CONTENTS

2-7
About PAGE

8-15
Summary of core offer

16-31
UN Environment offer

32-43
International Labour Organization offer

44-55
UN Development Programme offer

56-63
UN Industrial Development Organization offer

64-73
UN Institute for Training and Research offer

74-79
PAGE global resources

80-82
PAGE key contacts
Since its inception in 2013, the Partnership for Action on Green Economy (PAGE) has grown into a prominent alliance of five UN agencies, eight funding partners and eighteen countries that work together to transform economies into drivers of sustainability, to foster economic growth, create income and jobs, reduce poverty and inequality and strengthen the ecological foundations of global economy. Thanks to the wide-ranging specialized expertise of the five UN agencies and PAGE partners, PAGE embodies the principles of “one UN.” Because of this, PAGE is increasingly recognized as a uniquely effective model for delivering comprehensive and coordinated support to countries to achieve the Sustainable Development Goals (SDGs) and to address climate change.

The focus and area of action for PAGE is upstream, where policies that shape the full economy are created and propelled downstream. By working at the “policy riverbed,” PAGE has a broader catalytic effect downstream, in economic sectors and in the myriad initiatives undertaken in each of those sectors. The collective convening power of the five UN partners and distinct

FOOTNOTES
2. European Union, Finland, Germany, Norway, Republic of Korea, Sweden, Switzerland, and United Arab Emirates.
3. Argentina, Barbados, Brazil (Mato Grosso State), Burkina Faso, China (Jiangsu Province), Ghana, Guatemala, Guyana, India, Indonesia, Kazakhstan, Kyrgyz Republic, Mauritius, Mongolia, Peru, Senegal, South Africa, and Uruguay.
expertise of each of them enables PAGE activities to cover macro, meso and micro levels of the economy and issues that cut across economic sectors. PAGE also helps to create a policy environment that enables and promotes investments and projects that are aligned with overall sustainability objectives.

PAGE activities bring together national counterpart ministries and the networks of five UN agencies to strengthen integrated policymaking processes as called for in the 2030 Agenda. In addition to promoting institutional and policy coherence, synergies and partnerships among Government agencies and between public, private, civil society and academic sectors, PAGE projects make a strong business case for investing in sustainability. Through its emphasis on national ownership, PAGE supports countries to build knowledge and consensus, and to create a collective commitment to plan and implement reforms that advance the transition to a green economy and contribute to achieving the SDGs.

The recent UN-wide reforms, which serve to enhance coherence and joint delivery across the organisation, have further reinforced the usefulness of PAGE’s joint-delivery model and demand-driven nature of its activities. It is a firm conviction of PAGE partners that an inclusive and green economic future can only be achieved through a collaborative approach that builds on and extends a vibrant network of partnerships - across disciplines, countries and stakeholders from around the globe.

In order to address these challenges and ensure a sustainable future, governments, civil society and the private sector must work together to create opportunities to ensure long-term prosperity for all in a resource-constrained world. An inclusive green economy and related concepts (such as circular economy, low-carbon economy, ecological civilization, living well, sufficiency economy, green growth, inclusive wealth, etc.) provide such opportunities.

In its simplest expression, such an economy is low carbon, resource efficient and clean in production, but also inclusive in consumption and based on principles of sharing, circularity, collaboration, solidarity, resilience, opportunity and interdependence. It is focused on expanding options and choices for national economies, using appropriate fiscal and social protection policies, and backed up by strong institutions that are specifically geared to safeguarding social and ecological floors. In addition, it recognizes that there are many pathways to environmental sustainability, and diverse expressions and interpretations of the green economy concept that suit varying national contexts. The transition to inclusive green economies on a global scale is fully aligned with the objectives of the Paris Agreement, and the SDGs more broadly, and will be fundamental to achieving the transformative societal change required to meet these objectives.

In a green economy, growth jobs and socioeconomic equity is driven by investments in addressing local and global sustainability challenges. Inclusive green economy also requires a shift of consumption and public spending and the liberalization of trade towards environmentally friendly goods and services.

WHAT IS AN INCLUSIVE GREEN ECONOMY?

The root causes of unsustainable development patterns can be traced back to the misallocation of capital to activities that generate economic benefits, but with negative social and environmental externalities. These activities are anchored in economic policies and practices and sometimes deeply flawed national economic planning processes that historically have promoted short-term gains in income and GDP growth while undermining sustainable development.

We take an upstream, economy-wide approach, with the overall goal to help transform national economies into drivers of environmental sustainability, social inclusion and economic growth. We think the best way to go about this transition is to:

1. Put sustainability at the centre of national planning, economic policymaking and financial systems, by grounding national decision-making in inclusive green economy principles
2. Identify opportunities to ‘green’ economic sectors and thematic areas, thereby reducing environmental impact whilst improving competitiveness
3. Build the capacity and skills of partner countries to better implement and expand on 1 & 2 above
4. Inform and influence global public and policy debates to advocate for green economy transitions on a global scale based on learning accumulated by the countries, including through South-South and North-South collaboration.
Our work with countries is grounded in a set of core values:

• **Country ownership**: PAGE engagement is shaped and driven by key national ministries/provincial departments, in cooperation with all relevant stakeholders.

• **Programmatic and policy reform focus**: PAGE focuses on enabling strategic policy analysis and supporting macro-economic, sectoral, and thematic policy reforms, depending on appetite for reform and timing of policy cycle.

• **Activities are founded on national development planning**: PAGE activities are linked to existing planning structures and processes for long-term sustainability.

• **Trans-disciplinary collaboration**: PAGE activities are initiated in countries where key ministries/provincial departments have jointly expressed interest in collaborating with PAGE.

• **Broad-based stakeholder participation**: PAGE supports the active engagement of key stakeholder groups and societal partners in planning and implementation.

• **Joint commitment**: Governments and PAGE partners work together based on collective commitment to achieve sustainable development for all.

• **Equal partnership among all countries**: PAGE is a partnership based on learning and exchange of ideas, innovations and practices among equals. PAGE offers opportunities for North-South-South learning and knowledge exchange.

• **Commitment to results-based programming and allocation of effort**: PAGE commits to engage with countries when and where its support is crucial for informing the policy cycle but may withdraw or put activities on hold if interest wanes or national priorities change, threatening the success of PAGE-supported efforts.

Bringing all this together, PAGE delivers a coherent, integrated offer with economy-wide reach, comprising of technical assistance, analysis tools, capacity building, and network expansion.

**PAGE COUNTRIES**

PAGE is currently working with eighteen countries to support their inclusive green economy transition, though the number of partnering countries is continuing to grow.

**PARTNER COUNTRIES**

PAGE is currently working with eighteen countries to support their inclusive green economy transition, though the number of partnering countries is continuing to grow.

**TIMELINE**

<table>
<thead>
<tr>
<th>Year</th>
<th>Active Countries</th>
<th>New Countries</th>
</tr>
</thead>
<tbody>
<tr>
<td>2013</td>
<td>2</td>
<td>0</td>
</tr>
<tr>
<td>2014</td>
<td>6</td>
<td>4</td>
</tr>
<tr>
<td>2015</td>
<td>8</td>
<td>2</td>
</tr>
<tr>
<td>2016</td>
<td>11</td>
<td>3</td>
</tr>
<tr>
<td>2017</td>
<td>13</td>
<td>2</td>
</tr>
<tr>
<td>2018</td>
<td>18</td>
<td>5</td>
</tr>
</tbody>
</table>

Funding partners, in 8 PAGE countries. 96 countries represented at PAGE events.
PAGE helps governments create and implement policies that promote green economic activities, by providing the following tools and services:

<table>
<thead>
<tr>
<th>Tools and Services</th>
<th>Overview</th>
</tr>
</thead>
<tbody>
<tr>
<td><strong>Stocktaking</strong></td>
<td>PAGE reviews the current policy and regulatory environment and analyses how it is impacting economic development, employment, environmental sustainability, social inclusiveness and financing for green transformation. It helps to identify most critical entry points for PAGE support.</td>
</tr>
<tr>
<td><strong>Modelling</strong></td>
<td>As part of the macroeconomic assessment, modelling is conducted through a specially designed tool that takes several commonly used modelling methods and integrates them to forecast economic, social and environmental benefits of different policy and investment scenarios. It helps policymakers to prioritise appropriate policy and investment decisions for most rewarding economic sectors.</td>
</tr>
<tr>
<td><strong>Policy analysis and alignment</strong></td>
<td>PAGE analyses and reviews how existing or proposed policies align with national development targets, the Paris Agreement and the Sustainable Development Goals.</td>
</tr>
<tr>
<td><strong>Institutional capacity building</strong></td>
<td>PAGE ensures that the domestic policy-making infrastructure can continue to build momentum towards an inclusive green economy.</td>
</tr>
<tr>
<td><strong>Cooperation and coordination</strong></td>
<td>PAGE builds inter-ministerial coordination mechanisms, cross-sectoral networks and international platforms to exchange ideas about policy innovations and learn best practices and lessons on implementation.</td>
</tr>
</tbody>
</table>
PAGE prioritises supporting the development of key sectors that can drive future economic growth and sustainable development.

**Tools and Services**

**Overview**

**Sectoral assessment**

PAGE analyses the potential of individual economic sectors, as well as specific thematic areas, including trade, jobs, industry, infrastructure, fiscal measures, investments, learning needs and the macroeconomic environment to determine inclusive green economy opportunities and capacity for development.

**Strategy development**

PAGE supports in developing policies, national development and investment plans for promoting sectors that grow the economy, protect the natural environment and provide better employment and consumption choices for poor and vulnerable communities.

**Institutional capacity building**

PAGE builds capacity and skills of individuals and institutions to put a greener and more inclusive economy into action.

**Green skills development**

PAGE works with business associations, universities and governments to develop and deliver green skills curricula customized to the green growth trajectory of the country.

PAGE provides analysis, tools and advice to enable policymakers to assess the impact of their policy and investment decisions on their progress towards the Sustainable Development Goals and national green economy targets.

**Tools and Services**

**Overview**

**Developing new measurement frameworks**

PAGE has developed a tool—the Green Economy Progress measurement framework—that enables countries to track their inclusive green economy progress at a country level, facilitating cross-country comparison of achieved progress.

**Driving implementation of measurement tools**

PAGE assists countries in setting up this measurement framework to gauge progress in making their economies more sustainable and to guide future action. The Green Economy Progress measurement framework also supports the assessment of progress in achieving the SDGs.

**Institutionalizing green economy data**

PAGE develops strategies and action plans for relevant government agencies and institutions to collect, store and analyse green economy data in a scientifically rigorous manner and enables comparison across countries and time periods.
Green economic activities are more powerful when they are undertaken as a global effort. PAGE has been successful in supporting the movement toward sustainable economies by helping drive and shape conversations about the future we want.

PAGE convenes green economy stakeholders, including decision-makers, green champions, thought leaders from the public and private sectors and civil society at global events to share ideas, best practices and opportunities for further development.

PAGE participates in global fora and high-profile events, and engages with and trains media representatives on green economy issues to ensure that inclusive green economy is kept on the agenda of decision-makers.

PAGE connects with organizations, government agencies and civil society groups to build a green economy network and creating a multiplying effect on green economy action.

PAGE creates green economy learning environments and resources to help build the next generation of green economy leaders and support South-South cooperation and knowledge exchange.

PAGE uses a variety of traditional, social media and online mechanisms to generate grassroots green economy discussions and celebrate green economy champions.

**Tools and Services**

**Overview**

- **Global events**: PAGE convenes green economy stakeholders, including decision-makers, green champions, thought leaders from the public and private sectors and civil society at global events to share ideas, best practices and opportunities for further development.

- **Green economy advocacy**: PAGE participates in global fora and high-profile events, and engages with and trains media representatives on green economy issues to ensure that inclusive green economy is kept on the agenda of decision-makers.

- **Building partnerships and networks**: PAGE connects with organizations, government agencies and civil society groups to build a green economy network and creating a multiplying effect on green economy action.

- **Learning and exchange**: PAGE creates green economy learning environments and resources to help build the next generation of green economy leaders and support South-South cooperation and knowledge exchange.

- **Public outreach**: PAGE uses a variety of traditional, social media and online mechanisms to generate grassroots green economy discussions and celebrate green economy champions.

**INSPIRING ACTION**

Left: At global events, such as the PAGE Ministerial conferences, PAGE brings together ministers from PAGE countries and Funding Partner countries, innovators and leaders from the private sector and civil society, academics, thought leaders and champions to exchange ideas, share best practices, discuss latest developments and learn from experiences.
PAGE works with relevant institutions and initiatives to support governments and the private sector to develop strategies to build financial systems that are responsive to and rewarded for sustainable investment.

**Tools and Services**

**Overview**

**Assessing demand**
PAGE conducts and interprets analyses to determine the appetite for green financial products within the domestic market to inform planning and drive investment.

**Strategic planning**
PAGE works with partners and experts to develop strategies to scale sustainable and ‘green’ finance practices and products, through identifying key characteristics and objectives and exploring possible action plans to achieve these goals.

**Connecting actors**
PAGE forms strategic connections between relevant government ministries, public sector finance, the banking sector and green finance experts to enable the public and private sector to work together to create conditions favourable for green finance to flourish.

**Building skills**
PAGE delivers training on green financial mechanisms and products to help create a critical mass of skilled and interested parties to engage in green financial markets.

**Green finance awareness**
PAGE provides platforms to elevate and amplify the conversation on green finance, highlighting its centrality for long term sustainable development at global events and discussions.

The Mongolian sustainable development and green growth vision offers an ambitious set of goals centered on human development, inclusive growth and equity, and entails the establishment of an investment program, enhancement of the capacity of human resources, and improvement in the operations of development funds as key directives.

However, putting sustainability at the heart of economic and financial policies and practices is urgently needed if the Sustainable Development Goals are to be achieved and a low carbon development is to be realized. Realizing these needs, the Mongolian Bankers Association, have been proactively contributing to the country’s green economy agenda by launching a set of voluntary standards called the Mongolian Sustainable Finance Principles. The principles define how financial institutions can manage environmental and social risks and meet growing financing needs for green and inclusive economic growth. The principles have already been adopted by all banks; environmental and social management systems (ESMS) have been established and environmental and social risk assessments in banks’ lending and investment operations have been integrated.

Principle 4, named “Promotion of Green Economy Growth”, urges banks to consider their core business and existing mix of products and services, as well as new market opportunities to develop appropriate green products or services, in order to realize the implementation of principle 4, it was concluded that a financial mechanism needs to be established to effectively promote green business development.

Recognizing this need, The Government of Mongolia, represented by the Ministry of Environment and Tourism, and the Mongolian Bankers Association are jointly working to establish the Mongolian Green Credit Fund (MCGF), a national green finance vehicle to bring long-term financing to projects and companies that stimulate green growth in the country. With the support of the Global Green Growth Institute and PAGE, the MCGF's Business Plan has been developed and relevant legal and market assessments have been conducted. Further preparatory activities are being conducted under the Readiness and Preparatory Program of the Green Climate Fund along with the MCGF.

Furthermore, the realization of sustainable finance implies looking at the governance structures and institutions which regulate financial market outcomes. These efforts have been led by the Government of Mongolia and supported by PAGE, the Global Green Growth Institute, the Netherlands Development Finance Company, the International Finance Company and UN Environment Inquiry, among others. PAGE is proud to be a humble partner of Mongolia in its green economy efforts.
During the country PAGE Inception phase, stocktaking is an important exercise to establish a baseline as it plays a key role in helping to set out priorities, including at the sectoral level or for thematic policy reform.

The stocktaking exercise is usually led by the country’s lead agency, with participation from other PAGE agencies, as well as local stakeholders.

Specific objectives of the stocktaking include, inter alia, the following:

- Summarize existing economic, social and environmental policies relevant to green economy;
- Identify national and international institutions and actors relevant for achieving PAGE objectives;
- Review ongoing and planned initiatives and projects related to green economy;
- Summarize key results from economic and other relevant studies and assessments;
- Initiate identification of priority work streams and action under the national PAGE partnership.

Country highlights

- MONGOLIA
- CHINA (JIANGSU PROVINCE)
- KYRGYZ REPUBLIC
- PERU
UN Environment, under PAGE, and in close collaboration with national stakeholders, supports the process of elaborating national green economy policies and action plans. Building on the partnership’s agency expertise, PAGE provides technical advisory feedback on various national green economy themes that inform the development of such strategies.

**Country highlights**

**Support for the development of the National Green Growth Strategy in Peru**

In 2014, Peru presented its roadmap supported, inter alia, by PAGE. The initial Green Economy Stocktaking Study and the findings of the Green Economy Assessment are informing the Guidelines for Green Growth in Peru. This endeavour is led by the Ministry of Economy and Finance and the Ministry of Environment, while being supported by the Global Green Growth Institute. The National Green Growth Strategy aims to create more efficient public policies to promote good regulatory practices, improve environmental public education and promote sustainable patterns of consumption and production.

**Support for the development of the National Green Economy Strategy in Burkina Faso**

In June 2016, Burkina Faso started the process of developing a National Green Economy Strategy along with a Three-Year Action Plan for its implementation. The strategy considers key areas such as climate change, sustainable consumption and production, and green jobs. The overall process is led by the Ministry of Environment, Green Economy and Climate Change, with support from PAGE. The strategy aims to strengthen the integration of green economy in all sectors of national development. The latter was recently validated by national stakeholders and is now ready for official adoption by the government.

UN Environment provides policy advice to countries on how fiscal reforms can mobilize revenues to support the transition to an inclusive green economy while addressing environmental and social externalities.

**Green Fiscal Policy**

To this end, UN Environment:

- Undertakes research and policy analysis to support countries on green budgeting and fiscal policy reforms;
- Supports knowledge sharing among countries and promotes good practices on green fiscal policy reforms;
- Promotes policy dialogue to push the global agenda on green fiscal policies.

Our work on green fiscal policies also supports countries to develop public financial mechanisms for green investment and facilitates a green transition of different sectors and thematic areas including energy, climate change, pollution, water and extractives through fiscal policy reforms. UN Environment pushes its work on green fiscal policies and green budgeting through a wide range of partnerships established by the Green Fiscal Policy Network (GFPN).

GFPN is a joint partnership between UN Environment, the International Monetary Fund (IMF) and Deutsche Gesellschaft für Internationale Zusammenarbeit (GIZ) that facilitates knowledge sharing and dialogue on green fiscal reform.

**Country highlights**

**Green fiscal policy support in Senegal**

In Senegal, UN Environment carried out a study exploring different financial vehicles and mechanisms to manage revenues from oil and gas extraction. Drawing on insights from global best practices, the study sets out some policy options to promote sustainable development through the management of revenues from the oil and gas sector.

The report informed discussions at the 3rd National Conference on Sustainable Development in May 2018 which focused on the “Sustainable and Healthy Exploitation and Management of Gas and Oil Resources”. For more information on Green Fiscal Policy in Senegal, click here.

**Analysis for agricultural financial instruments in Uruguay**

In Uruguay, UN Environment carried out policy analysis of the impact of introducing an agriculture water charge. The charge is one of the instruments proposed under the new National Water Plan as a way to raise revenues, increase water use efficiency and improve water quality. More information is available here.
UN Environment supports countries in developing Green Economy Policy Assessments for informing policymaking decision processes on green economy within the context of the Sustainable Development Goals and the Paris Agreement on Climate Change.

Green Economy Modelling is a powerful tool that:
- establishes a relationship between policy targets and relevant economic, environmental and social dimensions;
- projects the impacts of policy measures in advance;
- analyses the effects of existing policies and;
- identifies synergies and cross-sector impacts among policy choices.

UN Environment works on strengthening institutional and individual capacities of local institutions on modelling techniques through tailor-made trainings:
- basic and introductory training activities for stakeholders;
- specialized trainings/intermediate level for green economy analysts;
- in-depth trainings for modellers.

The IGEM framework presents a methodology on how to integrate three of the main modelling techniques (SD, CGE and IO-SAM) used for green economy policy assessment to refine impact analysis of green policies and investments in the economy.

In Guyana, UN Environment is conducting a Green Economy Policy Assessment that informs the development of the Green State Development Strategy by simulating green investments in key sectors, specifically forestry, agriculture, energy, and infrastructure. For more information click here.

In Peru, UN Environment supported a Green Economy Policy Assessment to assess ex-ante the economic, social and environmental impacts of implementing 3 out of the 11 intended Nationally Determined Contributions submitted by the country as part of the voluntary contributions to the Paris Agreement on Climate Change.

PAGE has developed the Integrated Green Economy Modelling (IGEM) framework that aims to better respond to countries’ needs in terms of analysing the cross-sectoral impacts of Green Economy (GE) policies. The IGEM framework presents a methodology on how to integrate three of the main modelling techniques (SD, CGE and IO-SAM) used for green economy policy assessment to refine impact analysis of green policies and investments in the economy.

The implementation of the IGEM in Peru aims, inter alia, to capture dynamics of the Peruvian manufacturing sector and facilitate the analysis of green industrial policies. The IGEM will be used by the Peruvian government to assess the ex-ante economic, social and environmental impact of green industrial policies. Current discussions with local stakeholders include improving energy efficiency across three prioritized manufacturing sub-sectors as well as the Nationally Appropriate Mitigation Actions planned for the cement industry. It is expected that the implementation of these interventions will boost economic efficiency and labour productivity of manufacturing firms, and reduce GHG emissions and air pollution with positive spill-over effects on health, which will have many significant positive impacts at the regional and national level.
PAGE seeks to support nations and regions to improve skills, knowledge and institutional capacity. To deliver these outcomes, UN Environment collaborates with other UN agencies to deliver to countries capacity building and knowledge products.

**TRAINING ON GREEN ECONOMY MODELLING**

UN Environment and UNITAR are partnering together to develop the capacity of national institutions in PAGE countries through the training of technical staff and policymakers in relevant skills for Inclusive Green Economy macroeconomic analysis and policymaking. More information is available [here](#).

**TRAINING ON INDICATORS FOR GREEN ECONOMY POLICYMAKING**

The objective of this training package is to develop in-country capacity of PAGE partner countries on the understanding and application of Green Economy Indicator concepts, and their linkages with SDGs indicator monitoring through introductory and advanced modules on indicators for Green Economy Policymaking. More information is available [here](#).

**E-LEARNING COURSE ON GREEN FISCAL REFORM**

An interactive e-learning course on Green Fiscal Reform developed jointly by UNITAR, UN Environment and UNDP offers a practice-oriented approach to understanding various approaches and instruments for reforming government spending and revenue generation to support the transition to a green economy. More information is available [here](#).

**TRAINING ON SUSTAINABLE INFRASTRUCTURE**

UN Environment has developed a capacity building course on integrated approaches to the planning and development of sustainable infrastructure, in support of the green economy transition. The course provides tools and approaches that can be used for upstream, macro-level infrastructure planning that takes into account the interconnections between different infrastructure systems, landscapes and ecosystems, sectors, project phases, jurisdictions, and the environmental, social, and economic aspects of sustainability. More information is available [here](#).

**INTEGRATED GREEN ECONOMY MODELLING (IGEM) FRAMEWORK**

UN Environment under PAGE has developed the Integrated Green Economy Modelling (IGEM) Framework that aims to better respond to countries’ needs in terms of analyzing the cross-sectoral impacts of Green Economy policies. More information on the IGEM Framework is available [here](#).

---

**HOW GREEN FISCAL REFORM COULD INFLUENCE COUNTRY POLICIES TOWARDS MORE SUSTAINABLE NATURAL RESOURCE MANAGEMENT PRACTICES**

Mr. Martin van Brakel currently works at the WorldFish Bangladesh & South Asia office as a Fisheries Scientist. He is leading the efforts to improve livelihoods of communities that rely on the hilsa shad (dish fish) for the Enhanced Coastal Fisheries in Bangladesh (ECOFISH) project. Occasionally, he works as a consultant to assess aquatic resource-based livelihoods practices and ecotourism development, including recreational fisheries in other countries in the South Asia region.

During the weeks of 8 September to 10 November 2017, the Partnership for Action on Green Economy (PAGE) delivered an e-learning course on green fiscal reform to meet the learning needs and build capacities of national stakeholders.

The interactive and practice-oriented course provided participants from government, business, civil society and academia with an introduction to various approaches and policy instruments for reforming government spending and revenue generation with the goal of supporting the transition to a green economy.

For Mr. van Brakel, the course offers a very accessible yet in-depth and interactive learning experience with a huge scope for practical use in the design and formulation of green fiscal policies.

Mr. van Brakel explains that the “decline in yields of this fishery prompted the government of Bangladesh to launch a management action plan that is akin to payment for environmental services.”

However, the policy has done little to improve the life of hilsa fishers sustainably, while costing the nation considerable public resources each year. “My case study offers recommendations for a trust fund that could be allocated and managed in-country.”

He strongly encourages others to take the e-course: “The interactive way in which the e-course is implemented offered me a fantastic opportunity to receive grounded feedback on my case study, both from the highly experienced course facilitators and from my peers taking the course. It was also an enriching experience to learn from other examples of green fiscal reform all over the world, in ‘real time’... While donors nowadays emphasize on sustainable development, the finance of such development is becoming scarcer and scarcer. For this reason, governments will need to shift away from traditional external donor funding and move towards more sustainable finance mechanisms that can be allocated and managed in-country.”

This course provided Mr. van Brakel with valuable insights about how to develop and implement fiscal mechanisms in a sustainable manner. “I recommend this course to anyone who deals with designing and financing sustainable development, be it a government employee, natural resource manager or fiscal advisor,” he concludes.
The Environment and Trade Hub of UN Environment works together with PAGE in building capacities in partner countries to explore and harness trade and investment opportunities arising from the transition to an Inclusive Green Economy.

More specifically, this partnership provides assistance to countries in using trade and investment policy instruments to accelerate the transition to an Inclusive Green Economy through:

1. Green trade opportunities assessments and tools;
2. Advisory services on green trade policy and practices;
3. Promoting green industry and sustainable business through trade;
4. Capacity building in the area of trade and green economy, sustainable global value chains, and green industrial policy.

UN Environment assists governments in implementing Sustainable Public Procurement (for goods, services, works and utilities), which generates benefits not only to organizations, but also to society, the economy and the environment.

Technical assistance includes, inter alia:
1. Initial training;
2. Undertaking a Status Assessment, Legal Review, Prioritization Exercise and Market Readiness Analysis;
3. Strategic planning with the aim of developing a Sustainable Public Procurement Policy and Action Plan;
4. Supporting performance assessment and accompanying the country in the implementation process.

Country highlights
In Mongolia, UN Environment has supported the government in:
1. Developing a national SPP action plan;
2. Identifying an initial set of products to be purchased in line with sustainability principles;
3. Developing various SPP tools such as standard bidding documents, training materials and SPP Guidelines;
4. Introducing SPP provisions in public procurement legislation;
5. Mobilizing relevant stakeholders;
6. Connecting public officials with relevant international SPP activities.

Non-timber forestry products strategy in Burkina Faso
In Burkina Faso, UN Environment is supporting the government to update a sectoral strategy for non-timber forestry products with the aim of greening production and commercialization while exploring access to new markets. The technical assistance includes institutional and individual capacity building for key decision makers. More information is available here.

Learn more
Capacity building in China
Green industry and trade assessments in South Africa and Ghana

A GUIDELINE FOR SUSTAINABLE PUBLIC PROCUREMENT
PAGE seeks to support nations and regions to improve skills, knowledge and institutional capacity. To deliver these outcomes, UN Environment collaborates with other UN agencies to deliver to countries capacity building and knowledge products.

**E-Learning Course on Green Economy and Trade**

To meet the learning needs and build capacities of national stakeholders, UNITAR and UN Environment are collaborating within PAGE, to deliver the first interactive e-learning course at the nexus of trade and the green economy. More information on the e-learning course is available [here](#).

**Green Industrial Policy Trilogy**

To inform policymakers, researchers and practitioners about the concept of Trade and Green Industrial Policies and the instruments available, UN Environment and UNIDO under PAGE has published a trilogy, available [here](#).

**Green Economy Indicator Guidance Manual**

The Green Economy Indicator Guidance Manual places emphasis on policy options with “multiple dividends” across the environmental, social and economic dimensions of sustainable development. The Green Economy Indicator Guidance Manual has been applied to specific policies and sectors in Uruguay, Mauritius, Ghana, and Rwanda. More information on the Green Economy Indicator Guidance Manual is available [here](#).

**Green Economy Progress (GEP) Measurement Framework**

Two main products are available to partner countries:

1. The Green Economy Indicator Guidance Manual, which provides guidance to countries on the use of indicators in different stages of policymaking. Emphasis is placed on policy options with “multiple dividends” across the environmental, social and economic dimensions of sustainable development. The Framework serves to introduce greater levels of transparency to policymaking and has been applied in Jiangsu Province in China. More information of the Green Economy Progress Measurement Framework is available [here](#).

2. The GEP Measurement Framework, that allows countries to monitor overall progress towards achieving development priorities and key Sustainable Development Goals. In addition, the tool enables cross-country comparison on Green Economy progress. In May 2018, PAGE delivered a training on indicators for green economy policymaking to monitoring and data government officials in South Africa. The training presented the methodology of PAGE’s GEP Measurement Framework and discussed its application. PAGE is currently working with the Department of Environmental Affairs and the Department of Science and Technology to establish a National Green Economy Indicators Framework for South Africa.

Additionally, UN Environment provides trainings that strengthen institutional and individual capacities on metrics and indicators throughout the whole process.

**Country Highlights**

**GEP Measurement Framework in China**

In January 2017, Nanjing University, on behalf of PAGE, embarked on a research project to apply the GEP Measurement Framework at the sub-national level to assist green economy policymaking and progress monitoring. The project has led to the development of a provincial-level green economy indicators framework, primary assessment results for Jiangsu province, from 2013 to 2015, and a technical note detailing the methodology. More information available [here](#).

**Indicator training in South Africa**

In May 2018, PAGE delivered a training on indicators for green economy policymaking to monitoring and data government officials in South Africa. The training presented the methodology of PAGE’s GEP Measurement Framework and discussed its application. PAGE is currently working with the Department of Environmental Affairs and the Department of Science and Technology to establish a National Green Economy Indicators Framework for South Africa.
KNOWLEDGE PRODUCTS

UN Environment under PAGE has developed a key tool for policymakers, analysts and other stakeholders for understanding how green economy is progressing. The Green Economy Progress (GEP) Measurement Framework helps countries evaluate their overall progress towards an Inclusive Green Economy and enable a cross-country comparison of progress.

The GEP Measurement Framework has four objectives:
1. To support the assessment of progress in achieving a selection of the SDGs within the 2030 Sustainable Development Agenda and establishing direct links with them;
2. To help countries monitor progress against nationally set targets in priority areas;
3. To introduce greater levels of transparency to policymaking and provide policymakers with the tools necessary to set up policies that support the transition to an Inclusive Green Economy; and
4. To measure and compare green economy efforts across countries.

The GEP Measurement Framework aims to understand the extent to which an inclusive green economy addresses three main global challenges, namely:
(a) persistent poverty; (b) overstepped planetary boundaries; and (c) inequitable sharing of growing prosperity.

It includes measurements of accumulation of capital – be it natural, low carbon and resource efficient, human, or social – which serves as input for producing goods and services in an environmentally friendly manner. It also attempts to capture the transition of consumption, investment, government spending and trade towards such goods and services. The GEP Measurement Framework also includes measurement of the outcome of enabling policies that are conducive to an Inclusive Green Economy.

Progress in improving these outcomes is then analysed against specific planetary boundaries, such as greenhouse gas emissions, water and land use.

In its initial version, the GEP Measurement Framework is composed of a GEP Index and a companion Dashboard of Sustainability indicators. These components can be both analysed individually and combined to allow the ranking of progress by country (GEP+).

The first component, the GEP Index, measures the progress made in improving the well-being of current generations in relation to economic opportunities, social inclusiveness and environmental protection. It is composed of 13 indicators that capture critical issues faced in achieving an Inclusive Green Economy transition, such as material footprint and inequality.

The GEP Index focuses on the progress achieved by countries with respect to a target set for each individual indicator. Construction of the GEP Index utilizes a weighting system that allows for the assessment of how far off a country is from the global threshold on a specific component of an Inclusive Green Economy (an indicator) and an evaluation of the relative importance of one component (an indicator) with respect to the others from the country’s perspective.

The Dashboard of Sustainability includes six indicators that track the sustainability of any progress that has been achieved as measured by the GEP Index. Its role is to monitor the long-term sustainability of the factors underpinning humanity’s current and future well-being.
UNEP FI’s work includes a strong focus on policy – at an international level, by providing a network and research to foster the consideration of sustainability issues by financial supervisors and regulators, and to include the financial sector in processes such as global climate negotiations; and at a country-level, by supporting sustainable finance roadmaps that provide frameworks to enable financial institutions to contribute more systematically to the transition to an inclusive, resilient and low-carbon economy.

SUSTAINABLE FINANCE E-LEARNING COURSE

The practice-oriented course seeks to provide participants from governments, financial sector, businesses, and civil society with an introduction to various approaches to promote and harness opportunities related to sustainable finance. Learners will gain an understanding of the benefits and rationale of sustainable finance solutions over conventional investment. The course provides technical knowledge on various sustainable finance mechanisms and their application to a real-world policy or business context.

This course is a product of collaboration between PAGE and the Strategic Alliance on Green Bond Market Development in G20 Emerging Economies (STA), a BMZ-funded partnership between Skandinaviska Enskilda Banken (SEB) and Gesellschaft für Internationale Zusammenarbeit (GIZ) GmbH.

INSPIRING ACTION

GREEN GROWTH EXPERT CONNECT SERVICE

The service is available, at no cost, to government agency representatives from developing countries and supporting technical institutes. To request support, policymakers can submit a question through the Green Growth Knowledge Platform (GGKP), and the GGKP will match them with a leading green growth policy expert. The expert will then work with the policymaker to provide tailored support, including review of draft strategies, analyzing policy options, sharing experiences and best practices from other countries, facilitating networking and providing information on similar programs.

Expert Connect offers support on a range of topics, including fiscal reform, access to finance, indicators and metrics, ecosystem valuation, sustainable consumption and production, sustainable trade, and government procurement.

For more information, click here.

Country highlights

Drafting Mongolia’s green construction policy

In collaboration with the Partnership for Action on Green Economy (PAGE) and the Clean Energy Solutions Center, the GGKP Expert Connect is supporting Mongolia’s transition to a green economy through the drafting of a new national green construction policy. The policy centers on sustainable urban planning, with the overall objective of avoiding urban sprawl and creating compact cities in Mongolia. Once adopted, the National Green Construction Policy, once adopted, will contribute to Mongolia’s Sustainable Development Vision 2030 and its related Green Development Policy.

The Green Growth Knowledge Platform (GGKP) is a global community of organisations and experts that provides relevant, timely and targeted policy guidance, best practices, tools and data to support the transition to an Inclusive Green Economy. The GGKP was founded in 2012 by the UN Environment, the Global Green Growth Institute (GGGI), the Organization for Economic Co-operation and Development (OECD) and the World Bank.

Country highlights

Green bonds development in Mauritius

In 2017, the Stock Exchange of Mauritius requested UN Environment’s support under PAGE for green bonds market development, with a focus on building capacity among green bond issuers, investors and verifiers. Training and awareness raising activities are undertaken to enable the issuance of green bonds on the Mauritius Stock Exchange. For more information on UN Environment’s work on Green Bonds in Mauritius, click here.

Green credit assessment in Mongolia

In Mongolia, UNEP FI and PAGE collaborated with the Mongolian Bankers Association to assess demand for green credits. The collaboration also contributed to the establishment of a joint working group for creating a Mongolian Green Credit Fund, and providing options for resource mobilization with the global Green Climate Fund.

UN Environment work on sustainable finance is led by the “Finance Initiative” (UNEP FI), a global partnership with banks, insurers and investors to align financial institutions with the UN Framework Convention on Climate Change and the Sustainable Development Goals.

UNEP FI’s work includes a strong focus on policy – at an international level, by providing a network and research to foster the consideration of sustainability issues by financial supervisors and regulators, and to include the financial sector in processes such as global climate negotiations; and at a country-level, by supporting sustainable finance roadmaps that provide frameworks to enable financial institutions to contribute more systematically to the transition to an inclusive, resilient and low-carbon economy.

SUSTAINABLE FINANCE E-LEARNING COURSE

The practice-oriented course seeks to provide participants from governments, financial sector, businesses, and civil society with an introduction to various approaches to promote and harness opportunities related to sustainable finance. Learners will gain an understanding of the benefits and rationale of sustainable finance solutions over conventional investment. The course provides technical knowledge on various sustainable finance mechanisms and their application to a real-world policy or business context.

This course is a product of collaboration between PAGE and the Strategic Alliance on Green Bond Market Development in G20 Emerging Economies (STA), a BMZ-funded partnership between Skandinaviska Enskilda Banken (SEB) and Gesellschaft für Internationale Zusammenarbeit (GIZ) GmbH.
POLICY & PLANNING
GREEN EMPLOYMENT POLICY

Advisory Support, Information Services and Training Programme (ASIST-AP)

In 15 countries across the globe, the ILO is implementing the ASIST-AP programme to develop and mainstream local resource-based strategies for sustainable development and poverty reduction.

Employment Intensive Investment Programme in Asia and the Pacific

In Asia and the Pacific, the ILO supported national agencies to deliver local infrastructure services to develop adaptation measures such as flood-proofing and improved water and land resource management to improve natural disaster resilience.

GREEN EMPLOYMENT POLICY STRATEGIES

Building on green jobs assessments and green jobs mapping studies (see further below), the ILO supports countries to develop national employment strategies and adapt national employment policies to incorporate green growth objectives and better promote the creation of green jobs.

EMPLOYMENT-INTENSIVE INVESTMENT AND GREEN INFRASTRUCTURE

The ILO has accumulated a wealth of experience related to public works programmes in which local resource-based approaches have been used to improve livelihoods in rural areas—including soil conservation programmes, irrigation and water supply systems, rural road works, and reforestation measures—and to mitigate the impact of future natural disasters and climate change. In urban areas, the ILO has supported the implementation of employment-intensive investment measures to improve working and living conditions in slums by tackling solid waste disposal and water drainage issues.

The ILO’s Local investments for climate change adaptation: Green Jobs through green works is a guide for identifying, designing and implementing interventions in support of climate change at the local level. It links climate change adaptation with poverty reduction and employment creation.

Country highlights

<table>
<thead>
<tr>
<th>National Employment Policy support in Ghana</th>
<th>National Green Jobs Strategy support in Peru</th>
</tr>
</thead>
<tbody>
<tr>
<td>In Ghana, the ILO supported the stakeholders to revise the country’s National Employment Policy. Strategic actions under the creation of decent jobs to meet employment demand included the promotion of green jobs creation in energy and industrial efficiency, energy supply, transportation, biodiversity, conversation, and ecosystem restoration, soil and land management, and waste management.</td>
<td>Under PAGE in Peru, the ILO supported the formulation of the National Green Jobs Strategy for its incorporation into the National Employment Policy for 2015–2019. Assistance was also provided at the provincial level to incorporate green growth objectives into youth employment plans.</td>
</tr>
</tbody>
</table>
The ILO offers a range of training courses, both at its training centre in Turin, and as tailored, in-country programs, including green economy policy training at the global and national level.

INSTITUTIONAL CAPACITY BUILDING

- **Global**: The Academy on the Green Economy is a 2-week training and learning event that reviews the current knowledge and tools for a transition to environmentally sustainable and socially inclusive economies and fosters exchanges with experts and practitioners. Participants increase their capacity to formulate and implement green economy policies and strategies in key economic sectors, keeping up with new orientations of markets, government policies and social aspirations.

- **National**: The ILO also provides tailored training for national partners at the country level through National Academies and other customized courses, where participants learn to develop green economy policies and strategies in their specific country context.

Country highlights

**National Green Economy Academies in Burkina Faso, Senegal and South Africa**

These sessions were delivered to convene key national stakeholders—government, the private sector, think tanks, and academic institutions—in order to bridge knowledge gaps and training needs, and to facilitate a joint way forward in terms of setting public policy, private sector development, social protection, green industrialization, and employment creation goals in the context of the just transition.

**Green Economy training for trade unions in Mauritius**

The ILO helped trade unions gain a better overall understanding of green economy and green jobs. During the session, trade union representatives developed an action plan which identifies personal and institutional contributions to promoting green jobs creation at national level and in the context of PAGE.
How do you start "greening" your building and construction business while remaining competitive and affordable? What "eco-system" is needed to facilitate the transition to a greener built environment? What actors do you involve? What kind of policies need to be developed? What skills set is required? What are the implications for job creation?" Excerpt from Green building and construction course description.

SECTOR-SPECIFIC TRAINING

- Opportunities for green jobs in the waste sector, ITC-ILO Turin. This course focuses on the potential for decent work promotion and green business development across the waste hierarchy, with a focus on waste collection; reuse, refurbishment and remanufacturing; sorting and recycling; as well as reduction at source.
- Green building and construction: Pathway towards inclusive growth and the creation of decent and green jobs, ITC-ILO Turin. The course reviews key policies and strategies for the promotion of more and better jobs for inclusive growth in the building construction sector.
- Energy transition: Perspectives and opportunities for the world of work, ITC-ILO Turin. The course provides a conceptual framework for the promotion of more and better jobs through a sustainable and clean energy transition.

JUST TRANSITION TRAINING

Organised in collaboration with the Secretariat of the UNFCCC and delivered at the ILO’s training centre in Turin, the Promoting a just transition to low-carbon and climate-resilient development course provides a review of concepts, global practices and country experiences with the objective of understanding the main policy areas of the just-transition framework and giving them practical effect at country, sector and local level.
GREEN ENTREPRENEURSHIP TRAINING

As a part of its flagship business management program, Start and Improve Your Business (SIYB), the ILO has a vast Training of Trainers (ToT) Network, which has trained over 15 million entrepreneurs worldwide. As a part of the SIYB training package, the SIYB Green Business Booklet was designed to help aspiring entrepreneurs to set up green businesses and existing enterprises to go green. It provides guidance on how to come up with a green business idea, how to design a green business plan, and how to green the processes of a business. Therefore, the ILO can help boost green entrepreneurship in PAGE countries through the use and further development of the SIYB ToT network.

“GREENING” ENTERPRISES

Sustaining Competitive and Responsible Enterprises (SCORE) is an ILO programme that supports small and medium sized enterprises (SMEs) to grow and create more and better jobs by improving their competitiveness through better quality, productivity and workplace practices. ‘Productivity through Cleaner Production’ is a core SCORE training module, which supports SMEs to become more resource-efficient, reduce waste, and decrease the use of contaminants. Implemented in 9 countries around the world, SCORE has become a valuable programme for making the link between cost savings and greener production practices. See more here.

Country highlights

SCORE training in Ghana

In Ghana’s manufacturing sector, SCORE trained 185 enterprises and supported the skills development of 1,070 workers and managers. Upon completion of the programme, 47% of enterprises realized cost reductions, 35% of enterprises produced less waste and 13% of enterprises benefited from energy savings.

TRAINING OF TRAINERS WORKSHOP IN SENEGAL AND BURKINA FASO

Under PAGE, the ILO conducted a Training-of-Trainers workshop to support green enterprise creation in Senegal and Burkina Faso using the Green Business Booklet.

The sessions taught participants to train entrepreneurs to identify environmental challenges and ways to overcome them, define the green enterprise and understand the benefits of green business. In addition, sessions were held on training entrepreneurs to find a green business idea, develop a green business plan and green the production and consumption processes.

26 participants (8 women and 18 men) took part in this training including 17 SIYB trainers of Senegal and 5 SIYB trainers of Burkina Faso, 3 officials from Senegal and one official from Burkina as beneficiaries of the future training activities.

Through this training, PAGE supports Senegal in the framework of the project on the creation of green job opportunities (PACEV) and in Burkina Faso as part of the “Maison de l’entreprise”. Thus the trainers were selected on the basis of the PACEV intervention zones for Senegal and as trainers of the “Maison de l’entreprise” for Burkina Faso.

At the end of the training, participants are able to train entrepreneurs to identify environmental challenges and ways to overcome them, define the green enterprise and understand the benefits of green business. They are also able to train entrepreneurs to find a green business idea, develop a green business plan and green the production and consumption processes.

The next steps after this training will be to train the entrepreneurs who are beneficiaries of PACEV (Senegal) and the “Maison de l’entreprise” (Burkina Faso) on the green enterprise with the aim of encouraging the creation and development of green enterprises in the sectors such as solid waste management, renewable energies, agroforestry and agriculture.
GREEN VALUE CHAIN DEVELOPMENT

The ILO’s value chain development approach entails identifying the underlying causes to systemic constraints preventing inclusive and sustainable growth. It has been used in sectors like green construction building, waste management, sustainable tourism, and multiple agricultural sectors to tackle complex market issues. The approach analyses stakeholder incentives and capacities, as well as the market forces that drive the status quo, and develops solutions jointly with the existing market actors. See more here.

SOCIAL AND SOLIDARITY ECONOMY IN WASTE MANAGEMENT

The social and solidarity economy organizations are emerging as important actors in climate change adaptation and mitigation across countries. Waste management, in particular, has become a sector in which the ILO has substantial knowledge and experience in leveraging the power of cooperative models to foster inclusive growth and decent job creation. Think.COOP has been developed as a low-cost, easy to use training module for those interested in establishing or joining a cooperative.

Country highlights

- Waste sector social and solidarity economy organization support in Senegal
- Waste sector social and solidarity economy organization support in Indonesia
- Waste Picker cooperatives workshop in Turkey

In Senegal, based on joint research by the ILO and WIEGO on informal waste picker cooperation, the ILO is assessing the needs of waste pickers, garbage collectors and informal recycling workers in waste dumps in order to support the development of waste picker cooperatives and other social and solidarity economy organizations.

In Indonesia the ILO and UNIDO worked with cooperatives in 21 low-income villages to convert discarded nutmeg fruit into juice, turning waste into a market-ready product.

In Turkey, the ILO held a workshop “Understanding the Role of Waste Pickers and their Cooperatives in Waste Management and Recycling” which facilitated dialogue between waste pickers and central and local government officials on how to inclusively streamline and modernize the solid waste management business. Collective entrepreneurship, such as cooperatives, emerged as a concrete solution for integrating waste pickers into the Turkish modern waste management chain.

SKILLS FOR GREEN JOBS

Skills development is critical for unlocking the employment potential of green economies. However, skills shortages are often an obstacle in realizing this potential.

Under the PAGE program, the ILO conducts Skills for Green Jobs assessments that analyse the specific skills needed for new occupations, for greening existing occupations and within sectors undergoing structural changes as a result of policy implementation and the entry of new technology.

The assessments look at whether and how skills responses are integrated into larger greening policies and programs and provide recommendations for policies and strategies for meeting the country’s goals for greening the economy.

Country highlights

- Green skillset demand assessment in Mauritius
- Green skillset demand assessment in Senegal
- Green skillset demand assessment in Indonesia
- Green skillset demand assessment in South Africa

In Mauritius, the ILO outlined the current and future demand for green skillsets across sectors like agriculture, tourism, waste management, manufacturing, and renewable energy, and identified the current strengths and weaknesses of existing skills development mechanisms. Similar assessments were also conducted in Brazil, Burkina Faso, Ghana, Guyana, Senegal and South Africa.
As social protection is a core pillar of its Decent Work agenda, the ILO specializes in policies and programs that support vulnerable populations to manage economic and social risks. In the face of climate change, social protection initiatives are ever more important for safeguarding people working in highly affected sectors like agriculture and tourism. The ILO has refined a number of financial tools under its Social Finance Program and Impact Insurance Facility to support climate affected populations in countries around the world.

**Country highlights**

**Index-Based Insurance Programme in Ethiopia**  
In Ethiopia, a drought devastated many areas across the country, wiping out farmer livestock. Impact insurance measures put in place through the Index-Based Insurance Programme enabled the 1,400 enrolled farmers to be reimbursed for incurred losses. A similar programme is also in place in Kenya.

**Employment programme in the Philippines**  
After hurricane Haiyan hit the Philippines in 2013, the ILO rolled out an emergency employment programme to help the most affected to earn an income and sustain a livelihood by rebuilding community infrastructure. The ILO worked with local communities to construct new homes using interlocking compressed earth blocks, which were more disaster resistant and environmentally sustainable. The programme directly supported 15,000 people, who received a guaranteed minimum wage and access to social security benefits.

Through its unique tripartite structure, the ILO is well-positioned to facilitate engagement among different stakeholders, with particular emphasis on dialogue among governments, employers’ associations and workers’ organizations. Dialogue platforms are a key mechanism to set mutually agreed upon goals and action plans towards a just transition to a greener economy; they help to gather rich insights from different stakeholders and to build broad-based consensus around policy choices. The ILO also supports the development of knowledge sharing platforms, fora, and learning events.

Under its Enterprises Initiative, the ILO established a platform for ILO engagement with enterprises to contribute to sustainability goals of both the private sector and the ILO and involves both workers and employers organizations.

**INSPIRING ACTION**

**SOCIAL DIALOGUE FOR A JUST TRANSITION**

In Ghana, the ILO jointly organized a Regional Forum on Greening Industries and Green Entrepreneurship Promotion as a driver of sustainable and inclusive growth in rural Africa with UNU-INRA to build capacity and establish a common understanding of greening industries, enterprises, and workplaces in Africa.
UN DEVELOPMENT PROGRAMME OFFER

POLICY & PLANNING

POLICY ALIGNMENT

UNDP works closely with national counterparts and P AGE partners to integrate inclusive green economy concerns and priorities into the design, financing, implementation and review of national development strategies and policies of P AGE member countries.

ALIGNMENT OF GREEN ECONOMY PRIORITIES WITH SUSTAINABLE DEVELOPMENT GOALS AND PARIS AGREEMENT IMPLEMENTATION

Inclusive green economy policies can have both positive and negative overspill effects on other sectors of society. Therefore, looking at multiple policy areas in relation to one another can provide critical insights into the opportunities for achieving specific goals simultaneously, and avoiding the external costs of single sector–focused policies. UNDP works with partner countries to understand interlinkages between policies and priorities and foster alignment with the SDGs and Paris commitments.

Country highlights

In 2014 in Mongolia, with P AGE support the Parliament approved the National Green Development Policy (NGDP), whose development was supported by P AGE. In January 2016, the Cabinet approved an Action Plan for implementation of the NGDP and one month later the State Great Khural, the Mongolian Parliament, adopted the Sustainable Development Vision (SDV) 2030. Under its Nationally Determined Contribution, Mongolia committed to reduce national greenhouse gas emissions by 14% by 2030, compared to the projected emissions under a business as usual scenario. Click here for more details.

LEFT: A woman in Kyrgyz Republic checks on her harvest in a solar greenhouse, an environmental technology that can reduce emissions while improving food security.

Credit: UNDP in the Kyrgyz Republic

LEFT: Aligning national development priorities with Sustainable Development Goals
MAPS stands for Mainstreaming, Acceleration and Policy Support. MAPS was adopted by the United Nations Development Group in October 2015 as a common approach to its support to the implementation of the 2030 Agenda for Sustainable Development at the country level.”

Excerpt from MAPS: A common approach to the UNDG’s policy support to the SDGs – An update on implementation. Available here.

**POLICY ANALYSIS**

**DIAGNOSTICS, INCLUDING PUBLIC ENVIRONMENTAL EXPENDITURE REVIEWS (PEER), CLIMATE PUBLIC EXPENDITURES AND INSTITUTIONAL REVIEWS (CPEIR), AND COSTINGS**

PEERs and CPEIRs offer systematic quantitative and qualitative analysis of public resource allocations within and across sectoral ministries, and/or at national and subnational levels of government. They assess the efficiency and effectiveness of allocations in the context of the country’s environmental and climate change management framework and priorities. They also identify reforms needed to improve the effectiveness, efficiency and sustainability of public spending for environmental and climate change management, including through relevant policies, institutional frameworks and budget processes.

**CAPACITY BUILDING**

**SUPPORT FOR NATIONAL TRAINING ON GENDER AND INCLUSIVENESS**

UNDP’s core offer also includes the provision of targeted capacity building in gender and inclusiveness issues to a broad range of stakeholders at the national level within the PAGE countries.

**UNDP has worked to strengthen institutional capacities to address issues of social inclusiveness, gender equality and women’s empowerment in Mauritius. For example, UNDP has provided targeted training on gender equality and inclusiveness to national partners during the PAGE Green Economy Forum in Mauritius in 2018, including through UNDP led interactive panel discussions and exploring the links between green economy, gender and the SDGs in Mauritius.**

**Country highlights**

**Public Environmental Expenditure Review in Mauritius**

UNDP supported the government to conduct a public environment expenditure review (PEER) in 2015. The PEER evaluated how environmental expenditures are integrated into the national medium-term expenditure framework, and sector budgetary process. It offered recommendations towards a more efficient approach to planning and budgetary processes, a sustainable environmental policy framework and related legislation necessary for the transition to a green economy. Based on the recommendations of the PEER, PAGE has supported the government to introduce climate finance tracking tools within the budget process and the Treasury Accounting System. Click here for more details.

**Climate Public Expenditure and Institutional Review: A Study of Hebei Province, China**

The report, jointly released by UNDP and the Chinese Academy of Fiscal Sciences of the Ministry of Finance, establishes a baseline of climate-related expenditure at the provincial level and assesses to what extent public expenditure on climate-related activities complies with policy priorities and strategies on climate change or green growth at the provincial level. To read the report click here.

**District Climate Public Expenditure and Institutional Review in Nepal**

UNDP provided technical assistance to the Nepalese government in conducting a climate expenditure and institutional review for the Udayapur, Dhading, Myagdi, Bardiya, and Achham districts in 2015/17, in order to better understand the focus on climate finance at the local level, and review responses of the districts to climate-relevant impacts. Click here to read the full report.

**FACILITATION OF GENDER MAINSTREAMING WITHIN NATIONAL GREEN ECONOMY PLANNING**

UNDP works with countries to implement strategies that ensure the inclusive aspects of green economy approaches and increased gender equality, including through integration of a gender perspective into the preparation, design, implementation, monitoring and evaluation of policies. In addition to gender-responsive content, gender mainstreaming also requires equal gender representation in the decision-making process.

**Below:** Kazakh migration visiting Mongolian female-run businesses in and around Ulaanbaatar. Credit: UNDP Mongolia.
UNDP helps to address the sustainability challenges of highly-traded commodities. UNDP supports governments in creating national environments where sustainable commodity sectors can grow as part of the Green Commodities Programme, including facilitating neutral spaces where stakeholders can collaborate on a shared vision and agenda for action, building public-private partnerships, and sharing what we learn through a growing community of practitioners.

**TARGETING SCENARIO ANALYSIS**

UNDP has developed an innovative analytical approach called Targeted Scenario Analysis (TSA), which captures the value of ecosystem services within decision making, to help make the business case for sustainable policy and investment choices. TSA goes beyond standard economic valuation methodologies to compare the implications of two contrasting management strategies on the basis of relevant socioeconomic indicators (both quantitative and qualitative) for a specific productive sector, factoring in data related to ecosystem management. This increases the likelihood that this data will be used to make policy and management decisions that result in effective and sustainable management of ecosystems and ecosystem services.

**Country highlights**

Targeted inclusiveness training was provided to Environment Department officials in Jiangsu Province, China in 2015 and 2017 as part of broader PAGE support. In November 2015, as part of the PAGE Scoping Mission in Nanjing City and Yancheng city, Jiangsu Province, UNDP shared example of gender and green economy approaches and strengthened department capacities through interactive exercises conducted for Environment Department participants of the PAGE inception workshop.

UNDP has also strengthened capacities through trainings provided during the PAGE Provincial Academy on Green Economy in November 2017 in Taizhou city, Jiangsu, China. UNDP led a training session on inclusiveness for the Chinese partners involved in PAGE’s Green Industrial Policy development work.

At the sectoral and sub-national levels, UNDP offers core training on the inclusive aspect of green economy approaches including through interactive formats and peer-to-peer learning.

**CAPACITY BUILDING**

UNDP offers core training on the inclusive aspect of green economy approaches including through interactive formats and peer-to-peer learning.
SOUTH-SOUTH COOPERATION IN GREEN ECONOMY:
PEER-TO-PEER LEARNING BETWEEN KYRGYZ REPUBLIC AND MONGOLIA TO ADVANCE THE 2030 AGENDA

South-south cooperation has gained increasing attention in recent years as a powerful mechanism to accelerate sustainable development, and as such has become a focal point of UN work. There is a growing consensus that the shared ideas, knowledge and skills promoted through these partnerships can stimulate effective solutions to common challenges and build on mutual strengths. On International South-South Cooperation Day, the 12th of September 2018, PAGE’s work in Mongolia and the Kyrgyz Republic was recognized in a report highlighting best practices in south-south and triangular cooperation throughout the entire UN system.

The Kyrgyz-Mongolian cooperation included peer-to-peer learning sessions on the development and implementation of the policy reform for green economy and the use of green technologies in business. The initiative emerged within the framework of an agreement between the International Labour Organization and the UN Institute for Training and Research – two PAGE partner agencies – to strengthen south-south cooperation between PAGE countries, which is technically and financially supported by the German Corporation for International Cooperation (GIZ).

Mongolia’s expertise and experiences have been instrumental in shaping the Kyrgyz Republic’s identification of priority areas as they green their economy, particularly in green finance, sustainable public procurement and green jobs. Due to the similarities in the national contexts, replication and adaptation of policies and practices between the two countries has been especially effective.

On the back of these exchanges and complementary PAGE advisory support and technical guidance, the Kyrgyz Republic recently passed a new Development Program that places these priorities in the fore. The experiences between Mongolia and the Kyrgyz Republic demonstrates how fostering productive south-south relationships can strengthen and accelerate the global transition towards an inclusive green economy, and emphasizes the importance of effective partnerships, collaboration and learning that is at the heart of PAGE’s work.

Global highlights

**Synthesis Report on Integrated Planning & Sustainable Development**

The report, led by UNDP, draws on eight country studies prepared by consultants, government experts, and UNDP staff. It illustrates the different sustainable development pathways that countries are pursuing in line with national priorities and contexts. Its country-based evidence and non-prescriptive findings for policymakers and practitioners highlight the need for integrated and coherent development policies, while illustrating a range of inclusive green economy solutions. As such, this report represents an important addition to the global community’s demand-driven resources for advancing the 2030 Agenda. Click here to read the full report.

**FACILITATION OF SOUTH-SOUTH AND TRIANGULAR EXCHANGES**

South-south and triangular exchanges enable peer-to-peer learning that generates shared ideas, knowledge and skills. These exchanges often stimulate effective solutions to common challenges and build on mutual strengths. UNDP supports countries in engaging in peer-to-peer learning exchanges, by bringing together countries at different stages of their inclusive green economy transition.

**PUBLICATIONS TO SHARE GOOD PRACTICE AND FACILITATE KNOWLEDGE EXCHANGE**

In addition to bringing countries together in exchanges that facilitate knowledge sharing, UNDP prepares publications that assemble knowledge and learnings from country experiences in green economy transitions, to share best practices whilst capturing the diversity in approaches to sustainable development pathways.

**INCLUSIVE ACTION**

**SUPPORTING INCLUSIVENESS**

In addition to strengthening capacities to address issues of inclusiveness and SDGs through PAGE support to China and Mauritius, UNDP has also strengthened gender capacities in Mongolia. This work has drawn on the findings of the “Gender Mainstreaming in Green Development Policy” and has targeted Ministry of Environment and Tourism (MET) officers. For example, in June 2017 UNDP and MET officials explored the linkages between the SDGs, the NGDP and gender issues through an initiative organised by Education for Sustainable Development (ESD) project.

**KNOWLEDGE SHARING**

**SUPPORT FOR INCLUSIVE PARTICIPATORY PROCESS INCLUDING PARTNERSHIPS WITH MINISTRIES, PRIVATE SECTOR AND CIVIL SOCIETY**

The experiences between Mongolia and the Kyrgyz Republic recently passed a new Development Program that places these priorities in the fore. The Kyrgyz-Mongolian cooperation included peer-to-peer learning sessions on the development and implementation of the policy reform for green economy and the use of green technologies in business. The initiative emerged within the framework of an agreement between the International Labour Organization and the UN Institute for Training and Research – two PAGE partner agencies – to strengthen south-south cooperation between PAGE countries, which is technically and financially supported by the German Corporation for International Cooperation (GIZ).

This is a clear example of triangular cooperation and of how countries with similar political, historical, cultural, economic and social contexts can strongly benefit from peer-to-peer learning. PAGE provides an ideal platform to facilitate this learning, by bringing together countries at varying stages of their inclusive green economic transformation. While the Kyrgyz government recognizes sustainable development as a national priority, the country is at the relatively early stages of its inclusive green economy transition. Conversely, Mongolia is transitioning towards the end of its PAGE-supported programme, and is in a strong position to share best practices and learnings from its experience.
Siempre es posible cambiar – it is always possible to change, rang out the chorus of the song that opened the closing ceremony of the Fifth Latin America Green Awards (Premios Latinamérica Verde) on August 16 in Guayaquil, Ecuador. PAGE was a key partner for the awards, underlining the role of green economy in Latin America as a key component for achieving environmental protection and prosperity.

The awards drew in 2,733 success stories, 38 countries and 713 participating cities. This was an increase of 324 projects and 44 cities over the in 2017 awards, clear evidence that the ambition and opportunity to develop ideas to protect the planet is growing in the region.

250 experts from 21 countries determined the rankings of the 500 best projects, as well as the finalists in each category of the award. Deciding of the overall winners of this year’s awards was an elite jury comprising: Matilde Mordt, Regional Director for Sustainable Development and Resilience at the United Nations Development Programme (UNDP); Franco Pizza, representative of Banco Colombia; Gael Almeida, Regional Director for Latin America and representative of National Geographic Society and Hugo Arnal, National Director of WWF Ecuador.

UNDP awarded a special recognition to the project “Conservation and Strengthening of Beekeeping in Biological Corridors of Chiapas, Mexico”, for good practices in sustainable development – that is, a project that simultaneously advances people, planet, prosperity, peace and partnerships.

The gala closed with an intervention from the President of Sambito (Soluciones Ambientales Totales), Gustavo Manrique, who said, “the best future depends on taking a step to turn your dream, hopes and illusions into a reality. That is Latin America Green Awards, a tribute to the dreamers, to those who have the perseverance, the love, the faith to work in a better planet.”
UNDP helps governments to assess various green financing mechanisms including options for: 1) avoiding future costs; 2) spending existing resources more effectively and efficiently; 3) reallocating existing resources; and 4) mobilizing new resources, including through a variety of innovative green financing options including green bonds. See a complete list here.

**GREEN BONDS**

Green bonds are innovative financial instruments where the proceeds are invested exclusively (either by specifying the use of the proceeds, direct project exposure, or securitization) in green projects that generate climate or other environmental benefits. UNDP supports countries, including Indonesia, to establish Green Bonds and organizes webinars that provide an overview of green bonds, barriers for international debt capital markets to invest in a consistent manner into emerging markets, how aggregation of project assets and refinancing through proceeds of green bonds can accelerate NDC implementation. For more on green bonds, click here.

**Global highlights**

**Green Bonds as Financial Instruments for NDC Implementation (Webinar)**

UNDP provided a webinar that offers an overview of the topic of green bonds, barriers for international debt capital markets to invest in a consistent manner into emerging markets, how aggregation of project assets and refinancing through proceeds of green bonds can accelerate NDC implementation. It considers structures that can be designed for replication across countries. This is accompanied by three inspiring examples of how such investment structures can work in practice. See here for more information.

**Country highlights**

**Mongolia public-private investment facility**

In Mongolia, UNDP PAGE is supporting the creation of a public-private investment facility to establish a more sustainable and inclusive value chain to benefit herders and cooperatives. The objective is to advance climate-resilient livestock management and help reverse long-term pasture degradation. The private-equity funding window will be developed in partnership with an already established fund management firm, targeting medium sized companies in Mongolia.

The expected long-term results of the fund include changes in the behaviour of medium-sized enterprises, and their suppliers that are more conducive to sustainable land/pasture management and strengthened resilience of herder livelihoods.
UNIDO’s key focus is to support the inclusive and sustainable development of key industry sectors that can drive economic growth.

UNIDO green industry agenda has a two-pronged strategy (a) the greening of existing industry, and (b) the creation of new “Green industries”. UNIDO offers several tools and knowledge products for advancing green industry and measuring the progress in this transition. We provide customised advisory services and capacity building initiatives to assist government and industry in moving towards a green economy.

**GREEN INDUSTRY PROGRESS (GIPro) INDEX**

UNIDO has developed the Green Industry Progress (GIPro) index to estimate the progress in achieving the transition to an inclusive green industry. It incorporates a set of green industry indicators to measure progress against set targets. Progress toward green industry is measured for each indicator and is aggregated into a composite index across several parameters for the country. This pins down the progress each province/state/city has made and allows a comparison of progress among the provinces/states/cities. The uniqueness of this index is its ability to display the overall picture of advancement made by each province and can precisely provide policy recommendation to the policymakers on the areas where government intervention is most needed.

**POLICY & PLANNING**

**POLICY ADVICE**

**Country highlights**

**GIPro in Action**

UNIDO has developed the GIPro Index for measuring the progress of green industrialization in 18 Chinese provinces. The provinces showed overall progress against the GIPro index indicators. However, Industrial Hazardous Waste Generation Intensity grew in the majority of provinces in our sample. It was recommended that the country should set priority policies to address the challenges that emerged to enhance its green industrialization progress.
IDENTIFYING PRIORITIES STRATEGIES AND ANALYSIS

GREEN INDUSTRY ASSESSMENTS AND GREEN INDUSTRY AND TRADE ASSESSMENTS

GITA provides a concise yet comprehensive overview of how industries could potentially facilitate the transition to a green economy. The assessment evaluates the current status of industries toward green industrialization with specific focus on industrial environment pollution, resource use and use of clean technologies and identifies prospective ways to fill up existing gaps. At the same time, it measures the potential of the economy for exporting green goods and the associated supporting institutional capacity. Furthermore, it reviews whether existing public policies are conducive to green industry and green trade. The findings of the analysis identify priority areas for green industrialization and provide precise policy guidelines on how government can better support the transition to green industrial production. Green Industry and Trade Assessments have been conducted in Burkina Faso, Ghana, Peru, Senegal, and South Africa. Four more GITAs are underway in Barbados, Guyana, Kyrgyzstan and Indonesia.

Country highlights

Green Industry and Trade Assessment in Ghana
The GITA in Ghana reviewed planning and policy regimes with the potential for greening industry, supporting expansion of green technologies and promoting green industrial trade. The assessment found that a resource-efficient green industry initiative endorsed by the Ministry of Trade and Industry and the National Energy Commission would be a modest but powerful step towards greening industry.

For more details, click here.

Country highlights

L’industrie Verte au Burkina Faso: Évaluation et perspectives de développement
This study identifies many strengths and assets which can support and facilitate the transition to green industry in Burkina Faso, as well as many challenges which may impede progress. The study provides recommendations for how a green industry transition can succeed.

Perú: la Transición Hacia Una Industria Verde: Perspectivas de la industria manufacturera
This assessment investigates the potential for green industry in Peru and provides recommendations for the creation and support of green industry as a fundamental part of the country’s transition to a green economy.

Ghana: Green Industry and Trade Assessment
This assessment provides an in-depth examination of the role of industry and trade in facilitating the transition to a green economy in Ghana. The assessment reviews the multiple planning and policy regimes in place. It identifies a set of both modified and new policies to support the transition to green industrial production and trade. The report identifies further opportunities for the international community to assist Ghana to transform its economy.

A Green Economy Industry and Trade Analysis: Assessing South Africa’s Potential
This analysis shows how a green industry and trade transition materializes through two complementary streams, which go hand in hand: the development of new, green industries and the greening of existing, traditional industries. Within this framework, this analysis focuses on the development of new trade opportunities for green industries in South Africa, both for import substitution and for exports.
UNIDO develops national action plans and implementation strategies for identified priority sectors, and provides advisory services to countries on the steps necessary to move towards a green economy.

In this context, UNIDO closely collaborates with partner ministries in advancing policy development and reform in specific sectors and thematic areas identified by the governments. For instance, we have developed an action plan and implementation strategy for the development of the Biomaterials industry in South Africa. We have crafted a green industry priority action plan for the government of Kyrgyz Republic as part of their national green economy strategy development.

WASTE MANAGEMENT POLICY DEVELOPMENT

UNIDO has conducted an assessment of industrial waste and opportunities for industrial symbiosis in the Republic of Mauritius and Industrial inventory analysis for Mongolia under the PAGE framework.

SECTORAL POLICY ADVICE

UNIDO develops national action plans and implementation strategies for identified priority sectors, and provides advisory services to countries on the steps necessary to move towards a green economy.

In this context, UNIDO closely collaborates with partner ministries in advancing policy development and reform in specific sectors and thematic areas identified by the governments. For instance, we have developed an action plan and implementation strategy for the development of the Biomaterials industry in South Africa. We have crafted a green industry priority action plan for the government of Kyrgyz Republic as part of their national green economy strategy development.

WASTE MANAGEMENT POLICY DEVELOPMENT

UNIDO has conducted an assessment of industrial waste and opportunities for industrial symbiosis in the Republic of Mauritius and Industrial inventory analysis for Mongolia under the PAGE framework.

Country highlights

Two green industrial policy developments underway in Burkina Faso and Peru

In Burkina Faso, PAGE was requested to update and revise the country industrial policy document incorporating green components into the policy agenda. UNIDO assisted the government in greening the industrial policy following the structure laid out in the Practitioner’s Guide to Strategic Green Industrial Policy, published by PAGE in 2016 using the expertise of local institutions.
UNIDO provides assistance to governments in embedding circular economy principles into national strategies and helping ministries in designing the implementation strategies tailored to the national economy.

Governments are encouraging - and, in some cases, requiring - the adoption of circular economy principles that would lead to higher resource efficiency and less waste. UNIDO offers cross-cutting services on the building blocks of circular economy based on our 50 years of enriched expertise in industries all around the world.

CIRCULAR ECONOMY

UNIDO has successfully been able to integrate the concept of circular economy into “Uruguay Transforma,” the country’s overarching programme towards structural transformation. The development of a waste valorization strategy is underway through the “Waste Valorization and Circular Economy” project. UNIDO is assisting the government in incorporating analyses of aspects of climate change in the scenarios of the national development strategy Uruguay 2050 for the forest-wood value chain that would drive the country's climate mitigation agenda.

TRAINING ON WASTE VALORIZATION AND VALUE CHAIN ANALYSIS IN URUGUAY

The waste valorization and value chain analysis training course was PAGE’s first initiative in Uruguay. The information generated during the course will contribute as an input to Uruguay’s circular economy agenda and the technical capacity created will be used to replicate the methodology with other sectors.

PAGE in Uruguay has held a workshop on waste valorization and value chain analysis in order to share qualitative information from the local market and international best practices, and to identify new opportunities for waste valorization in Uruguay and the main technical limitations.

The waste valorization and value chain analysis training course was PAGE’s first initiative in Uruguay. Among other topics, the course focused on:

- The general dynamics of industrial waste in Uruguay.
- UNIDO’s approach to identifying waste valorization opportunities, value capture and up-grading in the context of global value chains.
- Global and regional dynamics of industrial waste and the associated value chains.
- The potential for industrial waste valorization in Uruguay based on the development of value chains or the consumption of intermediate and final goods.
- The identification of international markets for industrial waste from the selected value chains.
- Sharing qualitative information to identify the main bottlenecks and limitations for waste valorization in Uruguay.

The value chains and waste selected for the analysis during the course - bovine meat, bovine leather, leather and plastics - were based on the priorities and proposals from national institutions.

The information generated during the course will contribute as an input to Uruguay’s circular economy agenda and the technical capacity created will be used to replicate the methodology with other sectors.
UNIDO has been collaborating with various green start-up initiatives in Uruguay, especially those that have been identified by The National Development Agency (ANDE) and the BioValor project. Through the program, the country has found opportunities to create Green Jobs for the vulnerable population and with a focus on youth empowerment.

Gaining access to decent work – and to employment opportunities in general – remains a challenge for women throughout the world. Women have considerably lower labor force participation rates than men – 26 percentage points lower – and higher chances of becoming unemployed when they do participate. 82 per cent of women in developing countries were in vulnerable forms of employment in 2017, compared with 72 per cent of men.

In order to enhance economic empowerment of women in green industry, UNIDO provides tailored advice to policy-makers and practitioners on the establishment and implementation of a policy framework to integrate gender and green industrial policies. As a baseline scenario analysis, an assessment is done to identify the policy priority areas for gender mainstreaming in green industries and designing the work plans for intervention in the participating country. UNIDO supports governments in improving the institutional capacity to formulate and adopt gender-responsive green industrial policies. The goal is to initiate policy changes and empower women to take leadership roles in green industries as entrepreneurs or industrial professionals.

UNIDO provides training, workshop, stakeholder consultations and dialogues concerning green industry development, environmental and waste management, among others to ensure that domestic infrastructure can carry on building momentum towards an inclusive green economy.
GLOBAL HIGHLIGHTS

Multi-stakeholder consultations and policy support for SDG alignment in Mongolia.

Foundational trainings have been organized back to back with high-level policy fora and Green Economy Weeks in Mongolia, Burkina Faso, Senegal and Ghana. Accompanying documentation is publicly available, including training materials on key green economy concepts such as resource efficiency, natural capital and ecosystem services, as well as their application in policy, planning and governance frameworks.

POLICY & PLANNING

FOUNDATIONAL LEARNING

Experience in partner countries has shown that key stakeholders often do not have a common understanding of what an inclusive green economy looks like and what the implications of a green transition are for various sectors and stakeholders.

Even if there is a general agreement that these topics are important, a well-grounded understanding of key concepts and tools helps to decide on priorities and identify specific policy measures to advance the transition more effectively. Therefore, one of the services UNITAR offers under PAGE are foundational training courses (often combined with high-level policy events). Foundational learning on green economy across institutions and sectors is especially useful early on in the implementation of a PAGE country project to lay the basis for an informed policy dialogue.

Green Economy Introductory e-Course

The Green Economy Introductory e-Course is the perfect low-cost solution to building common understanding across a range of stakeholders at the national level on what green economy is, what are the benefits from it, and what are some of the main approaches for enabling a green transition. A number of training institutions in PAGE partner countries have expressed interest in offering the course to national audiences. To the global audience, the course is made available free of charge on the dedicated learning platform for Climate change education, UN CC:Learn.
Human capital is an important enabler and driver of the green transition. Conversely, the absence of relevant knowledge and skills can pose a significant barrier to the green economy.

Often trainings are conducted on an ad-hoc basis by external experts without building the capacity of the national education system. Within the framework of PAGE, UNITAR conducts national Green Economy Learning Assessments to help countries systematically identify priority learning needs in key sectors and thematic areas, relative to the countries’ policies and strategies. The assessments also map existing capacities of national education and training institutions to deliver learning on green economy. Based on the assessments, targeted capacity development actions are formulated and implemented by national partner institutions. Partner countries can also decide to develop a National Green Economy Learning Strategy to raise the visibility of education and training as a means to achieve green economy outcomes.

**GREEN ECONOMY LEARNING ASSESSMENT OUTCOMES**

Green economy learning assessments have been conducted in: Mongolia, Ghana, South Africa, Mauritius, Kyrgyz Republic, Senegal and Burkina Faso. Two more are underway in Mato Grosso (Brazil) and Uruguay.

The findings and recommendations of the Green Economy Learning Assessments have contributed to:

- Development of new training courses (e-learning and face-to-face) by national learning institutions;
- Mainstreaming green economy topics into the curriculum of universities in areas such as green buildings, sustainable finance and green economy modelling;
- University collaboration for better accreditation of green economy courses;
- Systematic integration of green economy learning in PAGE sectoral workstreams;
- Policy reform in the education sector;
- Change in mind-sets and attitudes of students, academic staff and policy makers.

---

**THINKING CAPACITY BUILDING RIGHT FROM THE START IN URUGUAY**

“A nice brochure is not enough to make people separate their garbage. You will need a sustained effort and the right incentives to make change” exclaimed María Laura Rodríguez, Economics, Communications and Environmental Manager at the concluding discussion of a workshop held in Montevideo, Uruguay.

The workshop was organized as part of the country’s inclusive green economy capacity building effort that is shaping up in collaboration with the Partnership for Action on Green Economy (PAGE). The country joined PAGE in 2017. As project work streams are concretizing their scope and goals, PAGE and government counterparts initiated a dialogue early on in the project to analyze what skills and knowledge related to the green transition need to be strengthened.

In particular, the workshop aimed at identifying priority inclusive green economy learning needs in public, private and civil society sectors as well as academia. It also started a discussion on the competency framework to guide more structured analysis later on. The competency framework serves to differentiate skills in varying competency areas, such as project management, stakeholder involvement and technical execution of tasks.

The conclusions from the workshop will serve as inputs to the upcoming Green Economy Learning Assessment. The objectives of this assessment, in addition to systematically grasping learning needs, entail mapping of existing institutional capacities to deliver inclusive green economy learning as well as formulation of recommendations for actions to respond to identified gaps.

Based on the recommendations of that study, an action plan with tangible learning interventions will be developed and carried out from 2019 onwards.
To facilitate in-depth understanding on specific issues, UNITAR organizes specialized face-to-face trainings and e-learning courses in collaboration with other PAGE partner agencies. The trainings follow latest adult learning methodologies putting emphasis on job-relevance, interactivity, and impact evaluation.

Face-to-face sessions are designed as part of a broader learning path that includes a variety of learning opportunities, including self-study, e-learning and on-the-job coaching. Where possible, UNITAR organizes training sessions in collaboration with local partner institutions to ensure regular follow-up and sustainability.

E-learning courses within the PAGE portfolio include: Green Fiscal Reform, Green Economy and Trade, as well as upcoming courses on Green Industry, Green Economic Modelling and Sustainable Finance. In partnership with national learning institutions those courses can be adopted to the national context of partner countries.

Face-to-face trainings for policy makers and key stakeholders: Examples of specialized face-to-face (or blended) trainings on issues that have been identified as priority learning areas by partner countries include: green economy modelling, sustainable finance, green fiscal instruments, green economy and trade, and others.

E-learning materials

To meet the learning needs and build capacities of national stakeholders, UNITAR developed an e-learning course on green fiscal reform, seeking to provide participants from government, business, civil society and academia with an introduction to various approaches and policy instruments for reforming government spending and revenue generation with the goal of supporting the transition to a green economy.

Green fiscal reform

This e-learning course on the nexus of trade and the green economy was developed by UNITAR and UN Environment, to increase understanding of the significant opportunities that exist for developing and developed countries to achieve long-term and sustainable economic development by diversifying their economies and benefiting from the growing global demand for green goods and services. In this context, sustainable trade can serve as an effective means to advance an inclusive green economy.
Many officials lack good understanding of what the Green Economy means in practice and in the context of their work. It is will be very useful for them to have the concept linked to the key priorities and sectors in the country, as well as concrete measures and projects they are involved in.

Najma Mohamed, former PAGE Coordinator in South Africa

In South Africa, an e-learning course to train trainers on “How to design, deliver and evaluate effective e-learning for inclusive green economy” that is tailored to the context of country is being developed by the Center for Environmental Management (CEM) at North-West University (NWU), with the support of UNITAR. The training of trainers was a first course if a larger capacity development initiative supported by PAGE. As a next step, a new e-course on green economy, tailored specifically to the South-African context has been developed by CEM-NWU and is now available to policymakers and key stakeholders in South Africa. The course has also been included in the academic curriculum at the University of Johannesburg, and is now available to policymakers and key stakeholders in South Africa.

What do you think is the most popular course among architecture students at the Mongolian University of Science and Technology (MUST)? It’s a course on green buildings.

“Even former students are asking us if they can take the course,” says B. Munkhbayar, a Senior Lecturer at MUST.

The interest in the course reflects a broader shift in the building sector in Mongolia where energy efficient buildings are more and more in demand.

Currently, the manufacturing and construction sectors consume 60 percent of total electricity and 24 percent of the heat. The building heat loss is about 30 percent – we want to change this,” says L. Batjargal, Director of Construction and Urban Development (MCUD).

The National Green Development Policy sets a target for reducing heat loss through buildings by 20 percent by 2020 and by 40 percent by 2030. To achieve this, MCUD is working on a green building code and rating system and is revamping its construction sector policy, with support by PAGE, the International Finance Cooperation (IFC) and a Nationally Appropriate Mitigation Action (NAMA) project.

The green building course offered by MUST is not the only green-economy related course run by Mongolian universities.

With support from PAGE, the National University of Mongolia (NUM), the Mongolian University of Life Sciences (MULS) and the University of Finance and Economics (UFE) are developing a new undergraduate course on green economy and macro-economic modelling, to be launched in 2018. A new course on sustainable finance is planned to be piloted next year, in partnership with the Mongolian Sustainable Finance Association (MSFA), IFC and PAGE.

Beyond the launch of new courses, universities are joining forces to green their campuses and are planning to work on a submission to the Green Climate Fund (GCF). Furthermore, the Ministry of Education, Science, Culture and Sports is focusing the new higher education policy on sustainable development to encourage universities to green their teaching and operations.

If university students are becoming leaders in society they need to fully integrate the concept of sustainable development. And this is not just as a matter of principle, as Cristina Martinez from the International Labor Organization (ILO) highlights: “We estimate that by 2030, 14 million jobs will be created in climate change mitigation in Asia – most of them for high skilled labor, i.e. both university and vocational education graduates.”

By greening their educational offer, the Mongolian universities are not only preparing their students to be better citizens but also to be competitive in a changing labor market.
INSPIRING ACTION
EXPERIENCE-SHARING AND EXCHANGE

Peer Learning and Community Building
In addition, webinars and virtual meetings can be organized between groups of stakeholders with similar interests across PAGE countries. To facilitate in-depth exchange and peer-learning over a longer period, UNITAR is creating a community/network of experts and trainers.

South-South, North-South and Triangular Exchange
South-South, North-South, and triangular exchanges are an effective way to leverage good practices among PAGE partner countries, as well as experts from the global green economy community. Face-to-face meetings certainly play an important role to strengthen linkages at a personal level.

Resource Guide of Green Economy Learning Institutions
The Guide identifies, analyses and profiles institutions offering green economy learning. It is a tool that can be used by trainers, students and institutions looking for a training partner with expertise in a specific thematic area or a region.

The Guide lends itself useful to:
- Government agencies, NGOs or businesses: looking for specialized executive trainings and a reliable training provider;
- Learning institutions and trainers: looking for partner institutions to collaborate on joint learning activities;
- Individuals: looking for possibilities to improve personal knowledge and skills in the area of green economy.

Country highlights

Mongolia-Kyrgyz Republic green economy policy exchange
A Mongolian delegation which visited Kyrgyz Republic as part of PAGE supported South-South Exchange Initiative in November 2017. Valuable experiences and lessons learnt in the areas of government policy, sustainable finance, sustainable public procurement, green buildings, waste management, and capacity development, have been shared.

South Africa-Mauritius exchange on public-private policy interface
The Green Economy Forum in Mauritius (May 2018) featured a PAGE country exchange element with two experts from South Africa attending and sharing experiences and practices working at the interface between public policy and private engagement, more specifically in the areas of green bonds, public procurement and green business development.

Sweden-Mongolia green economy youth exchange
Students from Lund University in Sweden and three Mongolian universities have connected via video-conference for a dialogue on how young people can contribute to an inclusive green economy. For more details click here.

Green Economy Learning Forum
"This is a tremendous opportunity for our country. We have a unique support mechanism over multiple years in PAGE. Let’s be ambitious and envision now where we want to be at the end of this project!" emphasized Pablo Montes, National Coordinator for PAGE. In front of the 42 participants at the start of the workshop, Firi, uinc viget aperturger hort, nos is ste, orts verupob licaet; nonsuliasiaet? Odies audum ne iam noacae dum hos per que igitiun patur acividi sus furbes pulam et gra inam st? Nam intellere nonihicaed ina, iam. Elas nos, quintadac vit.

"A nice brochure is not enough to make people separate their garbage. You will need a sustained effort and the right incentives to make change" exclaimed Maria Laura Rodriguez, Economics, Communications and Environmental Manager at the concluding discussion of a workshop held in Montevideo, Uruguay.

The workshop was organized as part of the country's inclusive green economy capacity building effort that is shaping up in collaboration with the Partnership for Action on Green Economy (PAGE). The country joined PAGE in 2017. As project work streams are concretizing their scope and goals, PAGE and government counterparts initiated a dialogue early on in the project to analyze what skills and knowledge related to the green transition need to be strengthened.

In particular, the workshop aimed at identifying priority inclusive green economy learning needs in public, private and civil society sectors as well as academia. It also started a discussion on the competency framework to guide more structured analysis later on. The competency framework serves to differentiate skills in varying competency areas, such as project management, stakeholder involvement and technical execution of tasks.

The conclusions from the workshop will serve as inputs to the upcoming Green Economy Learning Assessment. The objectives of this assessment, in addition to systematically grasping learning needs, entail mapping of existing institutional capacities to deliver inclusive green economy learning as well as formulation of recommendations for actions to respond to identified gaps.

Based on the recommendations of that study, an action plan with tangible learning interventions will be developed and carried out from 2019 onwards.

Read more
The Green Economy Toolkit for Policymakers provides countries with practical guidance on how to formulate and assess policies, measure progress and model future effects of the transition. The toolkit consists of three reports, the Guidance manual for green economy policy assessment, the Guidance manual for green economy indicators and the report Using models for green economy policymaking.

The PAGE Introductory Learning Materials on Green Economy are organized around 40 key topics and contain easily digestible knowledge on a number of green economy issues. They are available in PowerPoint and PDF format with detailed speakers notes providing further information and case examples.

The UNITAR-facilitated PAGE e-learning course “Introduction to Green Economy: Concepts and Applications” is a state-of-the-art virtual learning course, which introduces participants to different concepts and facets of the green economy, as well as the global, national and sector-specific challenges and opportunities associated with the green transition. Additionally, participants develop basic skills for applying the green economy concept in a practical context.
The service

The interactive and practice-oriented course seeks to provide participants with tailored support, including to review draft strategies, analyse policy options, share experiences from other countries, and facilitate networking.

DEVELOPMENT PLANNING AND SUSTAINABLE SYNTHESIS REPORT: INTEGRATED DEVELOPMENT PLANNING IN THE ECONOMY INTO NATIONAL OPERATIONALIZING GREEN UNDERSTANDING AND POLICY MAKING INFORMING GREEN ECONOMY ADVANCED LEARNING MATERIALS ON GREEN ECONOMY

WEBINAR ON PAGE’S INDICATORS FOR GREEN ECONOMY POLICY MAKING

The PAGE Advanced Learning Materials is a set of 15 advanced learning units on green economy with thematic focus on “Green economy policy assessments” and “Greening economic sectors.” This work complements the self-standing set of “Introductory Learning Materials on Green Economy.”

TOOLS & SERVICES PAGE GLOBAL RESOURCES

INTEGRATED GREEN ECONOMY MODELLING FRAMEWORK

WEBINAR ON PAGE’S INDICATORS FOR GREEN ECONOMY POLICY MAKING

PAGE and The Green Growth Knowledge Platform (GGKP)’s webinar on Indicators for Green Economy Policymaking presented PAGE’s country experiences in developing and rolling out green economy indicators to inform policymaking with a case study in Mauritius. It also introduced the Green Economy Progress Measurement Framework, a tool that helps countries evaluate their overall progress towards an Inclusive Green Economy across a specified time and enables a cross-country comparison of progress. The presentations and a recording of the webinar are available online.

INTEGRATED GREEN ECONOMY MODELLING FRAMEWORK

PAGE has developed the Integrated Green Economy Modelling (IGEM) Framework that aims to better respond to countries’ needs in terms of analysing the cross-sectoral impacts of Green Economy (GE) policies. The IGEM framework presents a methodology on how to integrate three of the main modelling techniques (SD, CGE and IO-SAM) used for green economy policy assessment to refine impact analysis of green policies and investments in the economy.

WEBINAR ON PAGE’S INDICATORS FOR GREEN ECONOMY POLICY MAKING

PAGE and GGKP’s webinar on the Integrated Green Economy Modelling (IGEM) Framework, including country experience with green economy modelling in Mexico and Peru. The Integrated Green Economy Modelling (IGEM) Framework responds to country requests for tools to analyse the cross-sectoral as well as environmental and social impacts of green economy policies and investments. The presentations and a recording of the webinar are available online.

GREEN FISCAL REFORM E-COURSE

The interactive and practice-oriented course seeks to provide participants from government, business, civil society and academia with an introduction to various approaches and policy instruments for reforming government spending and revenue generation with the goal of supporting the transition to an inclusive green economy. Moreover, participants will acquire basic skills for translating GFR principles into a real-world policy and professional context.

GREEN JOBS FOR SUSTAINABLE DEVELOPMENT

This online course provides an interactive e-learning opportunity to master the concepts and definitions associated with green jobs, involving a review of tools, selected literature and ongoing practices. Building on the ILO’s technical work in the promotion of green decent jobs and on PAGE country-level achievements in the transition to greener economies, tutors and participants will analyse and discuss the world of work’s contribution to sustainable development, throughout a 10-week online journey.
PRACTITIONER'S GUIDE TO STRATEGIC GREEN INDUSTRIAL POLICY

PAGE developed this guide to provide practical advice on the evolving concept of Strategic Green Industrial Policy (SGIP) for policy practitioners. The guide details tools that can be applied to what some industrial policymakers may consider to be relatively under-explored territory. The guide draws on tools and methodologies from disciplines such as industrial ecology and ecological economics, with other tools rooted in systems thinking, theory of change, or other fields of research and practice.

GREEN INDUSTRIAL POLICY AND TRADE: A TOOL-BOX

PAGE developed this tool-box to guide policy makers and green economy professionals in the use of policy options at the intersection of green industrial policy and trade. As such, this tool-box provides an overview over trade-related green industrial policy instruments available and clarifies their structure and operation, while outlining their implications with regard to trade policy. The tools are embedded in an overall methodology consistent with the Practitioner's Guide to Strategic Green Industrial Policy.

GREEN INDUSTRIAL POLICY: CONCEPTS, POLICIES, COUNTRY EXPERIENCES

The Green Industrial Policy: Concept, Policies, Country Experiences report is a joint publication by UN Environment and the German Development Institute/Deutsches Institut für Entwicklungspolitik (DIE). It illustrates how green industrial policy can be a driver for a green economy transformation and highlights the social, environmental and economic co-benefits of green industrial policy.

GREEN ECONOMY AND TRADE E-LEARNING COURSE

The practice-oriented course seeks to provide interested participants from government, business and civil society with an introduction to various approaches to promote and harness opportunities related to sustainable trade. At the end of the course, participants are given the opportunity to apply their newly acquired knowledge to a real-life trade situation in a specific country, region, sector, or company by developing an action plan.

SUCCESSFUL ORGANIC PRODUCTION AND EXPORT E-LEARNING COURSE

This course aims to build the capacities of participants to understand organic farming and its benefits, and enable them to overcome production and export challenges. The modules provide step by step guidance for conversion to organic farming, and monitoring benchmarks for quality assurance in order to meet the necessary standard and certification requirements for accessing local and international markets.

GUIDANCE NOTE: LEARNING FOR AN INCLUSIVE GREEN ECONOMY

Knowledge and skills of stakeholders in Government, businesses, and civil society are a key determinant for effective green economy policy analysis, design and implementation at all levels. This guidance note provides methodological and organizational guidance to countries interested in taking a systematic approach to education and training for an inclusive green economy that goes beyond ad-hoc trainings.

RESOURCE GUIDE FOR GREEN ECONOMY LEARNING INSTITUTIONS

The Resource Guide for Green Economy Learning Institutions aims to raise the visibility to green economy learning opportunities, enable collaboration and kick-start a global green economy learning network. It identifies knowledge-sharers, thought-leaders, and pioneers of green economy learning.

COMMUNITY OF TRAINERS

This platform presents profiles of PAGE trainers for easy reference. These individuals are committed to advance learning for the IGE transition and share their expertise in teaching. For example, if you are looking for a course facilitator, coach or advisor to respond to learning needs in your country, sector or organization, we encourage you to approach the Community of Trainers for collaboration.

LEARNINGGREENECONOMY MAILING LIST

LearnGreenEconomy is a free network announcement and coordination list for practitioners active in learning for an inclusive green economy (IGE). This email-based list will serve as a knowledge-sharing platform to promote IGE learning-related activities and events, thus advancing the objectives of PAGE’s Global Forum on Green Economy Learning.
# PAGE KEY CONTACTS

<table>
<thead>
<tr>
<th>NAME</th>
<th>CONTACT</th>
</tr>
</thead>
<tbody>
<tr>
<td>Asad Naqvi</td>
<td><a href="mailto:asad.naqvi@un.org">asad.naqvi@un.org</a></td>
</tr>
<tr>
<td>Head, PAGE Secretariat</td>
<td></td>
</tr>
<tr>
<td>Vera Weick</td>
<td><a href="mailto:vera.weick@un.org">vera.weick@un.org</a></td>
</tr>
<tr>
<td>Programme Officer, PAGE Secretariat</td>
<td></td>
</tr>
<tr>
<td>Ronal Gainza</td>
<td><a href="mailto:ronal.gainza@un.org">ronal.gainza@un.org</a></td>
</tr>
<tr>
<td>Programme Officer, PAGE Secretariat</td>
<td></td>
</tr>
<tr>
<td>Kelly Stetter</td>
<td><a href="mailto:kelly.stetter@un.org">kelly.stetter@un.org</a></td>
</tr>
<tr>
<td>Monitoring and Reporting Consultant, PAGE Secretariat</td>
<td></td>
</tr>
<tr>
<td>Francesca Monteverdi</td>
<td><a href="mailto:francesca.monteverdi@un.org">francesca.monteverdi@un.org</a></td>
</tr>
<tr>
<td>Events and Communications Consultant, PAGE Secretariat</td>
<td></td>
</tr>
<tr>
<td>Fulai Sheng</td>
<td><a href="mailto:fulai.sheng@un.org">fulai.sheng@un.org</a></td>
</tr>
<tr>
<td>PAGE agency focal point - UN Environment</td>
<td></td>
</tr>
<tr>
<td>Joy Kim</td>
<td><a href="mailto:joy.kim@un.org">joy.kim@un.org</a></td>
</tr>
<tr>
<td>Lead Technical Advisor - UN Environment</td>
<td></td>
</tr>
<tr>
<td>Kamal Gueye</td>
<td><a href="mailto:gueye@ilo.org">gueye@ilo.org</a></td>
</tr>
<tr>
<td>PAGE agency focal point - ILO</td>
<td></td>
</tr>
<tr>
<td>Tim Scott</td>
<td><a href="mailto:tim.scott@undp.org">tim.scott@undp.org</a></td>
</tr>
<tr>
<td>PAGE agency focal point - UNDP</td>
<td></td>
</tr>
<tr>
<td>Iti Ozunimi</td>
<td><a href="mailto:o.it@unido.org">o.it@unido.org</a></td>
</tr>
<tr>
<td>PAGE agency focal point - UNIDO</td>
<td></td>
</tr>
<tr>
<td>Amrei Horstbrink</td>
<td><a href="mailto:amrei.horstbrink@unitar.org">amrei.horstbrink@unitar.org</a></td>
</tr>
<tr>
<td>PAGE agency focal point - UNITAR</td>
<td></td>
</tr>
</tbody>
</table>