FINANCING FOR THE SUSTAINABLE DEVELOPMENT GOALS:
The role of fiscal reforms, revenue management and sovereign wealth funds in the extractives sector

7-8 December 2016
Bangkok, Thailand

Summary of discussions

In the context of discussions to mobilize finance for the **2030 Agenda for Sustainable Development**, this regional workshop explored how to raise and use revenues from the extractive sector to support green investment and deliver the Sustainable Development Goals (SDGs), while reducing some of the negative environmental and social impacts of mining activities. This was the third regional workshop of the **Green Fiscal Policy Network** (a joint partnership between UN Environment, the International Monetary Fund (IMF) and the Deutsche Gesellschaft für Internationale Zusammenarbeit (GIZ)) and was organised in collaboration with the **UNDP-UNEP Poverty Environment Initiative Asia-Pacific**.

The workshop brought together 50 participants including representatives from countries (Australia, China, Germany, India, Indonesia, Lao PDR, Malaysia, Mongolia, Myanmar, Norway, Nepal, Philippines, Thailand, Timor-Leste and Vietnam), international and regional organizations, industry, civil society, and other experts to discuss and share experiences with fiscal frameworks in the extractive sector and how these can be reformed to better support sustainable development.

The **agenda** for the two-day workshop included several presentations from technical experts and country representatives, panel discussions and working group sessions. This note provides a brief summary of some of the main issues discussed, it does not aim to reproduce in detail all presentations and discussions at the workshop but rather aims to capture the most salient ideas raised and interesting country experiences discussed.

All workshop materials including PowerPoint presentations and relevant background materials can be found on the Green Fiscal Policy Network website: www.greenfiscalpolicy.org/about-the-network/2016-workshop/.

Key issues

- **Revenues from resource extraction are an important source of public financing** in many resource-rich countries and can support delivery of the SDGs and the Paris Climate Agreement. However, the sector faces a number of challenges including environmental and social impacts and volatile international markets; while immature or ineffective fiscal regimes, weak governance structures, limited capacities and illegal mining activities in some countries affect the scale and use of revenues.
- There is a need for **robust fiscal regimes in the extractive sector** which are designed to attract investment and ensure that the state receives an appropriate share of revenue, fosters stability, are easy to administer and comply with. This should be supported by sufficient capacities in tax administration, evaluation mechanisms and good financial governance.
- A **country-specific fiscal policy framework should guide the allocation of resource revenue** between saving and spending depending on the development needs of the country and its resource horizon. This should be reinforced by credible and transparent fiscal policy rules and efforts to build capacity and strengthen public financial management.
- **'Investing for investing'** is critical in terms of building a country's capacity to invest domestically, manage its investment process and enhance its absorptive capacity. This should be supported by an 'authorizing environment' with laws and rules designed to have a behavioral impact on investors, independent capacitated institutions to leverage revenues for green investment, and enhanced understanding among citizens.
- Countries adopt different **systems for the distribution of resource revenues** at the national and local level which can change over time (e.g. Mongolia). These systems should be carefully and transparently designed, have independent oversight, engage stakeholders and take into account absorption capacities of local governments and communities.
- **Addressing environmental and social impacts of mining requires a comprehensive policy mix**, which includes fiscal instruments (e.g. carbon tax in India), non-fiscal instruments (e.g. regulations and environmental impact assessments in Malaysia), mitigation measures (e.g. earmarked transfers in China), liability provisions and insurance mechanisms, environmental management funds and mine closure funds (e.g. Myanmar), and community development funds (e.g. Lao PDR) among others. These policies should be supported by adequate institutional capacities to ensure implementation, robust monitoring and reporting mechanisms (e.g. the Philippines), third party verification and stakeholder engagement processes.
- The **private sector also has an important role to play.** Mining companies are increasingly moving away from corporate social responsibility towards operationalizing a sustainable development strategy through community development agreements, incubation programs, machinery leasing and sizing down. Such efforts should be supported by monitoring and evaluation frameworks, quality assurance and controls, stringent international standards and dynamic community engagement.
- **Well-managed sovereign wealth funds (SWFs) and natural resource funds (NRFs) can support delivery of the SDGs** by helping to improve the quality of public spending (e.g. Peru, Chile, Botswana), strengthening international competitiveness (e.g. Saudi Arabia, Kazakhstan), earmarking spending for high impact projects or environmental protection (e.g. Alabama, Texas, Timor-Leste) and supporting ethical investments (e.g. Norway). Using such funds for domestic investments requires careful management and should be carried out through formal budget processes to avoid undermining fiscal rules and circumventing accountability mechanisms.
- SWFs and NRFs also require substantive **transparency requirements** (e.g. Timor-Leste), adequate government capacities, a balanced growth strategy that focuses on the non-extractive sector to support diversification of the economy and strong political will.
- **Further networking and sharing of experiences** on this topic can provide valuable insights to countries as they take forward action to deliver the SDGs.

Day 1: Fiscal reforms in the extractive sector

The workshop was opened by the organizers who set out the context for discussions. **Mr. Sheng Fulai** (UN Environment) noted the significant financing needed to deliver the SDGs and the Paris Climate Agreement and the opportunity for resource-rich countries to raise public finances from the extractive sector to support the SDGs. However, he recognised that the sector faces a number of challenges including environmental and social externalities and volatile international markets; while immature or ineffective fiscal regimes, weak governance structures and limited capacities in some countries affect the scale and use of revenues.

Mr. Ian Parry (IMF) noted that extractive industries provide a key source of public revenue in many resource-rich countries and are the most important source of tax revenues in 50 resource-rich countries around the world. He noted that robust fiscal tools are needed to raise revenues in the sector, while a balanced mix of measures (e.g. regulation, fiscal, liability), is needed to address environmental and social impacts of mining activities, taking into account administrative considerations.

Mr. Stefan Helming (GIZ) noted the need to mobilise financing to support the SDGs and how some countries underperform despite having rich natural resource reserves. He emphasised the importance of good financial governance in resource-dependent states, in particular the need to build effective institutions, reduce illicit financial flows and corruption, improve domestic resource mobilisation, and tackle climate change, in order to safeguard the overall quality of the public financial management system and support delivery of the SDGs.

Session I: Extractives, sustainable development and fiscal regimes

This session was chaired by Mr. Ian Parry (IMF) and set out key issues related to mining and sustainable development in the Asia Pacific region, fiscal regimes, capacity needs and good financial governance in the extractive sector.

A joint presentation by **Ms. Seonmi Choi** (UNDP-UNEP Poverty-Environment Initiative (PEI)) and **Ms. Uyanga Gankhuyag** (UNDP) focused on ***Mining and sustainable development in the Asia Pacific region.*** Ms. Choi set out key sustainability challenges facing countries in the region, namely how to transform non-renewable capital into other forms of capital, how to manage social and environmental externalities and trade-offs between different land uses, sector objectives, national vs local impacts, and population groups. Ms. Choi stressed the need for more attention to micro-level impacts and for more informed decision-making. Ms. Gankhuyag set out some key concepts related to mining and sustainable development, including the difference between ecosystem-centred and human well-being-centred views on sustainable development, and concerns related to current well-being, the well-being of future generations and the well-being of others.

In a presentation on ***Fiscal regimes in the extractives sector - Objectives, tools and design principles,*** **Ms. Oana Elena Luca** (IMF) highlighted the need for a distinct fiscal regime for extractive industries given the unique characteristics of the sector, in particular its exhaustibility. She noted that fiscal regimes in the sector should be robust, easy to administer and comply with. They should also foster stability, attract investment and ensure that the state receives an appropriate share of revenues. Depending on country circumstances, the fiscal regime should in general include a royalty on gross revenue, tax on rents, corporate income tax as well as bonus-bidding in certain environments. Fiscal regimes should be supported by adequate capacities in tax administration, transparency in design and implementation (e.g. IMF Guide on Resource Revenue Transparency, Extractive Industries Transparency Initiative

(EITI)) and evaluation mechanisms (e.g. IMF Fiscal Analysis of Resource Industries (FARI) modelling system).

In a presentation on ***Promoting good financial governance in resource-rich countries to support sustainable development,*** **Mr. Harald Kueppers** (GIZ) set out how key challenges to good financial governance (GFG) in resource-rich countries relating to the legal and fiscal framework, contracts, revenue collection and allocation, state ownership, artisanal and small scale mining, and data availability can be addressed while safeguarding GFG (technical dimension), assessing stakeholder interests (political economy dimension) and managing re-distribution effects efficiently and transparently (normative dimension). Ghana was highlighted as an interesting example of the management of petroleum revenues, which draws together government agencies, the private sector, civil society, and parliament in the process.

Discussions with participants covered a number of issues including the importance of building tax administration capacities to ensure the effective collection and management of corporate income taxes and royalties and the need for complementary policies beyond the fiscal regime (e.g. environmental assessments, decommissioning provisions, regulations) and a strong governance system to address environmental externalities. It was also noted that assessments of the costs and benefits of mining should take a broader view, for example although certain mining activities (e.g. gravel) may generate little revenues and have large environmental impacts, they may provide other notable benefits such as job creation.

Session II: Principles for natural resource revenue management, governance and green investment

This session was chaired by Mr. Harald Kueppers (GIZ) and discussed principles for the management of natural resource revenues, mechanisms for distributing natural resource revenues and how resource revenues can be used to support green investment and the SDGs.

In a presentation on ***Macro-fiscal policy frameworks in resource-rich countries,*** **Ms. Oana Elena Luca** (IMF) set out some of the fiscal policy challenges facing resource-rich countries which include decisions on savings versus investment, constraints on scaling up investment, managing resource exhaustibility, uncertainty and volatility. She noted that a country-specific fiscal policy framework should guide the allocation of resource revenues between saving and spending, balancing financial saving with a gradual scaling-up of investment depending on the development needs of the country and its resource horizon. This framework should be reinforced by flexible, credible and transparent fiscal policy rules and complemented by efforts to build capacity and strengthen public financial management.

In a presentation on ***Investing natural resource wealth to support sustainable development,*** **Ms. Perrine Toledano** (Columbia Centre for Sustainable Investment (CCSI)) set out how revenues from the extractive sector can be used to support significant investments needed to deliver the SDGs and the Paris Climate Agreement. She emphasised the notion of 'Investing in investing' (coined by Paul Collier) to build a country's capacity to invest domestically, manage its investment process, evaluate projects and enhance its absorptive capacity. The capacity to invest should be supported by an 'authorizing environment' with laws and rules designed to incentivise investment, independent capacitated institutions to leverage extractive revenues for green investment, and raising citizens' understanding of the opportunities from natural resource development. She also noted that the imperative to accelerate green investments could encourage the development of Strategic Investment Funds which can help attract private investment. Her presentation included case examples from Botswana, Malaysia, Rwanda, PINAI (Philippines), FONSIS (Senegal) and ISIF (Ireland).

In a presentation on ***Mechanisms for natural resource revenue distribution and benefit sharing at the national and local level,*** **Ms. Uyanga Gankhuyag** (UNDP) set out different approaches to distributing resource revenues. She noted that some countries do not distinguish resource revenues from non-resource revenues while others distribute revenues based on derivation or on indicators, with revenues allocated either through inter-governmental transfers or tax assignments. There are pros and cons to each approach. She concluded her presentation with some guidelines for establishing resource revenue sharing systems which include: aligning the system with clear objectives, choosing appropriate revenue streams and fiscal tools; smoothing fiscal expenditures; adopting a simple, enforceable revenue transfer formula agreed through national consensus and codified in law; ensuring transparency and independent oversight.

Discussions with participants covered a number of issues including limited capacities of local governments in terms of spending which may require other measures such as earmarking expenditures, multi-year revenue spending and the use of sub-national wealth funds. The country-specific context was also emphasised as this will determine the allocation of resource revenues between saving and investment, requires flexibility in the application of certain fiscal benchmarks such as the Permanent Income Hypothesis, and the adoption of tailored fiscal frameworks.

Session III: Addressing environmental externalities and social impacts – The role of green fiscal reforms

This session was chaired by Mr. Sheng Fulai (UN Environment) and discussed how green fiscal reforms and other instruments can address environmental and social impacts from the extractive sector, administrative issues of different instruments and country experiences.

In a presentation on ***Fiscal reforms to 'green' extractives – instruments, legal and regulatory frameworks and administration,*** **Mr. Ian Parry** (IMF) set out how prices of extractive commodities (coal, natural gas, oil) do not reflect environmental and health costs and there is a need to revise these prices, especially for coal, at a relevant point in the supply chain. For example, it may be best to impose carbon pricing upstream (extraction, processing, distribution) as this provides a comprehensive, administratively simple and efficient policy to support the Paris climate commitments and raise revenues. Mr Parry also noted the significant environmental risks associated with mining/drilling activities, however he argued that regulations and permits may be more effective at addressing certain types of environmental externalities, while ex-post liability provisions require supplementary measures such as industry insurance funds and a minimum level of assets/liability insurance. Environmental taxes may be useful to address certain externalities such as methane leaks from oil/gas operations where accurate measurement is possible (e.g. through remote sensing techniques in the US) and per unit charges on water withdrawals for fracking operations.

In a presentation on ***Green taxes and budget reform for sustainable and inclusive development,*** **Ms. Aneta Nikolova** (UNESCAP) set out the key role of fiscal reforms in the policy mix for a transition to an inclusive green economy, highlighting examples of fossil fuel subsidy reforms in Indonesia and Iran. She noted how in some countries in the region (e.g. Myanmar, Cambodia), not only are environmental externalities from extractive activities not internalised, mining is further encouraged through tax exemptions and concessions which can be considered a form of implicit subsidies. There are thus opportunities for upstream environmental taxes in these and other countries in the region such as Lao PDR, Malaysia, Mongolia. She also noted the role of other instruments such as environmental insurance/funds in addressing environmental damages.

In a presentation on ***Green fiscal reforms in the extractives sector – Experience from China,*** **Mr. Zheng Xinye** (Renmin University, China) set out how the role of the extractive sector (in terms of jobs and tax revenues) varies significantly across different provinces in China. He highlighted the adoption of a new environmental tax, a consumption tax (based on goods with negative externalities) and changes in the VAT tax rate; while on the expenditure side, he noted investments in new green infrastructure and earmarked transfers – resource exhausted cities transfer (RECT). The RCET aims to increase environmental services, build infrastructure, support welfare programmes for the poor and support social programmes for people affected by mining activities. Some challenges relate to governance issues (e.g. absorption capacities in some local governments and limited capacities of the central government to ensure local government activities are in line with commitments) and perverse incentives (e.g. local governments may be encouraged to expand extractive activities to raise further revenues through taxes).

In a presentation on ***Green fiscal reforms in the extractives sector – Experience from Myanmar,*** **Mr. Nanda Win Aung** (Ministry of Natural Resources & Environmental Conservation, Myanmar) set out how recent institutional reforms brought together government departments on environment and mining under the same ministry which has helped encourage synergies. There are a number of non–fiscal (e.g. EIA/SIA, EMP/MES, awareness raising, rules and regulations, reforestation and biodiversity conservation) and fiscal measures (e.g. environmental management fund, mine closure fund, economic incentive mechanisms, a damage penalty) in place to address externalities from extractive activities. The environmental management fund is financed from a number of sources (e.g. polluter payments, ecosystem payments, government financing, registration fees for EIA etc.), while payments to the mine closure fund are determined on a case-by-case basis with money deposited in a bank and used at the end of the production period to cover the costs of mine closure. Some remaining challenges include illegal mining, limited human resources and capacities, monitoring and assessment, enforcement and legal compliance.

The discussions with participants covered several issues including how the tax system can be simplified through institutional reforms as in Myanmar; how an environmental fund in Kazakhstan has helped efforts to restore the Aral Sea; how well-designed fiscal policies can act as a gate keeper to ensure only those investments for which benefits outweigh costs go ahead. It was noted that while provisions such as environmental impact assessments may be a routine practice in many countries, a key challenge is how to deal with unanticipated environmental risks. In this regard, it was noted how an industry level insurance fund for environmental damage could provide an incentive for industry to self-regulate, meet certain requirements, take reasonable steps to prevent environmental damages and address concerns of unanticipated environmental risks.

Session IV: Country experiences with natural resource revenue management and governance

This session was chaired by Ms. Seonmi Choi (PEI) and examined country experiences with the use and management of natural resource revenues to support sustainable development.

In a presentation on ***Managing revenues from mining – Experience of Mongolia,*** **Ms. Tumendelger Baljinnyam** (National Development Agency, Mongolia) highlighted the importance of the extractive sector in Mongolia. The concept of natural resource revenue sharing has gained significant attention over the past decade with the adoption of a number of laws and different revenue sharing schemes tested by the Government with varying degrees of success. A recent study by UNDP and PEI found that extractive companies are subject to over 20 types of taxes, mineral royalties, fees and charges which generate quite a substantial amount of local government revenues. The distribution of extractive revenues has changed over the years, it is currently derivation-based with revenues allocated to a Human Development Fund, General Local Development Fund and Local Development Funds, and Community Development Agreements. Some of the lessons learnt and challenges are that national policies and laws should be stable; revenue sharing mechanisms should be planned and implemented in line with the SDGs; there is a need to build capacities of local governments and inform local citizens to reduce conflict; requirements to address poverty and environmental issues should be integrated in fund guidelines and alternative allocation systems could be considered to allow financing of medium and large-scale projects.

In a presentation on ***Local government natural resource revenue management and national benefit sharing – Experience of the Philippines,*** **Mr. Niño Raymond B. Alvina** (Department of Finance, Philippines) noted how local governments play an important role in the sub-national implementation of transparency initiatives on resource revenues. In the Philippines, resource revenues are distributed depending on where natural resources are located. This allows for the compensation of negative impacts, helps mitigate conflicts related to rights/ownership/use, supports delivery of public service functions by local governments and helps address disparities in development, poverty, and income of local governments. Some remaining challenges include the need for more transparency and accountability, the lack of / conflicting information on tax collection and benefits, delays/variances in receipts of revenue and information gaps. In this regard, the Environment and Natural Resources Data Management (ENRDMT) tool is now a mandatory reporting requirement by the Department of Finance for local treasurers which helps address some information gaps.

In a presentation on ***Managing natural resource revenues – Experience of India,*** **Mr. Nitya Nanda** (The Energy and Resources Institute (TERI), New Delhi, India) noted that environmental damages from mining projects are significant and although there are several laws which empower central and state governments to take appropriate action, implementation is poor and there are no effective monitoring mechanisms. A new framework has been initiated, however it is not yet fully implemented and it is not clear whether revenues will be used in a transparent, consultative manner. Social externalities from mining are also significant (displacing groups, disrupting close social networks, etc.). Illegal mining is a major problem in many states, affecting revenue collections and exacerbating environmental/social impacts. Revenues from mining activities go to a general government fund and it is not clear how these revenues are used. Key lessons include the importance of responsible governance to enforce relevant laws; the need for governments to adequately and fairly address negative externalities from mining, recognize the possibility of incomparable values and create trust; the need to ensure well-being of displaced people and build transparency.

In a presentation on ***Managing natural resource revenues - Experience of Malaysia,*** **Mr. Nurul Huda Romli** (Minerals and Geoscience Department, Malaysia) set out how Malaysia has set goals for the future which take into consideration the sustainable development of its ample mineral resources. He outlined the legislative framework in place to ensure mining activities are carried out in line with safe practices, comply with environmental standards and do not jeopardize safety and health. This includes the State Mineral Enactment which brings greater uniformity in the issuance of mineral tenements in all states and requires a Rehabilitation Plan and Environmental Impact Assessment (EIA) before the mine is allowed to operate and the Mineral Development Act which ensures safe, environmentally friendly mining activities. There are also provisions for small scale operations to contribute to a Common Rehabilitation Fund for rehabilitation purposes and for large-scale mines to contribute to a Mine Rehabilitation Fund for progressive rehabilitation as decided by the miner.

Discussions with participants covered several issues including how in Mongolia the majority of revenues allocated to Local Development Funds are spent on small-scale infrastructure projects; in Nepal local governments collect revenues from river mining which are subsequently spent at the local level; in the Philippines local governments are given powers/autonomy over resource revenues. The importance of monitoring how revenues are being spent (e.g. as in the Philippines) and the importance of building capacities for example to enhance efficiency of revenue collection and support SDG-related investments was emphasised. It was also noted how technological developments (e.g. satellite imaging) could help address some of the problems with illegal mining activities.

Day 2: Channelling resource revenues to support the SDGs

Session V: Mobilizing revenues to support sustainable development (I)

The first of this two-part session was chaired by Ms. Joy Kim (UN Environment) and focused on Sovereign Wealth Funds (SWFs) and Natural Resource Funds (NRFs), fund objectives, fiscal rules applied, links to development goals, potential challenges and trade-offs, trends and country experiences.

In a presentation on ***Trends, principles and governance of natural resource funds,*** **Mr. Andrew Bauer** (Natural Resources Governance Institute (NRGI)) set out how performances of SWFs/NRFs have varied significantly across countries with some funds helping countries to escape the resource curse (e.g. Chile, Peru, Norway, some Persian Gulf countries, several US states) while others have become slush funds due to mis-management (e.g. Russia, Venezuela, Libya, Brunei, Equatorial Guinea). Key principles for good governance of SWFs include establishing clear fund objectives, fiscal and investment rules, strong oversight and transparency. The SWF in Norway was cited as an example of a strong governance structure, which although complicated has contributed to transparency and accountability. Mr. Bauer questioned whether SWFs are the best tool to support domestic investments (as this may undermine domestic fiscal rules, require a different set of skills etc.) and argued that other vehicles (e.g. national development banks, public-private-partnerships, infrastructure funds etc.) may be more suitable. He noted that if SWFs are well-managed, they can contribute to the SDGs by helping to stabilize budget expenditures and improve the quality of public spending (e.g. Peru, Chile, Botswana), improving international competitiveness by mitigating the negative effects of Dutch disease (e.g. Saudi Arabia, Kazakhstan), earmarking spending for high impact projects or environmental protection (e.g. Alabama, Texas, Timor-Leste) and supporting ethical investments (e.g. Norway).

In a presentation on ***Guidelines for designing SWFs to support the SDGs,*** **Mr. Sony Kapoor** (Re-Define International Think Tank) set out key challenges facing resource-rich developing countries, namely a lack of capital to develop needed infrastructure and a lack of human resources which requires decisions among competing priorities (e.g. capital vs. current expenditure, commercial vs. non-commercial etc.). A first step would be to maximise revenues from extractives (with lessons to be learned from Canada, Norway etc.) while minimising externalities (with regulatory measures etc.). A second step would be to diversify oil wealth, increase growth and welfare. Against the backdrop of declining returns on developed country assets, he noted that an increasing number of SWFs are being used to support domestic investments and social infrastructure investments. He set out the advantages and disadvantages of such an approach and highlighted the need for checks and balances on SWF management (e.g. sustainable public spending plan, build expertise with international oversight, separate the promoter role from the financier role, establish partnerships with public and private actors, increase transparency, etc.).

In a presentation on ***Managing revenues from the extractives sector – Experience of Australia and Norway,*** **Mr. Paul Cleary** (The Australian) set out how despite differences in the size of the economy and quality of human resources, Australia and Papua New Guinea (PNG) have had similar difficulties in raising revenues from extractive activities due to limited taxes applied in the sector. For example in Australia, an effort to raise the resource rent tax (RRT) on mining to 40% by the then Prime Minister failed due to inadequate communication with the public and a lack of political support, eventually leading the PM to leave office after 10 weeks and providing a big boost to mining companies. However there have been some recent encouraging developments in Australia where the government announced a review of the extractive sector and in PNG where the government revised taxes and reintroduced the additional profits tax. Mr. Cleary also highlighted the Norwegian SWF as a good example for its robust fiscal regime and ethical guidelines.

In a presentation on ***Managing revenues from the extractives sector – Experience of Mongolia and other countries in Asia,*** **Mr. Seung-Min Lee** (Asian Development Bank (ADB)) set out a number of factors/conditions which should be in place for natural resource revenues to support sustainable development. This includes establishing a saving and stabilisation mechanism such as a SWF; having a comprehensive and sound fiscal policy framework; adopting a balanced growth strategy that also focuses on the non-mineral sector; robust transparency and accountability mechanisms; and strong political commitment. He discussed the case of Mongolia which has undertaken efforts to reform its fiscal framework in the extractive sector (with a Fiscal Stabilization Fund in 2010 and a Human Development Fund which ran a significant deficit and was subsequently reformed as the Future Heritage Fund) and is currently prioritising efforts to clear the national debt. He also discussed the case of Kazakhstan where a National Fund acts as both a stabilisation and savings fund. In terms of lessons learned, he highlighted the importance of economic diversification in resource-rich countries to build resilient economies and strong political will.

Discussions with participants covered several issues including whether SWFs should be used to support domestic investment. In light of real world experience of what happens when spending domestically through SWFs (e.g. Angola, Azerbaijan, Kuwait, Iran, Libya, Russia), some argued it would be better to spend domestically through other vehicles given increased risks of patronage and corruption. Others argued that SWFs are not a distinct class of governance problems but rather reflect underlying governance challenges in the country and government capacities to invest domestically, although it was recognised that this may be an over-simplification of issues which does not reflect positive experiences in some countries such as Timor-Leste. Participants discussed the governance of SWFs and differences in structures and investment decisions among countries. It was noted that while Norway may not be a role model for other countries (and how its system of checks and balances may not always work properly), it has a very strong and complex institutional structure which provides some relevant lessons for other countries. Key challenges discussed include the need to set rules and implement them, the need for capacity development among government officials, the need for transparency and the importance of strong political commitment.

Session VI: Mobilizing revenues to support sustainable development (II)

The second session was chaired by Ms. Uyanga Gankhuyag (UN Development Programme) and focused on country experiences with different mechanisms to mobilize resource revenues for sustainable development and the role of the private sector in investing resource revenues in local communities to support sustainable development

In a presentation on ***The Petroleum Fund in Timor-Leste***, **Mr. Filipe Nery Bernardo** (Ministry of Finance, Timor-Leste) provided an overview of the Petroleum Fund of Timor-Leste

(PFTL) which is considered a good case of a well-managed SWF. Established in 2005, the PFTL is owned by the Ministry of Finance and managed by the Central Bank. It has substantive transparency requirements and a diversified investment strategy. The PFTL helps phase-in petroleum income into the economy in a controlled fashion, benefiting both current and future generations and contributing to sound fiscal policy. A share of petroleum revenues and investment returns (net present value of future revenues, approximately 3%) is transferred to the state budget and together with other government revenues supports long-term growth through investments in economic affairs, public services, education, social protection etc. Timor-Leste also has a Strategic Development Plan for 2011-2030 which is closely linked to the SDGs and a Transparency Portal with information on real time budget execution, aid and procurement.

In a presentation on ***Mining and local livelihoods – Experience from Lao PDR,*** **Ms. Soukvina Philavanh** (National Economic Research Institute (NERI), Lao PDR) outlined how Community Development Funds (CDFs) have been established to contribute to national poverty reduction programs where mining projects are located. All companies who sign a mining agreement and have a mining license are expected to contribute to a CDF which funds local-level development projects. However, to date the performance of CDFs has fallen short of expectations as its contributions have been mainly short-term and ad hoc, focusing on improving existing infrastructure rather than new investments. There is also limited understanding of mechanisms to access the fund and limited capacities among local communities to effectively work with companies for long-term development with weak coordination and oversight mechanisms. Some policy implications arising from the results of a recent PEI study are: to include non-financial commitments for community development in concession agreements; improve coordination mechanisms between provincial district authorities and companies; improve absorption capacity of local communities; improve oversight and reporting systems, and educate local communities.

In a presentation on ***Supporting community investment programs and sustainability – The role of the private sector,*** **Ms. Masuma Farooki** (SNL Metals and Mining) discussed how the private sector can engage with sustainable development at all phases: exploration (through social and environmental mapping); construction (with suppliers and investors); production (with a social license to operate); and closure (through rehabilitation and diversification). There are a number of different private sector actors (exploration companies, mid-sized mining companies, majors, investors, consumer goods) and international investor standards in place (IFC Performance Standards and Equator Principles). Currently, many companies are moving away from corporate social responsibility (CSR) to operationalizing a sustainable development strategy through community development agreements, incubation programs, machinery leasing and sizing down. There is a need for governments to negotiate at the right time with companies; international standards should be more stringent than national standards; community engagement is more integral to mining operations and processes in place to ensure dynamic engagement.

Discussions with participants covered several issues including the challenges to diversifying an economy away from the resource sector particularly in fragile, post-conflict countries; priorities for revenue expenditure at the national and community level; and varying capacities between local communities. Participants discussed how community engagement with mining companies differs between regions (e.g. Latin America vs. East Asia), how international standards are applied equally across countries but may differ between small and large companies depending on resources, and how the Equator Principles includes provisions to ensure social spending does not go down when commodity prices decline. The importance of clear responsibility and accountability between governments, companies and local communities for delivering the SDGs was also noted.

Session VIII and IX: Working Groups

Three working groups met in parallel to exchange insights and experiences on key issues. A brief summary of discussions in each working group is provided below.

WG1: Fiscal reforms to mobilise resources and 'green' extractive industries

This working group was facilitated by Mr. Ian Parry (IMF) and Ms. Joy Kim (UN Environment). The rapporteur was Mr. Nitya Nanda (The Energy and Resources Institute (TERI), India). Key points raised in the discussion include the following:

- **Countries have various experiences with fiscal and non-fiscal instruments in the extractive sector**. For example in Lao PDR, while there are some regulations in place, monitoring/compliance/implementation is challenging, institutional capacities and resources are limited, and there is a need for a more robust fiscal framework to address declining commodity prices. In Myanmar, there are strict policies on EIA and EMS, however challenges relate to monitoring, negotiation capacities and illegal mining. In India, monitoring mechanisms are weak and social/environmental impacts of mining are significant, there are limited taxes on mining activities and problems with EIA processes which are conducted by companies with no certified agency/quality control. In China, mining has significant environmental/climate/social impacts and perverse incentives on local governments, new policy measures include non-fiscal policy (e.g. labour standards), high taxes, local component requirements, employment provisions, revenue transfers to environmental insurance measures by local communities, closure of small illegal mining and NGOs acting as a watch dog. In Vietnam, there are environmental protection fees, new laws on mining right fees and high royalties on minerals.
- Although other regulatory measures (e.g. labour standards, local components requirements, regulations) are in place in a number of countries, **monitoring/compliance/implementation remains a challenge**. Other challenges include the **quality of EIA processes and illegal mining**.
- **Mine closure funds** are important complementary tools, however such funds may be too small to adequately address environmental impacts. They are also not a widely adopted practice and do not exist in many countries.
- **Judiciary measures** work well in some countries such as India. However, penalties are not sufficient and environmental damages are difficult to estimate.
- A possible solution could be the application of **different royalty rates** depending on environmental impacts and additional royalties for mitigating impacts.
- **Governance structures and institutional arrangements are important.** For example in some countries Federal governments deal with environmental issues whereas royalties go to the state (e.g. India). Different ministries should be engaged in the process (mining, forest, environment and finance) as revenues from mining activities go to the finance ministry but do not always flow to environmental enforcement agencies. There is also a role for state-owned mining companies in some countries (e.g. India).
- **Key challenges include:** limited human capacity, limited political will to address environmental and social impacts; a lack of clear objectives of the government in view of limited understanding of the costs-benefits of mining activities.
- **Involving civil society in monitoring** and third party multi-stakeholder groups in quality control processes is important**.**
- Strict EIA may slow down the process and may hinder investments, thus adopting **a phased approach** (e.g. in Myanmar) may be useful.

WG2: Natural resource revenue management, benefit sharing and stakeholder engagement to support sustainable development

This working group was facilitated by Dr. Detlef Schreiber (GIZ) and Ms. Anja Waldraff (GIZ). The rapporteur was Mr. Raju Babu Pudasaini (Under Secretary, Ministry of Population and Environment, Nepal). Key points raised in the discussion include the following:

- Countries use **different mechanisms for distributing resource revenues at the local, regional and national level**. For example in Nepal, the local level decides what to collect and how to spend revenues and is supported technically by the national level. In Timor-Leste, all extractive revenues are collected by the national level and distributed to districts, in autonomous districts there is own collection (non-extractive revenues) and a top-up by the government. In Indonesia, revenues are allocated to the central level with a proportion of collected revenue going back to the local and provincial level depending on political power rather than on extraction. In Australia, the state government collects royalties and federal governments collect company taxes with some exceptions such as the 'royalties for the region initiative' where part of the royalties go back to impacted communities.
- **Stakeholders are engaged in the process** in different ways. For example in Nepal there is a national level expenditure tracking portal and in Timor-Leste distribution is very transparent down to the district level (with information provided through a website) with parliament involved in budget allocation
- Some of the **main achievements and remaining challenges** facing countries include a lack of capacity, limited effectiveness of existing mechanisms / enforcement and the need to establish conflict prevention / regulation mechanisms. In Timor-Leste, social media provides a very powerful tool to voice issues. In Indonesia, there is a need to re-arrange the budgetary system to tackle the challenge of phasing out fossil fuel subsidies and communication with citizens. In Australia, the government is careful not to upset mining companies while civil society can play an important role by putting pressure on the government.
- **Principles to ensure sound and transparent management of resource revenues and good governance** could include:
    - Transparency portals
    - Equal treatment between districts
    - A holistic approach to SDG implementation
    - Conflict resolution and dialogue mechanisms
    - Compliance with international commitments (e.g. reduce fossil fuel subsidies to achieve commitments in NDCs)
    - Facilitate capacity development at different levels – empower local communities through engagement in planning, implementation, monitoring
- Technical support that may be useful to support resource management and good governance for sustainable development includes **networking to share best practices** between countries and an **external view** to address transboundary aspects.

WG3: Investing natural resource revenues to support sustainable development

This working group was facilitated by Ms. Sirini Withana (UN Environment) and Ms. Seonmi Choi (PEI). The rapporteur was Mr. Nurul Huda Romli (Minerals and Geoscience Department, Malaysia). Key points raised in the discussion include the following:

- Countries adopt **different definitions of 'green investment'** which include for example investments in clean energy, water, forestry, protected areas, pollution control, clean technologies, hydropower, environmental protection and land rehabilitation (by local governments). Some challenges to investing resource revenues for sustainable development include the **lack of an internationally agreed definition of green investment**, limited financing for environmental protection, **difficulties in tracking** resource revenues when revenues are allocated to the general budget, **criteria for investment**, weak **public financial management** and **incoherent policies** such as land use planning and land concessions.

- Countries have **different funds and mechanisms** to mobilise revenues for sustainable development and to address environmental externalities from mining, for example Environmental Funds, Rehabilitation Funds, Trust Funds, spending requirements for local development funds, social development management plans supported by mining companies etc.
- **Some challenges** include the need to balance national and local interests, underestimates of the costs of rehabilitation, earmarking funds for direct environmental damages from mining, competition between green investment and other investments.
- While there are **some risks to linking resource revenues with green investment** given the volatility of resource revenues, **there are also benefits** such as **diversifying the economy, reducing macroeconomic volatility and risk.**
- The **private sector** can play an important role in supporting sustainable development in local communities depending on the company. For example, some companies make contributions to rehabilitation funds, community development funds and endowment funds. Some companies invest in biodiversity offsets and other measures. However it was noted that such mechanisms may not work well in practice and there is a need for further monitoring and discipline systems, strengthened implementation, improved estimates of rehabilitation costs and a clarification of responsibilities between companies, local governments and communities.
- **Technical support** that may be useful includes support to countries in determining the viability of setting up a SWF/NRF (e.g. changes needed to the legal and fiscal framework, concessions for loans and grants for green investment etc.); how to optimally reform the tax regime on the extractive sector, the combination of different instruments that could be applied and wider fiscal package; how to design environmental taxes; and further sharing of lessons between countries including on mining rehabilitation efforts.

Session X: Wrap-up and conclusions

In the closing session of the workshop, organisers shared information on some relevant materials and resources (links are available on the workshop website under 'Other materials') and provided brief closing remarks. Participants also shared some final take-away messages from the workshop and suggestions, noting the need for further sharing of experiences at the country level (e.g. on challenges faced in different countries and how these have been addressed, experiences with green fiscal policies such as carbon taxes and other environmental taxes), the need for further South-South exchange, the need to build institutional capacities and assess the effectiveness of different policies for supporting delivery of the SDGs.