

Second Workshop on Long-term Finance, Session II: Enhancing enabling conditions: Policies and instruments

2nd October 2012 Amal-Lee Amin E3G – Third Generation Environmentalism





- Barriers to mobilising, scaling-up and catalyzing low carbon and climate resilient investment
- Role of public policy and public finance to mobilise, scale-up and catalyse private investment
- Learning from experiences and role of climate finance
- Potential new instruments and role of the Convention
- Concluding remarks

The 2030 Investment Challenge



- <2C requires \$10 trillion in additional energy investment to 2030
- Shifting \$26 trillion from high to low carbon energy investment
- \$145 trillion in infrastructure investment to 2030 needs to be made low carbon and climate resilient
- Planning investments under uncertainty of the costs of adaptation integrate climate risks to make all economic sectors and infrastructure resilient
- Investment in major economies mainly low carbon from 2020

Requires transformational changes – align public policy and public finance in all countries and a specific role of climate finance to support developing countries

Barriers to Investment Increase Risks and so Costs of Investment



Policy Barriers

- Policy uncertainty and complexity
- Transaction costs (complying with policy/licensing/reporting etc)
- Land allocation, access and security of ownership
- Enforcement of policy and pricing incentives
- Existing subsidies and policy support for high carbon alternatives

Market and Technology Barriers

- Relatively high upfront cost of technology
- Human and operational risks (lack of trained people)
- Limitations of support infrastructure (e.g. grid infrastructure)
- Immature supply-chain and limited capacity of project developers
- Long term viability of many state utilities under question
- Lack of track record of particular technology/project



General financial barriers

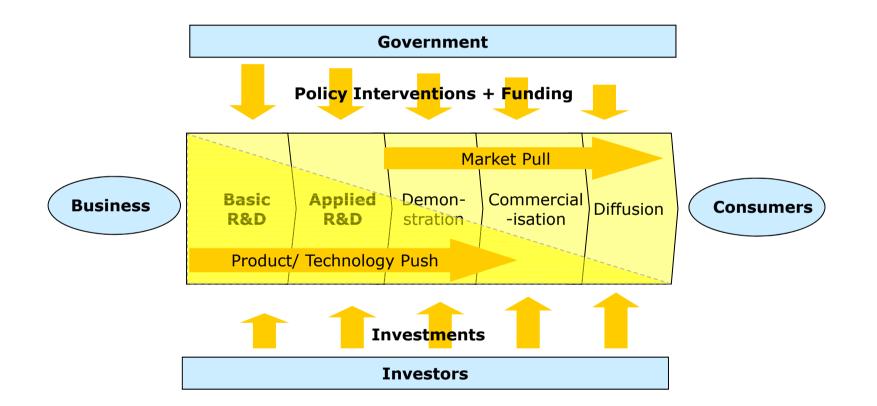
- Country risk: possibility of defaults or other factors leading to non-return of invested capital including economic risks such as inflation.
- Currency risk: Exchange rate fluctuations making returns volatile.

Climate specific financial barriers

- Deal flow problems: insufficient number of commercially attractive deals making diversification in investment portfolios difficult
- Complexity risks: difficulty evaluating multiple, overlapping risks making it easier to invest in business-as-usual investments.

Policy and Financial Interventions Differ Along the Innovation Chain









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The Policy Challenges



•Policy and regulation is key to an effective investment framework and to reducing risks and so costs of investment

- Main task is to change focus of existing flows of infrastructure investment in energy, cities, water etc
- Policies designed to ensure most effective use of climate finance in order to ensure it:
 - Bridges upfront financing gaps
 - Bridges incremental cost gap
 - Catalyst for transformational change and innovation by removing specific risks and overcoming barriers

The Financial Challenges



- **Front-Loaded Finance**: upfront investment e.g. in efficiency, RES etc to displace long term fossil fuel purchases. Strains <u>capacity</u> of financial system especially in the current post-crisis climate
- **Managing Risk**: low carbon investment has higher political, technology, and policy risks. Investors amplify low carbon risk (downplay high carbon risk)
- **Integration**: regulatory reforms needed to integrate low carbon and climate resilience into on-going infrastructure investment in cities, water systems, industrial clusters, electricity and gas grids

Public policy and regulatory/market reforms – as well as targeted public finance interventions – necessary to reduce risk and mobilise private investors

Investment Grade Policy



- Early engagement of stakeholders and dialogue particularly private investors to increase transparency and buy-in to policy objectives
- A clear, long term and coherent policy and regulatory framework underpinned by rule of law aim to align investment timescales and policy timescales
- Price signals should incentivise deployment of low carbon/resilient investments:
 - Explicit or implicit (e.g. FiTs) pricing of Carbon to increase cost competitiveness, clear process for review and phasing out
 - Transparency of fossil fuel subsidies and phasing out
- Economic planning with aim of realising benefits of green growth through market creation (e.g. standards, building codes, transport policy etc)
- Institutional arrangements to facilitate effective cross-Ministerial coordination and integrated resource planning

Adaptive Governance to Mobilise Finance



Integrating resilience within national planning processes:

- Increase cooperation and communication between scientific and policy communities
- Integrated approach towards resource planning requires particularly strong coordination and cooperation between Ministries
- Partnering with stakeholders to identify means for increasing resilience of key economic sectors and infrastructure, and strengthening community based responses

Overcome barriers to private sector investment in adaptation through:

- Raising awareness through increasing availability of data, information and user-friendly risk-assessment tools
- Medium and longer-term planning to comprehensively identify and communicate climate risks across different sectors to the private sector
- Create policies and regulation to incentivise resilience measures e.g. building codes



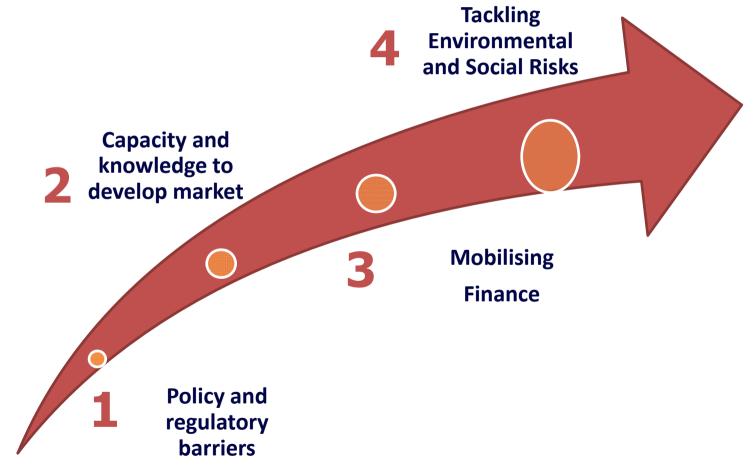


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Case study: Mexico-IDB-IFC Renewable Energy CTF Program



The Renewable Energy Program – to address key barriers for renewable energy development in the Mexican market



Developing a Robust Policy and Regulatory Framework



Program Components:

- Bank support for the Government of Mexico's national climate change strategy – policy based loans to develop the institutional framework
- Grants for studies to strengthen policy and regulatory agencies and to develop methodologies to define pricing incentives
- Grant to undertake a comprehensive assessment of opportunities for attracting **carbon finance** for renewable energy and energy efficiency





Program Components:

- **Developing the market:** wind energy projects in Oaxaca provide opportunity to strengthen capacity and build relevant expertise:
 - Market knowledge regarding wind energy financing role of private developers and investors
 - Technical aspects of specific renewable technologies, such as wind turbines – including \$5m GEF grant for technology development
 - Study on property rights, leasing and land access for local and indigenous communities
 - Studies on economic benefits of developing a local wind industry
- **Robust knowledge management** for capturing and disseminating relevant knowledge nationally, regionally and internationally



Building technical, institutional capacity for scaled-up investments over time





Program Components:

• Mobilising direct private sector finance:

- CTF funds used to address risk and cost barriers for early market entrants
- Goal: to achieve a track record of successful projects through a limited number of initial investments
- Up to \$80 million of CTF used to catalyze up to \$160 million of MDB financing and \$850 million other financing (sponsors, private investors and other bilateral banks)

• Catalyzing financing through national public banks:

- \$70 million of CTF resources used to leverage minimum of \$70m domestic public finance from NAFIN and further \$70m IDB loan
- Provide direct loans and contingent credit lines to cover cash flow shortages (e.g. debt repayments)
- grant finance to strengthen NAFIN's institutional capacity

Mobilising resources from public and private sector into a new sector

Managing Environmental and Social Risk

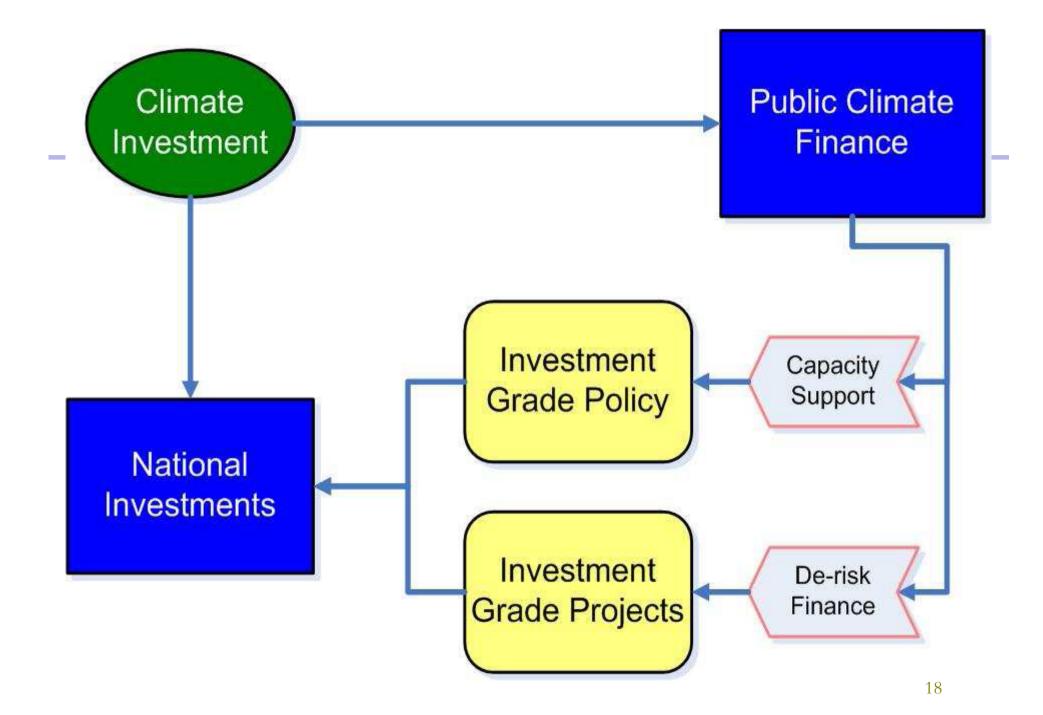


Program Components :

- Environmental risk assessments that benefit all sector players and reduce information barriers (e.g. impact on endemic and migratory bird and bat populations of existing and future wind farms)
- Creation of a "foundation" for local communities affected by wind farms (could be replicated for other technologies)
 - Contributions from all local wind farms, Government, MDBs and philanthropic organizations
 - Promotes community and social development
 - Method of sharing benefits
 - Reduces risk of local opposition to the development of the sector



Creating opportunity for scale-up over the medium and longer-term



Brazil's Amazon Fund: innovative governance features



- Decades of experience in creating incentives for reducing deforestation, sustainable forestry and sustainable forest management
- Governance involves wide stakeholder base, including local government, national ministries and civil society (IPs, traditional communities, NGOs, industry and scientists)
- Funded projects in line with national policy priorities and guidelines of the Sustainable Amazon Plan and the Action Plan for Prevention and Control of the Legal Amazon Deforestation
- States participating in the Amazon Fund Governance or applying for funds must develop a full strategy to fight deforestation
- NGOs and other public and private institutions can also apply for funding
- Delivery of pledged finance contingent on demonstrating credible emission reductions based on accepted baselines and subject to robust monitoring and certification

Strengthening Institutional Capacity for Engaging and Mobilising Private Sector



- Zambia: Inter-ministerial Secretariat on Climate Change:
 - Led by Ministry of Finance and engaging line ministries focus on mitigation and adaptation
 - Partnership between public and private sector for low carbon investment, open to adaptation measures in the future
- India's National Solar Mission combines:
 - Regulatory measures through FiTs based on reverse auctions
 - Innovative public-private finance instruments such as Partial Credit Guarantee Facility, FOREX hedging facility and Solar Park Financing Vehicle
- GEF, LDCF, SCCF and PPCR have all focused on reducing identifying vulnerabilities and strengthening adaptive capacity
 - Few emerging examples of how climate finance can share risks with the private sector for adaptation e.g. Caribbean Risk Insurance Facility and Piloting Index-based Agriculture Insurance Niger

Delivering Scaled-up Investment: case of offshore wind in the UK



- Scaling up investment in offshore wind: current 2 GW to be increased to 18 30GW by 2020
- Historically \$4 5bn/year utilities balance-sheet financing and project finance → to 2020 requires at least a fourfold increase to \$15 – 25 bn/year
- Exceeds balance-sheets when post financial crisis utilities are deleveraging and commercial banks required to maintain capital reserves
- Relative scarcity of capital compared to scale need to accelerate participation of low cost capital from institutional investors
- Role for the UK's new Green Investment Bank to facilitate refinancing of offshore wind assets post the construction and early operation phases
- Sharing risks construction and early operational risks require expertise of utilities and commercial banks then flip into debt/bond markets to allow recycling of capital





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International Policy and Instruments



- Plethora of international and regional funds, mechanisms and facilities providing public (climate) finance for mitigation and adaptation
- UNFCCC GEF, special funds and the Adaptation Fund
- Climate Investment Funds concessional finance
- Multilateral and bilateral development banks ordinary capital
- Growing number regional/sector public-private climate finance vehicles
- Green Climate Fund under design, considering private sector facility and calling for "readiness" for receiving climate finance

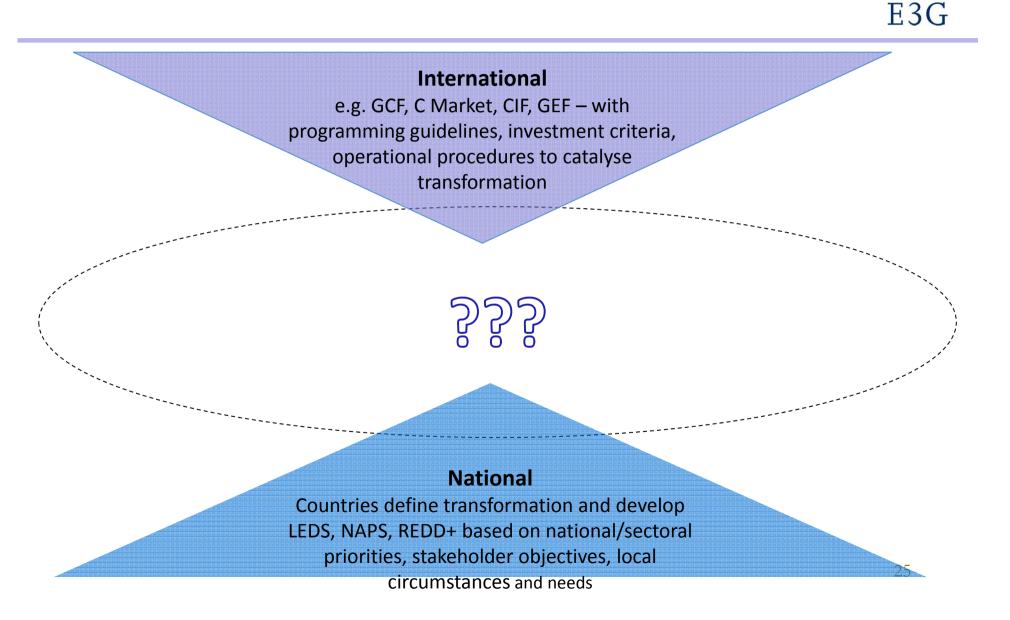
Top-down measures provide support for countries to create conducive enabling environments and capital for sharing risks to mobilise the private sector

National Policy and Instruments



- Governments leadership in creating conducive enabling environments, LEDS and NAPs:
 - active approach towards understanding how different sources of finance can best meet national and/or sectoral objectives
 - identify and prioritise capacity needs both institutional and for market development
 e.g. make data available or for aggregators of small projects for EE
 - design and implement policy instruments that share risks with private sector e.g. FiTs
 - provide seed capital or concessional finance to provide targeted financial interventions, directly or through national/state development banks or dedicated green funds
 - market enabling activities to increase project deal flow e.g. data and tools for project developers, fund managers, access to feasibility studies etc.
 - maximise use of existing international financial mechanisms which support private sector e.g. foreign exchange hedging or political risk guarantees

Create effective supply and demand for climate finance: topdown incentives and effective use of climate finance



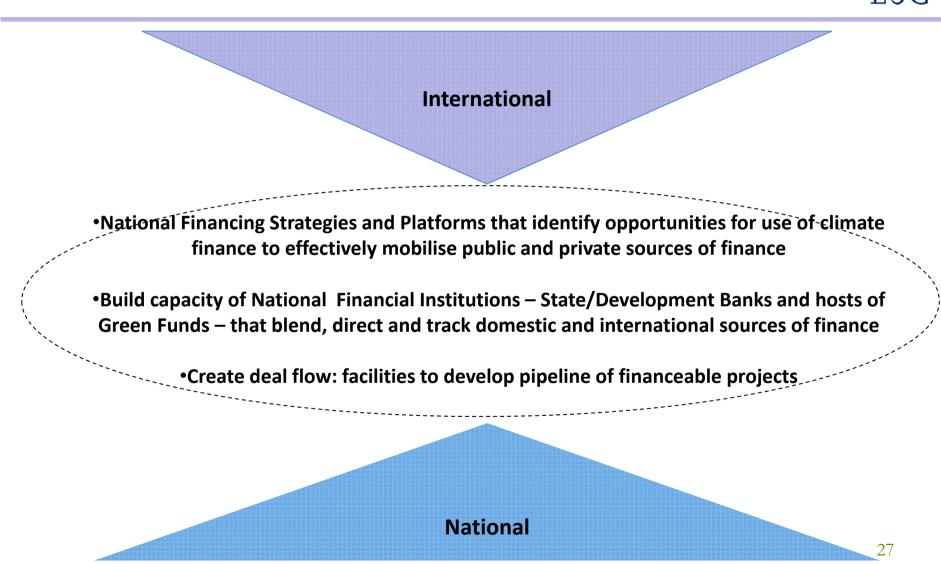
Potential New Policy and Instruments – inside or outside of the Convention?



- National Financing Strategies or Platforms: engage public and private stakeholders on financing options for implementation of LEDS and NAPS (including integration within the national budget and sector plans)
- **Capacity Development Facility:** dedicated to strengthening institutional capacity, including for national public banks, Green Funds or Green Investment Bank vehicles (readiness?)
- **Innovative Finance Fund:** reward innovative public-private financing approaches to low carbon and resilient
- **Project Pipeline Development Facilities**: bankable mitigation and adaptation projects that can have a transformational impact

Bridging top-down supply with effective demand for climate finance





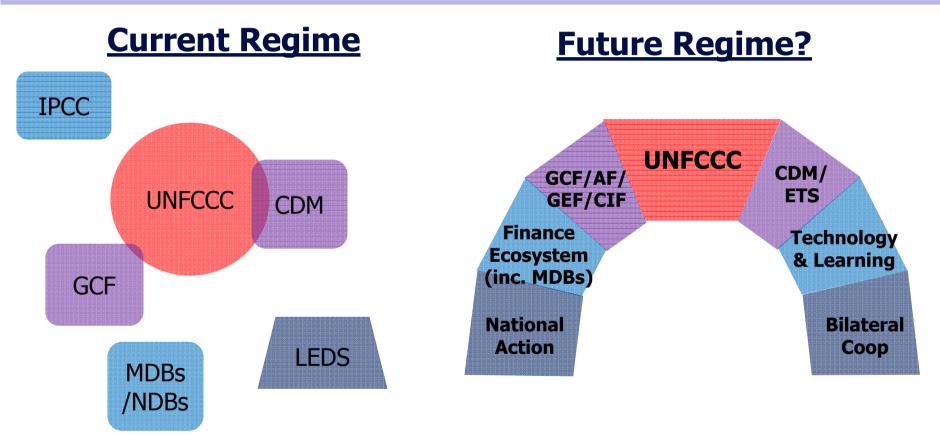
Role of Convention in Providing an Effective International Framework



- Green Climate Fund and its private sector facility
- Adaptation Fund
- Existing or new KP mechanisms for Carbon Finance
- Global Environment Facility
- Adaptation Committee
- Technology Executive Committee and Climate Technology Centers
- NAMA Registry
- Standing Committee
- Forum for Capacity-building
- Measurement, Reporting and Verification



The Climate Regime must evolve



Past regime shaped by theory and negotiation. Future regime must be built on practical experience

Role of the Convention



- **Incentivise and reward national leadership:** "climate financing compact" recognising primary role of national policies to align climate financed activities with national priorities
- **Grant resources for capacity-building**: important that national policies and measures can access and attract climate finance
- **Concessional finance for targeted risk-sharing instruments:** allocate risks (and rewards) to those best placed for those
- **Measuring, reporting and verification:** transparency and accountability of finance and actions
- **Learning**: how to strengthen institutional learning on policy, regulatory and financial models

Policies and Instruments Outside the Convention



- Accelerate investment by pension fund, insurers, sovereign funds:
 - Grow international green bond market (now only \$150bn)
 - Reform financial regulation (Solvency II; Basel III) discriminating against infrastructure investment (now 1%)
 - Tax incentives for pension funds to stimulate climate related investments
 - Transparency and accountability of long-term investments by institutional investors
 - Standards and data based on common definitions
 - Regulation to manage systemic financial risks of high carbon investment and disclose company/fund carbon liabilities





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Learning Lessons from Experience



- Need to learn much more from existing use of climate finance
- Climate finance not same as development finance involves new and complex issues, linked to major policy and market reform
- Country leadership in designing strategies and plans that actively identify financing options grounded through strong involvement of local stakeholders
- Understand what policies and instruments work best in different contexts, identify where there may be particular challenges with implementation
- Realising benefits of green growth will require Government efforts to grow local markets and support for technology and innovation
- Integrated approach towards mitigation and adaptation institutional constraints?
- Understanding the role of the private sector in adaptation?
- Simplistic M&E systems (e.g. tons of carbon) will incentivise wrong project portfolio and culture in delivery organisations

Summary



- Ultimately it will be necessary to redirect all public flows of finance to lever all forms of private capital into low carbon and resilient investment options
- Keep focus on policy and regulation as key to an effective investment framework
- Sharing risks through combining public policy with targeted use of public finance designed to reduce overall costs of investment, emerging cases of role of climate finance within this
- Support required Governments to strengthen institutional capacity coordination and integration of differing policy objectives with existing and potential sources of finance
- Catalytic role of the Green Climate Fund must focus on both institutional strengthening i.e. non-reimbursable grants and investments i.e. concessional finance
- Multilateral, bilateral and national development banks can be important source of policy expertise as well as channels for blending public, private and climate finance
- MRV system to increase transparency of actions as well as financial flows





Detailed materials of E3G finance work can be found at <u>www.e3g.org</u>

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