

The Energy Challenge

Renewables at Rio+20

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Sustainable Energy – Sustainable Development

- 1.3 billion people lack access to electricity
- Demand will increase by 40% in the next 20 years
- Reliable and sustainable energy is necessary for sustainable development and climate protection
- ‘Green economy’ must be powered by sustainable energy that does not unduly impact the environment or people
- Energy poverty could be eradicated using a mix of energy sources, only increasing CO2 emissions by 0.7% in 2030

Sustainable Energy for All (SE4All)

UN Secretary General’s suggested goals:

1. Ensure universal access to modern energy services
2. Double rate of improvement in efficiency
3. Double the share of renewable energy

Solutions

- Focus on high-impact initiatives that will create enabling frameworks for sustainable energy
- Need for change well-established: range of roadmaps show how these changes can be implemented
- We have the technological and managerial skills, financial expertise, and broad support
- However, political and financing barriers are stifling development of sustainable energy resources
- Lack of partnerships, information, political will and supporting frameworks

Vision, Goals and Target

- Agree on a long-term vision for 100% sustainable energy with ambitious and specific goals
- Key debate will be the relationship between energy-specific goals and Sustainable Development Goals
- SE4All goals are a logical starting point, but are currently lacking: no standard by which to assess progress
- Must articulate and agree on clear baselines and metrics
- Parties must commit to endorsing the SE4All objectives and initiating a process to refine and advance them

Policies that Work

- Focus on implementing best practice and tailored policies based on extensive existing knowledge
- Create the right environment for private investment
- Good governance and sound economic context necessary, but specific reform in the energy sector is a readily achievable and complementary measure
- Numerous policies available: building codes; renewable energy targets; energy efficiency policies; urban planning and transport policies; industrial efficiency

Information Dissemination and Assistance

- Governments and policymakers must have access to adequate information regarding best practice
- Policies of a small number of countries particularly successful: must be widely disseminated
- Making technical assistance available is desirable: expertise exists but gaps in capacity and coverage remain
- Many centres of excellence in energy policy lack the capacity to respond to requests for technical assistance
- Developing countries identify the need for improved capacity in government agencies and regulatory bodies
- Need for an institution to serve as a clearinghouse for policies and provide active policy advice - International Renewable Energy Agency (IRENA) can fill this role
- Nations should commit to signing IRENA treaty and contributing funds to developing its capacity

Catalysing Private Investment

- Lack of suitable investments, not capital
- International Monetary Fund: big institutional investors in 17 OECD countries hold US\$60 trillion in total assets
- Investors seek opportunities to invest, but do not find many investment-grade opportunities: must be large-scale and liquid with a clearly identified risk profile
- Renewable energy projects generally small/not securitised
- Innovative investment vehicles and institutions are needed to aggregate small, risky projects into investment units

International Finance

- Development of unsustainable technologies subsidised
- Some funding agencies devoted to funding renewables: endowed with comparatively small funds
- Need shift in funding priorities at the international level
- World Bank/regional development banks must commit to renewables and redirect their funding
- International financial transaction tax could raise US\$400 billion annually: likely to feature prominently
- International Finance Corporation could establish a dedicated allowance for sustainable energy

Perverse Incentives

- Removing subsidies, aid payments, loans etc. that encourage fossil fuel consumption
- Incentivise inefficient energy use, regressive, cement dominance of fossil fuels, and create future resistance
- Cost more than \$300 billion in 2010
- Phase out must be accelerated: has considerable momentum and has become a priority
- 53 countries in the G20 and Asia-Pacific Economic Cooperation forums committed to phasing out subsidies
- Particularly important outcome for Rio+20