

Promoting the Enabling Environment for Geothermal Development in the Andean Countries: Legal and Regulatory Frameworks

Background:

The International Renewable Energy Agency (IRENA) is an intergovernmental organisation that supports countries in their transition to a sustainable energy future, and serves as the principal platform for international cooperation, a centre of excellence, and a repository of policy, technology, resource and financial knowledge on renewable energy www.irena.org. The Country Support and Partnerships (CSP) division helps countries and regions accelerate the introduction of renewable energy and works with a variety of public and private stakeholders.

In 2013, IRENA's Geothermal Initiative in Andes was launched together with the Latin America Energy Organisation, OLADE and the International Geothermal Association (IGA) as an initiative to support Andean countries, given the large geothermal potential. As a result of the workshop held in Iceland on the 4-5th March 2013, and country status reports, three potential areas were identified for potential support. These are legal frameworks to complement the existing regulatory geothermal norms to further develop enabling conditions for investments; access to finance and dissemination of innovative models to finance operations including geothermal reinsurance and risk mitigation funds amongst others; and capacity building.

Capacity Building for geothermal is one aspect of IRENA's Initiative through the National Strategies project. Desk based research is ongoing, including one on one discussions with experts working in the region on the capacity needs. There is also ongoing discussion with countries advanced in geothermal development on the potential offers in the geothermal sector – technology or knowledge transfer, technical co-operation, trainings on the field, best practices in policy formulation or financing structures, and provision of experts. As legal and regulatory frameworks were identified as important, this workshop has been designed to share the experiences of the countries that have had a long standing experience. The two day workshop will bring together stakeholders from the Government, private sector and supporting institutions.

Meeting Objectives:

- To share the experiences and lessons learnt between countries advanced in geothermal development and Andean countries
- To identify any potential gaps and barriers in regulations for geothermal – short term or long term – and discuss way forward for Andean countries.
- Realise possible synergies and areas for collaboration with IRENA and between/amongst Member/Signatory States.

Participation:

- Members from Iceland, New Zealand, Japan, Mexico, Kenya, Nicaragua, Grenada, OLADE, IGA, Inter-American Development Bank, KfW Entwicklungsbank, Japan International Cooperation Agency - JICA
- At least 2-4 delegates/representatives from each Andean country (Bolivia, Chile, Colombia, Ecuador and Peru). Delegates are from Government, mainly regulatory bodies, Energy Ministry and representatives from private sector and educational/ research institutions.

Contact: Kavita Rai - KRai@irena.org/ Alejandro Tapia - MATapia@irena.org

AGENDA

Promoting the Enabling Environment for Geothermal Development in the Andean

Countries: Legal and Regulatory Frameworks

- An IRENA and OLADE Capacity Building Event -

Date: 21-22 November 2013 **Time:** 09:00 to 17:30 (hours)

Location: Los Delfines Hotel, Lima Los Eucaliptos 555 San Isidro, Lima 27, Peru

AGENDA – DAY 1 (21 st November 2013)		
Time (Hour)	Topics	Speaker
SESSION 1 – Introduction to Workshop		
08:30 – 09:00	Registration	-
09:00 – 09:20	Welcoming remarks – Ministry of Energy and Mines of Peru	Excellency Jorge Merino Tafur Ministro de Energía y Minas (tbc)
09:20 – 09:35	Welcome remarks, workshop objectives and expected outcomes	Mrs. Gauri Singh Director, Country Support and Partnerships, IRENA
09:35 – 10:10	<p><i>IRENA Geothermal Initiative in the Andean countries</i></p> <ul style="list-style-type: none"> ▪ Status of Geothermal Energy in the Andean countries ▪ Strategy for the Geothermal Initiative in Andean countries 2014-2015 	Mr. Gabriel Salazar, Acting Executive Secretary, OLADE Mr. Alejandro Tapia, Regional Manager LAC- IRENA
10:10 – 10:40	Coffee break	
SESSION 2 – The development, challenges and impact of policy and regulations on geothermal development		
Moderator: Bart van Campen, Geothermal Institute, Auckland, New Zealand		
Panel - One (1) Government representative from each Andean country + Speakers + Japan + Kenya		
10:40 – 11:00	Legal framework for geothermal exploitation in Iceland	Mrs. Harpa Pétursdóttir Legal Advisor, National Energy Authority, Iceland
11:00 – 11:20	Regulatory Framework of Geothermal Energy in Chile (“Marco Regulatorio de la Energía Geotérmica en Chile”)	Mr. Rodrigo Godoy Ibañez, Lawyer, Ministry of Energy. Chile

11:20 -12:45	5-10 minutes interventions on the topic from the Andean country representatives Question and Answer from floor	Moderator
12:45-14:00	Lunch break	
SESSION 3 – Opening up investments for geothermal sector – key policies and regulations required		
Moderator: Paul Quinlivan, Board Member, International Geothermal Association (IGA)		
Panel – Speakers		
14:00-14:20	Government intervention in support of geothermal development: The case of Kenya	Mr. Joseph Nganga, Director- Electricity Energy Regulatory Commission
14:20-14:40	Investments in geothermal sector in Andean countries: private sector perspective in Chile	Mr. Rüdiger Trenkle Country Manager MRP Geotermia Chile
14:40 – 15:00	Challenges for Geothermal Technology Development	Mr. Sandro Bruni Geothermal Energy Expert Inter-American Development Bank (IDB), Washington
15:00 - 15:30	Coffee break	
15:30 - 15:50	The Geothermal Development Facility (GDF) for Latin America	Mr. Jens Wirth Lead Geothermal Specialist KfW Entwicklungsbank Germany
15:50 - 16:30	Questions to speakers from Andean countries and floor	All
SESSION 4 – Collaborating for growth – Perspectives from Japan		
Moderator: Gauri Singh, Director, Country Support and Partnerships, IRENA		
16:30 – 17:30	Overview of Policies on Geothermal Development in Japan State of play of geothermal development in Japan and the role being played by JOGMEC – Japan Oil, Gas and Metals National Corporation Cooperación de JICA al Desarrollo Geotérmico en Lationamérica" (JICA Cooperation in Geothermal Development in Latin America)	Mr. Hidenori Yonekura, Agency for Natural Resources and Energy, Japan Mr. Toshiaki Kayaba, Deputy Director, Planning and Finance Division, Geothermal Resource Development Department *JOGMEC Mr. Makoto Kanagawa JICA Peru
19:00 -	Dinner reception hosted by IRENA	All participants

DRAFT AGENDA – DAY 2		
Time (Hour)	Topic	Speaker
09:15 – 9:30	Introduction to Day 2 – Brief recap of first day	Dr.Kavita Rai Programme Officer, IRENA
SESSION 5 – The socio-environmental consideration and experiences in setting geothermal policy and regulation		
Moderator – OLADE		
Panel – Iceland, Japan, Kenya + presenters		
09:30 – 09:50	Ensuring sustained benefits for local communities from geothermal projects	Mr.Paul Quinlivan, Board Member International Geothermal Association
09:50 – 10:20	The New Zealand experience on legal frameworks and regulation for social and environmental aspects (land/water/overground-underground resource)	Mr. Mark Brockelsby Programme Manager (Energy) Waikato Regional Council New Zealand
10:20 – 10:35	Renewable energy and environmental regulations - Ecuador	Ing. Byron Betancourt Coordinador Nacional de Regulación, Consejo Nacional de Electricidad – CONELEC, Ecuador
10:35 – 11:00	Coffee break	
11:00 – 11:15	Experience from Peru	Eco. Iris Cárdenas Pino Directora General de Asuntos Ambientales Energéticos, Ministry of Energy and Mines, Peru
11.15 - 12.45	Interventions from Andean Countries and discussion	
12:45 – 14:15	Lunch break	
SESSION 6 – Building up capacities to strengthen geothermal policies and regulation in the Andean countries and beyond		
Moderator – Gauri Singh, Director, Country Support and Partnerships, IRENA		
14:15 – 15:15	Group discussions – each country on way forward (With experts joining each group)	All
15:15- 15:40	Coffee break	
15:40– 17:00	Experience and way forward in Nicaragua Presentation by each country on way forward	Nicaragua Andean country/ies
17:00 – 17:30	Closing	IRENA/OLADE/Peru
	Cocktail reception - hosted by Ministry of Energy and Mines, Peru	