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USAID ENERGY PROGRAM

USAID ENERGY PROGRAM YEAR 3 TRAINING PLAN

USAID ENERGY PROGRAM

11 November 2019

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DATA

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ACRONYMS

CBA	Cost Benefit Analysis
CEA	Cost Effectiveness Analysis
DSO	Distribution System Operator
EnCT	Energy Community Treaty
ESCO	Electricity Market Operator
EU	European Union
GEDF	Georgian Energy Development Fund
GGTC	Georgian Gas Transportation Company
GNERC	Georgian National Energy and Water Supply Regulatory Commission
GoG	Government of Georgia
GOGC	Georgian Oil and Gas Corporation
GREDA	Georgian Renewable Energy Development Association
GSE	Georgian State Electrosystem
HPP	Hydro Power Plant
MoESD	Ministry of Economy and Sustainable Development of Georgia
MoU	Memorandum of Understanding
OTC	Over the Counter
PURC	Public Utility Research Centre
PV	Photovoltaic
RIA	Regulatory Impact Assessment
USAID	United States Agency for International Development
VRE	Variable Renewable Energy
WG	Working Group

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INTRODUCTION

In October 2016, Georgia signed the Energy Community Treaty (EnCT) signaling the country's commitment to direct future energy planning and market development towards approximation with the European Union (EU). This step commits Georgia to enhancing the security of energy supply by promoting the development of relevant infrastructure, increasing market integration and gradual regulatory approximation towards key elements of the EnCT, and promoting the use of renewable energy sources.

USAID Energy Program activities focus on enhancing Georgia's energy security through improved legal and regulatory framework and increased investments in the energy sector. The ultimate expected outcome of this project is an energy legal and regulatory framework that complies with the European requirements and encourages competitive energy trade and private sector investments. USAID Energy Program will build the capacity of the Government of Georgia (GoG) and relevant institutions to evaluate the fiscal and long-term security impacts of regulatory changes, promote energy investment, primarily in Variable Renewable Energy (VRE) development. USAID Energy Program will provide assistance to the local relevant institutions to perform technical and other types of analyses and will providing adequate trainings to counterparts.

USAID Energy Program activities will focus on supporting the development of competitive energy markets that promote renewable energy development and the improvement of energy security. A major part of the technical assistance to the sector is capacity building within Task 2 of the Program covering the topics in the other four Program tasks.

Appendix includes training and other capacity building events to be provided by the USAID Energy Program during the third program year. USAID Energy Program plans to carry out 2 international Study Tours, 12 in-country RIA trainings, 5 in-country trainings, 2 trainings on "queuing methodologies" under task 3 and one international training related to VRE integration.

USAID Energy Program will be involved in full cycle of planning, implementation and evaluation of study tours. Close collaboration with stakeholders during planning process is important to evaluate their needs and estimate possible outcome from study tours. Therefore, respective task leads or subject matter experts of USAID Energy Program will accompany Georgian stakeholders to study tours. The role of USAID Energy Program's representatives will be to facilitate discussions, keep agenda in line with the objectives of a study tour/working group meeting, assure common understanding of concepts among different stakeholders, facilitate networking and planning of follow-up activities. We acknowledge that not all presented concepts will be absorbed by the participants immediately, therefore the Program's representative role is to observe such circumstances and address them in an effective manner. The lessons learned from study tours will contribute to design tailor-made capacity building activities that meet immediate needs of stakeholders. All costs related to participation of USAID Energy Program team members in study tours will be funded from the Total Direct cost line item, Section B.4, Budget and Payment of the Task Order.

APPENDIX

USAID ENERGY PROGRAM ANNUAL CAPACITY BUILDING AND TRAINING PLAN FOR YEAR 3

TASK 2 – INSTITUTIONAL STRENGTHENING AND CAPACITY BUILDING

Title	Training Name	Activity Description	Target Organizations	Proposed Timing / Delivery mode	Responsible person
2.1. Regulatory Impact Assessment tools	1. Regulatory Impact Assessment (RIA) Training Course by Public Utility Research Centre (PURC)	6 weeks targeted trainings to build skills and capacity in developing RIA on various rules and regulations	MoESD, The Parliament of Georgia	Sept 30, 2019 – December 2019	Sopio Kalabegishvili
	2. Training on Introduction to Regulatory Impact Assessment and Legal Framework of RIA	What is Regulatory Impact Assessment (RIA)? What is the legal framework? •Law on Normative Acts •Decree on RIA Methodology •Standard vs In-depth RIA •Institutional Structure of RIA Implementation	GNERC, MoESD, the Parliament	April – September 2020 Delivery mode: remote as needed	Eka Nadareishvili / Sopio Kalabegishvili
	3. Training on setting up and implementing the stakeholder consultation framework	•Stakeholder mapping •Defining a stakeholder engagement strategy •Preparation for stakeholder interview (preparing questionnaires, online surveys) •Summarizing and reporting on stakeholder consultation results	GNERC, MoESD, the Parliament	April – September 2020 Delivery mode: remote as needed	Eka Nadareishvili / Sopio Kalabegishvili
	4. Training on RIA Problem Definition	Identification of the problem, setting the problem tree, review of legal and institutional structure of the sector: •Forming an evidence-based problem definition •Strategy for defining the problem	GNERC, MoESD, the Parliament	April – September 2020 Delivery mode: remote as needed	Eka Nadareishvili / Sopio Kalabegishvili
	5. Training on Defining the Baseline Scenario	•Setting the Baseline, understanding tendencies •Identification of an accurate data source for conducting Advanced RIA, including both local and international sources •Extrapolation vs. forecasting	GNERC, MoESD, the Parliament	April – September 2020 Delivery mode: remote as needed	Eka Nadareishvili / Sopio Kalabegishvili
	6. Training on setting policy objectives and selecting policy options	•General and operational objectives •Making objectives SMART •Defining and selecting feasible policy options based on problem definition and objectives	GNERC, MoESD, the Parliament	April – September 2020 Delivery mode: remote as needed	Eka Nadareishvili / Sopio Kalabegishvili
	7. Training on identification of the impacts and analysis required for a standard RIA	•Identification of impacts (direct and indirect impacts) •Quantification of fiscal costs required •Reporting on qualitative impacts	GNERC, MoESD, the Parliament	April – September 2020 Delivery mode: remote as needed	Eka Nadareishvili / Sopio Kalabegishvili
	8. Training on identification of social and environmental	•Identification of vulnerable groups	GNERC, MoESD, the Parliament	April – September 2020	Eka Nadareishvili /

Title	Training Name	Activity Description	Target Organizations	Proposed Timing / Delivery mode	Responsible person
	impacts in energy sector	<ul style="list-style-type: none"> •Identification and assessment of social impacts •Identification and assessment of environmental impacts •Understanding of ecosystem services and related principles of economic evaluation of environment 		Delivery mode: remote as needed	Sopio Kalabegishvili
	9. Training on comparing options with multi-criteria analysis and issuing recommendations	<ul style="list-style-type: none"> •What is a multi-criteria analysis? •How to conduct a multi-criteria analysis? •How to select a recommended option 	GNERC, MoESD, the Parliament	April – September 2020 Delivery mode: remote as needed	Eka Nadareishvili / Ivane Pirveli
	10. Training on Monitoring and Evaluation of a RIA	<ul style="list-style-type: none"> •What is impact evaluation? •Developing monitoring and evaluation plan •Preparing basis for ex-post evaluation 	GNERC, MoESD, the Parliament	April – September 2020 Delivery mode: remote as needed	Eka Nadareishvili / Sopio Kalabegishvili
	11. Training on Quantitative Impact Assessment used in a RIA	<ul style="list-style-type: none"> •Standard Cost Model •Cost-Benefit Analysis •Cost-Effectiveness Analysis 	GNERC, MoESD, the Parliament	April – September 2020 Delivery mode: remote as needed	Eka Nadareishvili / Aleks Kochlashvili
	12. Training in Financial Analysis used in RIA	<ul style="list-style-type: none"> •Discounted cash-flow analysis for CBA and CEA •Requirements in the methodological decree 	GNERC, MoESD, the Parliament	April – September 2020 Delivery mode: remote as needed	Eka Nadareishvili / Aleks Kochlashvili
2.2. Capacity Building: In-country trainings	1. Nepal Energy Stakeholders Peer-to-Peer Informational Exchange Visit	USAID Energy Program and USAID Nepal Hydropower Development Project are organizing peer to peer knowledge exchange event in Georgia. Nepalese delegation will learn about ongoing energy reforms in Georgia, market development and cross-border trading issues. Georgian stakeholders will learn from Nepalese colleagues about successful implementation of large energy project, community engagement and related topics	MoESD, GSE, ESCO GEDF, GNERC, GREDA, USAID Nepal Hydropower Development Project, Nepal Electricity Sector Stakeholders	December 2019	Marina Kevanishvili
	2. Training on modern organized and Over the Counter (OTC) energy markets.	Practical 3 days Energy Trading Training for electricity and natural gas market participants. The training will cover the major topics applied in modern energy trading, as well as energy trading simulation games to improve participant's trading skills	MoESD, GNERC, ESCO, Georgian Gas Transportation Company (GGTC), and GSE Market Participants	February 2020	Ivane Pirveli / Tamuna Jaliashvili
	3. DigSilent Power Factory Training module on Grid connection of renewable generation (To be conducted online, impacted by COVID-19.	The training introduces the participant to the tools and techniques commonly used in practice for the analysis of grid integration of renewables in the power system with focus on wind power and Photovoltaics (PV)	GSE	May 2020	Davit Mujirishvili

Title	Training Name	Activity Description	Target Organizations	Proposed Timing / Delivery mode	Responsible person
	4. Continuous OTC Trading simulation in conjunction with DAM and Balancing Market dry-run.	UEP will provide training on OTC trading. UEP will develop concept note and training regarding detailed Electricity Market Concept Design (version 3), roles and responsibilities of different entities and interaction between OTC and organized electricity markets	Georgian Energy Exchange, GNERC, GSE, ESCO, MoESD, market participants	July - October, 2020	Daniel Potash, Ivane Pirveli, Ana Jejelava, John Swinscoe
	5. Training on Gas Markets, Trading Mechanisms and Products	The training is designed to increase the capacity of organizations responsible for developing Gas Market Concept Design in Georgia. The training will cover typical characteristics of developed western gas markets, balancing requirements, bilateral trading, roles and responsibilities of various market participants, etc. OTC trading platform for gas contracts operated by MTX commodities will be explored as a case study.	Georgian Energy Exchange, MoESD, GNERC	April – May, 2020 Delivery mode: remote as needed	Ivane Pirveli,
	6. Training on Economics of Electricity Trading	The training is designed for over 100 participants that are registered to the Day-ahead and Intraday electricity market Dry-run under newly created Georgian Energy Exchange. The training will cover the main economic concepts used in electricity markets, marginal cost pricing, market clearing price, microeconomic model of a firm costs and revenues, characteristics of electricity demand and supply, investment decisions, etc.	Generators, Large Customers, Developers, DSOs, Traders, Suppliers, Georgian Energy Exchange, ESCO, GEDF and GSE.	July 2020	Ivane Pirveli Jake Delphia
	7. Training on Wholesale Electricity Markets	The training is designed for over 100 participants that are registered to the Day-ahead and Intraday electricity market Dry-run under newly created Georgian Energy Exchange. The training will cover the main electricity trading mechanisms, different markets and their roles such as Forwards, Futures, OTC, Day-ahead, Intraday, Balancing and Ancillary services markets.	Generators, Large Customers, Developers, DSOs, Traders, Suppliers, Georgian Energy Exchange, ESCO, GEDF and GSE.	August 2020	John Swinscoe
	7. Market Monitoring Trainings	Market monitoring best practices, key indicators, market development & monitoring analyses	GNERC	September 2020	Crissy Godfrey, Tamuna Jaliashvili
	8. Advanced Training on Market Monitoring (Data Management and Financial Settlements)	Business process for market monitoring, including investigations, compliance/sanctions, customization to Georgian Market Model, shadow exercises	GNERC	September - October 2020	Crissy Godfrey, Tamuna Jaliashvili

Title	Training Name	Activity Description	Target Organizations	Proposed Timing / Delivery mode	Responsible person
2.2. Capacity Building: International Study Tours	1. Study tour to Czech Republic	Georgian stakeholders will learn about energy market functioning of an EU member state. Czech experience is interesting for Georgian counterparts especially in the area of market operations	MoESD, ESCO, GNERC, GSE, GOGC	20 October 2019 – 25 October 2019	Tamar Jaliashvili and Ana Jejelava from USAID Energy Program / Czech Energy Enterprises
	2. Study tour to USA (California)	Experience of California (USA) in terms of utilization and integration of Variable Renewable Energy will be shared. In addition main principles of competitive electricity market functioning and the role of ISO will be explored	MoESD, GNERC, other identified and approved participants	February 2020	Tata Murtskhvaladze and David Mujirishvili from USAID Energy Program / First Solar and other US Californian companies

TASK 3 – ENERGY INVESTMENT OPTIMIZATION

Title	Activities Description	Outputs Description	Target Organizations	Proposed Timing	Facilitator
Task 3: Energy Investment Optimization	3.1.1. Investor Advisory Group Meeting. Training: Develop quotas and methodologies for "queuing"	Organize/participate in investor advisory group meetings to identify and address the investment challenges in the sector. New energy generation projects and the capability of the transmission and/or the Distribution System Operator (DSO) on the process for grid access	MoESD, GNERC, ESCO, GSE, Renewable Energy Developers / Investors, Energy Sector Stakeholders	July 2020 Delivery mode: remote as needed	Tamar Murtskhvaladze
	3.1.1. Investor Advisory Group Meeting. Training: Develop quotas and methodologies for "queuing"	Organize/participate in investor advisory group meetings to identify and address the investment challenges in the sector. New energy generation projects and the capability of the transmission and/or the DSO on the process for grid access	MoESD, GNERC, ESCO, GSE, Renewable Energy Developers / Investors, Energy Sector Stakeholders	August 2020	Tamar Murtskhvaladze

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