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**HYDRO POWER AND ENERGY
PLANNING PROJECT (HPEP)**

REVIEW OF AMENDMENTS TO THE LAW OF GEORGIA ON ELECTRICITY AND NATURAL GAS

FEBRUARY 06, 2014

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(HPEP)

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1.0 LIST OF ABBREVIATIONS

E&G Law	Law of Georgia on Electricity and Natural Gas
ETM	Electricity Trading Mechanism
ESCO	Electricity System Commercial Operator
GEMM	Georgian Electricity Market Model
GNERC	Georgian National Electricity and Water Supply Regulatory Commission
HIPP	USAID's Hydropower Investment Promotion Project
HPEP	USAID's Hydro Power and Energy Planning Project
MoE	Ministry of Energy
MO	Market Operator
MR	Electricity (Capacity) Market Rules
USoA	Uniform System of Accounting

2.0 BACKGROUND

When USAID's Hydropower and Investment Promotion Project (HIPP), implemented by Deloitte Consulting, reviewed the enabling environment for private sector led development of the Georgian power sector in 2011, it recommended to the Government of Georgia (GoG) that changes be made to the country's Electricity and Natural Gas Law (E&G Law). These changes would be required if the large volume of private capital needed to leverage Georgia's natural resources, generate clean energy and improve Georgia's energy security were to be forthcoming. HIPP, and its successor project, USAID's HPEP (Hydropower and Energy Planning Project), also implemented by Deloitte Consulting, engaged and convened a wide variety of stakeholders, ranging from the Ministry of Energy (MoE) to Development Finance Institutions (DFIs) such as the World Bank and IFC, private strategic and institutional investors and other representatives from civil society, over a three year period to identify and agree upon the most crucial reforms needed, and to facilitate presentation and discussion of these reforms at Georgian Parliament. At the end of 2013, the Georgian Parliament adopted many of the proposed amendments that had arisen from this coordinated and holistic process of stakeholder engagement, deciding to reform the E&G Law in several crucial ways. Some of these amendments, which entered into force on 27th of December 2013, are a striking example of how public-private dialogue can help governments to develop and implement reforms to enhance the environment for power sector investment, are discussed below in detail.

3.0 TRANSIT REGULATION

In order for the Georgian power sector to evolve into an efficient system that enables investors to access multiple markets and promotes cross border trade, it is essential that Georgia be integrated into the rapidly growing regional power market. After the recent reforms, the transit of electricity across Georgia not only now falls within the scope of the E&G Law, but all issues connected with the transit of power across the country will be regulated by its provisions.

In addition, the Georgian Transmission System Operator (GSE), and other transmission companies in Georgia, now have the right to provide and charge any "person requiring transit" for transit services using the transmission network of Georgia. A "person requiring transit," a new concept also introduced by the reforms, is defined as a person who has concluded an agreement pertaining to the technical assurance of transit with the Electricity Dispatch Licensee.

A new approach, reflecting best international practice, to establishing the transmission tariff for transit was also included amongst the reforms. Rather than using existing tariffs set by the Regulatory Commission, fees for electricity transmission and dispatch services provided during electricity transit a new Article (Article 41⁴), states that transit fees charged must ensure the reimbursement solely of expenses related to transit. Also worthy of note, electricity losses for ensuring transit in the transmission network of Georgia may be reimbursed by the cause of the loss supplying electricity (compensatory electricity).

Additionally, in order to promote and ensure technically safe transit, a dispatch licensee that wishes to utilize the networks and services of a transmission licensee is

now required to conclude a separate agreement with the transmission licensee on the utilization of transmission networks and services, including indicating a compensatory price. If no such agreement is concluded between the two, the compensatory price will be established and paid in accordance with Georgia's Electricity (Capacity) Market Rules, which have also been modified as a result of the reform process.

As a result of crucial changes such as these, the development of a regional power market and the cross border trading of electricity, both required to attract investment into Georgia, have made highly significant steps forward.

4.0 REGULATION FOR THE NEW POWER TRANSMISSION LINE

The New Power Transmission Line refers to the new 400 KV interconnection from Akhaltsikhe Substation in Georgia to the border of Turkey. The E&G Law makes reference to the Market Rules stating that rules and procedures for holding an auction concerning the available transfer capacity of the New Power Transmission Line designated for Cross Border Transit (Flow) will be regulated by Market Rules. With the legal framework for the auctioning of cross border capacity between Georgia and Turkey now in place, cross border trading is quickly moving from a policy decision towards practical implementation.

5.0 MARKET RULES

The reforms also expanded the scope of the Market Rules (MR). Electricity transit and reasons and criteria for granting a status to the new transmission line were added to the MR regulation and other issues were covered, also. The MR regulates technical, commercial and legal relations arising in connection with direct contracts on electricity purchase and sale, including Market Operator, rule of drafting balances of electricity (capacity) and rule of their execution; rule and conditions for balance electricity price determination; rule of determination of factual losses in electricity sector including the period of electricity transit; reasons and criteria for granting a status to the new transmission line designated for intersystem transit (flow) and rule of testing of new transmission line designated for intersystem transit (flow); rule of import of electricity within the electricity system of Georgia during emergencies and rule of export of electricity within neighbouring electricity system.

6.0 INTRODUCTION OF MARKET OPERATOR

In the text of the E&G Law, the term "Electricity System Commercial Operator (ESCO)" is replaced by the Market Operator (MO). Therefore each Article using ESCO is amended; The definition of Market Operator was introduced. Market Operator is "Electricity System Commercial Operator JSC" or its successor which for the satisfaction of requirements of qualified enterprises buys and sells balance electricity and guaranteed capacity, also fulfills the functions stipulated in this Law in accordance with the Georgian legislation. Standard conditions of Direct Contract for guaranteed capacity shall be approved by the Commission in accordance with the proposal submitted by the Market Operator. Article 41² was added to the E&G Law. According to the article 41² In cases envisaged by the Electricity (capacity) Market Rules, the Market Operator is obliged to sign electricity (capacity) import and export agreements with authorized entities in neighboring electricity system, concerning

such factual flow (wheeling) of electricity, which is a result of deviation from the schedule during the operation of electricity systems in parallel regime.

Wholesale trading of electricity is implemented based on Direct Contracts or through Market Operator under the standard conditions of Direct Contracts. Article 23 of the Law was changed. The functions of the Market Operator were defined.

Standard conditions of Direct Contract for guaranteed capacity shall be approved by the Commission in accordance with the proposal submitted by the Market Operator.

7.0 STRENGTHENING GNERC

In the amended Law GNERC was give additional powers:

- GNERC is responsible to monitor energy markets. The relevant amendment is made to the Article listing GNERC authorities:
- GNERC will possess the authority to approve Grid Code;
- Grid Code definition is added to the E&G Law. Grid Code is defined as a normative act of GNERC combining transmission grid code and distribution grid code. Grid Code combines procedures, rules principles and standards for management and utilization of transmission and distribution networks and regulates the relations among licensees and network users. Transitional provisions of the E&G Law give the timeframe for the adoption of Grid Code and the date is June 1, 2015.

8.0 INTRODUCTION OF UNIFORM SYSTEM OF ACCOUNTING

A new article on Uniform System of Accounting (USoA) was introduced in the E&G Law. The timeframe for the approval of USoA defined for GNERC is 3 years from the enactment of the amendments.

The USoA is the system of accounting and accounting reporting mandatory for licensed entities and includes: Chart of accounts; Instructions for the application of chart of accounts and keeping records; The forms and the content of the periodic financial reports for regulatory purposes; Reporting frequency; Rules for separate bookkeeping of revenues, expenses, assets, liabilities, financial results and shareholders' equity in case of entity performs more than one licensed activity or/and in parallel with such an activity is engaged in other entrepreneurial activity. If a person holds more than one license or/and together with the licensed activity carries out (an)other business/entrepreneurial activity (activities), such person is obliged to keep recording for revenues, expenses and financial results of licensed activity (activities) separately, in compliance with Uniform System of Accounting requirements.

9.0 OTHER ISSUES RELATED TO TRANSMISSION AND DISPATCH SERVICE

New paragraphs are introduced to the E&G Law describing provision of transmission service and dispatch service:

- New Article concerning the calculation of electricity factual losses in electricity transmission network was added to the E&G Law.
- (28/3) The electricity metering system shall ensure the exact calculation of electricity expenditures in the transmission network. Electricity

expenditures in the transmission network comprises electricity discharge, which combines the own consumption of substation owned by the transmission licensee, consumption during the period of protection mode of the transmission line and the volume of electricity metered during the synchronization as well as electricity loss in transmission lines, transformers, reactors and other technical losses during active and non-active regimes of transmission line.

- (34/8, 35/4) Transmission service and Dispatch service are carried out on the basis of bilateral direct agreement under standard conditions. Standard conditions do not apply to electricity export and/or transmission service related to transit. Standard conditions of direct agreement apply when no bilateral direct agreement with qualified entity exists, except when nonexistence of such agreement is the reason of violation of legislation or conditions of agreement by qualified enterprise. Standard conditions of transmission service direct agreement is approved by the Commission on the basis of proposal made by the transmission licensee.
- (41²/1) The Dispatch Licensee, in agreement with the Market Operator, has right to sign agreements with relevant enterprises of neighboring countries on operation in parallel regime.
- (41²/2) Technical operation and cooperation management related to the operation of electricity systems in parallel regime is implemented in accordance with agreement signed by the Dispatch Licensee on operation in parallel regime and normative acts of the Commission.

10.0 DAILY TRADING

Before September 1, 2015, relevant amendments must be made to legislative and/or normative acts which will ensure the transformation of Georgian electricity market into a daily trading model.

11.0 ISSUES RECOMMENDED BY USAID HIPP NOT INCLUDED IN THE AMENDMENTS

Though the E&G Law does provide for some significant progress toward reaching GEMM 2015 and enacting the legislation for introducing the electricity trading mechanism (ETM) proposed under USAID Hydropower Investment promotion Project (HIPP) and HPEP, there are some items that need further review by the GoG and then enacted in another round of amendments of the Law in the near future.

- MRs should be adopted by the energy regulator, GNERC, and not by the MoE. GNERC has the authority to adopt the Grid Code and it is a very dangerous practice to have two different authorities adopting the MRs and Grid Code due to their strong complementary nature.
- The MO should be a licensed entity to protect the interests of electricity traders and consumers.
- The Dispatch Licensee should be transformed into a TSO. The TSO should be formed as an independent entity from GSE. Georgia has multiple transmission companies which requires the TSO not to be owned and managed by one of them.
- Any other critical item not included in the amendments?

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