Gas Interconnection
Poland – Lithuania (GIPL)
Backbone of Regional Market Development

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GAZ-SYSTEM S.A.
Key facts of about GAZ-SYSTEM S.A.

Gas Transmission Operator GAZ-SYSTEM S.A. – an energy company engaged in the distribution of gaseous fuels that is responsible for network operation in the gas system, the duties of which are specified in the Energy Law, designated as an Operator by virtue of a decision of the President of ERO.

GAZ-SYSTEM’s responsibilities as Transmission System Operator include:

- Coordinated and effective operation of the network while ensuring the required gas quality and supply reliability,
- Provide gas-market participants with equal access to the transmission network,
- Maintain, repair and develop transmission facilities, with due respect to the natural environment,
- Provide each transmission, storage and distribution system operator, and the LNG system, with sufficient information to ensure transport and storage of natural gas as appropriate for safe and efficient operation of the combined systems,
- Provide the system users with the information necessary to obtain effective access to the system,

*total capacity of the entry points Wysokoje and Drozdowicze are 7 bln m³
GAZ-SYSTEM S.A. in numbers

- Net sales revenues: 400 EUR million
- Operating costs: 320 EUR million
- Net profit: 74.6 EUR million
- Total assets: 1.66 EUR billion
- Number of employees: 2,299 persons
- Length of transmission network: 10,033 km
- Volume of gas transported: 16.3 bcm/a
- Number of gas stations: 887
- Number of compressor stations: 15
- Number of nodes: 58

Financial results at the end of 2012
Development of transmission system in Poland until 2023

Linking the CEE and Baltic regions
- Expansion of LNG terminal in Świnoujście
- PL-LT interconnection
- Further development of the transmission system
- Development of new UGS capacities and commercial development of shale gas business area

Creating the N-S corridor in the CEE region
- PL-CZ interconnection in Hat
- PL-SK interconnection
- Development of internal network to ensure high level of supply reliability and improved interoperability between the CEE systems

Connecting the gas market in Poland
- LNG terminal in Świnoujście
- Enhancement of the internal grid - more than 1,000 km of new pipelines
- PL-CZ interconnection in Cieszyn
- Upgrade of PL-DE interconnection in Lasów
- Physical reverse flow on the Yamal pipeline

The system, that connects
**LNG Terminal in Poland**

- **Regasification Capacity**
  - 5.0 bcm/a (570 000 cm/h) – 2014
  - 7.5 bcm/a (856 000 cm/h) or more – possible enhancement

- **LNG Offloading**
  Facility designated to receive Carriers from 120 000 to 216 000cm (Q-flex vessels)
  Carriers characteristics - draught: 12.5m, length: 315m

- **Truck Loading**
  Two loading bays with capacity of 95 000 t/a

- **Storage**
  Two storage tanks with capacity of 160 000 cm each.
  Possibility for construction of third additional storage tank (space reserved)

- **Pipeline**
  Pressure 8.4 MPa; Temperature: 1°C.

- **Costs**
  LNG Terminal construction cost estimated at approx. 700 mEUR (including EPC contract valued at 550 M EUR)
  Project has EU financial support via EEPR
The Concept of North-South Gas Corridor in CEE

The N-S corridor in the CEE region
Series of pipeline projects and interconnections at various stage of development coordinated to provide regional integration of physical infrastructure
Key role of the Polish transmission system in the region

Connecting the Baltic Sea region with the CEE countries
Setting the stage for the new supply potential
Crucial for delivering EU Infrastructure Policy goals

Infrastructure leverage
Relatively low costs of new infrastructure provide leverage for lower commodity prices for end-users
New investments facilitate new possibilities for the market
Creating attractive supply-mix for the region
Enhancing economic competitiveness of the region’s economies

Creating Supply potential

Existing infrastructure
Planned infrastructure/under construction

the system, that connects
Gas interconnection Poland – Lithuania (2018/2019)

The main goal of the project is to construct the Gas Interconnection Poland - Lithuania (GIPL) as a regional solution for the Baltic States (and possibly Finland) in context of gas market development and security of gas supplies.

The project is planned to be implemented in two stages:

Stage I – pipeline linking Rembelszczyzna (Poland) with Jauniunai (Lithuania) with transmission capacity of 2.3 bcm/y and MOP of 8.4 MPa on the Polish side and 5.4 MPa on the Lithuanian side.

Stage II – potential expansion of transmission capacity to 4.5 bcm/y by adding two compression stations and gas node.

The Gas interconnection Poland - Lithuania (GIPL) is aimed at the integration of the isolated gas markets of the Baltic States (and Finland if BalticConnector is constructed) into EU gas grid, by introducing the alternative gas supply route to the Baltic States. This interconnection will diversify the gas supply sources, increase the security of supply and serve for the enhancement of competition in the gas market of the Baltic States.

Reverse flow capacity is also envisaged depending on the market interest:
PL-LT direction
Stages I-II: approx. 1 bcm/year
On 14 October 2013, the European Commission has adopted a list of 248 key energy infrastructure projects. These projects have been selected by twelve regional groups established by the new guidelines for trans-European energy infrastructure (TEN-E).

Carrying the status of "projects of common interest" (PCI) they will benefit from faster and more efficient permit granting procedures and improved regulatory treatment.

They may also have access to financial support from the Connecting Europe Facility (CEF), under which a €5.85 billion budget has been allocated to trans-European energy infrastructure for the period 2014-22

The PCI status were granted for the number of GAZ-SYSTEM’s projects:

**Gas interconnections North-South in East-Central Europe and Southeastern Europe:**
- Western route of the North-South corridor in Poland and the interconnector Poland - Czech Republic;
- Eastern route of the North-South corridor in Poland and the interconnector Poland - Slovakia

**Action Plan for Interconnection of Baltic Energy Market for gas (BEMIP):**
- Interconnection Poland - Lithuania;
- Baltic Pipe;
- Expansion of an LNG terminal in Świnoujście;
- Expansion of the entry points of the Yamal pipeline in Lwówek and Wloclawek.
The project is carried out by the national transmission system operators – the Polish and Lithuanian:

**PL** - Operator Gazociągów Przesyłowych GAZ-SYSTEM S.A.,

**LT** - AB Amber Grid,

The project requires also close cooperation with the national regulatory authorities:

**Polish** Urząd Regulacji Energetyki (URE)

**Lithuanian** Valstybinė kainų ir energetikos kontrolės komisija

**Latvian** Public Utilities Commission

**Estonian** Competition Authority

**Route:**
Pipeline Rembelszczyzna – Jauniunai

**Diameter** – DN 700

**Length:** 534 km
PL: 357 km - LT: 177 km

**CAPEX**
- On a side of GAZ-SYSTEM: 422 mEUR
- On a side of AB AMBERGRID: 136 mEUR
- Total: 558 mEUR
What should be done in order to implement GIPL project?

1. Contractual obligations
   - Concluding the bilateral Cooperation Agreement between the Project Promoters

2. Preparatory works
   - Route study, EIA, basic and detailed engineering, building permission -> need to be obtained before FID date
   - PCI Status -> to facilitate permitting and to be eligible for EU funding, if necessary

3. Securing sources of financing
   - Consultation on project structuring with NRAs in line with TENE Regulation (CBCA, incentives, guaranteed capacity bookings)
   - Application for funding from EU - CEF by Project Promoters
   - Coordinated Market Screening/Open Season procedure in countries affected by PCI project
   - Final confirmation of commercial interest in short and long term capacity bookings

4. FID

5. Project realisation
   - Technical Design of the Project
   - Launching the necessary tendering procedures, including the purchase of pipes and valves, as well as construction
   - Construction
Socio-economic benefits of the Project for the Baltics

Access to the EU gas market

- Lithuania, Latvia, Estonia are not connected to the internal EU gas system forming an isolated energy market. Poland on the other hand will have sufficient interconnection capacities with the EU market by the time GIPL can be put into operation.
- Securing access to the EU gas market can lead to the formation of effective competition mechanisms, that would improve the efficiency of business performance by ensuring adequate levels of wholesale gas prices.

Security of gas supply

- The Baltic States are at the moment undiversified in terms of gas supply routes and are completely dependent on a sole supplier of natural gas, namely Russia.
- Interconnection with the EU gas market could significantly improve the security of gas supply for these EU Member States.

Gas market in the Baltic area in 2012

Source: ENTSOG, companies data
Full integration of the Baltic states into the EU gas market, which cannot be achieved by implementation LNG Terminal only

Access to the number of gas supply opportunities offered by developed Western European gas markets via Poland

Access to the global LNG market for the Baltic states via LNG Terminal in Świnoujście

Security of gas supply
Diversification of gas supply sources and routes
Enhancement of competition
Price convergence with the Western Gas Market
Better utilization of existing infrastructure assets (e.g. underground gas storages in Latvia)
Thank you for your attention
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