The Significance of Southern Gas Corridor for European Energy Security - Myth or Reality?

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Abstract

Taking into consideration the obvious fact that Kremlin's threatening and manipulative rhetoric is increasingly loud and severe, energy security problem is accordingly high on the European Union agenda. The paper analyses the importance of the Southern Gas Corridor - a planned infrastructure project in terms of its role in improving the security and diversity of the EU's energy supply by bringing natural gas from the Caspian region to Europe. The article discusses if Southern Gas Corridor is a window of opportunity for Europe to lessen Russian Gas dependence significantly or just a myth. Besides, the paper reviews a strategic logic of the Southern Gas Corridor and the Italian market as a final destination of the project. In the end, direct economic benefits from the Southern Gas Corridor are presented for the countries participating in this project.

Keywords: energy security, gas diversification, pipelines, southern gas corridor.

Introduction

EU member states are collectively the world's largest energy importer. The EU imports more than half of all the energy it consumes. Its import dependency is particularly high for crude oil (more than 90%) and natural gas (66%). The total import bill is more than €1 billion per day (European Commission. Energy Security Strategy). The European Commission forecasts that the EU will import over 80% of its natural gas needs by 2030 (Ratner, Belkin, Nichol & Woehrel, 2013).

Energy security affects all Member States but is particularly problematic for Baltic and central and eastern European states, some of which are entirely dependent on Russia for gas supplies. Russian supply accounts for a third of gas and oil imports into the EU, while the ongoing conflict in Ukraine (a major transit route for Russian gas) highlights the risks associated with this external dependence (European Parliament, 2015). So, "regarding energy supply security between European Union Commission and Russia; the gas shortages the Union countries experienced, Russia's monopoly policies, rising gas prices and finally the 2006 crisis between Russia and Ukraine forced Europe to produce alternative policies on new supply routes" (Belet, 2014, pp.87). Accordingly, there is high necessity of having alternative supply routes: "Europe needs new sources of gas to meet its long-term energy demand, replace its own declining energy production, fuel economic growth and diversify energy supply" (TAP, 2016). The current picture shows that European Union stays fragile to external energy challenges and consequently needs an effective energy security strategy that will contribute to its resilience towards energy supply shocks in the near future and substantially lessen dependency on Russian gas in the long term.



Figure 1: Map of Southern Gas Corridor. Source: Trans Adriatic Pipeline, 2016.

Literature Review

Taking into consideration today's picture that Kremlin uses threatening and manipulative rhetoric increasingly loudly and severely, energy security problem is accordingly high on the European Union agenda. EU stays fragile to external energy challenges and consequently needs an effective en-

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ergy security strategy to diversify supply routes in order to meet its long-term energy demand and lessen dependence on Russia. From this perspective, Southern Gas Corridor (SGC) - a planned infrastructure project is seen as a possible way out to improve the security and diversity of the EU's energy supply by bringing Caspian gas to Europe.

Southern Gas Corridor is discussed by Kalandadze (2014) in terms of "appropriate and timely solution" (pp.57) and mentions that it is "more than a welcome initiative" (pp.67) because this project has a capacity to play a significant role in the context of diversifying natural gas supply and routes. For the EU it does not mean that SGC can totally substitute Russian gas. Initially, it will carry 10 bcm gas to Europe and it means just 2% of the EU's gas consumption. The author points out that its strategic significance lies not necessarily in its capacity of replacement but in diversification.

It is important to state here that in order for this project to be successfully implemented, stabilization in the South Caucasian states will be more than crucial. The region suffers from instability and it is necessary for the West to take effective measures in order to contribute to the conflict management: "conflict resolution needs to become a central component of the EU's broader energy security strategy, in order to safeguard the potential of the entire concept" (Kalandadze, 2014, pp. 67).

Southern Gas Corridor is seen as an opportunity for the EU gas diversification but especially as a relief for those countries which suffer from total dependence on Russian gas. Akhunzada (2015) states that Trans Adriatic Pipeline (TAP), which is one of the components of SGC can provide natural gas to countries such as Albania, Kosovo and Montenegro, which lack an indigenous natural gas market. This means reducing monopoly of Russia over countries that are almost entirely dependent on Russian natural gas.

The importance of Southeast European and Balkan countries as a market destination is also discussed by Belet (2014). The author states that they have a potential of becoming the EU members and it will make them significant models for diversification of natural gas resources and routes to suffer less from Kremlin's challenges: "When we take into account that only the Russian gas is sold at these markets, new gas stream of the East over Turkey will weaken Russia in this game" (Belet, 2014. pp.96-97).

The selection of Italy as a final destination of SGC is not surprising and has it is logic because from southern part of the country it is possible to deliver gas northwards and moreover, to transport gas from the Mediterranean to the North Sea, including the countries along the pipeline (The Jamestown Foundation, 2013). It is interesting to note here that Azerbaijan will substantially strengthen its Western partnership because Caspian gas is an effective opportunity for the EU and "a step towards complementing Russia's quasi-monopolistic position in Europe, and make it somewhat more difficult for the Kremlin to dominate the gas market in the EU" (Cohen, 2014, pp. 3-4).

It can be said that Southern gas Corridor has pivotal importance and there are numerous reasons that undoubtedly

make this project valid and prospective. Not to repeat again how beneficial it is for the EU's diversification of sources and routes of energy supply and the expectation that the EU will be more dependent on more gas import in the next years this project will contribute a lot to establishing a more competitive price for natural gas in the European market. Koranyi (2014) underlines the issue about the Southern Corridor that "it will be essential in stabilizing the volatile region of the South Caucasus by anchoring Azerbaijan to the Euro-Atlantic community" (pp.3-4).

Livanios (2013) in his article mentions three major risks for the SGC but in the end highlights its potential that can effect on EU future energy security and the importance that lies in the project. The current situation shows, that despite the fact that from the very beginning of the project completion Southern Corridor cannot substitute Russian gas, it will play an important role in energy diversification. However, later the EU can be free from suffering that comes from Kremlin's leverage: "The Caspian gas resources have the potential to be the most strategic supplies to the energy security of EU. The strong leadership and the effective decision making on crucial gas infrastructure, will determine the future of European energy security" (Livanios, 2013, pp. 17).

Sefocvic (2015) in his paper reviews the key role of the Caspian region and underlines how crucial the project is: "The delivery of gas volumes from Azerbaijan to South-East Europe via the Southern Gas Corridor would significantly reinforce gas supply diversification in the region, which until now has been predominantly supplied by one major gas supplier" (pp.7-8). So, taking into consideration the obvious advantages of SGC project, its contribution in terms of political and economic independence of the region is more than clear. Besides, how much Azerbaijan will benefit from European markets economically and politically is also apparent. Moreover, as transit countries Georgia and Turkey will also benefit from "Russia-free" supplies as well as extra substantial revenues. No doubt, Southern Gas Corridor is a window of opportunity for Europe.

Why Does Europe Need Alternative Supply Routes?

The EU imports 53% of the energy it consumes (European Commission, 2014), and the diversification of energy sources and suppliers is the key means of improving the EU's energy security. Sefcovic (2015), underlines the importance of properly addressing this issue: "the EU needs to diversify supply, moderate demand, and put in place new preventive measures and emergency plans at all levels.

Exploring new supply regions for fuels, exploring new technologies, further developing indigenous resources and improving infrastructure to access new sources of supply are all elements that will contribute to the increased diversification and security of Europe's energy sector" (pp.7).

In February 2015, the European Commission presented the Energy Union plan in order to deal with the situation, to lessen this dependence, and to create a single European energy market. "Europe is also heavily dependent on one single supplier, namely Russia, responsible for a third of oil imports, 39% of gas and 29% of solid fuels. Six EU countries depend on Russia as the supplier for their entire gas imports. Towards increased energy security The EU is now seeking to reduce this dependence by diversifying energy sources and suppliers, cutting back on energy consumption, boosting energy production and cooperation between countries and investing in renewables."(The European Parliament, 2014, pp.1).

Sefcovic (2015) reviews that from this perspective the Southern Gas Corridor has a pivotal importance: "with its extended value chain, from gas production in the Caspian to the construction of infrastructure inside the European Union – remains a crucial project. The delivery of gas volumes from Azerbaijan to South-East Europe via the Southern Gas Corridor would significantly reinforce gas supply diversification in the region, which until now has been predominantly supplied by one major gas supplier" (pp.7-8).

It is important to underline a strategic location of Azerbaijan and its crucial role here. The country that stands "at the fault line of a more fundamental competition — the competition for resources between East and West. For Europe, it is important to secure strategic interests by ensuring that natural gas from Azerbaijan can flow to the continent as promptly and efficiently as possible. The practical realization of this strategic objective is the Southern Gas Corridor and the Shah Deniz gas field will kick start the entire process of bringing Caspian gas to Europe" (The Jamestown Foundation, 2013).

A huge bulk of European energy imports come from the three major gas suppliers of Europe, namely Norway, Algeria, and Russia (Ratner, et al., 2013). The proportions are as following: Norway 30%, Russia 39% and Algeria 13% (European Commission, 2016). Gazprom supplied 158.56 billion cubic meters of gas to European countries in 2015, according to the data provided by the company. Approximately 82 percent of the gas supply from Russia goes to Western Europe, while 18 percent is delivered to the Central Europe (European Commission: Gas transit route through Ukraine should be maintained).

Taking into consideration the existing picture, and despite the fact that there are also other suppliers, but the proportion of their supply is relatively low, it seems that Europe will still remain extremely vulnerable to Russian control over gas supplies. In spite of Russia-Ukraine gas dispute in 2009, i.e. reducing its dependence on Ukraine as a transit country for gas, the most important entry point for Russian gas into the EU remains the "Brotherhood" pipeline, located on the Ukrainian Slovak border (transit of 52.5 bcm in 2013) (Clingendael International Energy Programme, n.d). All these, however, indicate how urgent alternative energy supply routes are to be addressed.

Southern Gas Corridor - a Window of Opportunity for the EU?

The Southern Corridor is an initiative of the European Commission to supply Europe with gas from Caspian and Middle Eastern regions. The Southern Gas Corridor is planned to transport gas from Azerbaijan's Shah Deniz Field Phase II, across Azerbaijan, Georgia, Turkey, Greece, and Albania into the EU, terminating in Italy (BP Azerbaijan, n.d). The Corridor consists of three major pipelines: the existing South Caucasus Pipeline (SCP), a pipeline of 691 km running from Baku across Azerbaijan and Georgia to the Turkish border (BP Azerbaijan, n.d). After completing additional stages of the pipeline development and working at full capacity, the pipeline can transport up to 21 – 24 bcm of natural gas (Georgian Oil& Gas Corporation, 2013).

The second pipeline is 1850 km Trans Anatolian Natural Gas Pipeline (TANAP). The aim of the TANAP Project is to bring natural gas produced from Azerbaijan's Shah Deniz-2 gas field, and other areas of the Caspian Sea, through Georgia, primarily to Turkey, and then to Europe (TANAP, n.d). TANAP should carry 16 bcm annually from the SCP, leave 6 bcm in Turkey and carry 10 bcm into the EU (Socor, 2014).

The third planned pipeline is Trans Adriatic Pipeline (TAP). TAP will be 878 kilometers in length (Greece 550 km; Albania 215 km; Adriatic Sea 105 km; Italy 8 km). Its highest point will be 1,800 meters in Albania's mountains, while its lowest will be 820 meters beneath the sea (Trans Adriatic Pipeline, 2016c). TAP's initial capacity of 10 billion cubic meters (bcm) of gas per year is equivalent to the energy consumption of approximately seven million households in Europe. In the future, the addition of two extra compressor stations could double the throughput to more than 20 bcm as additional energy supplies come on stream in the wider Caspian region. The pipeline will also have the so-called "physical reverse flow" feature, allowing gas from Italy to be diverted to South East Europe if energy supplies are disrupted or more pipeline capacity is required to bring additional gas into the region (Trans Adriatic Pipeline, 2016a).

Eurogas President Jean- Francois Cirelli stated that, the current volumes of Russia's gas supplies to Europe cannot be completely substituted by other sources such as the SGC. However, the Eurogas President pointed out "it is important for Europe to try many different sources of gas" (Sputnik International, 2014).

Therefore, it can be stated that Southern Gas Corridor's pivotal significance is based on the establishment of competitiveness rather than substitution. However, other, oil and gas rich countries in the region, like Kazakhstan, Uzbekistan, and most importantly Turkmenistan may play important roles in changing the energy diversification climate in case they decide to look for diversified export markets and consequently to turn to the West. Turkmenistan holds the largest natural gas reserves in Central Asia, of approximately 265 trillion cubic feet, and with its involvement the SGC could ultimately meet European demand in its entirety (Kalandadze, 2014). Finally, as described in the EU's Energy Security and Solidarity Action Plan, the Southern Corri-

dor has the potential to incorporate natural gas from Iraq. Should the political conditions experience a shift though, even Iranian gas could be connected up. Iran, notably, has the world's second largest gas reserves.

The Southern Gas Corridor will further contribute to the region's political and economic independence. It will make cooperation closer between Georgia, Azerbaijan and Turkey on the one hand and the EU on the other. This consequently means strengthening regional political and economic ties, boosting further engagement by western powers in the region, reinforcing the region's economic and political independence from Moscow (Kalandadze, 2014).

"The Caspian gas resources have the potential to be the most strategic supplies to the energy security of EU. The strong leadership and the effective decision making on crucial gas infrastructure, will determine the future of European energy security" (Livanios, 2013, p. 17). It will be "a step towards complementing Russia's quasi-monopolistic position in Europe, and make it somewhat more difficult for the Kremlin to dominate the gas market in the EU" (Cohen, 2014, p.4). Despite the great opportunities that can considerably contribute to European energy security, together with long term economic security and stability of the region, there are obvious risks, however. The Caucasus region suffers from several political, economic and ethnic-political instabilities, i.e. frozen conflicts: "military occupation and substantial uncontrolled armed presence of a foreign country make the region guite vulnerable and susceptible to further destabilization. Any kind of escalation has significant potential to jeopardize regional stability and the entire energy security concept" (Kalandadze, 2014).

The Strategic Logic of the Southern Gas Corridor

Koranyi (2014) presents strategic rationale of Southern Gas Corridor that underlines its true validity. First, with the Corridor Europe will be provided with a new route to secure natural gas supplies from the gas-rich Caspian Sea Basin. Besides, the Southern Corridor is designed to be expanded as additional natural gas becomes available in Azerbaijan, and if Turkmenistan seeks access to European markets to diversify its own exports and add a third route in addition to Russia and China. Moreover, the Southern Corridor has the capacity to incorporate natural gas from the Eastern Mediterranean as well as Iraq, and possibly from Iran too, which holds the world's second largest gas reserves, although the related geopolitical and commercial challenges are alarming.

Second, the Southern Corridor opens a new and competitive route for the EU to import natural gas from producers not controlled by Gazprom and it will generate competition necessary for gas price to decrease. Therefore, this will make challenging for Gazprom to demand higher natural gas prices based on long-term contracts.

Third, Europe will need more gas in the long run, as coal - and, in some cases, nuclear - are phased out of the energy mix, and gas is ideally placed to serve as a backup

resource to steady the uneven performance of renewables. As conventional reserves deplete, Europe's dependence on gas imports is expected to grow further, from the current 64 percent to above 80 percent by the end of the next decade.

Finally, it is expected that the Southern Gas Corridor will contribute to cementing Azerbaijan's and Georgia's Euro-Atlantic orientation. It will also bring new supplies to Turkey, the fastest growing gas market in Europe, to decrease its dependence on Iran and Russia and to lay the foundation for a gas-trading hub that will lower gas prices for Turkey and its European neighbors (pp.3-4).

Besides, Southern Gas Corridor plays very important role for SEE - South East Europe. It is expected that total gas demand of SEE will increase from 26 bcm in 2012 to 44 bcm by 2025 and 50 bcm by 2030 (Akhundzada, 2015). TAP can meet this growing demand in terms of supplying the additional required gas. This is why "lessening the dependence on Russian gas is vital for safeguarding Europe's security and integrity in the medium- and longterm" (Koranyi, 2014, p.10).

The Russia-Ukraine gas crises have increased the importance of access to new and reliable gas sources for SEE. TAP represents a reliable gas supply for these countries. Through the Ionian Adriatic Pipeline (IAP), TAP can bring natural gas to Bosnia and Herzegovina, Serbia, Kosovo, Montenegro and Croatia, and to Bulgaria and Romania via the vertical interconnector project, namely the Greece-Bulgaria-Romania interconnectors.

The Sense of Italian Market Selection

The selection of Italy as the final destination of the Southern Gas Corridor was surprising, because the Italian market is oversupplied and well diversified. The Shah Deniz Consortium justifies its decision by pointing at the high gas prices in Italy and a strong commercially viable market. Moreover, Italy needs to import additional volumes of 7.7 bcm annually, due to the declining production of its own natural gas.

It is estimated that every year Italy's gas production will be declining by 10 percent. From supply security reasons, Italy is also trying to replace some volumes of gas coming from Algeria and Libya. In addition, most of Italy's prospective LNG projects and pipeline projects are presently on hold (The Jamestown Foundation, 2013).

It is interesting to note that in case of oversupply in the Italian market, Azerbaijani experts consider this possible scenario as an asset for the Shah Deniz Consortium and Azerbaijan, because in this case the Shah Deniz gas can be easily supplied to neighboring countries through the gas pipeline from the Southern part of Italy northwards. Transportation of Caspian gas can also reach the well-diversified markets in Western and Northern Europe. So, Italy can be considered not as the main destination market but as a transit corridor to markets in Europe, reaching up all the way to the North Sea.

This will enable all the shippers to transport gas from the Mediterranean to the North Sea, including the countries along the pipeline. Italy's National Investment Strategy plans to exploit the country's geographic position to turn it into one of Europe's main transit countries by 2020 (The Jamestown Foundation, 2013).

Direct Economic Benefits from the Southern Gas Corridor

Georgia is a strategic partner of the Southern Gas Corridor project. "Initial gas sales to Georgia and Turkey are scheduled for late 2019, with the first deliveries to Europe coming early 2020. Once the operation is fully operation level, Georgia will receive an additional 1 billion cubic meters of gas from the South Corridor project" (Svanidze, 2016). According to the project agreement, Georgia is not only a transit country but also a natural gas consumer country. Georgia has an option to purchase 5% of gas transported from Azerbaijan to Turkey for a favorable price. In addition, for 20 years starting from the date when the project becomes operational, Georgia will purchase additional volume of gas about half a million cubic meters, from project investors at a special price (Georgian Oil & Gas Corporation, n.d). Moreover, in Georgia, the expansion of the South Caucasus Pipeline will be the largest single investment amounting to \$2.2 billion (The Jamestown Foundation, 2013).

The route of Southern Gas Corridor shows that Turkev's role as a transit country is more than simply crucial. It is clear that using Turkey's geographical position to increase energy supply security is in the interest of both Europe and Turkey. "In Turkey, direct investment will be almost \$8 billion and contribute to the Turkish economy. In Italy, TAP will provide 10-12 percent of Italy's gas supplies and, similarly to Albania, will contribute to diversifying supplies and improving energy security. In Albania, TAP will be the largest direct investment, in fact the largest ever investment in the Albanian economy. It will also help Albania become a transit country, especially to other Balkan countries, through the Ionian-Adriatic Pipeline. In Greece, there will be a 1.5 billion euro (\$2.04 billion) investment, which will create 2,000 jobs directly and 10,000 indirectly, bringing almost 450 million Euros (\$612 million) of added value to the Greek economy" (The Jamestown Foundation, 2013).

So, with TAP it will be possible "to reach important consumption centers of Europe over Italy but also to carry gas to Southeast European and the Balkan countries after 2025 with the doubled transportation capacity. When we take into account that only the Russian gas is sold at these markets, new gas stream of the East over Turkey will weaken Russia in this game" (Belet, 2014, pp. 96-97).

Conclusion

It is not hard to notice that in the modern world diversification of energy sources and suppliers is a pivotal means of improving energy security of the European Union. The EU stays fragile to external energy shocks and consequently needs an effective energy security strategy that will contribute to its resilience towards energy supply challenges in the near future. There is an urgent necessity for alternative energy supply routes that will substantially lessen EU's dependency on Russian gas in the long term. From this perspective, Southern Gas Corridor is seen as a possible way out.

"With the potential to deliver 10 bcm to South Europe, and bypassing Russia, the SGC provides an excellent opportunity for Europe to diversify its supply and reduce Gazprom's monopoly in the short to medium term. With the possibility of expanding the pipeline to include other Central Asian and potentially Iranian sources, Europe's long term energy security could also benefit" (Kalandadze, 2014). It is important to point out that as many South East European countries are entirely dependent on a single supplier of natural gas, and it leaves them completely unprotected to challenges in supply and uncompetitive pricing. Some other countries in the region, like Albania, are not even on the gas grid. They completely rely on coal and oil to meet their energy needs. TAP will pave the way for new sources of energy to enter these markets and promote development of their energy sectors (TAP, 2016).

Despite the fact that this Southern Gas Corridor project highlights its effectiveness in terms of contribution to reduce Russian monopoly, it faces obvious challenges too, namely, frozen, unsettled conflicts in the South Caucasian states. Besides, it cannot be surprising that any kind of Western presence in the post-Soviet area may be perceived by Russia as a direct threat to its interests and in this case to its energy monopoly. This means that instability puts the region under threat together with the project. Accordingly, EU and NATO need to take considerable measures to avoid destabilization in the region and play much more crucial role in conflict resolution.

A guaranteed successful implementation of the Southern Gas Corridor project directly means that it will secure diversified energy supply to the European Union. So, Southern Gas Corridor is a window of opportunity for Europe, it is not a myth but already an obvious reality.

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