Roland Götz: The Myth of Diversification. Europe and the Natural Gas from the Caspian Region

Transport costs for crude oil and natural gas are not at all the same: While crude oil can be transported cost-efficiently in tankers, the cheapest way to transport natural gas is via pipelines. Thus, when Europeans address the question of gas supply, they are in a good position, given the gas-extracting and exporting states that surround them on all sides.

And yet Europe anxiously discusses its own dependence on 'uncertain' suppliers, calling for a geographical diversification of its own gas supply to solve the problem. However, this demand does not take into account that, on the one hand, European gas imports from Russia will decrease anyway relative to those from Africa and the Middle East, and that on the other, transporting gas by pipeline naturally involves a strong dependence between supplier and customer.

For some time now, the 'Caspian region' has increasingly come to the fore, consisting of the post-Soviet states of Central Asia and the South Caucasus but not including Russia and Iran. While international attention was attracted by the region's oil after the fall of the Soviet Union, European interests focussed on natural gas. The plan was to offer political support to the Caspian region to make its natural-gas resources accessible to Europe and to release Europe and the other countries concerned from their dependence on Russia. Next to Europe and Russia, China has also begun to show an interest in Caspian resources, and it has already pushed far ahead with its extraction and pipeline projects.

Potential gas-exporting countries include Kazakhstan, Turkmenistan, Uzbekistan, and Azerbaijan but not Kyrgyzstan, Tajikistan, Georgia, and Armenia. While Kazakhstan, Turkmenistan, and Azerbaijan are 'young' gas regions, Uzbekistan has already reached its limit, having exhausted 35 percent of its resources.

Having decreased markedly in the nineties, Azerbaijan's gas production soared when the country started to exploit the newly-discovered gas field of Shah Deniz, and it now hopes to increase its output to 20 billion m^3 by 2020. While one part is intended for domestic consumption and Georgia, another will be reserved for Turkey. The remainder might go to Europe.

In Kazakhstan, natural gas is extracted primarily in the northwest and on the shelf of the Caspian Sea, where it is a by-product of crude-oil production. The medium-term extraction volume is expected to reach 75 billion m^3, with an export potential of 40 billion m^3.

Turkmenistan is the country with the biggest natural-gas deposits in the region. However, although it was said in 2003 that the reserves of the late president Niyazov amounted to 22.5 trillion m^3, this figure may be doubted. According to estimates, the country's reserves and resources added up to no more than around 2.8 and 6 trillion m^3, respectively, by the end of 2005. While Turkmen gas extraction had still amounted to 90 billion m^3 per year at the end of the Soviet era, it then went down to 20 billion m^3. It was not before 2001 that the extraction volume increased again, reaching 50 billion m^3 in that year and 67 billion m^3 in 2006. Turkmenistan's officially stated extraction objective of 120 billion m^3 for 2010 is certainly unrealistic, although we may expect the volume to go up to 150 billion m^3 in the medium term. If the country should fulfil its long-term delivery contract with Russia, which provides for an annual supply of 90 billion m^3 from 2020 onwards, it would still have around 40 billion m^3 left to export to China, Iran, Turkey, and maybe Europe.

Uzbekistan reached an extraction volume of 58 billion m^3 in 2006, of which 47 billion m^3 went for domestic consumption while twelve billion m^3 were exported to southern Kazakhstan, Kyrgyzstan, Tajikistan, and Russia. Given the high exhaustion degree of its gas fields, the country will hardly be able to exceed the volume of 2006 in the future.

Caspian natural gas can be exported to all four cardinal points. The countries that could be supplied include Russia, Belarus, Ukraine, Moldova, China, Pakistan, India, Turkey, and Europe. However, the currently existing pipeline connections only go north and west. The system that goes north towards Russia starts in southern Turkmenistan and Uzbekistan. In Kazakhstan, it splits up into two branches, one leading to Moscow, the other to Ukraine. Those parts of the system that have not been maintained due to the fall of the Soviet Union are to be repaired in the near future to bring its capacity up to 90 billion m^3. There are plans to start building a pipeline which runs east towards China in 2009. The pipeline leading from Turkmenistan to Uzbekistan and Kazakhstan will be designed to carry 30 billion m^3. At the moment, pipelines towards the south, which could convey Turkmen gas to Afghanistan and all the way to Pakistan and India, are not making any progress. A gas pipeline that goes west towards Turkey and Europe, on the other hand, running along the eastern shore of the Caspian Sea to connect the Turkmen field of Korpedze to the Iranian city of Kordkuy, has been in operation since 1997.

Through the South Caucasus Pipeline (SCP) which was completed in 2007, Azerbaijan gained access to the Turkish and the European market for the first time. Designed to carry a volume of 16 trillion m^3, the pipeline is to be extended further so as to allow Azerbaijan to export greater volumes of natural gas to the west. Moreover, the USA vociferously demands the construction of an underwater pipeline, the so-called Trans-Caspian Gas Pipeline.

Presumably, much of the Caspian natural gas which will soon be on its way towards the west will come from Azerbaijan, especially as, with the SCP, the country has an export pipeline which can be extended according to requirements, and as Turkmenistan's options to export gas to the west are hardly developed.

To export gas to countries located outside the CIS, Russia has three existing and/or planned pipelines at its disposal – transit pipelines to Europe, direct pipelines to Europe, and pipelines that go east. The main line of the oldest and largest system runs through Ukraine to Slovakia and Czechia all the way to Germany, while its branches go to Hungary as well as, via Moldova, to Rumania, Bulgaria, and Turkey. Furthermore, the system is complemented by the Yamal-Europe Pipeline which runs through Belarus and Poland. However, all these pipelines run through the territories of CIS states. So-called direct pipelines which circumvent the transit countries include the Blue Stream Pipeline leading across the Black Sea to Turkey, the planned North Stream Pipeline which runs across the Baltic Sea to Poland, and a pipeline to Finland. Having had exclusive rights over Russian gas exports since 2006, Gazprom now intends to build a pipeline across the Black Sea together with the Italian ENI: This South Stream pipeline is to run from the starting point of the Blue Stream Pipeline to the Bulgarian city of Varna and on to southern Italy and/or Austria.

The objective of Gazprom is a double diversification of its export routes. On the one hand, it searches for alternative routes of transport that do not run through the western transit countries. On the other, gas exports to Europe are to be supplemented, if not even replaced, by exports to the east. In this context, Gazprom is certainly not looking for the most cost-efficient way to expand its transport capacities. However, it is guided by strategic considerations in

this: The transit pipelines running through Ukraine and Belarus are by now regarded as ‘insecure’, so that the Baltic Sea pipeline might be an alternative. What has also been taken into consideration is to build a bigger southern pipeline leading from Iran to Europe, the so-called Nabucco project, and, in continuation of this, to expand the Blue Stream Pipeline all the way to Europe.

Has the race for diversification become a foreign-policy strategy in the field of energy? Some people in Europe demand that the construction of pipelines should not be left to companies but should be made an issue of EU policy, and that the EU states should be able to speak with one voice on the question of gas imports. However, this must be viewed critically as the EU does not have either the formal competences or the means to finance anything but the preliminary stages of a pipeline. The fact is that the energy companies are still following their own business interests. Even if Nabucco became reality, it would hardly change the diversification of Europe’s gas exports, unless Iran starts to export extensive volumes of gas to Europe. Yet this option is hardly realistic, given the country’s moot political priorities in terms of gas export.

It is to be expected that Russia and, in second place, Africa will remain Europe’s most important natural-gas suppliers for a long time to come. And yet the Europeans should use every chance that presents itself to expand their cooperation with the states in the Caspian region.