



The European Union's Shift Towards Algerian Gas as a Solution to the 2022 Energy Crisis

توجه الاتحاد الاوروبي نحو الغاز الجزائري كحل لأزمة الطاقة سنة 2022

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Abstract

Keywords

In the second half of 2022, the global energy landscape underwent profound changes triggered by the geopolitical crisis between Russia and Ukraine. In response to the conflict, the European Union enacted sanctions against Russia, which, in turn, leveraged its substantial natural gas supplies as a strategic asset against Europe. This situation compelled EU member states to pivot towards alternative energy sources, notably embracing Algerian gas as a cornerstone of their energy strategy amidst the crisis. Consequently, there was a marked surge in demand for Algerian gas. The findings of this study suggest that Algeria is well-positioned to satisfy the growing long-term energy needs of Europe, representing a mutually beneficial scenario. This alignment enhances the diversification of Europe's energy portfolio while concurrently mitigating the risks associated with energy supply interruptions.

Energy Security ;
European Union ;
Liquefied Natural
Gas ; Russo-
Ukrainian Crisis ;
Natural Gas
Exports ;

JEL Classification Codes : Q34; Q41; Q48

الكلمات المفتاحية

الملخص

شهدت أسواق الطاقة العالمية تحولا كبيرا في النصف الثاني من سنة 2022 وذلك بعد اندلاع الأزمة بين روسيا وأوكرانيا حيث فرض الاتحاد الاوروبي عقوبات على روسيا مما جعلها تستخدم الطاقة كسلاح على اعتبارها من أكبر موردين أوروبا للغاز الطبيعي. وفرض هذا الصراع على دول الاتحاد السعي نحو تحقيق الأمن الطاقوي والتوجه نحو مصادر جديد للغاز وأهمها الغاز الجزائري، الذي أصبح يمثل مصدرا رئيسيا للطاقة بالنسبة لدول الاتحاد منذ اندلاع الأزمة التي أدت إلى ارتفاع حاد في الطلب عليه ، وتوصلت الدراسة إلى أن الجزائر بإمكانها تلبية الطلب الاوروبي المتزايد على المدى البعيد. الذي يعد تطورا إيجابيا للجانبين. فهو يساعد على تنويع إمدادات الطاقة الأوروبية وتقليل مخاطر انقطاع الإمدادات.

الأمن الطاقوي ؛ الاتحاد
الاوروبي ؛ الغاز الطبيعي
المسال ؛ الازمة الروسية ؛
صادرات الغاز الطبيعي.

تصنيف JEL : Q34; Q41; Q48

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I.INTRODUCTION:

Natural gas, a pivotal primary energy source, plays a critical role in sustaining the global economy and is particularly vital for the major industrialized nations. It serves as both a tool for fostering peace and a potential instrument of conflict. The imperative of energy security has become increasingly acute, catalyzing shifts in the global economic landscape amid intense competition for limited energy resources.

This competition is further intensified by population growth, economic development, and escalating energy demands against the backdrop of dwindling confirmed oil and natural gas reserves. Such dynamics render the global economy exceedingly susceptible to fluctuations in energy supply and prices.

Given that EU nations are unable to satisfy their internal energy requirements through domestic production alone, imports are crucial for maintaining energy security. This security is a pivotal concern in European and international policy circles, with Russian and Algerian energy supplies covering a substantial portion of the EU's oil and natural gas consumption. The aim is to secure stable and reliable energy sources.

The discourse on the role of natural gas within European-Russian and European-Algerian relations gains complexity, particularly in light of the recurrent Ukrainian crises in 2014 and 2022. These crises led to disruptions in energy supply to the EU, causing widespread industrial stagnation and societal impact.

The reliance on Russian energy sources has underscored the vulnerability of European nations, prioritizing the need for secure natural gas supplies. This dependency spurred a reevaluation of Europe's energy relations with Russia and Ukraine, leading to strategic efforts to reduce Russian influence and enhance security by diversifying suppliers, notably through increased imports from strategically important nations like Algeria.

I.1 Research Problem:

This study seeks to comprehensively explore the following question: **How has the European Union adapted to the Russo-Ukrainian crisis, and what role does Algeria play in bolstering European energy security?**

I.2 Study Hypotheses:

Given the context, the following hypothesis is proposed: The European Union's response to the crisis has been proactive, characterized by diversifying gas sources away from Russian supplies to alternatives such as liquefied natural gas via tankers and Algerian gas through pipelines.

I.3 Purpose of the Study:

This study aims to evaluate the European Union's strategic response to the Russo-Ukrainian crisis, assess the shift towards diverse energy sources, and elucidate the potential role of Algeria in enhancing European energy security.

I.4 Significance of the Study:

The significance of this study stems from the critical nature of energy as the lifeblood of the global economy. The manipulation of natural gas as a strategic tool by Russia during the Russo-Ukrainian crisis compelled the European Union to redefine its energy policy and turn towards North Africa, particularly Algeria, to offset the diminished Russian supplies.

I.5 Study Methodology:

This study employs a descriptive approach, which is particularly apt for exploring, analyzing, and classifying the dynamics of the topic at hand. Our analysis is structured around three principal axes: initially, we delve into the nature of European interactions with both Algeria and Russia; subsequently, we assess the European Union's strategic response to the crisis, focusing on its shift towards alternative energy solutions to Russian gas; and finally, we examine Algeria's role in fulfilling European gas demands.

II. European Relations with Both Russia and Algeria

II.1 European-Russian Relations

The tapestry of European-Russian relations is rich and complex, woven through decades of both collaboration and conflict. The strategic importance of Russia as a primary energy supplier to the European Union (EU) dates back over thirty years to the mid-1970s, a period marked by the Cold War tensions between the then Soviet Union and the United States. Russia has consistently been the top supplier of this crucial commodity to the EU, with Algeria and Norway following.

After the Soviet Union's dissolution in 1991, Russia endeavored to foster amicable ties with the European Union. In 1994, the EU and Russia ratified the Partnership and Cooperation Agreement, which took effect on December 2, 1997, and was established for a renewable decade-long term. (Russian Mission, Cooperation and Partnership Agreement, 2022) This agreement provided a foundation for nurturing relations by promoting cooperation across diverse sectors such as economics, trade, politics, and security.

In 2003, the initiative known as "Four Common Spaces" was launched between Russia, France, and Germany, the latter two countries having opposed the Iraq War. This initiative was designed to strengthen EU-Russian relations by establishing four areas of joint cooperation: an economic space, a space of freedom, security, and justice, an external security space, and a space of research and education, with a particular focus on energy, transportation, environmental, and cultural collaborations. (Hassan, 2022)

Despite its intent to bolster cooperation, the initiative encountered significant obstacles, especially concerning energy issues. Rising energy prices for oil and natural gas solidified Russia's pivotal role in European energy security, augmenting its influence over natural gas imports to Europe.

The year 2014 marked a significant escalation in tensions due to the global energy crisis following Russia's annexation of Crimea from Ukraine. The EU responded with sanctions against Russia, which retaliated with its own sanctions against the EU (Hassan, 2022). Since then, EU-Russian relations have been strained by various disputes, including the conflicts in Ukraine, which resurfaced in 2022 with a Russian invasion, triggering a global crisis and surging energy prices, particularly for natural gas, which is central to this study.

The relationship transformed from one of cooperation and partnership to one of hostility and dissent, intensified by European support for Ukraine and subsequent sanctions against Russia. (Hajjaj, 2020, p. 258) These developments have had profound implications for the Eurozone countries that are heavily dependent on Russian energy supplies.

The past half-century of European-Russian relations has been punctuated by numerous disruptions. Russia remains a crucial supplier of natural gas, especially to Western European countries, pivotal in external trade. As significant as Russia is to the EU, the EU -with its half-billion energy consumers- is equally significant to Russia.

Geopolitical competition has led to disruptions and volatility in their relations, particularly as some Eastern European countries joined the EU, which Russia views as its natural sphere of influence, thereby heightening tensions. Consequently, reliance on Russian gas poses a significant threat to the wealth, power, and security of the EU in light of Russian energy policies.

II.2 European- Algerian Relations

The dramatic surge in Algerian exports to the European Union, particularly in the realm of hydrocarbons, has elevated Algeria's strategic importance relative to its neighbors, significantly influencing international relations both quantitatively and qualitatively. Under the auspices of the Evian Agreement, Algeria has secured preferential status for its exports to the EU, reinforcing its economic stature.

The energy sector, a critical pillar of EU-Algerian economic relations, sees Algeria as the third-largest supplier of natural gas to the EU, while the EU remains the most vital market for Algerian gas exports. Since 2015, a strategic partnership in the energy domain between the EU and Algeria has been fostering advancements in renewable energies, energy efficiency, and encouraging investments. (Press and Media Team of the Delegation to Algeria, 2024)

Trade interactions between the two entities underscore the EU's role as Algeria's primary trading partner. Statistics from foreign trade reveal that over 50% of trade exchanges (both exports and imports) occur with the EU. Approximately two-thirds of Algerian exports are directed towards

the EU, with Italy, France, and Spain being the principal trading countries. (Traka, 2014) The year 2018 saw trade values peak at 39.8 billion euros. However, there was a noticeable decline in 2020 when trade values plummeted to 24.9 billion euros, marking a significant reduction of 14.9 billion euros.

In essence, Algerian-European relations are marked by a robust partnership and cooperation across multiple spheres, notably in the economic sector with vibrant trade exchanges, particularly in energy, as well as in political and security domains. This multifaceted relationship is encapsulated in the Euro-Algerian partnership, which has evolved through various stages of Algerian-European interactions.

III. The European Union's Response to the Russo-Ukrainian Crisis

Despite the geopolitical upheavals that have transpired in the vicinity of the European Union since the end of the Cold War, the dismantling of the Berlin Wall, and the EU's eastward expansion, the EU has maintained a relatively stable supply of energy, with energy flows from Russia remaining secure. However, the scenario shifted dramatically in February 2022 with the Russian military's incursion into Ukraine, presenting a profound threat to European energy security.

The EU's strategic response was multifaceted:

III.1 Imposing Sanctions on Russia:

The sanctions levied against Russia by the European Union are not a novel strategy, having been previously implemented in 2014 following Russia's annexation of Crimea. Yet, the scope of sanctions intensified considerably following the recent Russian invasion of Ukraine, with unprecedented measures being enacted in coordination with the United States to escalate the costs of the conflict for Russia and to thwart its military endeavors. Key sanctions included:

- The exclusion of prominent Russian banks from the British financial system by the United Kingdom, freezing of all Russian bank assets, prohibition of Russian corporate borrowing from British banks, and restrictions on deposit capacities for individuals and companies in British banks.
- A significant number of major Russian banks were severed from the SWIFT international financial messaging system, impeding Russia's ability to receive payments for oil and gas exports promptly.
- The European Union instituted a ban on the sale, supply, transfer, and export of euro-denominated banknotes to Russia. This measure aims to limit the Russian government, its central bank, and any natural or legal persons in Russia from accessing euro resources, thereby preventing any potential evasion of the sanctions. (Press and Media Team of the Delegation to Russia, 2024)

In an expanded effort to apply pressure on Russia, the European Union imposed a comprehensive air travel ban. This measure prohibited Russian airlines of all types from entering EU airports and barred them from traversing EU airspace. Additionally, the EU enacted a ban on the export of goods and technologies pertinent to the aviation and aerospace sectors directly to Russia, further tightening the economic constraints.

In the critical arena of energy, which lies at the core of EU-Russian relations, significant measures were introduced. The EU prohibited the import of Russian coal and other specific materials and goods, aiming to curtail Russia's economic leverage. The sanctions regime was also extended to encompass Russian oil imports transported by sea. In a notable move reflecting the gravity of the situation, Germany suspended its plans to inaugurate a major new gas pipeline from Russia, signaling a strategic shift in energy policy.

III.2 Replacing Russian Gas with Other Energy Sources:

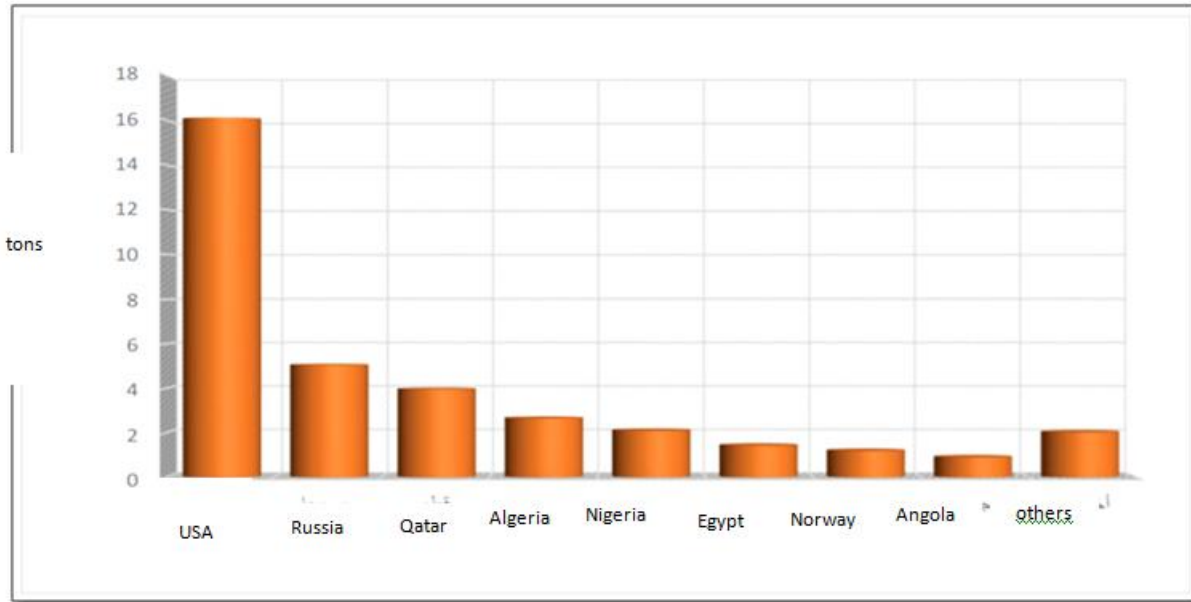
Russia, recognized as one of the largest natural gas suppliers to the European Union, experienced a significant reduction in its gas exports to Europe via pipelines in 2023, with a decline of 79% and 86% compared to 2022 and 2021, respectively. From January 1 to May 20, 2023, the average daily flow of Russian gas was about 60 million cubic meters, totaling approximately 8.5 billion cubic meters for that period.

This rate persisted throughout the year, with total Russian gas imports to Europe via pipelines amounting to about 22 billion cubic meters, a sharp decrease from 63 billion cubic meters in 2022 and 142 billion cubic meters in 2021 (Fattouh, 2023, p. 27). However, in light of the political and military conflict between Russia and Ukraine, and involving the West, Europe has been prompted to seek alternatives to Russian gas, such as Algerian gas, liquefied natural gas (LNG) from the United States and Qatar, and supplies from other countries like Nigeria through new pipelines. (Fattouh, 2023, p. 34) Imports from North Africa to Southern Europe have now become equal to or exceeded the Russian flows to Europe in most months.

III.3 The European Union's Shift Towards Liquefied Natural Gas (LNG):

Reacting to the diminished demand for Russian gas, the EU has increasingly turned towards LNG imports. In the initial five months of 2023, Europe imported an average of 450 million cubic meters of LNG per day, a volume more than sevenfold the gas received from Russia via pipelines during the same timeframe.

This volume surpasses what was historically expected from Russia. Despite the overarching trend, Russia maintained a notable position in LNG exports to the EU, securing the second position with 14.3% of total exports. Meanwhile, the United States emerged as the leading supplier, accounting for 45.4% of the total with 16.1 million tons. This development underscores the EU's strategic shift to diversify its energy supply sources in light of the ongoing Russo-Ukrainian conflict. (Organization of Arab Petroleum Exporting Countries [OAPEC], 2023, p. 15)

Figure 01: LNG Suppliers to the European Market in the First Quarter of 2023

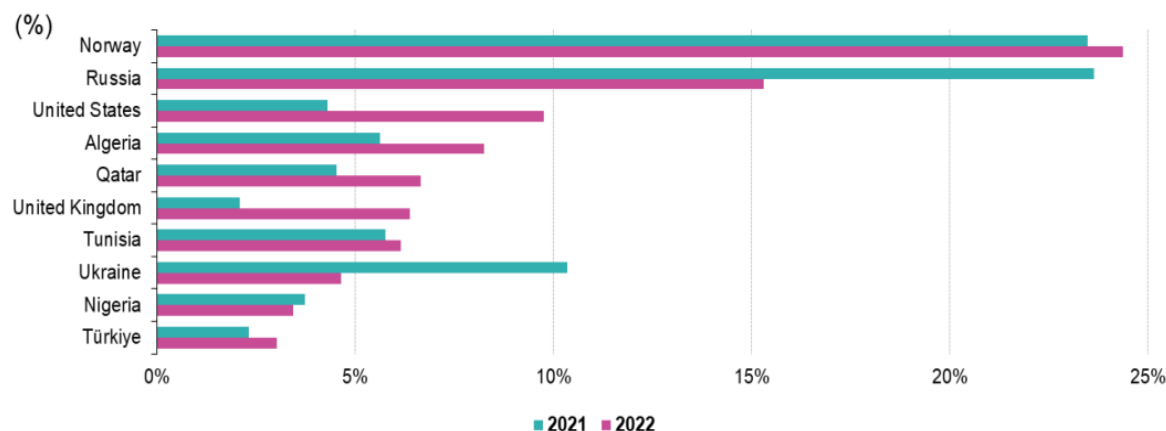
Source: Organization of Arab Petroleum Exporting Countries (OAPEC)

This shift in LNG sources to the European market highlights the importance of diversifying supply sources amid the Russo-Ukrainian war. Europe seeks to reduce its reliance on Russian natural gas and enhance cooperation with other countries such as the United States and Qatar. It is expected that these trends will continue in the future, as Europe plans to increase its imports of LNG from other countries, aiming to reduce its dependency on Russian natural gas to 50% by 2030.

III.4 The European Union's Shift Towards Algerian Gas:

The shortfall in Russian gas supplies precipitated by the crisis in February 2022 notably boosted Algerian gas exports to Europe. Algeria has ascended as a principal energy supplier to the EU. In May 2023, Algerian gas exports exceeded those to Italy and also saw a significant increase to Spain, achieving record levels. This surge is attributable to Algeria's robust capacity and infrastructure, which are well-suited to address the supply-demand dynamics within EU countries.

Figure 02: Percentage of Natural Gas Imports (Entries) from Outside the European Union by Country



Source: Eurostat (nrg_ti_gasm)

https://ec.europa.eu/eurostat/databrowser/view/nrg_ti_gasm/default/table?lang=en&category=nrg.nrg_quant.nrg_quantm.nrg_t_m.nrg_ti_m

From the above figure, we observe a noticeable increase in the percentage of natural gas imports to the European Union from Algeria, rising from 6% in 2021 to 8.3% in 2022, compared with Russia, whose import share decreased to 15.3% in 2022. Several reasons can explain this increase in natural gas imports from Algeria to Europe. Primarily, Algeria's proximity to Europe makes it an attractive natural gas source for European countries.

Additionally, Algeria is considered a reliable supplier of natural gas to Europe, thanks to its vast gas reserves. Furthermore, Algeria enjoys strong political and economic relations with Europe, which facilitates the process of exporting natural gas from Algeria to Europe.

Regarding Algeria's exports of liquefied natural gas (LNG) in the first quarter of 2023, there was a notable increase, as illustrated in (Table No. 01).

Table No. 01: Development of LNG Exports during the First Quarter of 2023 and Comparison with the Same Quarter of 2022 (Unit: Million Tons)

Annual Change Q1 2023	Q1 2023	Q1 2022	Country
16.7%	2.8	2.4	Algeria

Source: Organization of Arab Petroleum Exporting Countries (OAPEC), Developments in LNG and Hydrogen during the First Quarter of 2023, State of Kuwait, May 2023, p. 9.

From the table above, we note the increase in Algeria's LNG exports during the first quarter of 2023 to 2.8 million tons compared to 2.4 million tons during the corresponding quarter of 2022, marking a notable annual growth rate of 16.7%. Most shipments from Algeria were directed to major European markets such as France, at a time when European Union countries are striving to diversify their supply sources.

Algeria tops the list of countries with strategic relations with European nations and is highly trusted in providing gas supplies, whether LNG or gas through pipelines, thanks to its vast reserves and export infrastructure, including liquefaction plants in Arzew and Skikda, and pipelines connecting it to the European market.

Even with the cessation of gas pumping connecting Algeria to Spain (via Morocco) since late 2021 due to the expiration of the agreement between Algeria and Morocco and the failure to reach a new agreement, LNG continued to flow to Spain, which received several shipments during the first quarter of 2023, estimated at about 240,000 tons initially. (OAPEC, 2023, p. 11)

IV. The Role of Algerian Gas in Achieving European Energy Security

The significance of energy security for the European Union has been paramount since the 1920s, a challenge that persists amid current global economic and political crises, most notably the Russo-Ukrainian war of 2022. In this context, Algeria has gained substantial importance in enhancing the energy security of European countries by ensuring the stability and reliability of energy supplies, especially gas.

IV.1 Potential of Natural Gas in Algeria:

The Algerian energy sector, given its critical importance, sensitivity, and vital contribution to the national economy, receives special attention from the state. Algeria's position as a leading natural gas exporter has been reinforced by significant developments in its energy sector. The production of natural gas has seen remarkable growth, rising from 49.27 million cubic meters in 1990 to 105.04 million cubic meters in 2021, an average annual increase of 7.6%. (OAPEC, 2023, p. 11)

This surge is attributed to various factors, including the discovery of new natural gas fields, the development of export infrastructure, and increased investments in exploration and production. These elements confirm Algeria's stature as a premier gas-producing nation, further emphasized by its significant proven reserves of gas and oil.

Table No. 02: Proven Reserves of Natural Gas during the Period (2011-2021) (Unit: Billion Cubic Meters at [IV](#) Year-End)

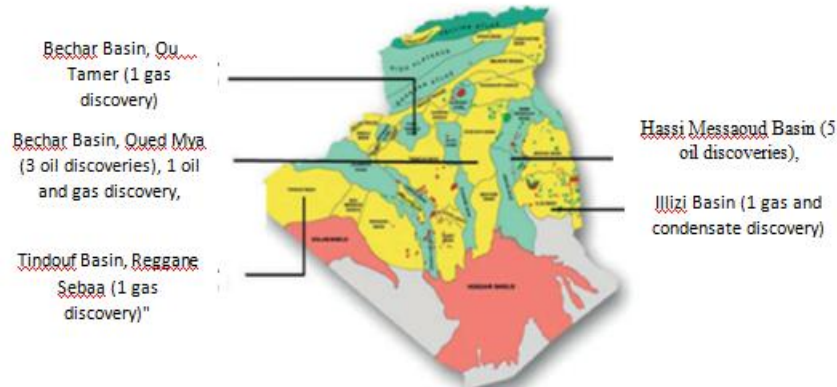
Percentage of Global Proven Natural Gas Reserves	Proven Natural Gas Reserves	Years
2.36%	4504	2011
2.34%	4504	2012
2.29%	4504	2013
2.30%	4504	2014
2.29%	4504	2015
2.30%	4504	2016
2.28%	4505	2017
2.23%	4505	2018
2.20%	4504	2019
2.17%	4504	2020
2.18%	4504	2021

Source: OPEC Report from 2011 to 2022.

The data presented clearly shows that Algeria's confirmed natural gas reserves have remained consistent from 2011 to the end of 2021, estimated at 4504 billion cubic meters. This stability suggests that the volume of gas being discovered is closely aligned with the levels of production, a reflection of the diligent efforts by Sonatrach, both independently and in collaboration with international partners, in the realms of exploration, drilling, and the development of new fields.

In 2021, a notable achievement was the discovery of thirteen new hydrocarbon sources through Sonatrach's independent efforts, which helped to ascertain confirmed and potential quantities estimated at 70.4 million tons of oil equivalent, comprising 86% oil and 14% gas. (Labza, n.d., p. 91)

Map No. 01: Sonatrach's Self-Effort Discoveries for the Year 2021.



Source: Sonatrach Report 2021, p. 22.

Despite these discoveries, Algeria has not increased its reserves due to rising domestic demand for natural gas. However, given the international context characterized by fluctuating prices and increasing demand both nationally and internationally, Algeria is focusing its efforts on boosting investments in exploration and production activities. This demonstrates Algeria's capability to meet the growing European demand for gas over the long term.

IV.2 The Reality of Gas Transport from Algeria to Europe:

Algeria is one of the most crucial countries on which the European Union relies for its gas supplies. An impressive 95% of Algeria's gas exports, whether through pipelines or as liquefied natural gas (LNG), are destined for Europe (Sonatrach Company, 2021, p. 21). These exports are facilitated through two primary methods: pipelines and tankers.

A. Tankers: By the end of 2021, Algeria had a fleet of 11 LNG tankers with a total capacity of 1.359 million cubic meters, ensuring a significant portion of its LNG exports reach European markets efficiently. (Bemraha, 2021, p. 45)

B.Pipelines: Algeria utilizes two major pipelines for gas exports to Europe:

– TransMed Pipeline:

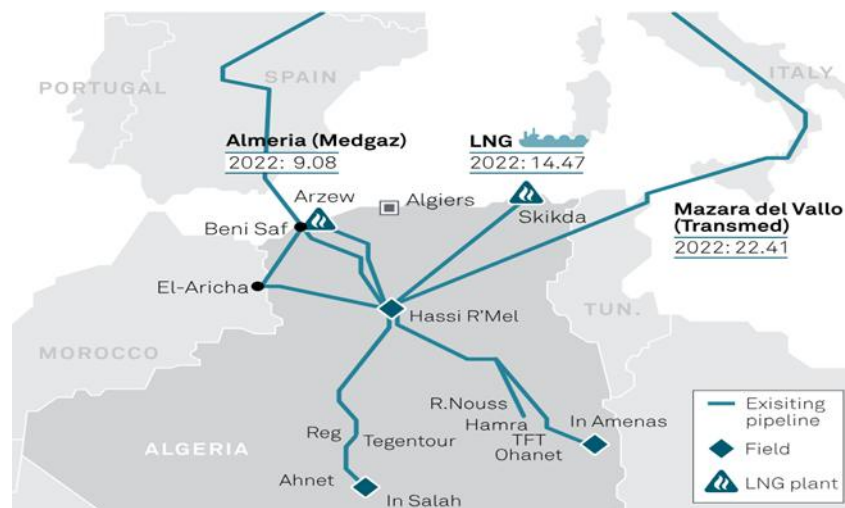
This pipeline spans 2,485 kilometers, originating from the Hassi R'Mel gas field in Algeria, passing through Tunisia, and reaching Sicily in Italy. It further extends north to Slovenia. The TransMed pipeline became operational in 1982 with an initial capacity of 8 billion cubic meters per year, which has since been expanded to approximately 33 billion cubic meters annually. (Ben Aichouba, 2022, p. 460)

Medgaz Pipeline:

In addition to the above pipelines, there is the GALSI Pipeline (Galsi), which is under construction and connects Algeria to northern Italy via the island of Sardinia, with a total length of about 1505 km. The terrestrial section of the project was completed in 2023, and work is currently underway on the maritime section. The project is expected to be fully completed by 2025.

Another significant project is the trans-Saharan gas pipeline, through which Algeria will play the role of a corridor. This line connects Nigeria and Europe and links Algeria and Nigeria, passing through the Niger Republic to Hassi R'Mel, from where the gas is then transported via Algerian pipelines towards the European Union.

Map No. 02: Natural Gas and LNG Pipeline Routes Between Algeria, Italy, and Spain



Source: S&P Global Commodity Insights [S&P Global Commodity Insights](#)

Algeria is regarded as a vital strategic partner for Europe in the energy sector, recognizing the critical importance of energy for European security. Algeria has demonstrated a strong commitment to stabilizing gas supplies to Europe. European imports of Algerian gas have increased significantly, rising from 40% in 1999 to 50% in 2010, and reaching 70% in 2020. Projections indicate that this figure could soar to 85% by 2030. (Mahmoud, 2022) Algeria's gas exports are primarily directed towards three major European Union countries: France, Italy, and Spain.

France: Since 2013, France has relied heavily on Algerian LNG transported by tankers, accounting for 15.32% of the total EU gas imports from Algeria in 2020.

Italy and Spain: These countries depend largely on Algerian gas delivered through pipelines, with Italy importing 46.11% and Spain 32.07% of their gas needs from Algeria, respectively, in addition to smaller quantities of LNG transported by tankers. (Lotfi, 2012, p. 150)

Algerian natural gas plays a pivotal role in Algerian-European relations, serving as a cornerstone of energy supply for these countries. A prime example is the substantial dependency of France on Algerian gas. (Ben Aichouba, 2022, p. 461) In 2007, a partnership contract was signed between Algeria's Sonatrach and the French Gas Company to secure Algerian gas supplies for France in the future and mitigate reliance on Russian gas. (Bemraha, 2021, p. 47)

Given Algeria's vast energy potential, particularly in natural gas, the country has established itself as a leading supplier to European nations in North Africa and the Mediterranean region. This prominent position has qualified Algeria to be a crucial part of the European Union's strategy to diversify its energy supplies, with natural gas playing a central role as the fuel of the future.

V. Conclusion:

Natural gas stands as one of the most crucial economic resources globally, often at the heart of political, economic, and military strife. For European Union countries, the concept of energy security is a fundamental issue, driven by their reliance on external energy sources. Natural gas is vital in Europe's energy relations, notably with Russia, and influences the EU's strategic initiatives to establish companies and dialogues with producing nations, particularly Algeria. This strategy is partly motivated by ongoing crises in regions like Ukraine, notably the 2022 crisis, which severely impacted Europe's energy supplies.

The European strategy to replace Russian gas and focus on diversifying supply sources to regions known for abundant and secure production, especially Algeria, has evidently increased Algerian gas exports to EU countries following the crisis. This trend is expected to continue growing in the future. Energy, particularly natural gas, has not only bolstered the relationship between the European Union countries and Algeria but also highlighted Algeria as one of the world's largest producers with vast reserves. These reserves are increasingly attracting European countries that are eager to diversify their energy sources and reduce their reliance on Russian supplies.

Results:

- The nature of the relationship between the European Union and Russia has highlighted the EU's vulnerability concerning its energy security, prompting considerations of permanently replacing Russia as an energy supplier to the European market.

- The 2022 crisis confirmed that Russia is an unreliable energy source for EU countries, necessitating the search for alternatives to break Russian influence and work towards building a unified internal energy market to face external challenges.
- The crisis opened the door for Algeria to increase its gas exports to EU countries and to activate more companies in the field of exploration and development, making it a long-term alternative to Russian gas.

Recommendations:

- The European Union should cooperate with Algeria by increasing investments in the energy sector, particularly renewable energy, to rationalize the consumption of fossil energy and ensure a surplus of natural gas for export to EU countries.
- It is essential for Algeria to focus on energy transition and renewable energies and to use the current crisis to mobilize financial resources to accelerate the intensification of production, thereby being able to cover the increasing European demand.

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