

# THE IMPACT OF INTERNATIONAL SANCTIONS ON NATIONAL ECONOMIC REGIME OF TARGET STATES

**Bibigul Bimbetova, Kazakh-Russian International University**  
**Yuliya Tyurina, Financial University under the Government of RF**  
**Marija Troyanskaya, Orenburg State University**  
**Elena Ermakova, Plekhanov Russian University of Economics**  
**Aizhan Orynassarova, Kazakhstan Innovative Academy**  
**Aizhan Skakova, Al-Farabi Kazakh National University**  
**Gulzhamal Koptayeva, Miras University**  
**Gulzhan Agabekova, Miras University**

## ABSTRACT

*Nowadays, sanction seems to be as an important tool of international policy to keep security and provide collective reaction to violations of peace and international order in diplomatic non-military manner. Recently, international sanctions were imposed against Russia by the European Union and the United States because a change the status of the Crimea and destabilisation of the situation in the southeast part of Ukraine. However, there have been debates on whatever are international sanctions effective or not. In particular, can sanctions change Russia's political behaviour and achieve political objectives in Ukrainian crisis. This paper aims to use Russia as a case study and examine the impact of sanctions employed by the EU and U.S against Russia on national economy regime.*

**Keywords:** Economic Sanctions, EU, U.S, Russia, Ukraine, Sanction Theory, Russian Economic System, Energy Sector, Oil, Gas, LNG.

## INTRODUCTION

The United Nations Charter of 1945 recognises that an enforcement policy as a necessary tool to prevent and eliminate threats to peace, suppress acts of all aggression and other potential violations against the peace (Couzigou, 2016). The UN's report "A more secure world: Our shared responsibility" identifies such threats to peace and security as poverty, environmental degradation, conflicts within and between states, the proliferation and use of nuclear, chemical and biological weapons, international terrorism, sexual violence, and transnational organised crime (Panel, 2004). These threats come from both states and non-state actors (Simma et al., 2002). Enforcement policy is considered in UN Charter as "an essential part of collective security system". The UN Charter defines a clear framework for the use of enforcement policy. The UN Charter's Article No. 41 provides measures for full or partial break of economic relations. The UN Security Council qualifies this type of measures as economic sanctions. For example, resolution No. 665 approved by the UN Security Council on Iraq and Kuwait says that the UN Security Council decided "to apply economic sanctions under Chapter VII of the UN Charter". The sanctions under resolution No. 665 has clear political goal to change political behaviour of Iraq regarding to Kuwait. United Nations is viewed economic sanctions as an important tool to keep security and peace and provide collective reaction to violations of peace

and international order. Thus, case of Iraq shows that non-military approach has become an alternative one to the use of military force.

## LITERATURE REVIEW

Since Iraq-Kuwait conflict in 1990, there has been a significant increase in number of employed economic sanctions. The economic sanctions have been imposed by the UN's Security Council on Iran, Syria, Libya, Somalia, Rwanda, Sierra Leone, the former Yugoslavia (including Kosovo), Haiti, Eritrea and Ethiopia, Liberia, Congo, and Russia. There have been different reasons of the number increase of economic sanctions. First, the focus of imposing sanctions has been changed as well and nowadays it is covering such issues as protection of human rights, the fight against terrorism, the proliferation and use of nuclear and the support of peace agreements (Simma et al., 2002). In this context, sanctions employ to win some policy concession. For example, in Cuba, it has been regime change in the country; with Russia, the goal is to deter Russia from acting aggressively in Ukraine, and perhaps curtail its influence in eastern Ukraine; with Iran, the goal is to stop Iranian nuclear program. The U.S government has made restrictions related to Iranian oil sector and has set additional bans on financial institutions. It has been also limited the U.S president's right to cancel the employed sanctions. The UN Security Council adopted special resolution No. 1929, which froze financial assets owned by the Iranian government and assets placed by Iranian government abroad. Second, as shown in case of Iraq-Kuwait conflict, the initiation of military operations has become expensive tool, and these military operations are not always having positive results. Therefore, non-military approach has become an alternative to the use of military force. Third, the change of threats nature to peace and security had had a significant impact on the changing concept of enforcement policy. As shown in UN's report "*A more secure world: Our shared responsibility*", the most serious threats to peace and security are not only aggressive wars between states (Panel, 2004). Finally, the globalisation of international economic relationship provides massive integration of markets, services, and capital between both developed and developing countries. In this context, the economic sanctions might have significant impact on national economy of target state, thus, making economic sanctions as a powerful tool for influencing the target state (UN, 2009). This situation is especially important for developing countries.

There has been a lot of literature researching sanctions issue. Baldwin & Pape (1998) have argued that "*sanctions are ineffective, or that their goals are overambitious and non-realistic*". Baldwin & Pape (1998) in his paper "*Why economic sanctions do not work*" concluded that sanctions reach only 10-15% of the success rate as the target state adapts to new economic and political circumstances instead of changing its political behaviour; 79% of cases when sanctions did not prevent military action. Sanctions aimed at changing the political behaviour of targeted countries have also had a low success rate. According to Clarke et al. (2009), the number of initiated sanction cases, which ended in success was 12% between 1980 and 2005; and the success of sanctions aimed at changing the political regime was 28%. In another word, sanctions do not contribute to the achievement of the goal set in the UN Charter-maintaining and restoring international peace and security. The sanctions have the opposite effect, creating tensions between political elites and societies, contributing to the realisation of hidden and not always friendly motives of interested parties. The report "*The impact of economic sanctions*" written by UK Committee on Economic Affairs (2007) states that: "*sanctions do not always bring the same results in terms of prompting the implementation of the UN Security Council resolutions, and in recent years the effectiveness of sanctions is increasingly being*

*questioned*". Some scholars use examples of Iran, Yugoslavia or Haiti to illustrate ineffectiveness of economic sanctions as an instrument of political pressure, while in Russia, there are debates on whatever can sanctions change Russian behaviour in Ukraine and what factors much effect on economic and political dynamics in Russia-sanction regime or oil price reduction on global market (Dreyer & Popescu, 2014; Shirov et al., 2015; Newnham, 2015). Some researchers believe that sanctions work effectively (Dreyer & Popescu, 2014), while others call for strengthening sanctions regime against Russia due its current ineffectiveness. However, Paternoster et al. (1983) argues that sanctions are a lot more effective, when there are many senders of sanctions against target state. Economically, for example, if single sender state of sanctions tries to deter bad political behaviour of target state, and if target state has only 1-2% of all trade from sender of sanction, then it is still getting 98% of trade effectiveness. On another hand, if sender state of sanctions can manage all 100% of trade partners of target state on board of sanction, then these sanctions are going to be much more effective because all trade partners have disappeared. On another hand, if more states involve in sanctions affair, it is hard to keep senders together. Furthermore, the success of sanctions in the sense of its effectiveness is not guaranteed by the participation of a large state like the United States and or some European economies.

As stated by Marinov (2005), sanctions remain an important tool of international policy and diplomacy, however, existing trends in the international legal regulation of the sanctions call for the need for further study of sanction regimes, as well as the development of measures to improve their regulatory framework, and application practices. In terms of ethical issues of sanction, as raised by Kern (2009), several serious problems are arising during the implementation of economic sanctions regimes. The most significant one is "*accompanying damage*" to the civilian population of the country, which is not officially declared as a target of economic sanctions and material damage caused by the sanctions regime to third states because of a break in economic ties with the target state against which sanctions are employed. As stated by Klinova & Sidorova (2014), economic sanctions damage social programs and impact on civilian population who began to consider the governments of those countries that imposed these sanctions as their enemies. The UN Millennium Declaration calls for minimising the negative effects of economic sanctions on innocent populations through regular review of sanctions regimes and eliminating the negative effects of sanctions on third parties as well as parties imposing sanctions. For example, Hufbauer et al. (1990) calculated and stated that damage to economies imposing sanctions exceeds 1-2% of GDP. Furthermore, sanctions can create corruption and criminalisation regime, ignoring rule of law. Considering the difficulties in the practice of applying international economic sanctions, the UN Human Right Watch proposes to make sanctions a subtler tool, applying them more purposefully, improving the planning and implementation of sanctions regimes.

## RESEARCH METHODOLOGY AND SOURCES

Currently, there is not universal accepted method for assessing effectiveness of international economic sanctions. The choice of methodological framework might depend on political and economic goals of sanctions and economic of nature of target states. This paper decides to apply document analysis. Document analysis is one of the effective qualitative research methods widely used in different fields including economics, business, education, communications, social, political and health science. Both formal and informal documents are important sources of data and information to research realities and facts. The formal documents

include governmental directives, orders, reports, and official statistics from institutions that mainly reflect public relations. These documents are drafted and approved by state or public bodies, public and private institutions and can be used as evidence. The purpose of these documents is to inform about the current situations, problems, achievement of the goals, as well as the regulation of institutional relations. Informal documents also include materials from local and international mass media that reflect all aspects of society. Furthermore, document analysis is cost effective research method than the social surveys, in-depth interview or participant observation. In this research, the methodology includes collection and analyse news articles in English and Russian, interviews of policy makers to Russian federal channels, and country specific financial and economic data from international organisations such as the World Bank, United Nations and European Commission. Furthermore, it includes analysis of government documents from Russian Ministry of Energy, Ministry of Industry and Trade, and Ministry of Economic Development. It also includes analysis of published papers in specific international journals.

## RESULTS AND DISCUSSION

There are debates on whatever can sanctions change Russian behaviour in Ukraine and what factors much effect on economic dynamics in Russia-sanction regime or oil price reduction on global market (e.g., Dreyer & Popescu, 2014; Shirov et al., 2015; Newnham, 2015; Tuzova & Qayum, 2016). Dreger et al. (2016) in his paper shows that low oil prices affect in national currency (Russian Ruble), which lead to 50% of loss of its value against U.S dollar. Korotin et al. (2019) with using decomposition by Hilbert-Huang show a lack of direct impact of sanctions on the ruble exchange rate. Dreger et al. (2016) conclude that the further intervention of the Central Bank of Russia in operations on the foreign exchange market could help to balance the budget, but at the same time, there will be acceleration of inflation rates. Imported goods, which occupy 40-45% of the consumer basket of Russians in large cities, will rise in price in proportion to the inflation rates. Dreyer & Popescu (2014) and Gurvich & Prilepskiy (2016) conclude that international sanctions have impact mainly on capital flows specifically in oil and gas sector and inflation rate, while low oil prices have effect on global markets impact on federal revenue and social programs in Russia. According to data from World Bank, GDP reductions in Russia were started in 2013. The was GDP increase from 1.4% in 2010 to 0.8% in 2012 and to 0.1% in 2014. Gurvich & Prilepskiy (2016) shows that capital flows in oil and gas sector has decreased from 174 billion U.S dollars to 26.5 billion between 2014 and 2016 due to sanctions regime, consequently such reduction of capital flow has led GDP fall from 1660.8 in 2009 to 1238.3 billion of U.S dollars in 2016. Furthermore, inflation rate has increased from 15.6% in 2014 to 20% in 2017. However, according to Klinova & Sidorova (2014), GDP decrease was mainly associated with unfavourable market conditions in world commodity markets and a significant reduction in investment activity of the largest Russian companies. Klinova & Sidorova (2014) stated that such negative economic situation was observed mainly in resource-rich energy exporting countries including Azerbaijan, Kazakhstan, Venezuela and Nigeria. In fact, the Russian economy mainly depends on exports; where energy resource exports account for 60% of GDP (WB, 2017). The oil and gas sector is main resources for GDP structure; the share of oil and gas in the GDP structure has increased from 20.9% in 2001 to 42.3% in 2014 (WB, 2017). According to some studies, Russia and other Caspian Sea countries suffer from the “*Dutch disease*” (Dobrynskaya & Turkisch, 2010; Karatayev et al., 2016). Furthermore, industrial activities in the energy sector in Caspian Sea countries are associated with substantial

environmental degradation (Karatayev & Clarke, 2014), posing a potential threat to sustainable development and the water-energy-food security nexus perspective in the region (Rivotti et al., 2019). Due to the high reliance on income from gas and oil exports, the Russian and Caspian Sea economies and its competitiveness are vulnerable to international commodity prices (Karatayev & Clarke, 2016). Thus, it cannot yet be claimed that the sanctions had a directly significant impact on the economic growth in Russia, but sanctions can be viewed as an important factor in shaping the economic dynamics in Russia in the medium and long-term period.

What can be argued surely is that sanctions have reduced trade turnover between Russia and countries that supported sanctions. Looking specifically the impacts on EU countries, the declines in trade with Russia and the EU's reduced market share in Russia are to some extent continuations of long-term trends. Both Russia and the EU have close trade partnerships and both economies depend on each other. According to report provided by the Russian Institute for Strategic Studies, the main trade partners of Russia are the European Union countries, Asia-Pacific countries and Commonwealth of Independent States. As a result of 2014, Russia's trade with most countries that supported anti-Russian sanctions has declined markedly. For example, according to Federal Customs Service of Russia, trade turnover with Portugal fell by 41.2%, Greece-by 27.5%, Hungary-by 27.5%, United Kingdom-by 21.3%, Lithuania-by 20.5%, Poland fell by 17.6%, France-by 17.5%, Finland-by 14.7%, Italy-by 10%, Germany-by 6.5% (FCS, 2017). The trade volume between Russia and other countries that declared sanctions against Russia has also decreased. In particular, trade volumes with Canada decreased by 3%, with Japan by 7.3%, with Norway by 18.5%. The largest trading partner of the Russia was China in 2014, the turnover of which decreased by 1.5% to 88.4 billion U.S dollars, or about 11.3% of Russia's foreign trade turnover (FCS, 2017). According to Russia' Federal Custom Agency, China's share in Russia's foreign trade grew to 16.8%. In general, after sanctions, in 2015, goods with estimated cost 22.98 billion U.S dollars were imported to Russia, which is 36.9% less than in 2014 (FCS, 2017).

Regarding economic dimensions of sanctions, it is also important to mention energy issue, because sanctions were also applied against Russia's energy sector. There is common understanding amongst the European Union countries that it is "*unwise*" for EU side to declare a total energy embargo to Russia. The European Union countries largely depend on energy resources from Russia. According to the European Commission, the European countries import from Russia 67.5% and 74.2% of oil and gas resources respectively. Russian oil and gas companies account for 56.3% of European energy market (EC, 2017). In a short-term perspective, it will not be possible to provide energy resource supply to European countries from other regions, therefore from this point of view, Russia looks like a reliable partner (Cotella et al., 2016). In fact, many large energy European companies do not support the imposed sanctions against Russia, while the U.S. as the main initiator of sanctions against Russia, can declare an energy embargo and stop buying Russian oil (Aleem, 2017). It might be not so effective since U.S's oil consumption from Russia is only 5%. Furthermore, the U.S uses gas from Canada, and taking into account the shale gas revolution, the U.S is interested to minimise gas import from Russia to the EU (Boersma & Johnson, 2012). However, the transition to U.S. shale gas supplies requires considerable funds for development of port facilities, the creation of a tanker fleet, etc. The cost of shale gas from U.S is much more expensive than Russian pipeline gas (Spencer et al., 2014). As a response to the U.S and EU energy sanctions, Russia reorients the flow of energy resources to the markets of China, India, Japan, and Asia-Pacific market (Skalamera, 2016). In fact, Russia and China has already expanded its energy cooperation through current and future

energy projects such as gas pipeline “*Power of Siberia*” (from Russian Irkutsk and Yakutia gas production centres to North-Eastern China; export capacity: 38 billion cubic meters per year); gas pipeline “*Altai*” (from Western Siberia to North-Western China; export capacity: 30 billion cubic meters per year). In addition to oil pipeline “*Atasu- Alashankou*” (from Kazakhstan’s Caspian shore (in future from Iran) to Xinjiang in China), gas pipeline “*Caspian Sea-China*” (from Russia’s Caspian shore to China via Kazakhstan; export capacity: 55 billion cubic meters per year) (Karatayev & Clarke, 2014; Koshim et al., 2018).

As said before, applied sanctions aimed to ban the transfer of equipment for the development of deep-sea and Arctic shale oil and gas fields. Furthermore, the U.S. has applied targeted sanctions against largest oil corporations including Transneft, Novatek, and Rosneft. However, despite the sanctions regime, Russia keeps development of deep-sea and Arctic oil and gas projects in particular Liquefied Natural Gas (LNG). In fact, world consumption of LNG is currently growing at 10% per year, while the standard gas pipeline consumption demonstrates 2.4% of growth (IEA, 2017). According to International Energy Agency, the LNG share in world trade gas will be about 50-60% in 2030 (for comparison: it was 4.7% in 2015). The regions with the largest forecasted growth in LNG demand are the United States and the countries of South-East Asia, first of all China, Japan, South Korea, and India. The share of LNG in the total gas consumption is more than 25% in the U.S Japan is also largest LNG consumer in the Asia-Pacific region with imports up to 85% (45 bcm) of natural gas in liquefied form. There are two regasification of LNG terminals in operation in India with technical capacity of regasification about 9.2 billion m<sup>3</sup>. In European Union countries, there are 12 regasification of LNG terminals currently in operation and 6 terminals at the construction stage. The technical capacity of the regasification of LNG terminals is 74.02 billion m<sup>3</sup>. Total technical capacity of the LNG regasification terminals with planned projects in European Union is about 180 billion m<sup>3</sup>. According to the forecasts of the International Energy Agency, LNG imports to European Union countries increases six times by 2030, and total consumption gas grows by 80%. Russia as energy rich country clearly understands the opportunities that open LNG market. As stated in National Energy Security Strategy up to 2035, LNG production in deep-sea and Arctic area is the main priority for the development of the Russian gas industry. In 2012, two largest Russian energy companies Gazprom and Novatek announced that the development of LNG projects is one of the key priority areas of its activities and that the companies are embarking on a phased strategy to increase their presence in the global LNG market. Recently, in 2017, Vladimir Putin launched ambitious LNG project in Arctic sea area called “*Yamal LNG Project*”. “*Yamal LNG Project*”, first LNG plant in Russia belongs to four different companies including Russian company Novatek (50.1%), French Total (20%) and Chinese CNPC (20%), and Silk Road Fund (9.9%) (Rusmininfo, 2016). The cost of “*Yamal LNG Project*” was about 27 billion U.S. dollars. Currently, “*Yamal LNG Project*” delivers LNG to the UK, U.S., South Korea, Japan, China, as well as Mexico and India (Rusmininfo, 2016). The total volume of supplies amounted to approximately 3.45 billion m<sup>3</sup>. The resource potential on the Yamal Project for the LNG production is about 10 trillion m<sup>3</sup>. As said in Financial Times, “*Yamal LNG Project*” demonstrates that Russia can survive the sanctions regime (Rusmininfo, 2016).

In addition to “*Yamal LNG Project*”, Russia has developed the project “*Nord Stream 2*”. In addition to “*Gazprom*”, the French consortium “*Engie*”, the Austrian “*OMV*”, the German “*Uniper*” and the Dutch “*Shell*” and “*Wintershall*” has joined the international consortium of “*Nord Stream 2*” established on September 4, 2015 at the Eastern Economic Forum (RT, 2015). The “*Nord Stream 2*” is one of the main Russian project, aims to increase reliability and

diversification of export routes from Russian natural gas fields to European energy market. The gas pipeline passes directly from Russia (Vyborg region) to Germany and Austria along the Baltic Sea. The total length of the “*Nord Stream 2*” is 1224 km. The technical capacity of “*Nord Stream 2*” project is about 30 billion m<sup>3</sup> of gas per year. Apart from “*Nord Stream 2*” project, “*Gazprom*” is developing a project for the “*South Stream*” gas pipeline. The “*South Stream*” project involves the construction of a gas transmission system from Russia through the Black Sea to the countries of Southern and Central Europe. The capacity of the projected system is about 63 billion m<sup>3</sup> of gas per year. The total length of the “*South Stream*” project is more than 930 km. To date, only Bulgaria has suspended negotiations on this issue.

Furthermore, Russia has used its energy source as an instrument of political pressure in sanctions regime. In fact, Russia and the OPEC countries have agreed to reduce oil production by 1.8 million barrels per day until the end of 2018. In particular, Russia has agreed to cut production by 300000 barrels per day. However, the largest Russian oil company “*Gazprom Neft*” was against the agreement to reduce oil production because the launch of new projects is expected in Black Sea (in cooperation with Italian Eni Company) and in eastern Siberia (in cooperation with Chinese CNPC) in 2018. The position of “*Gazprom Neft*” can be explained the fact that current oil projects involve international investors, while another largest oil Russian company “*Rosneft*” postponed two projects (“*Yamal-Nenets*” and “*Krasnoyarsk*”) because company is 78% of state owned and does not depends on much international investors. The license for the development of the “*Yamal-Nenets*” project belongs to Russian company “*Tyumenneftegaz*”, which became part of “*Rosneft*” after the doubtful transaction of TNK-BP Holding in 2013 (BBC, 2013). The recoverable reserves of the field are 410 million tons of oil. It was planned that it will be launched in 2018 and by 2023 will produce 130000 barrels per day (6.4 million tons per year). “*Krasnoyarsk*” project, where oil reserves are estimated at 272 million tons of oil, the field is expected to be launched in 2019, and the oil production should be about 100000 barrels per day by 2020 (5 million tons per year). In comparison, the largest Rosneft’ project called “*Yuganskneftegaz*” produces about 60 million tons of oil per year. The whole “*Rosneft*” company produced 189.7 million tons of oil in 2016. As said by Arkady Dvorkovich, Deputy Prime Minister of Russian Federation, during the business lunch at the General OPEC meeting in Vienna, Russia is able to reduce its oil production not only because deal with OPEC countries, but also because the national growth of the economy “*is provided by the non-oil sector*” (OPEC newsletter, 2017). This statement has risen a lot of questions especially in terms of “*non-oil economic growth*”, however, this statement can be supported by international statistics confirming the fact that Russia has really reduced its oil production from 1.8 (in 2016) to 1.5 million barrels per day in 2017 (BP, 2017).

## CONCLUSION

There are three types of economic sanctions. The first restricts access to Western financial markets and services for designated Russian state-owned enterprises in the banking, energy, and defence sectors. The second places an embargo on exports to Russia of designated high-technology oil exploration and production equipment. The third is an embargo on exports to Russia of designated military and dual-use goods. In terms of macroeconomic effect, international sanctions blocked Russia’s access to the international financial markets. The combined effect of these sanctions and of the fall in oil prices in international markets caused significant downward pressure on the value of the Russian rouble and increased capital flight. Exports to Russia from the EU, the US and other countries participating in sanctions have

declined in recent years. The direct effect from sanctions on export decline was limited, however. The main factors behind this development were the contraction in demand in Russia and substantial depreciation of the ruble. As result of sanctions, investment activity is substantially reduced in Russia. A negative factor proving a decrease in investment activity in the country is that direct investments in the non-banking sector of Russia decreased by almost 65% in 2017 compared to 2014. With the increase in demand of credit institutions for foreign currency due to the need to repay foreign debts, the national currency has fallen against the U.S. dollar and the euro. The currency devaluation became one of the reasons for the weakening of the national currency. In such a situation, the risk of non-recurring foreign currency loans is growing, which could lead to the bankruptcy of even large enterprises. In connection with these negative phenomena in the medium-term period, according to some experts, the financial crisis in Russia is inevitable. Both reduction of oil prices at international markets and sanctions against Russia targeted key sectors of the economy, such as oil and gas and military sectors, have affected national economy of Russia, which is reflected in GDP fall, inflation growth, and the depreciation of the national currency. Since the political situation around Ukraine is at “*impasse phase*”, it should not be excluded the scenario of applying new sanctions against Russia. The European Union and U.S choose as a target industry, whose revenues largely depend on the filling of the state budget. Regarding energy sector, the sanctions regime have insignificant impact, as Russia continues to develop its energy projects, however, in long-term perspective, sanctions may jeopardize Russia’s oil and gas production volumes and the development of pipeline infrastructure, gradually squeezing the country out of foreign markets, limiting its export revenues, and undermining the stability of the Russian economy. The Russian economy, like decades ago, relies on oil and gas export, which leads to the economic instability. Russia has practically nothing to oppose to the EU countries in the war of economic sanctions. In the period of high hydrocarbon prices and good conditions on global raw markets, the opportunity to modernise the national economy was missed. As a response to the U.S. and EU energy sanctions, Russia reorients the flow of energy resources to the markets of China, India, Japan, and Asia-Pacific market. Furthermore, despite the sanctions regime, Russia keeps development of deep-sea and Arctic oil and gas projects in particular liquefied natural gas. In fact, Russia as energy rich country clearly understands the opportunity that opens LNG market. As stated in National Energy Security Strategy, LNG production in deep-sea and Arctic area is the main priority for the development of the Russian gas industry.

## REFERENCES

- Aleem, Z. (2017). Why Europe is so angry over the big Russia sanctions bill. Available at: [www.vox.com](http://www.vox.com)
- Baldwin, D.A., & Pape, R.A. (1998). Evaluating economic sanctions. *International Security*, 23(2), 189-198.
- Boersma, T., & Johnson, C. (2012). The shale gas revolution: US and EU policy and research agendas. *Review of Policy Research*, 29(4), 570-576.
- Clarke, L., Edmonds, J., Krey, V., Richels, R., Rose, S., & Tavoni, M. (2009). International climate policy architectures: Overview of the EMF 22 International Scenarios. *Energy Economics*, 31, S64-S81.
- Cotella, G., Crivello, S., & Karatayev, M. (2016). European Union energy policy evolutionary patterns, pp. 13-42. In *Low-carbon Energy Security from a European Perspective* (edited by Lombardi, P. & Gruenig, M.).
- Couzigou, I. (2016). The United Nations security council sanctions and international human rights. *ICL Journal*, 10(3), 277-311.
- Dobrynskaya, V., & Turkisch, E. (2010). Economic diversification and Dutch disease in Russia. *Post-Communist Economies*, 22(3), 283-302.
- Dreger, C., Kholodilin, K.A., Ulbricht, D., & Fidrmuc, J. (2016). Between the hammer and the anvil: The impact of economic sanctions and oil prices on Russia’s ruble. *Journal of Comparative Economics*, 44(2), 295-308.

- Dreyer, I., & Popescu, N. (2014). Do sanctions against Russia work? European Union Institute for Security Studies (EUISS) Brief, (35).
- Gurvich, E., & Prilepskiy, I. (2016). The impact of financial sanctions on the Russian economy. *Voprosy Ekonomiki*, 1.
- Hufbauer, G.C., Schott, J.J., & Elliott, K.A. (1990). *Economic sanctions reconsidered: History and current policy* (2<sup>nd</sup> ed.). Washington, DC: Peterson Institute for International Economics.
- International Energy Agency (2017). Global gas security review 2017. How is LNG Market Flexibility Evolving? Available at: <https://www.iea.org/publications>
- Karatayev, M., & Clarke, M.L. (2014). Current energy resources in Kazakhstan and the future potential of renewables: A review. *Energy Procedia*, 59, 97-104.
- Karatayev, M., & Clarke, M.L. (2016). A review of current energy systems and green energy potential in Kazakhstan. *Renewable and Sustainable Energy Reviews*, 55, 491-504.
- Karatayev, M., Hall, S., Kalyuzhnova, Y., & Clarke, M.L. (2016). Renewable energy technology uptake in Kazakhstan: Policy drivers and barriers in a transitional economy. *Renewable and Sustainable Energy Reviews*, 66, 120-136.
- Kern, A. (2009). *Economic sanctions: Law and public policy* (1<sup>st</sup> ed.). Springer.
- Klinova, M., & Sidorova, E. (2014). Economic sanctions and their impact on Russia's economic ties with the European Union. *Issues of Economics*, 201.
- Korotin, V., Dolgonosov, M., Popov, V., Korotina, O., & Korolkova, I. (2019). The Ukrainian crisis, economic sanctions, oil shock and commodity currency: Analysis based on EMD approach. *Research in International Business and Finance*, 48, 156-168.
- Koshim, A., Karatayev, M., Clarke, M.L., & Nock, W. (2018). Spatial assessment of the distribution and potential of bioenergy resources in Kazakhstan. *Advances in Geosciences*, 45, 217-225.
- Marinov, N. (2005). Do economic sanctions destabilize country leaders? *American Journal of Political Science*, 49(3), 564-576.
- Newnham, R. (2015). The Ukrainian crisis and western economic sanctions against Russia: Do they work or should they be strengthened? Cicero Foundation Great Debate Paper, 15-04.
- Panel, U.H.L. (2004). A more secure world: Our shared responsibility. *Terrorism*, 145(164), 41.
- Paternoster, R., Saltzman, L.E., Waldo, G.P., & Chiricos, T.G. (1983). Perceived risk and social control: Do sanctions really deter? *Law and Society Review*, 457-479.
- Rivotti, P., Karatayev, M., Mourão, Z.S., Shah, N., Clarke, M.L., & Konadu, D.D. (2019). Impact of future energy policy on water resources in Kazakhstan. *Energy Strategy Reviews*, 24, 261-267.
- Rusmininfo (2016). Novatek plans to maintain share of 20% on Russian market in 2017. Available at: <http://www.rusmininfo.com>
- Shirov, A.A., Yantovskii, A.A., & Potapenko, V.V. (2015). Evaluation of the potential effect of sanctions on the economic development of Russia and the European Union. *Studies on Russian Economic Development*, 26(4), 317-326.
- Simma, B., Mosler, H., Paulus, A., & Chaitidou, E. (2002). *The charter of the United Nations: A commentary*, 1. Oxford: Oxford University Press.
- Skalamera, M. (2016). Sino-Russian energy relations reversed: A new little brother. *Energy Strategy Reviews*, 13, 97-108.
- Spencer, T., Sartor, O., & Mathieu, M. (2014). Unconventional wisdom: An economic analysis of US shale gas and implications for the EU. *Studies*, 2, 14.
- Tuzova, Y., & Qayum, F. (2016). Global oil glut and sanctions: The impact on Putin's Russia. *Energy Policy*, 90, 140-151.