SERBIA'S APPROACH TO CHINA'S SILK ROAD:
OPPORTUNITIES AND RISKS

Miloš Todorović¹, Sanela Mrdaković²*

¹University of Niš, Faculty of Economics, Niš, Serbia
²PhD Student, University of Niš, Faculty of Economics, Niš, Serbia

Abstract

When China introduced the strategy for the new Silk Road in 2013, it had once again affirmed its position as a global leader and defined future direction in its foreign policy and economic development. As one of the most ambitious projects ever, once fully implemented, the new Silk Road will connect markets in Asia, Middle East, Africa and Europe, strengthen cooperation between countries and boost international trade flows.

This paper analyzes the importance of the new Silk Road for economies along its corridors, as well as the impact on Serbia’s economic development. It examines China’s investment model in Serbia, sectors with the largest volume of investment and the potential risks that developing countries could face through the implementation of BRI projects. The review also evaluates the attractiveness of the Serbian market and its role in the BRI vision in the Western Balkans. Preliminary research indicates that investments from China in recent years have had a positive impact on Serbia’s economic development. It is anticipated that further enhancement of investment relations between Serbia and China may have a wider impact not only on the realization of BRI goals in Serbia, but also in Europe, considering Serbia’s geographical position and the potential to bring Chinese companies closer to the EU market.

Key words: Silk Road, Belt and Road, China Serbia cooperation, 16+1, BRI.

ПРИСТУП СРБИЈЕ КИНЕСКОМ ПУТУ СВИЛЕ:
ШАНСЕ И РИЗИЦИ

Антрект

Када је 2013. године представила стратегију новог Пута свиле, Кина је још једном потврдила позицију глобалног лидера и дефинисала правце будућег еко-
номског и политичког деловања. Као један од најамбициознијих пројеката икада представљених у свету, када се у потпуности буде реализовао, Пут свиле повеза-

* Аутор за кореспонденцију: Санела Мрдаковић, Економски факултет у Нишу,
Трг краља Александра Њединитеља 11, 18000 Ниш, Србија
sanja_mrdakovic@hotmail.com

© 2021 by University of Niš, Serbia | Creative Commons License: CC BY-NC-ND
INTRODUCTION

The New Silk Road is one of the most complex and most ambitious projects ever implemented globally. While its principal objective is to strengthen the Chinese economy and its role in international economic and political affairs, one of the key characteristics of this project is the importance for the global economy, i.e. for economies of those countries that are located along its corridors. This paper examines the New Silk Road in terms of its strategy, geographical coverage, risks and impact on global economic flows, as well as on the economies of Western Balkan countries, i.e. the Republic of Serbia (“Serbia”), as one of the key Chinese partners in this initiative. The aim of this study is to establish how this initiative will be implemented in Serbia and to analyze the correlation between foreign direct investments (“FDI”) from China and Serbia’s GDP.

The research seeks to address the following research questions:

- To what extent the New Silk Road will affect the global economy and the development of countries along its corridors?
- Why is this Project particularly relevant for Serbia and how will it affect its economic development?
- What is China’s model of investment in Serbia and which industry sectors register the highest FDI inflows?
- What makes Serbian market particularly important for the New Silk Road, considering significantly higher volume of Chinese investments in Serbia, compared to other Western Balkan countries?

Preliminary analysis indicates that in 2019, in comparison to previous years, a significant inflow of foreign direct investments from China was recorded, whereby the New Silk Road could be considered as one of the key drivers of these investments.

Although every investment, irrespective of its origin, is important for economic growth, investments from China, especially in the post pan-
Serbia’s Approach to China’s Silk Road: Opportunities and Risks

The analysis conducted in this paper entails testing the following hypothesis:

- **H1:** Alongside infrastructure development, which will enhance connection with other regional markets, accession to this initiative will also increase exports of Serbian products to the Chinese market;

- **H2:** There is a strong linear relationship between FDI from China and Serbia’s GDP.

The analysis of the New Silk Road initiative and its importance for the global economy, and Serbian economy in particular, focuses on the review of available literature and the utilization of primarily secondary data sources. It examines papers published by international think tanks, organizations such as the World Bank, Economic Parliament and IBDR, as well as academic databases. The analysis of Silk Road projects and other Chinese investments in Serbia uses data from publicly available sources, such as the websites of the Serbian Ministry of Infrastructure, Construction and Transport and the Center for Strategic and International Studies. Statistical analysis of key macroeconomic and foreign trade indicators between Serbia and China relies on available sources from the Central Bank of Serbia and the World Bank databases. The main contribution of this study is in the analysis of Chinese investments in Serbia within the Silk Road initiative and the emphasis on key risks that countries along the Silk Road corridors could face by lending from Chinese banks, as well as on the analysis of the positive impact of these investments on their economies.

The **One Belt One Road** or **The New Silk Road** initiative was introduced by the Chinese government in 2013, with the aim of strengthening cooperation between countries in Asia, Africa, Middle East and Europe, by promoting investments in the field of infrastructure (roads, railways, ports), information and communication technologies, energy and other industry sectors. It is estimated that 2/3 of the world’s population lives along the Silk Road corridors (Ghossein et al., 2018, p.4). Currently, over 125 countries have joined this initiative (Raiser & Ruta, 2019); based on further MoUs with China, more countries are expected to join this project which, to a certain extent, represents an upgrade of the ancient Silk Road - once a network of trade routes that connected Asia and Europe. The idea of the Chinese government was to implement this project through six land economic corridors (The World Bank Group, 2019, p.3):

demic period, could be of crucial importance for the development of Serbia considering China’s economic strength and goals within the New Silk Road. One purpose of this study is to assess the correlation between foreign direct investments from China and Serbia’s GDP by means of correlation analysis.

The analysis of the New Silk Road initiative and its importance for the global economy, and Serbian economy in particular, focuses on the review of available literature and the utilization of primarily secondary data sources. It examines papers published by international think tanks, organizations such as the World Bank, Economic Parliament and IBDR, as well as academic databases. The analysis of Silk Road projects and other Chinese investments in Serbia uses data from publicly available sources, such as the websites of the Serbian Ministry of Infrastructure, Construction and Transport and the Center for Strategic and International Studies. Statistical analysis of key macroeconomic and foreign trade indicators between Serbia and China relies on available sources from the Central Bank of Serbia and the World Bank databases. The main contribution of this study is in the analysis of Chinese investments in Serbia within the Silk Road initiative and the emphasis on key risks that countries along the Silk Road corridors could face by lending from Chinese banks, as well as on the analysis of the positive impact of these investments on their economies.

The **One Belt One Road** or **The New Silk Road** initiative was introduced by the Chinese government in 2013, with the aim of strengthening cooperation between countries in Asia, Africa, Middle East and Europe, by promoting investments in the field of infrastructure (roads, railways, ports), information and communication technologies, energy and other industry sectors. It is estimated that 2/3 of the world's population lives along the Silk Road corridors (Ghossein et al., 2018, p.4). Currently, over 125 countries have joined this initiative (Raiser & Ruta, 2019); based on further MoUs with China, more countries are expected to join this project which, to a certain extent, represents an upgrade of the ancient Silk Road - once a network of trade routes that connected Asia and Europe. The idea of the Chinese government was to implement this project through six land economic corridors (The World Bank Group, 2019, p.3):
1. China - Mongolia - Russia;
2. New Eurasian land bridge;
3. China-Central Asia-West Asia;
4. China - Indochina Peninsula;
5. China - Pakistan;

The New Silk Road encompasses two main routes: the Silk Road Economic Belt and the New Maritime Silk Road. The first, land route, stretches from China, through Central and South Asia to Europe, while the maritime route begins in China, passes through Southeast Asia, Middle East, East and North Africa, to Europe, where both routes end (Figure 1).

**Figure 1. The New Silk Road**
*Source: The Italian Institute for International Political Studies (2017)*

**THE NEW SILK ROAD: OBJECTIVES, IMPACT ON GLOBAL ECONOMY, INVESTMENT VALUE AND ASSOCIATED RISKS**

**Objectives of the New Silk Road**

The New Silk Road aims to foster China's integration into global economic flows, its diplomatic relations with countries along the corridors, accelerate its economic growth and enable China to become a key player on the international economic and political scene. The Project intends to enhance cooperation between countries in Asia, Africa and Europe in five major areas: financial integration, labor exchange, infrastructure development, policy coordination and trade promotion through the removal of trade barriers (ISPI, 2017, pp.13-24). Aside from infrastructure development, the New Silk Road proposes the establishment of free
trade zones, technological and industrial parks and media cooperation (Hoffman, 2015). One of the objectives concerns the development of Chinese conglomerates that specialize in critical infrastructure, electricity, information and communication technologies (Rolland, 2017, p.104). The New Silk Road also focuses on advancements in science, cultural exchange in education, sport, tourism and other fields, and on the internationalization of the Chinese currency renminbi, which is increasingly being used in Chinese loans within the New Silk Road (ISPI, 2017, p.125).

The completion of Silk Road projects is expected to improve logistic channels and trade between China and Europe, enable balanced development within China (reduce development gaps in urban and rural areas), and create alternative routes for oil and gas supply from Central & Southeast Asia and Pakistan (Steer Davies Gleave, 2018, p.15). By means of available economic, technological and political resources, China aspires to create a stable environment for its long-term development and further expand export markets for its products. Countries in Europe, currently outside of the European Union could allow China to invest under less strict rules than those insisted on by the European Union in terms of environmental standards, anti-dumping measures and public tender rules (Barisitz & Radzyner, 2017, p.3).

Several EU member states have also expressed interest in joining this ambitious project, which could change the overall economic and geopolitical relations in the world. An interesting example is Italy, one of the founding members of the European Union, where sympathies towards China are growing in the post-pandemic period, and support for the EU membership is declining. China has already invested in several European ports - Piraeus, Rotterdam, Genoa, Valencia and Bilbao (and signed the MOU with the Port of Trieste), which could be of great importance for the development of the western part of the New Silk Road (NPR, 2018; Belt and Road News, 2019b).

The New Silk Road strategy focuses on several strategic priorities with a view to strengthen the Chinese economy and influence in international economic and political relations (Baker McKenzie, 2017, p.6):

- support the Go Global strategy (by promoting China as a global leader and enhancing cooperation with other countries in the world);
- increase export of Chinese products in markets along the corridors;
- modernize Chinese industry (by exposing Chinese companies to global markets, employing foreign labor and greater transparency);
- strengthen China’s geo-political role in Asia and Europe;
- reduce excess supply in Chinese industry (during the global financial crisis, the Chinese government prepared a package of measures to strengthen the economy which, among other things,
created huge surplus in many industry sectors, particularly in the steel industry (Cai, 2017, p.12));

- strengthen the role of renminbi in the world (by creating a network of offshore renminbi clearing centers) (Rolland, 2017, p.105).

Impact on the Global Economy and the Development of Countries along the Corridors

The New Silk Road transport corridors aim to promote the exchange of goods that will positively impact international trade, exports, foreign direct investments and the standard of living, but will, at the same time, present a challenge for underdeveloped and developing countries, considering huge capital investments needed for project implementation.

According to the World Bank (2019, p.5), the implementation of these projects is expected to reduce transportation costs by 12% and logistics time by 3%, with the most significant impact on the production of fresh food and other time-sensitive sectors. Also, it is estimated that international trade flows will increase by 2.8% - 9.7% in countries along the corridors and 1.7% - 6.2% in other countries, which may lead to an increase in real income in the world by 0.7% - 2.9%. Furthermore, it is expected that foreign direct investments will increase by 7.6% in low-income countries and 3.4% -7.5% in other economies along the corridors. The New Silk Road projects could improve standard of living and lift 39.6 million people out of extreme and moderate poverty in countries along the corridors.

Lastly, due to transportation cost decrease and infrastructure building, countries along the corridors may witness an increase in exports by about 10%.

The largest in terms of population, but also in terms of increasing purchasing power, the Chinese market will become more accessible to European and Asian producers. This is particularly important concerning the recession brought by the COVID-19 pandemic in 2020. Exports to China, but also imports from China accompanied by foreign direct investments, are a desirable scenario in the post-pandemic period.

Risks Associated with the New Silk Road

Implementation of large infrastructure projects is often associated with various economic and legal risks, due to the value of investments, length of loan repayment, source of financing and in less developed countries, due to insufficiently strong legal framework to safeguard against these risks. Silk Road projects are particularly vulnerable to these risks, given the level of economic development of certain countries along the corridors.
One of the main risks often highlighted in literature relates to debt sustainability, as several examples have shown that certain countries have been unable to repay their loans and had to subsequently apply measures contrary to the national interest.¹ Large infrastructure projects may also be exposed to corruption risks and abuse in public procurement. The corruption perception level varies from country to country along the corridors, depending on the strength of national institutions and legal regulations. Based on the Corruption Perceptions Index, it is estimated that the perception in countries along the corridors is higher than the world average, and the highest in countries with low and medium-low incomes (The World Bank Group, 2019, p.109). Therefore, it is necessary to ensure transparency in public procurement and continuous monitoring of all project phases. Some of the criticisms with regard to Chinese concessional loans for infrastructure projects relate to the incompatibility with EU norms and regulations on public tenders, non-transparency and non-disclosure of contractual elements, as well as insufficiently competitive bidding processes (Grieger, 2018, p.7). One of the risks lies in the fact that more than 60% of work on those projects is performed by Chinese companies (Ghossein et al, 2018, p.5), which discourages domestic companies and local labor. According to the World Bank analysis (2019, p.7), certain corridors pass through areas with the heightened risks of flooding, landslides, degradation and deforestation, and certain projects do not provide high standards of protection against carbon dioxide emissions, which increases environmental pollution risks.

Apart from the aforementioned risks for countries involved in Silk Road projects, there are certain risks that China itself and its investors are exposed to. Many Silk Road projects are executed in countries with insufficiently developed legal systems for investor protection and contractual rights, in countries with political and economic challenges and high indebtedness rates. China also faces risks related to economic viability of projects, that are financed by Chinese banks, and challenges in loan repayment by economically less developed countries often requiring renegotiation of contractual terms, deferred payment or conversion of debt into other forms of claims, which, due to the accumulation of non-performing loans, brings into question the financial sustainability and future financing of the New Silk Road (Asia Global Online, 2019). Given that infrastructure projects in Serbia are mainly financed by Chinese

---

¹ Due to debt repayment problems, Sri Lanka, for example, had to cede a strategically important port in the Indian Ocean to China as part of a loan repayment agreement (Abi-Habib, The New York Times, 2018). On the other hand, a project to finance the reconstruction of a highway in Montenegro that would connect the port of Bar with Serbia, per initial feasibility studies could not be justified due to insufficient traffic, and difficulties related to rising project costs, currency instability and insufficient hedging ultimately led to rising debt levels and issues in loan repayment (Barkin, & Vasovic, Reuters, 2018)
loans, due to the slow economic activity in 2020 caused by the current COVID-19 pandemic, as well as unprofitability of infrastructure projects until the last phase, Serbia may face challenges in repaying these loans and further projects execution.

The year of 2020 is marked by the COVID-19 pandemic and it is questionable how the pandemic will affect the implementation of the projects already initiated, as well as whether or not China will continue to focus on infrastructure projects or redirect to other sectors that may become more dominant in the post-pandemic period. The pandemic has greatly affected global economy and disrupted the movement of people, goods, capital and distribution channels. It is estimated that in the post-pandemic period, there will certainly be changes in the supply chain, project dynamics and possibly greater share of private capital in project financing, as China may face uncollectible claims due to loan repayment issues by certain governments (Baker McKenzie, 2020, pp.2-3). Another possible consequence of the pandemic relates to the distribution of material and equipment to project sites, as well as the future engagement of Chinese workers outside of China, considering travel restrictions and supply chain disruptions (Chazića, 2020).

Due to the slowdown in business activities, there may be some delays in issuing permits for new projects, too. Reduced economic activities and financial difficulties in debt servicing could jeopardize the economic viability of projects and lead to the possibility of China shifting to health and e-commerce projects in the coming period under two initiatives: Digital Silk Road and Health Silk Road, the former focusing on strengthening cooperation between countries in the field of digital technologies and the latter in the field of health (Pitlo, 2020). The nature of the pandemic has promoted the need to invest in Information and Communication Technologies, i.e. Artificial Intelligence, in order to effectively monitor the spread of the virus and enable business and private communication, but also the need to invest in the health sector due to challenges in treatment, procurement of medical equipment and drugs in virus suppression.

It is estimated that in the future, due to unsettled debts, China may either take ownership of certain Silk Road projects or simply write off debts in favor of its foreign policy goals (The Guardian, 2020). As far as Serbia is concerned, the consequences of the pandemic relate to project dynamics due to inability of Chinese workers and experts to visit Serbia as well as the transportation of equipment and materials from China. A significant decline in visits by Chinese tourists is expected in 2020, which will certainly affect the Serbian tourism sector.

Lastly, the Silk Road initiative is to be considered a long-term process that could be affected by circumstances currently unforeseeable, such as, for example, the pandemic. However, given that the realization of this project
would certainly change global geopolitical relations, one of the risks to consider are the activities of those global players who do not endorse China getting closer to Russia, Europe, Middle East and Africa. Hence this project is perceived as a recomposition of economic and political relations in the world. But it also touches upon the foundation of some of the oldest geopolitical theories, such as Halford Mackinder's "heart land" theory, whose postulates explain the outbreak of a number of war conflicts.

Investment Value and Financing Methods

The New Silk Road initiative is predominantly financed by the four largest Chinese state owned banks: Industrial & Commercial Bank of China (ICBC), China Construction Bank (CCB), Agricultural Bank of China (ABC) and Bank of China (BOC), two institutional banks: China Development Bank and Export Import Bank of China, and the Silk Road Fund (Belt & Road News, 2019a). Chinese loans to low-income countries are generally granted with an interest rate of 2%, grace period of 6 years, maturity of 20 years, and are based on inter-governmental agreements and issuance of government guarantees (The World Bank Group, 2019, p.98; Grieger, 2018, p.7).

The World Bank (2019, pp.37-38) estimates that the project value in 70 countries that have joined this initiative is about $575 billion in all sectors, planned or executed, most of which in the field of energy (46%) and transport & logistics (25%). It is estimated that 2/3 of these funds is intended to finance projects in East Asia and the Pacific (34%), Europe and Central Asia (25%).

THE NEW SILK ROAD IN SOUTHEAST EUROPE

The "16 + 1" Initiative

Notwithstanding the fact that Europe is the end point of both land and sea routes of the New Silk Road, not all countries in Europe are equally and strategically important for this project and on the radar of Chinese investors. The 16 + 1 framework was created in 2012 with the aim of connecting and strengthening cooperation between China and countries in Central, East and Southeast Europe. It includes 11 countries currently members of the European Union (Bulgaria, Poland, the Czech Republic, Romania, Croatia, Estonia, Hungary, Lithuania, Latvia, Slovenia and Slovakia) and 5 countries that are not (Serbia, Bosnia and Herzegovina, Northern Macedonia, Montenegro and Albania).
The 16 + 1 framework aims to strengthen trade relations between China and these countries, and accelerate their economic growth through investments in energy, transport, science, education, agriculture, tourism and culture. The dialogue usually involves a discussion at the state level, followed by negotiations at lower government levels, after which the financing negotiations take place, usually through China Development Bank or China EXIM Bank. Chinese banks often finance up to 85% of the project value and the rest is financed by countries that implement these projects (Dirlewanger-Lücke, 2018, pp.3-6).

Mediterranean countries are particularly important for the New Silk Road, specifically Greece, as the key point on the maritime corridor. One of the largest projects in Europe concerns the takeover of the Greek port of Piraeus by China Ocean Shipping Company (COSCO), through which China positions its products in Central and Southeast European markets (ISPI, 2017, pp.112-113). Since 2016, COSCO has been the majority shareholder in the port of Piraeus (67%), and today, this port is one of the most important routes and entry points for Chinese goods reaching the 16 markets, considering that the transportation time from China to Europe has decreased by about a week and a half. Within the 16 + 1 format, another also significant investment relates to the reconstruction of the Belgrade-Budapest railway, worth around USD 1.9 billion, contracted in 2013 and financed by the China’s EXIM Bank. It is expected that upon the completion of this project, the transportation time between the two cities will decrease from 8 to 2.4h (Barisitz & Radzyner, 2017, p.6).

The New Silk Road in the Western Balkans

In recent years, there has been an increase in investments from China and cultural exchange in the Western Balkans, due to an important role of this region in the implementation of Silk Road projects. The influx of Chinese investments in the Western Balkans has had a positive effect on economies that have long been stagnant, had high unemployment rates, numerous political challenges and underdeveloped infrastructure. The Western Balkans is considered an important entry point for Chinese products into the EU market as it lies at the crossroads of Southeast Europe, it is located on important river and road routes and an important transport corridor connecting the Mediterranean with Central Europe passes through its area.

Chinese loans with favorable terms allow Western Balkan countries to obtain the necessary funds to finance expensive and complex projects, diversify financing, revive economies and implement strategic, infrastructure projects without the need for the EU funds. However, the World Bank and the IMF warn that concessional loans approved by Chinese financial institutions could create great dependence on China in countries in Central and Southeast
Europe (Bastian, 2017a). This region is important for China as it provides political support concerning China’s international affairs and interesting investment opportunities (ISPI, 2017, p.111).

Since 2009, China has begun to considerably invest in the Western Balkans (the highest percentage of investments has been observed in Serbia), with the most significant investments in the field of construction/reconstruction of roads, railways, bridges and thermal power plants. Despite the fact that Chinese loans are of great importance for the region that seeks to attract foreign direct investments and accelerate economic growth, the potential inability to repay debts and the unprofitability of projects in the long run, as well as lower percentage of FDI compared to concessional loans, could create great financial dependence on China and debt overload (Bastian, 2017b, p.23).

Within the Western Balkans, the Balkan Silk Road refers to the route that connects the Greek port of Piraeus and Budapest, where containers with Chinese goods arriving in the port of Piraeus, via Northern Macedonia and Serbia, are transported to Hungary, i.e. the European Union market.

**Chinese Investments in Serbia**

Bilateral relations with the People's Republic of China were established in January 1955 and enhanced in 2009, when the countries signed the Strategic Partnership Agreement. China, as one of the four pillars of Serbian diplomacy (besides America, Russia and the EU), has a special position in Serbia's international relations; in recent years, there has been a significant increase in Chinese investments in Serbia, as a result of well-developed bilateral relations. The Strategic Partnership Agreement from 2009 resulted in a series of Memoranda of Cooperation and Agreements, in the fields of infrastructure, energy, culture, etc.

Chinese investments in Serbia are mainly focused on the metal and automotive industry, transport, mining and energy. In 2017, Bank of China opened a branch in Belgrade, with the aim of contributing to the realization of Silk Road projects in Serbia.

Chinese investments are particularly important for the Serbian economy, due to limited access to the EU funds for large infrastructure projects and also for the implementation of a set of economic development goals. However, China should not be considered as an alternative to the EU, but as a distinct strategic partner, since the EU is the key foreign trade partner of Serbia. According to the National Bank of Serbia, in 2019, the inflow of FDIs from the European Union accounted for 51.66% of the total FDI inflows, while the FDI inflows from China amounted to 5.5%. (NBS)
Likewise, the Serbian market provides certain benefits for the realization of Silk Road projects, due to its geographical position, the visa regime with China and connectivity, as it has free trade agreements with Russia, Belarus, Kazakhstan, EFTA, CEFTA and Turkey (Figure 2). By investing in the Serbian mining sector, China realizes the need for zinc and copper, required for the production of electric vehicles (New Energy Vehicle Sector-NEV), i.e. batteries for electric cars, trucks and buses (Bastian, 2019, p.16).

The key comparative advantages of Serbia for strengthening economic cooperation with China include (Dimitrijević, 2018, p.58):

- relative macroeconomic stability;
- stable banking sector;
- visa liberalization with China;
- highly qualified labor;
- developed telecommunication infrastructure.

Figure 2. Free Trade Agreements between Serbia and specific countries/organizations
Source: Development Agency of Serbia

In addition, Serbia has a favorable geographical position (it is located at the "crossroads of Europe"), provides the opportunity to operate within free zones (currently 15 active zones) and allows free access to the market of over 1.3 billion consumers through free trade agreements or the general preferential system (Development Agency of Serbia).
<table>
<thead>
<tr>
<th>Year</th>
<th>Project</th>
<th>Investor</th>
<th>Investment value</th>
<th>Sector</th>
<th>Source of financing</th>
</tr>
</thead>
<tbody>
<tr>
<td>2 2013</td>
<td>Corridor XI-Obrenovac-Ub, Lajkovac-Ljig</td>
<td>Shandong Hi Speed Group</td>
<td>334 mil. USD</td>
<td>transport</td>
<td>Loan-EXIM Bank China (301 mil.USD), Republic of Serbia (33 mil. USD)</td>
</tr>
<tr>
<td>3 2016</td>
<td>Belgrade bypass road, B (4.5.6)</td>
<td>Synohidro</td>
<td>225.6 mil. USD</td>
<td>transport</td>
<td>Loan-EXIM Bank China (85%), Republic of Serbia</td>
</tr>
<tr>
<td>4 2012 &amp; 2017</td>
<td>Thermal power plant Kostolac</td>
<td>China Machinery Engineering Corporation</td>
<td>I phase- 344 mil. USD II phase - 715 mil. USD</td>
<td>energy</td>
<td>Loan-EXIM Bank China (85%), Republic of Serbia (15%)</td>
</tr>
<tr>
<td>5 2010</td>
<td>Pupin’s Bridge</td>
<td>China Road and Bridge Corporation</td>
<td>255 mil. USD</td>
<td>transport</td>
<td>Loan-EXIM Bank China (85%), Republic of Serbia (15%)</td>
</tr>
<tr>
<td>6 2019</td>
<td>Industrial park Borca</td>
<td>China Road and Bridge Corporation</td>
<td>247 mil. USD</td>
<td>-</td>
<td>Loan-EXIM Bank China, China Development Bank, China Construction Bank</td>
</tr>
<tr>
<td>7 2019</td>
<td>Corridor XI - New Belgrade-Surcin</td>
<td>China Communication Construction Company</td>
<td>70.5 mil. USD</td>
<td>transport</td>
<td>Loan-EXIM Bank China, Republic of Serbia</td>
</tr>
<tr>
<td>8 2016</td>
<td>Corridor XI-Surcin-Obrenovac</td>
<td>China Communication Construction Company</td>
<td>233.7 mil. USD</td>
<td>transport</td>
<td>Loan-EXIM Bank China, Republic of Serbia</td>
</tr>
<tr>
<td>9 2017</td>
<td>Corridor XI - Preljina-Požega</td>
<td>China Communication Construction Company</td>
<td>450 mil. USD</td>
<td>transport</td>
<td>Loan-EXIM Bank China, Republic of Serbia</td>
</tr>
<tr>
<td>10 2016</td>
<td>Steel Mill Smederevo (Železara Smederevo)</td>
<td>HBIS Group</td>
<td>46 mil. USD</td>
<td>Metal industry</td>
<td>investment</td>
</tr>
<tr>
<td>11 2019</td>
<td>Tyre factory, Zrenjanin</td>
<td>Shandong Linglong Tire Co Ltd</td>
<td>994 mil. USD</td>
<td>Tyre industry</td>
<td>investment</td>
</tr>
<tr>
<td>12 2015</td>
<td>Memory foam factory Ruma</td>
<td>HealthCare Europe</td>
<td>54 mil. USD</td>
<td>Textile industry</td>
<td>investment</td>
</tr>
<tr>
<td>13 2016 &amp; 2019</td>
<td>Car components factory Obrenovac</td>
<td>Mei Ta</td>
<td>160 mil. USD</td>
<td>Auto industry</td>
<td>investment</td>
</tr>
<tr>
<td>14 2018</td>
<td>RTB Bor</td>
<td>Zijin Mining Group Company Limited</td>
<td>1, 26 mrd USD</td>
<td>Mining</td>
<td>investment</td>
</tr>
<tr>
<td>15 2019</td>
<td>Car components factory Loznica</td>
<td>MADO Automotive Europe</td>
<td>105 mil. USD</td>
<td>Auto industry</td>
<td>investment</td>
</tr>
<tr>
<td>16 2016</td>
<td>Socks manufacturing factory Cuprija</td>
<td>Eurofiber</td>
<td>1,05 mil. USD</td>
<td>Garment industry</td>
<td>investment</td>
</tr>
<tr>
<td>17 2019</td>
<td>Automotive interiors factory</td>
<td>Yanfeng Automotive Interiors</td>
<td>n/a</td>
<td>Auto industry</td>
<td>investment</td>
</tr>
</tbody>
</table>

Figure 3: The most prominent projects funded by the People’s Republic of China for the period of 2010-2019. Sources: Ministry of Construction, Transport and Infrastructure of the Republic of Serbia, Center for Strategic and International Studies and Serbian newspapers.
Figure 3 illustrates some of the most prominent projects with China, by value or strategic importance. Although it does not include all projects financed by China, and indicated investment values represent only initial or planned, but not necessarily final values, total investments for the period 2010-2019 exceeded USD 6.8 billion, majority of which were financed by Chinese banking loans for infrastructure projects.

**FOREIGN TRADE EXCHANGE WITH CHINA AND CORRELATION BETWEEN FDI FROM CHINA AND SERBIA’S GDP**

Since 2009, when Serbia and China signed the Strategic Partnership Agreement, there has been an increase in the volume of trade between the two countries. In 2019, compared to 2009, total import of goods from China doubled, and China is now Serbia’s third largest import partner. During the same period, exports of Serbian products to the Chinese market increased from 9 to 329 million dollars. As illustrated in Figures 4 & 5, trade balance records a significant trade deficit, which has doubled since 2009.

![Figure 4. Foreign trade exchange between Serbia and China between 2009-2019 (USD) Source: UN Comtrade Database](image)

![Figure 5. Foreign trade exchange between Serbia and China between 2009-2019 (USD) Source: UN Comtrade Database](image)

In the last three years, the most prominent export products to China were: wood, electronic equipment and electrical appliances, nuclear reactors, and copper and copper products. In 2019, copper and copper product export reached USD 263.5 million. Compared to the previous
year, when copper exports amounted to USD 23.6 million, a significant increase in export value could be attributed to the takeover of "RTB Bor" by the Chinese Zijin Mining Group in 2018. When it comes to imports, in the last three years, electronic equipment and electrical devices were the most prominent import goods from China, worth around USD 1.57 billion (Figure 6).

<table>
<thead>
<tr>
<th>Year</th>
<th>Export</th>
<th>Value (mil. USD)</th>
<th>Import</th>
<th>Value (mil. USD)</th>
</tr>
</thead>
<tbody>
<tr>
<td>2017</td>
<td>wood and articles of wood</td>
<td>24.9</td>
<td>electrical, electronic equipment</td>
<td>424.7</td>
</tr>
<tr>
<td></td>
<td>nuclear reactors, machinery</td>
<td>18.7</td>
<td>other commodities</td>
<td>334.5</td>
</tr>
<tr>
<td></td>
<td>electrical, electronic equipment</td>
<td>7.5</td>
<td>nuclear reactors, machinery</td>
<td>305.5</td>
</tr>
<tr>
<td>2018</td>
<td>wood and articles of wood</td>
<td>30</td>
<td>electrical, electronic equipment</td>
<td>532.6</td>
</tr>
<tr>
<td></td>
<td>copper and articles thereof</td>
<td>23.6</td>
<td>nuclear reactors, machinery</td>
<td>350.7</td>
</tr>
<tr>
<td></td>
<td>nuclear reactors, machinery</td>
<td>16.3</td>
<td>other commodities</td>
<td>323.6</td>
</tr>
<tr>
<td>2019</td>
<td>copper and articles thereof</td>
<td>263.5</td>
<td>electrical, electronic equipment</td>
<td>612.3</td>
</tr>
<tr>
<td></td>
<td>wood and articles of wood</td>
<td>25.4</td>
<td>nuclear reactors, machinery</td>
<td>426.6</td>
</tr>
<tr>
<td></td>
<td>nuclear reactors, machinery</td>
<td>11</td>
<td>other commodities</td>
<td>397.9</td>
</tr>
</tbody>
</table>

Figure 6. Overview of the key import and export commodities to/from China between 2017-2019.
Source: UN Comtrade Database

Analysis of the Relationship between Foreign Direct Investment from China and Serbia’s GDP

Despite relatively modest foreign direct investments from China compared to Serbia’s total FDI inflows, a significant increase in FDIs from China has been observed for the past five years, with the most significant increase in the past two years, which could be attributed to the growing volume of investments within the New Silk Road initiative (Figures 7 & 8). Foreign direct investments, in general, have positive effects on economies, as they stimulate production and exports, and in the case of Serbia, some of the examples of these effects relate to Chinese investments in “Zelezara Smederevo”, which is currently Serbia’s largest exporter, and "RTB Bor", which is among the top 10 Serbian exporters.
Figure 7. Overview of total FDI inflows in Serbia between 2010-2019 and FDI inflows from China (in million EUR)
Source: NBS

<table>
<thead>
<tr>
<th>Year</th>
<th>FDI from China (mil. EUR)</th>
<th>GDP (mil. EUR)</th>
<th>XY</th>
<th>$x^2$</th>
<th>$Y^2$</th>
</tr>
</thead>
<tbody>
<tr>
<td>2010</td>
<td>2.0</td>
<td>31,545.8</td>
<td>61,091.7</td>
<td>4.9</td>
<td>995,140,135.5</td>
</tr>
<tr>
<td>2011</td>
<td>6.0</td>
<td>35,431.7</td>
<td>212,590.1</td>
<td>36.0</td>
<td>1,255,403,760.0</td>
</tr>
<tr>
<td>2012</td>
<td>1.0</td>
<td>33,679.3</td>
<td>33,679.3</td>
<td>1.0</td>
<td>1,134,292,975.6</td>
</tr>
<tr>
<td>2013</td>
<td>-0.4</td>
<td>36,426.7</td>
<td>-14,570.7</td>
<td>0.2</td>
<td>1,328,902,720.0</td>
</tr>
<tr>
<td>2014</td>
<td>82.5</td>
<td>35,467.5</td>
<td>2,926,067.3</td>
<td>6,806.5</td>
<td>1,257,942,291.5</td>
</tr>
<tr>
<td>2015</td>
<td>24.1</td>
<td>35,715.5</td>
<td>860,744.7</td>
<td>580.8</td>
<td>1,275,600,358.3</td>
</tr>
<tr>
<td>2016</td>
<td>69.5</td>
<td>36,723.1</td>
<td>2,552,372.2</td>
<td>4,830.3</td>
<td>1,341,582,633.6</td>
</tr>
<tr>
<td>2017</td>
<td>103.5</td>
<td>39,183.3</td>
<td>4,055,468.0</td>
<td>10,712.5</td>
<td>1,553,328,330.9</td>
</tr>
<tr>
<td>2018</td>
<td>191.8</td>
<td>42,855.5</td>
<td>8,219,683.5</td>
<td>36,787.2</td>
<td>1,836,593,260.0</td>
</tr>
<tr>
<td>2019</td>
<td>210.1</td>
<td>45,908.0</td>
<td>9,645,265.4</td>
<td>44,142.0</td>
<td>2,107,542,082.8</td>
</tr>
<tr>
<td>Σ</td>
<td>699.1</td>
<td>372,936.3</td>
<td>28,554,271.4</td>
<td>103,900.0</td>
<td>14,073,328,545.4</td>
</tr>
</tbody>
</table>

Figure 7. Total FDI inflows in 2009-2018, in billions of dollars
Source: World Bank

For the purpose of analyzing the interdependence of FDI from China and Serbia’s GDP, we herein apply correlation analysis for the period of 2010 - 2019 (n = 10), using values of FDI from China and Serbia’s GDP for the past 10 years (Figure 9). Correlation analysis evaluates the direction and strength of the relationship between two attributes (bivariate analysis).

Figure 9. FDI inflows from China and Serbia’s GDP between 2010-2019.
Source: NBS / Trading Economics
The correlation coefficient \( r \) reveals the strength of the linear relationship between \( X \) and \( Y \). In our case, \( r \) is calculated as follows:

\[
r = \frac{n \sum xy - \sum x \sum y}{\sqrt{10^6 \times 8^2} - (4^2)^2} = \frac{10^6 \times 8^2 - (4^2)^2}{\sqrt{10^6 \times 8^2} - (4^2)^2} = 0.924
\]

The value of 0.924 indicates a very high, positive correlation between \( X \) and \( Y \). The coefficient of determination \( r^2 = 0.854 \) reveals that 85% of the GDP variability is explained by FDI variations. Linear correlation testing showed that the calculated p-value was less than the significance level (\( \alpha = 0.05 \)). It can be concluded that there is a significant linear relationship between FDI from China and Serbia’s GDP since the correlation coefficient is significantly different from zero.

**CONCLUSION**

The Silk Road strategy is designed to promote China’s long-term, balanced development, expand export markets for its products, and strengthen China’s geopolitical role in Asia and Europe. It is estimated that the New Silk Road will have a positive impact on the global economy, increase exports in countries along the corridors by 10% and FDI by 7.5%, and reduce transportation costs by 12%.

Despite multiple positive aspects, certain risks must be carefully weighed so that Silk Road projects could have a positive impact on economies and standard of living. In an effort to accelerate economic growth and revive stagnant economies, many underdeveloped countries could face serious debt repayment problems, which are usually structured in the form of loans from Chinese banks, which could lead to over-dependence on China. No less important is the risk of corruption, to which infrastructure projects are particularly vulnerable and sensitive, and to which less developed countries and countries without a strong legal mechanism for protection against this type of risk could eventually face.

Some countries along the Silk Road corridors face high levels of external debt, political and economic challenges, and many do not have strong legal framework for investor protection and contractual rights, which poses a great risk to China itself, i.e. Chinese lending banks and Chinese investors. Difficulties in loan repayments especially after the pandemic, could cause an increase in non-performing loans, the renegotiation of contractual terms, deferral of payments or even debt write-offs. Due to the risk of unprofitability of infrastructure projects which usually require huge capital investments, and inability to finalize them in countries severely affected by the pandemic, China could focus on projects in the field of health and information and communication technologies, as they become vital in the post pandemic period. The pandemic will
also instigate changes in the supply chain, project dynamics, distribution of materials and equipment and engagement of Chinese workers outside China, due to travel restrictions and supply chain disruptions.

Within the New Silk Road initiative, the 16 + 1 format is particularly important since it promotes the cooperation between China and 16 countries in Central, East and Southeast Europe. Serbia among others. Chinese investments are of great importance for the Serbian economy, as they promote faster economic growth and diversification of financing. Chinese projects in Serbia are mainly focused on infrastructure, transport, mining and energy, metal and automobile industry, whereby infrastructure projects are primarily funded through Chinese banking loans. Likewise, the Serbian market is also important for the New Silk Road, due to its geographical position, the visa regime, the connection with the EU market and numerous free trade arrangements. Over the past three years, the volume of foreign direct investments from China has doubled, and in order to ensure stable economic development, it is critical to direct efforts towards attracting Chinese FDI and limit borrowing for infrastructure projects, in order to prevent excessive financial dependence on China.

REFERENCES


Serbia's Approach to China's Silk Road: Opportunities and Risks


UN Comtrade Database, available at: https://comtrade.un.org/data/, (accessed: 18.03.2020.)

ПРИСТУП СРБИЈЕ КИНЕСКОМ ПУТУ СВИЛЕ: ШАНСЕ И РИЗИЦИ

Милош Тодоровић1, Санела Мрдаковић2

1Универзитет у Нишу, Економски факултет, Ниш, Србија
2Студент докторских студија, Универзитет у Нишу, Економски факултет, Ниш, Србија

Резиме

Када је 2013. године представила стратегију новог Пута свиле, Кина је још једном потврдила позицију глобалног лидера и дефинисала правце будућег економског и политичког деловања. Као један од најамбициознијих пројеката икада представљених у свету, када се у потпуности буде реализовао, Пут свиле повезаће тржишта Азије, Блиског истока, Африке и Европе, ојача економску сарадњу између земаља и интензивираће међународне трgovинске токове. Овај рад анализира значај Пута свиле за економије земаља дуж коридора, као и значај за економски развој Републике Србије. Помоћу финансијских средстава из Кине, Србија спровodi кључне инфраструктурне пројекте који ће допринети бољој повезаности са осталим тржиштима у Европи. Из године у годину, Србија све више привлачи инвестиције из Кине које су усмерене на развој компанија из области енергетике, металне индустрије и других индустријских грана. Истраживање њиховог утицаја на екonomску ситуацију у Србији, секторе у којима се бежели највећи прилив инвестиција, њихов утицај на извознице, економску сарадњу између земаља и потенцијални ризици који могу утицати на економску стабилност, може се брзо исказати на примеру реализације пројеката Пута свиле. Прелиминарна истраживања показују да су инвестиције из Кине последњих година имале позитиван утицај на привредни развој Србије, јер се оцењено доводе ће у земаљу повећање сукупног броја најзначајнијих инвестиција у Кину које су усмерене на развој компанија из области енергетике, металне индустрије и других индустријских грана. Истраживање њиховог утицаја на екonomску ситуацију у Србији, секторе у којима се бежели највећи прилив инвестиција, њихов утицај на извознице, економску сарадњу између земаља и потенцијални ризици који могу утицати на економску стабилност, може се брзо исказати на примеру реализације пројеката Пута свиле.