

## Research Article

# The Role of Green Sukuk (Islamic Bonds/ Shariah-Compliant Bonds) in Enhancing Indonesia Economic Development Strategy in The New Normal Era

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**Abstract.**

This study aims to determine the significance of Green Sukuk in enhancing Indonesia's economic development strategy in the new normal era. - The method employed was quantitative with forecasting. Furthermore, the researchers employed the least squares quantitative and historical analogy qualitative techniques. The study's findings indicate Green Sukuk's role in boosting Indonesia's economic development plan in the new normal era. The implications of the study are likely to add to the body of knowledge linked to the function of Green Sukuk in enhancing Indonesia's economic growth strategy in the new normal era. Increasing the number of issuances and contributions of State Sukuk (Islamic bonds/ shariah-compliant bonds) to APBN funding, with an annual average of roughly 30% of total Government Securities (SBN) financing. To the best of the researchers' knowledge, this is one of the first attempts to empirically study the function of Sukuk in boosting Indonesia's economic development strategy in the new normal era.

**Keywords:** Green Sukuk, Development Strategy, Indonesian Economy, and the New Normal Era

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## 1. Introduction

The evolution of instruments in financial institutions is intimately tied to the financial system [1]. Sharia-based finance is now widely accepted worldwide and has emerged as the preferred option for markets requiring sharia transactions. Sukuk is structured similarly to conventional bonds, allowing domestic and global commercial entities to raise cash via Islamic capital markets following Islamic precepts [2]. Sharia-based transactions and investments are developing quickly in the Middle East and Southeast Asia. In addition, global Islamic financial infrastructure institutions such as the Islamic Development Bank

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(IDP), International Financial Service Board (IFSB), Accounting and Auditing Organization for Islamic Institutions (AAOIFI), International Islamic Financial Market (IIFM), Islamic Research and Training Institute (IRTI), and others have been established [3].

Malaysia, Bahrain, Brunei Darussalam, the United Arab Emirates, Qatar, Pakistan, and the State of Saxony Anhalt-Germany are among the countries that regularly issue Sukuk. According to Marwan and Ali (2015), the project's performance determines the return on the SRI Sukuk instrument. SRI Sukuk requires the publishing of full project and profit details. However, even if the project is a success, Sukuk holders will not collect their funds [4]. Furthermore, Sukuk can be utilized for cash-mismatch financing, specifically through the use of short-term Sukuk (*Islamic Treasury Bills*), which can also be used as money market instruments [5].

It is time for Indonesia, as a Sukuk issuing country, to use this instrument to promote Indonesia's role in helping to create a more pleasant planet. Sukuk, a financial instrument comparable to bonds (bonds), can be used to fund programs to prevent global warming and its consequences [6].

The issue of this sovereign Green Sukuk demonstrates Indonesia's commitment to fostering sustainable and Green finance that supports resilience efforts in the face of global climate change. The emergence of Green Sukuk has recently seen a variety of problems identified and government measures to accelerate its growth [7]. Given that the global capital market was severely influenced by numerous circumstances in 2018, including the modernization of economic growth and geopolitical problems, the issue of sovereign Green Sukuk deserves praise. The United States announced tariffs on steel and aluminum imports, in particular, weighed substantially on market activity. Furthermore, the Fed's interest rate hike increased the level of liquidity. Oil prices have also been volatile from the beginning of 2018 before plummeting in the fourth quarter. This uncertainty, however, does not preclude the Indonesian Sharia capital market from participating in the global arena.

The government's Green Sukuk, which is hailed as one of Indonesia's achievements in 2018, needs to be revisited; this time, the focus should be on reviewing the proportion of foreign investors versus domestic investors, as foreign investors have dominated Green Sukuk since the first Green Sukuk was issued.

Indonesia had the highest issuance of state Sukuk, with a total issuance of USD 10.15 billion. Meanwhile, it should be emphasized that South Africa is the smallest country in terms of Sukuk issuance [8]. With so many issuances, this is a positive indicator for Islamic finance in the country. Sukuk is a rising instrument, but its sharia status is still contested. Many academics continue to question the practice of Sukuk, which has

risen fast both at home and abroad [9]. Sukuk are sometimes confused with traditional bonds, despite the two securities having significant distinctions. Bonds, in general, are debt-based securities, and the owner's profit is derived from the agreed-upon interest rate.

Meanwhile, Sukuk is evidence of ownership of tangible goods, as well as the use of utilization rights and services.

Furthermore, the most evident distinction is that Sukuk is subject to Islamic sharia norms prohibiting interest income [10]. Aside from questioning the practice of Sukuk, some people confuse it with stocks, despite noting that the main word that distinguishes Sukuk from shares is ownership. When discussing Sukuk, there is an ownership period, whereas there is none when discussing shares [11].

## 2. Literature Review

The government's issuing of Green Sukuk is largely identical to other State Sukuk because most revenues are now used for infrastructure finance. The only requirement is that the infrastructure employed as the basis for issuance (*underlying assets*) meet the Green infrastructure requirements [12]. The construction of reservoirs, irrigation, and hydropower has the potential to be classified as Green infrastructure because it supports the efficient use of water (sustainable water management), reduces the use of groundwater for agriculture, and increases the use of non-fossil renewable energy [13]. The proceeds from the sale of Green Sukuk will be used to finance initiatives in the Green category. According to the government's general guidelines, Green projects include energy efficiency and renewable energy, Green building, Green tourism, disaster risk reduction, sustainable transport, waste to energy and waste management, sustainable management of natural resources, and sustainable agriculture [14].

According to Lincoln Arsyad (2010: 11), before the 1960s, economic development was characterized by the capacity of the national economy to increase and maintain its GNP growth rate of 5 to 7 percent or more per year when its economic condition was initially relatively static for a long enough period [18]. This definition is fairly brief. However, the concept of economic development evolved due to the practice in the 1950s and 1960s, which demonstrated that development centered on GNP (Gross National Product) expansion alone would not be able to tackle basic development concerns [19]. This may be observed in most people's level and quality of life, who have not improved despite the achievement of the annual GNP growth target. In other words, there are indications of a severe error in strictly understanding the phrase economic progress

[20]. As a result, Todaro and Smith (2003), as quoted in Lincoln Arsyad (2010: 11), state that three main values indicate the success of a country's economic development: (1) the development of the community's ability to meet its basic needs (sustenance), (2) an increased sense of self-esteem of society as human beings, and (3) an increase in people's ability to choose (freedom from servitude), which is one of the human rights. These core principles are in line with Amartya Sen (1999:3), winner of the 1998 Nobel Prize in Economics, that "Development can be seen, it is argued here, as a process of expanding the real freedoms that people enjoy."

Economic development [21] is defined as more than merely how to raise GNP per year. Economic development is multifaceted, including many facets of people's lives rather than just one (economic) aspect. Economic development may be described as any effort undertaken by a country to improve economic activities and the standard of living of its citizens. Given these constraints, economic growth generally can be described as a long-term increase in the real per capita income of a country's population accompanied by changes in the institutional structure [22].

Regional economic development, according to Lincoln Arsyad (2010; 374), is a process of local government and society managing existing resources and forming a pattern of a partnership between local government and the private sector to create new jobs and stimulate the development of economic activity (economic growth) in the region. The fundamental issue in regional development is the emphasis on development policies based on the region's distinctive characteristics (endogenous development) through utilizing the potential of local people resources, institutions, and physical resources (regions) [23]. This perspective directs us to make regional efforts in the development process to create new job possibilities and stimulate economic activity [24].

Regional economic development is a process that includes the establishment of new institutions, the development of alternative industries, the expansion of existing workforce capacity to produce better products and services, the identification of new markets and scientific expertise, and the establishment of new businesses [25]. Every regional development effort aims to increase the amount and variety of work possibilities for residents. Local governments and communities must collaborate on regional development efforts to attain these objectives. As a result, the local government, in collaboration with the community and using current resources, must analyze the potential resources required to create and grow the regional economy [21].

### 3. Methods

The method employed was quantitative with forecasting. Furthermore, the researchers employed the least squares quantitative technique and historical analogy qualitative technique to determine the potential of Green Sukuk in boosting Indonesia's economic development plan in the new normal era. Data on 2008-2018 State Sukuk issuance, 2007-2018 Green bond issuance, distribution of 2009-2018 SNI investors, Sukuk investors in the domestic market, and the contribution of State Sukuk to development are used to project the Green Sukuk market. This study employs a descriptive strategy, which means that all quantitative data will be presented in detail to provide a full research result.

### 4. Result and Discussion

#### 4.1. The Potential of Green Sukuk Market of the Republik of Indonesia

According to Suherman and Manzilati's (2015) analysis, the investor potential for Green Sukuk is very high. Every year, the number of State Sukuk investors grows dramatically. Regardless of religious affiliation, this State Sukuk includes both Sharia and mainstream investors. In 2019, Indonesia issued Green Sukuk with serial number ST006 intending to attract 2,908 new investors, 56% of whom are millennials [22]. Retail Green Sukuk are also issued on sharia criteria and will likely appeal to Muslim investors. The Green concept presented by retail Green Sukuk is also a distinctive appeal during the frenetic issue of climate change, where investors with special preferences will, of course, welcome the issuing of retail Green Sukuk [26].

In 2020 Indonesia will again issue Global Sukuk on the international market with a US Dollar denomination in the format -144A/Reg S Trust Certificate of USD2.5 billion with a 5-year tenor of USD 750 million, 10 years of USD 1 billion, and a 30-year tenor of USD 750 million with a Wakalah agreement. This Global Sukuk is issued by the Indonesian SBSN Issuing Company III, a legal organization established by the Government of the Republic of Indonesia solely to issue SBSN [27].

#### 4.2. Development of State Sukuk Issuance

The issuing of Indonesia's first Green Sukuk on the global market was well appreciated. It is clear from the fact that the number of requests is 2.4 times the number of issuances.

The second Green Sukuk issuance on the global market was also very successful, with requests reaching 3.8 times the number of issuances [28]. Following the success of these two issuances, the government innovated once more by releasing Indonesia's first retail Green Sukuk in November 2019. According to data from the Ministry of Finance's Directorate General of Financing and Risk Management, the number of State Sukuk issued from 2019 to January 16, 2020, reached IDR 1,230.44 trillion, with an outstanding of IDR 738.37 trillion [29].

The evolution of State Sukuk and its contribution to the APBN is detailed below [30];

1. Increasing the number of issuances and the participation of State Sukuk in APBN financing, with an annual average of roughly 30% of total Government Securities (SBN) financing. The total accumulated issuance of State Sukuk until October 2018 was IDR 950 trillion (USD 63 billion), with IDR 657 trillion outstanding as of October 25, 2018;
2. Since 2013, allocated State Sukuk for project finance, known as Project Financing Sukuk, has been produced (Project Sukuk). Between 2013 and 2018, the overall allocation for Project Sukuk reached IDR 62.4 trillion, which was distributed across 34 provinces. Projects financed through Project Sukuk include the construction of roads and bridges, construction of railroads, construction of water resources projects (dams, irrigation, supply and management of groundwater), construction and development of lecture buildings, development and revitalization of pilgrimage dormitories, construction and rehabilitation Office of Religious Affairs and Hajj, construction of National Parks (Baluran, Mount Gede Pangrango, Aketajawe-Lolobata/Halmahera), construction and development of madrasas, and construction and development of laboratories [31].
3. Since 2009, the Indonesian government has issued State Sukuk to individual Indonesian citizens as an effective financial inclusion instrument. Over a ten-year period, the total issuance of Retail Sukuk reached IDR 144.7 trillion, with 243,364 investors. Furthermore, the total amount of Sukuk Savings issued was IDR 2.6 trillion, with 11,338 investors and an average nominal investment of IDR 228 million per investor;
4. Since 2009, Indonesia has been the largest international sovereign Sukuk issuer thanks to the regular issuance of Global Sukuk. In 2018, Indonesia became the first country in the world to issue Sovereign Green Sukuk. This indicates Indonesia's commitment to and participation in the development of domestic and international Islamic financial markets;

5. State Sukuk have also received recognition and awards from a variety of sources, including Alpha Southeast Asia, The Asset, Finance Asia, Credit Magazine, Asia Money, IFR Asia, Islamic Finance News, Euromoney Islamic Finance Awards, and Global Islamic Finance Awards, as well as 29 international standard awards from various institutions. In September 2018, State Sukuk received the Global Capital/Euromoney award for “Asia Pacific Green/SRI Bond Deal of the Year.”

### 4.3. The Development of Green Bond Issuance

The World Bank initially announced the creation of the Green Bond concept in 2008 as part of the “Strategic Framework for Development and Climate Change.” This concept also responds to the growing demand from investors seeking to invest in financial products tied to global climate change and environmental action. GB is being utilized to acquire capital from investors to support the World Bank program in projects that meet the standards [25].

GB investment projects are divided into two categories: those aimed at mitigating the effects of climate change and those aimed at adapting to existing climate change. Climate change mitigation projects include boosting the efficiency of mass transportation and replacing fuel, lowering carbon through reforestation and deforestation, waste management, the construction of energy-efficient buildings, solar and wind installations, and so on [32]. At the same time, programs listed as climate change adaptation include flood prevention (including reforestation and watershed management), boosting food security, and developing agricultural and forest management methods that reduce deforestation rates [33].

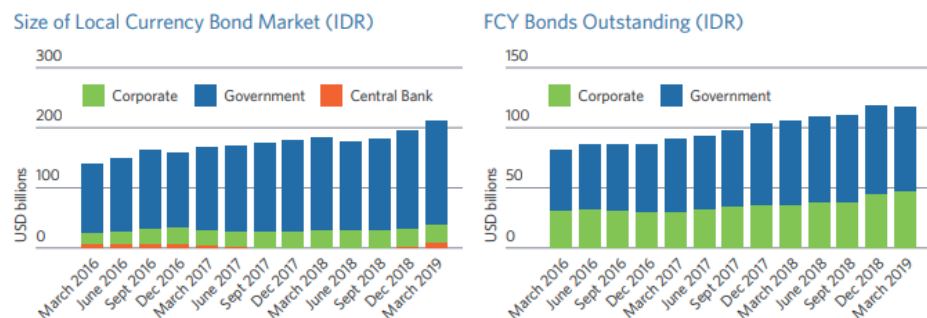


Figure 1: Source: CBI 2019.

According to the data presented above, the issuance of Green bonds is increasing. Green bond issuance is expected to climb by 30%.

#### 4.4. A Historical Analogy of Green Sukuk Potential Based on World Green Bond Issuance

It is time for Indonesia, as a trustworthy Sukuk issuing country, to use this tool to promote Indonesia's role in helping to create a more comfortable world. Sukuk, a financial instrument having many similarities to bonds (bonds), can be used to support programs aimed at reducing global warming and its consequences [34].

The government can create Green Sukuk based on the World Bank's Green Bond concept to assist infrastructure development and carbon emission reduction measures. Infrastructure development in numerous areas, which the government is heavily pursuing, has the potential to produce Green Sukuk [35]. The government currently has an integrated infrastructure development program as part of the Master Plan for the Acceleration and Expansion of Indonesia's Economic Development (MP3EI). To integrate this program with the carbon emission reduction program, it appears vital to align the MP3EI infrastructure development program with the notion of Green infrastructure. Some examples of Green infrastructure projects include electricity generation using renewable energy sources such as wind, solar, and geothermal power and mass transportation in major cities for commuters. Furthermore, the government can issue State Sukuk to help finance infrastructure development [36].

The issuance of Green Sukuk can be used to expand the investor base because there are existing corporate and individual investors concerned about environmental issues, particularly climate change. No country has previously issued Green Sukuk on the international primary market. If the government can prepare promptly, Indonesia will be the first to issue Green Sovereign Sukuk [37].

The following is a timeline of global Green bond issuance:

The following countries issue the most Green bonds.

Indonesia is not yet one of the countries that issues a high number of Green bonds, despite the potential for Green bonds in the future. According to CBI data, Indonesia first issued Green bonds in 2007 for a total of USD 809 million. The Indonesian government's first Green Sukuk issue in 2018 was greater, reaching USD 1.25 billion [38].

#### 4.5. Domestic Market Historical Analogy

The State Sukuk Market in Indonesia in 2018, when viewed from the number of Retail Sukuk investors, has reached 243,364 people from the t10 Series since 2009. At the start of the Retail Sukuk issuance, there were only 14,295 investors according to DPS,



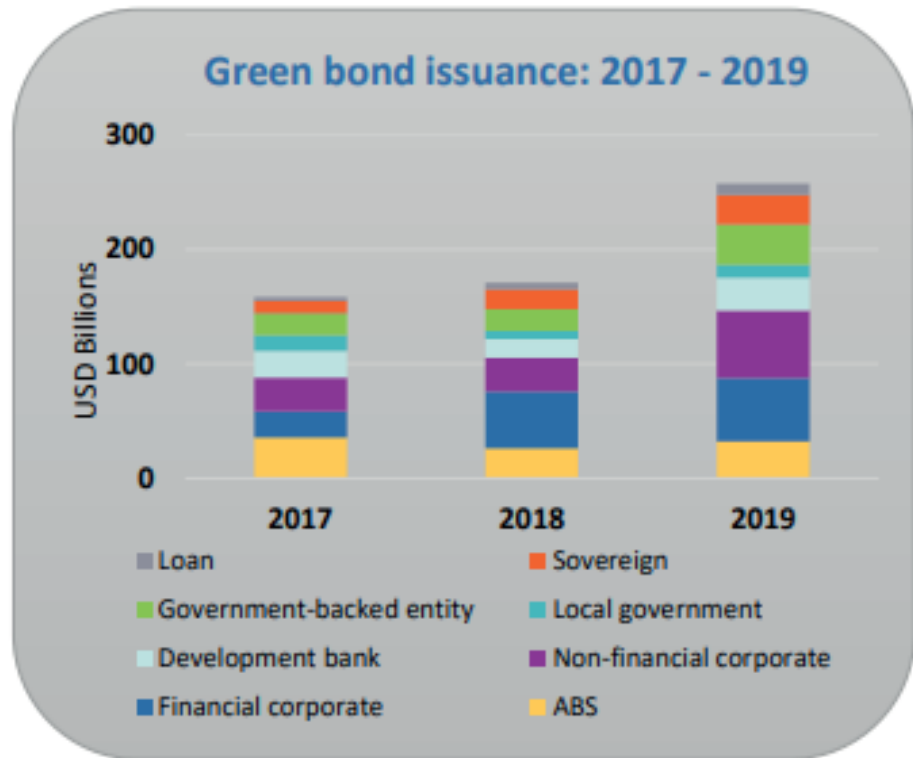


Figure 2:

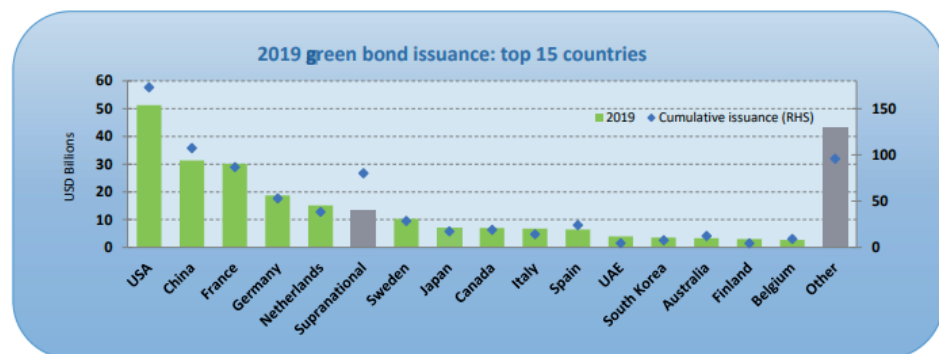


Figure 3:

2018. This indicates that the market for Green Sukuk in Indonesia has a big potential [39]. Since 2009, the number of retail Sukuk investors has risen, with 34,692 persons investing in 2014 and 48,444 investors in 2016. The number of retail Sukuk investors fell considerably between 2017 and 2018. As the number of Retail Sukuk investors fell in 2017 and 2018, more investors began saving Sukuk.

The Government of the Republic of Indonesia issued Savings Sukuk in 2016 and received 11,338 investors; in 2017, the number of investors climbed by 16,477. As a result, the market transitioned from retail Sukuk to savings bonds in 2017 [40].

The drop in Retail Sukuk does not affect the overall issuance of State Sukuk. In other words, the Sukuk market in Indonesia has been quite good, even though one of the Sukuk has witnessed a decline due to the transfer of investors to savings Sukuk [41].

The Indonesian government issues Green Sukuk for the foreign market when the home market is strong enough. The international issuance of Green Sukuk intends to attract Green bond investors from around the world to invest in Green Sukuk with a demonstrable asset foundation [42].

Based on market disruption events in Indonesia, the government needs to expand the market to international markets. Notably, if the savings Sukuk rises, the retail Sukuk falls. It is not enough for the government to market Green Sukuk domestically to enhance the development expenses of the Green Sukuk issuance sector. The government must also market Green Sukuk on the international market to avoid disrupting the local Green Sukuk market [43].

#### 4.6. Historical Analogy of Investor Distribution

Indonesian State Sukuk (SNI) or Global Sukuk issued by the Government of the Republic of Indonesia since 2009 are Sukuk traded internationally. As a result, the creation of this SNI is a manifestation of Indonesia's contribution and presence in the growth of global Islamic finance. SNI is issued in US Dollars (USD) once a year to facilitate investor transactions.

Indonesian State Sukuk [44] distribution is investors for a 5-year tenor of 32% of Islamic investors (Middle East and Malaysia), 5% of Indonesian investors, 40% of Asian investors (excluding Indonesia), 12% of US investors, and 11% of European investors. Meanwhile, in the 10-year tenor, 31 percent of Islamic investors, 5% of Indonesian investors, 34% of Asian investors (excluding Indonesia), 18% of US investors, and 12% of European investors are represented. Regarding the 30-year tenor, 10% is allocated to Islamic investors, 5% to Indonesian investors, 44% to Asian investors (excluding Indonesia), 8% to US investors, and 33% to European investors [45].

The issuing of several tenors of Indonesian State Sukuk tries to avoid market disruption. Because investor characteristics differ, it is hoped that the Asian, American, and European markets would not be disrupted and to attain the goal of issuing Indonesian State Sukuk.

#### 4.7. Contribution of Green Sukuk to Indonesia's Development

According to DPS (2018), the revenues from the issuance of Green Sukuk in 2018 were utilized to finance APBN projects for the 2018 (IDR 8.2 trillion) and 2016 (IDR 8.5 trillion) budgets that matched the Green Bond/Sukuk Framework criteria. The following is an example of an Indonesian Green Sukuk issuance:



Figure 4:

According to the figures presented above, the construction supported by Green Sukuk in 2018 was USD. 1.925 billion.



Figure 5:

#### 4.8. The Role of Green Sukuk in Post-Pandemic New Normal Era National Economic Recovery

In 2018, the revenues from the issue of Green Sukuk was USD 1.925 billion or IDR 16.75 trillion. In 2019, Green Sukuk issuance reached USD 750 million worldwide, or approximately IDR 11.25 trillion. Green Sukuk is a component of a very secure investment product [46]. According to data from the Republic of Indonesia's Ministry of Finance, the auction of five series of State Sharia Securities (SBSN) or state Sukuk on Tuesday (18/8) raised IDR 9.5 trillion [47]. Total auction results for the five Sukuk exceeded the indicated target of IDR 8 trillion, contributing to 19.2 percent of total incoming bids of IDR 49.37 trillion [48].



Figure 6:

The Indonesian government's Green Sukuk can cover the state revenue and expenditure budget gap. So that subsidies for low-income people and small and micro companies can be maintained and the economy can return to normalcy.

## 5. Conclusion

Based on the challenges and discussions mentioned, it is possible to infer that Green Sukuk played a role in the national economy's post-pandemic recovery in the new normal era. This study will impact theoretical and practical contributions and policy contributions.

This study is expected to contribute to the scientific understanding of the role of Green Sukuk in post-pandemic national economic recovery in the new normal era. It is envisaged that the findings of this study will serve as a reference for government owners and policymakers in financial management to help construct the Indonesian economy in the new normal era [49]. Researchers conducted this study to the best of their abilities, but they recognize that there are still several limitations, including, among other things, a lack of research variables and reference materials [50]. The research sample is also limited to discussing the role of Green Sukuk in post-pandemic national economic recovery in the new normal era.

It is intended that the researcher will include more variables in the subsequent study. There are limitations to research using data generated from quantitative methods with forecasting and quantitative least squares and qualitative techniques using historical analogy techniques [51].

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