

PROBLEMS IN DIGITAL ECONOMY CO-OPERATION AMONG SCO MEMBER STATES

Fu Siyao

PhD student, Belarusian State University, Minsk, Belarus, fus6836@gmail.com

Supervisor: D. V. Sokol

PhD in economics, associate professor, Belarusian State University, Minsk, Belarus, sokoldi@bsu.by

The digital economy has become a new driving force in the development of the world economy. In the face of a sizeable «digital dividend», the SCO member States have taken the development of the digital economy as a driving force for national economic growth and have reached a consensus on a vision for cooperation within the framework of the Shanghai Cooperation Organization (SCO). While seeing the potential for development, there are still many uncertainties. Based on the current situation of development, this paper discusses the problems in the development of digital economy in the SCO.

Keywords: digital economy; SCO; development differences; infrastructure; talent gap.

ПРОБЛЕМЫ СОТРУДНИЧЕСТВА СТРАН-ЧЛЕНОВ ШОС В ОБЛАСТИ ЦИФРОВОЙ ЭКОНОМИКИ

Фу Сыяо

аспирант, Белорусский государственный университет, г. Минск, Беларусь, fus6836@gmail.com

Научный руководитель: Д.В. Сокол

*кандидат экономических наук, доцент, Белорусский государственный университет,
г. Минск, Беларусь, sokoldi@bsu.by*

Цифровая экономика стала новой движущей силой в развитии мировой экономики. В условиях значительного «цифрового дивиденда» государства – члены ШОС восприняли развитие цифровой экономики как движущую силу национального экономического роста и достигли консенсуса по видению сотрудничества в рамках Шанхайской организации сотрудничества (ШОС). Несмотря на то, что потенциал развития очевиден, остается много неопределенностей. Исходя из текущей ситуации развития, в данной статье рассматриваются проблемы развития цифровой экономики в ШОС.

Ключевые слова: цифровая экономика; ШОС; различия в развитии; инфраструктура; нехватка талантов.

I. Current status of global digital infrastructure development

According to US official statistics, the value added of the US digital economy sector has exceeded \$2.4 trillion in 2021, a net increase of more than \$1 trillion from 10 years ago. The GDP created by the U.S. digital economy sector has surpassed that of the finance and insurance industry, and has become the second largest production sector in terms of value added after manufacturing. The trend of increasing digital users is significant, and the potential for growth in the digital market is enormous. As of January 2020, there were 5.19 billion mobile phone users out of a global

population of 7.75 billion, accounting for 67 % of the total global population; 4.54 billion Internet users, accounting for 59 % of the total global population; and 3.8 billion active social media users, accounting for 49 % of the total global population [1]. Due to different standards of measurement and statistical calibre, there are differences in the digital economy indicators compiled by different countries and institutions, but it is an indisputable fact that the growth of the digital economy is faster than the growth of the total economy.

II. Status of digital economy infrastructure in SCO member states

1. The differences in the data value chain among SCO member countries are very significant. The development of the digital economy cannot be achieved without a high level of digital collection, processing and application capabilities, which are closely related to Internet speed. In terms of fixed Internet speed, Russia, Kazakhstan, and India are at a medium level, and Kyrgyzstan, Uzbekistan, Pakistan, and Tajikistan are at a low level. For example, in the rural areas of Tajikistan, where 73 % of the total population lives, most are still using 2G networks [2].

Table 1

Basic Information on Internet Users in SCO Member States

Country	Total population (in billions)	Mobile phone users of the total population (%)	Internet users of the total population (%)	Active social media users of the total population (%)	Social media user growth ratio (% April 2019 / January 2020)
India	13.7	78	50	29	48
Kazakhstan	0.18	136	79	51	26
China	14.4	112	59	72	1.5
Kyrgyzstan	0.06	150	47	39	33
Pakistan	2.18	75	35	17	7
Russia	1.46	163	81	48	0
Tajikistan	0.09	107	26	7	49
Uzbekistan	0.33	76	55	9.6	44

Source: <https://datareportal.com/reports/>.

2. Internet infrastructure in SCO member states is insufficient to meet market needs. The prerequisite for the development of digital economy is that Internet users can use the Internet conveniently. Currently, most Internet users in SCO member states access the network through mobile devices, which is a characteristic of Internet development in low- and middle-income countries (or regions).

3. In addition to China and Russia, the highest share of digital platforms in member countries are American-owned companies. According to Amazon Alexa, Google, owned by U.S.-funded companies, is the top-ranked website visited by Internet users in India, Kazakhstan, Russia, Tajikistan and Uzbekistan, and YouTube is the top-ranked website visited by Internet users in member countries such as Kyrgyzstan and Pakistan. In the light of the current development, the competitiveness of the Russian digital platforms Yandex.com and Mail.ru in the market has declined, and part of the market share has been divided by American companies [3].

4. Huge gap in digital human resources. Tab. 2 shows that China, Russia and India are the best in the SCO in terms of human resources for the digital economy, Pakistan and Kazakhstan are poor, and Uzbekistan, Kyrgyzstan and Tajikistan are the lowest [4].

Table 2

Human Resources Related to the Digital Economy in SCO Member States in 2023

Country	Intellectual property rights (in billions of dollars)		Number of scientific and technical journals (10,000)	Innovative talent (in millions)
	expenditures	incomes		
India	104.2779	11.6758	149,213	260
Kazakhstan	3.0175	0.0665	2,971	626
China	444.7411	133.0477	669,744	4,132
Kyrgyzstan	0.0828	0.0322	194	–
Pakistan	1.1100	0.1300	17,038	415
Russia	44.8168	7.4437	89,967	2,725
Tajikistan	0.0003	0.0002	112	–
Uzbekistan	1.1147	0.0044	1,375	525

Source: <http://data.worldbank.org/cn/country>.

In short, SCO digital economy cooperation has better potential. However, under the influence of the endowment effect, there are many problems that need to be solved urgently in the SCO's digital economy cooperation. Only by solving these problems can SCO digital economy cooperation reap «digital dividends» and add new momentum to the development of the Shanghai Cooperation Organisation.

Bibliographic references

1. Value Creation and Capture: Implications for Developing Countries Value Creation and Capture: Implications for Developing Countries [Electronic Resource]. URL: https://unctad.org/en/PublicationsLibrary/der2019_overview_ch.pdf.
2. Концепция цифровой экономики в Республике Таджикистан [Electronic Resource]. URL: [https://medt.tj/images/news/2019/KCE R T.pdf?fbclid=IwAR3SKDK_1FgfGrI8UsftDe9hezUo3-4JTLqt0e-MRylSqsKYGivjPn2g77w](https://medt.tj/images/news/2019/KCE%20T.pdf?fbclid=IwAR3SKDK_1FgfGrI8UsftDe9hezUo3-4JTLqt0e-MRylSqsKYGivjPn2g77w).
3. 肖斌:《数字经济在中亚国家的发展:基于产业环境的分析》,载《欧亚经济》2020年第1期.
4. Fedchenko A. A. Economic Analysis of Human Resources in the Digital Economy // Digital Economy: Complexity and Variety vs. Rationality. 2020. P. 599–605.