### Development Trends of Cross-border Tourism Cooperation in Northeast Asia in the Post-epidemic Era\*

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#### **Abstract**

The tourism industry is a labor-intensive industry with multiple levels of employment, a wide range of areas, and a broad market, which has a great driving effect on employment in the entire society. Since the beginning of 2020, the COVID-19 epidemic has begun to spread all over the world. So far, the medical and health fields have not yet been able to adopt effective methods to completely control the epidemic. Many industries have encountered almost "shutdown" control or impact. As an important carrier of cultural exchanges, social communication, and trade circulation, the operation of the tourism industry is based on the movement of people, and it is particularly affected by the rapid development and continuous spread of the global epidemic. This article first conducts a more detailed analysis of the basic situation of tourism cooperation in Northeast Asia since the outbreak of the epidemic and a series of issues that have emerged, and then explores a preliminary analysis of how countries and regions can deepen cooperation and promote development in the tourism industry in the era of symbiosis of the epidemic.

Keywords: the COVID-19 epidemic, Northeast Asia, cross-border tourism cooperation,

development trend

JEL classification codes: O53, Z32

### 1. Introduction

Before the outbreak of the COVID-19 epidemic in 2020, global tourism had experienced steady growth for over six decades, culminating in an estimated 1.5 billion international arrivals in 2019, an increase of 4% year on year, and two years ahead of previous forecasts. According to the Sustainable development Goals Report 2021 released by the United Nations Statistics Division (UNSD), global GDP from tourism increased at a higher rate than the rest of the economy over the decade preceding 2019 to account for 4.1% of global GDP in 2019. According to data from the Organization for Economic Cooperation and Development (OECD) website, global expenditures on travel more than tripled between 2000 and 2018, rising from USD 495 billion to USD 1.5 trillion and accounting for 7% of global exports in goods and services (UNWTO, 2019).

Since the beginning of 2020, with the global pandemic of the COVID-19 epidemic, the world economy has suffered unprecedented losses. In order to prevent the spread of the epidemic, many countries around the world have announced the closure of borders or strict entry procedures and restrictions on personnel movements. The restrictions on international travel have led to a sharp drop in the number of international tourists, which has had an unprecedented impact on transnational and cross-border tourism. According to data released by the OECD, international tourism fell by around 80% in 2020. Globally, international arrivals decreased by 74% in 2020 compared to 2019, which represents a loss of \$1.3 trillion in inbound tourism expenditure, more than 11 times the loss resulting from the 2009 global crisis. An estimated 100 to 120 million tourism jobs are at risk because of the pandemic, with a disproportionate effect on women. Under the general trend, tourism exchanges and cooperation among countries

in the Northeast Asia are obviously hindered. At present, the world as a whole has entered the "normalized epidemic prevention and control era". Northeast Asian countries have successively introduced new measures to rebuild the tourism industry, supporting the continuous recovery of the tourism industry with more flexible tourism products, and promoting the digitalization and greenization of the tourism industry. Transformation redefines the future development model of tourism.

### 2. Tourism Development Status in Northeast Asian Countries

### 2.1 China's Tourism Industry

### 2.1.1 A Trend of Gradual Recovery on Domestic Tourism

According to the 2020 Cultural and Tourism Development Statistical Bulletin, in 2020, there will be 2.879 billion domestic tourists in the whole year, a decrease of 52.1% over the same period of the previous year.(seen from Figure 1) Domestic tourism revenue was 2.23 trillion yuan, a year-on-year decrease of 61.1%. As the country that was the first to fight against the epidemic and was the first to "zero out" the epidemic, China's domestic tourist numbers and tourism revenue have gradually recovered after bottoming out in the first half of 2000.

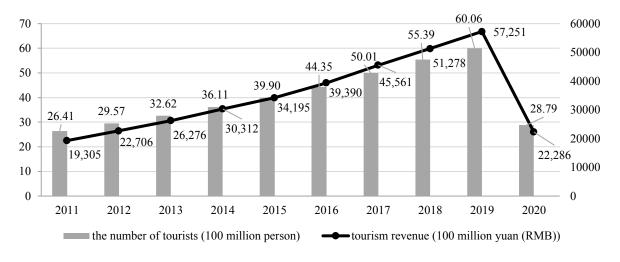


Figure 1. China's Domestic Tourism Development Status (2011-2020)

Source: China Tourism Statistics Bulletin (2011-2020).

Note: China's tourism data in this article refers to mainland tourism data, excluding tourism data from Hong Kong, Macau and Taiwan.

According to the Analysis Report on Tourism Economy Operation in the First Half of 2021 issued by the China Tourism Academy on July 9, 2021, the operation of China's tourism economy in the first half of 2021 showed the characteristics as follows: the tourism consumption confidence had risen steadily; favorable policies were gaining momentum; industry momentum would further accumulate; the stability still needs to be strengthened. In the first half of 2021, domestic tourists reached 2.355 billion, returning to 77% of 2019; domestic tourism revenue was 1.95 trillion yuan, returning to 70% of 2019.

According to calculations calculated by the Data Center of the Ministry of Culture and Tourism, from October 1st to 7th, there were 515 million domestic tourist trips across the country, a year-on-year decrease of 1.5% on a comparable basis, and a return to 70.1% of the same period before the epidemic on a comparable basis. Domestic tourism revenue reached to 389.061 billion yuan, a year-on-year decrease of 4.7% and recovered to 59.9% of the same period before the epidemic.

According to the above-mentioned data, it can be judged that the fundamentals of the tourism economy will be further stabilized. Tourism development expectations are expected to shift from cautious optimism to relative optimism. China's tourism market is expected to continue to improve.

### 2.1.2 Difficulties in the Overall Recovery of Cross-border Tourism

In 2019, China's inbound tourism market continued to maintain its growth trend since 2015, (seen from Figure 2) and China received a total of 145 million inbound tourists, a year-on-year increase of 2.9%. The sudden epidemic in 2020 has restrained the original growth trend of inbound tourism. According to the latest statistics from the China Tourism Academy (Data Center of the Ministry of Culture and Tourism), in the first half of 2020, 14.54 million Chinese inbound tourists were received, a year-on-year decrease of 80.1%. Among them, the decline of inbound overnight tourists and foreign inbound tourists also exceeded 80%. In addition, according to the number of foreign tourists inbound and outbound on the official website of the Mongolian Statistics Bureau, in 2020, there were 18,656 Mongolian tourists into China, a year-on-year decrease of 91.1%; in the first half of 2021, there were only 2,827 tourists, a year-on-year decrease of 79.2%, and a sharp drop to 96.6% compared with the same period in 2019.

In 2019, the number of outbound tourists from Chinese citizens was 155 million, a year-on-year increase of 13.9%. Among them, the number of tourists to South Korea and Japan increased by 25.8% and 13.7% respectively. In 2019, the overseas expenditure of outbound tourists exceeded 133.8 billion U.S. dollars, a growth rate of more than 2%. Among the top 15 Chinese outbound tourist destinations, Japan, South Korea, and Russia ranked fifth, sixth, and twelfth respectively. However, due to the impact of the epidemic, the year-on-year growth rate of outbound tourists in the first half of 2020 was negative. Therefore, referring to the above-mentioned data and the statistics in the following Tables 1, 3, 5, and 7 in the text, it can be concluded that in 2020, China's cross-border tourism cooperation with other countries in Northeast Asia had been severely hindered, that China's outbound tourism market had almost stagnated, and that situation is still continuing in 2021.

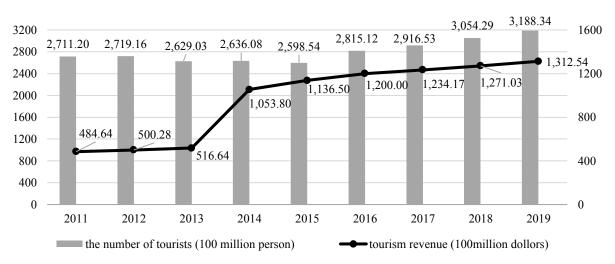


Figure 2. China's Inbound Tourism Development Status (2011-2019)

Source: China Tourism Statistics Bulletin---Annual tourism data (2011-2019).

### 2.2 Great Hindrance to Russia's Cross-border Tourism Cooperation

According to the Number of Inbound Foreign Tourists to Russia 2014-2020 released on the official website of Federal Agency for Tourism, before the outbreak of the COVID-19 epidemic, Russia's cross-border tourism cooperation has been showing a steady development trend. However, due to the COVID-19 epidemic in 2020, the number of inbound foreign tourists for tourism from 69 countries and regions in the world dropped to 6.359 million, a year-on-year decrease of 73.96%. According to the statistics shown in Table 1, in recent years, the number of inbound Chinese tourists to Russia has always ranked first. In addition, the upgrading of China-Russia strategic cooperative partnership has injected new impetus into Sino-Russian cross-border tourism cooperation. At the same time, relationship between Russia and Mongolia has always been in a continuous and positive development trend, which has laid a good foundation for multifield cross-border cooperation between both, and is also conducive to close personnel exchanges.

Affected by the epidemic, the global tourism industry encounters difficulties, and the development momentum of cross-border cooperation in Northeast Asia is severely hampered. In 2020, the number of inbound foreign tourists from China, Japan, South Korea, and Mongolia in Northeast Asia is 81,924, 12,822, 34,451, 45,006 respectively, a year-on-year decrease of 95.6%, 88.6%, 92.0%, and 88.0%. As shown in Table 1, the proportion of the total number of inbound foreign tourists from China, Japan, South Korea, and Mongolia is still showing a downturn, which has fallen to 2.7%, only about one-fifth of 2019.

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Figure 3. Statistics on the Number of Inbound Foriegn Tourists from the Northeast Asian Countries (2016-2020)

Source: The number of inbound foreign tourist to the Russian Federation in 2016-2020.

Table 1. Proportion of the Total Number of Inbound Foreign Tourists from the Northeast Asian Countries (2016-2020)

Unit: person, %

year	2016	2017	2018	2019	2020
Total number from the world	24,570,518	24,390,002	24,550,910	24,418,749	6,358,969
Total number from the Northeast Asia	2,056,644	2,229,928	2,543,547	2,801,889	174,203
9/0	8.4	9.1	10.4	11.5	2.7

Source: The number of inbound foreign tourist to the Russian Federation in 2016-2020.

### 2.3 A Standstill of Japan's Cross-border Tourism Cooperation

In order to prevent the spread of the COVID-19 epidemic, many countries in the world have adopted measures such as restricting overseas travel. The Japanese government also requires the suspension of cross-border traffic except for special circumstances, and further strengthens quarantine and invalidation of visas. For this reason, international movement for tourism purposes continues to be restricted. According to the statistics released by the Japanese Government Tourism Bureau, the number of inbound foreign passengers to Japan in October 2021 was 22,100, a decrease of 99.1% compared with the same period in 2019. In addition, in 2020, the number of inbound foreign passengers to Japan reached 4,115,828, a year-on-year decrease of 87.1%; among them, passengers for tourism purposes were 3,312,228, a decrease of 88.3% from 2019 (Table 2). In the first eight months of 2021, the number of inbound foreign passengers to Japan was 173,263, a decrease of 99.2% compared with the same period in 2019; among them, passengers for tourism purposes were 60,566, a decrease of 99.7% compared with the same period in 2019. From the above-mentioned statistical analysis, it can be seen that compared with the number of inbound foreign passengers to Japan in the same period in 2019, the number of inbound foreign passengers to Japan in 2020 had dropped significantly, and the cross-border tourism industry in Japan in 2021 was almost stagnant.

Figure 4. Statistics on the Number of Inbound Foreign Tourists from the Northeast Asian Countries (2016-2020)

Source: Japan National Tourism Organization: the Number of Visitors to Japan by Country/Region/Purpose(2016-2020).

Table 2. Proportion of the Total Number of Inbound Foreign Tourists from the Northeast Asian Countries (2016-2020)

Unit: person, %

year	2016	2017	2018	2019	2020
Total number from the world	21,049,676	25,441,593	27,766,112	28,257,141	3,312,228
Total number from the Northeast Asia	10,171,730	13,103,581	14,483,024	13,713,631	1,274,776
0/0	48.3	51.5	52.2	48.5	38.5

Source: Japan National Tourism Organization: the Number of Visitors to Japan by Country/Region/Purpose(2016-2020)

As shown in Figure 4, in 2020, the number of inbound foreign passengers from China, South Korea, Russia, and Mongolia for tourism purposes in Northeast Asia was 865,156, 391,046, 15,933, and 2,641, respectively, representing a year-on-year decrease of 89.9%, 92.2%, 82.1% and 84.7%. In addition, according to *Visitor Arrivals by Country/Area & Purpose of Visit for Jan.-Aug. 2021 (provisional figures) (Compared to 2019)* released by Japan National Tourism Organization, the number of inbound foreign passengers from China, South Korea, Russia, and Mongolia for tourism purposes in Northeast Asia was 3,380, 1,708, 1,674, and 232, respectively, representing a year-on-year decrease of 99.9%, 99.9%, 96.9%, and 97.9%.

As shown in Table 2, in recent years, the proportion of the total number of inbound foreign passengers from China, South Korea, Russia, and Mongolia for tourism purposes in Northeast Asia reached about 50%, which indicated that cross-border tourism cooperation with Japan had shown a steady improvement. As result of outbreak of the epidemic, the proportion had fallen to 38.5% in 2020, and Japan's cross-border tourism cooperation with other countries in the Northeast Asia region would be affected.

### 2.4 Difficulties in South Korea's Cross-border Tourism Cooperation

Severely affected by the epidemic, South Korea's cross-border tourism cooperation is in trouble. According to statistics released by the Korea Statistics Bureau, in 2020, the number

of inbound foreign visitors to South Korea was 2,519,118, a decrease of 85.6% year-on-year; among them, visitors for pleasure were 1,653,471, a year-on-year decrease of 88.5%. In the first half of 2021, there were 420,187 foreign visitors, a year-on-year decrease of 80.4%; among them, visitors for pleasure were 73,427, a year-on-year decrease of 95.4%. Based on the statistical analysis in Figure 5, compared with the same period in 2019, the number of inbound foreign visitors to South Korea for pleasure in 2020 had dropped significantly. The development of cross-border tourism in South Korea in 2021 is still precarious.

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Figure 5. Statistics on the Number of Inbound Foreign Tourists from the Northeast Asian Countries (2016-2020)

Source: KOSIS Statistical Database: Visitor Arrivals-by purpose / by nationality

As shown in Figure 5, in 2020, the number of inbound Korean visitors from China, Japan, Mongolia, and Russia in Northeast Asia for pleasure was 450,954, 406,701, 15,765, and 39,702, respectively, representing a year-on-year decrease of 90.8% and 87.2%, 82.7%, 82.1%. In the first half of 2021, the number of inbound Japanese visitors from China, Japan, Mongolia, and Russia for pleasure was 6,301, 198, 428, and 1,505, respectively, representing a year-on-year decrease of 85.9%, 100.0%, 97.2%, and 96.4%. Based on the above-mentioned statistical analysis, the number of inbound visitors from other countries in Northeast Asia has dropped sharply under the background of the epidemic sweeping the world. As shown in Table 3, in recent years, the number of inbound foreign visitor for pleasure from China, Japan, Mongolia, and Russia in Northeast Asia accounted for more than half, and in 2016 it accounted for nearly 70%. This shows that South Korea has a strong attraction for inbound tourism from other countries in Northeast Asia.

Table 3. Proportion of the Total Number of Inbound Tourists from the Northeast Asian Countries (2016-2020)

Unit: person, %

year	2016	2017	2018	2019	2020
Total number from the world	13,932,925	10,415,594	12,414,348	14,432,275	1,653,471
Total number from the Northeast Asia	9,378,945	5,611,256	6,873,502	8,412,617	913,122
%	67.3	53.9	55.4	58.3	55.2

Source: KOSIS Statistical Database: Visitor Arrivals-by purpose / by nationality

### 2.5 An Unprecedented Impact on Mongolia's Cross-border Tourism Cooperation

The COVID-19 epidemic has brought an unprecedented crisis to Mongolia's tourism industry. According to statistics from the Mongolian Bureau of Statistics in 2020, there were 66,940 inbound foreign passengers, a decrease of 89.5% compared with the number of 636,960 in 2019. Among them, the number of tourists was 58,859, a decrease of 89.8% compared to 2019. In the first half of 2021, the number of inbound foreign passengers was 13,292, a year-on-year decrease of 72.7%; among them, the number of tourists was 11,474, a year-on-year decrease of 73.8%.

From this analysis, it is concluded that the number of inbound foreign tourists to Mongolia in 2020 had dropped to the lowest value in nearly 20 years. In the first half of 2021, the development of Mongolia's cross-border tourism industry has shown signs of getting better after being hit hard by the epidemic. As shown in Figure 7, in 2020, the number of inbound foreign tourists from China, Japan, South Korea, Russia were 13,513, 1,131, 5,060, 29,635, respectively, representing a year-on-year decrease of 92.0% and 95.4 %, 95.0%, 79.1%. At the same time, according to the statistics released by the Mongolian Bureau of Statistics, in the first half of 2021, the number of inbound foreign tourists from China, Japan, South Korea, Russia was 2,397, 95, 424, 4,986, and 0, a year-on-year decrease of 72.4%, 91.0%, 91.2%, 99.5%.

As shown in Table 4, cross-border tourism cooperation between Mongolia and other countries in Northeast Asia has shown a good momentum of high-quality development, and the total number of inbound foreign tourists from the four countries remains high. However, due to the impact of the epidemic, the number of inbound foreign tourists to Mongolia has dropped significantly. Although the total number of inbound foreign tourists from the four Northeast Asian countries to Mongolia in 2020 will be as high as 83.8%, the highest value in the past 20 years. However, the absolute number of cliff-like declines cannot judge the recovery time of Northeast Asian countries' tourism cooperation with Mongolia.

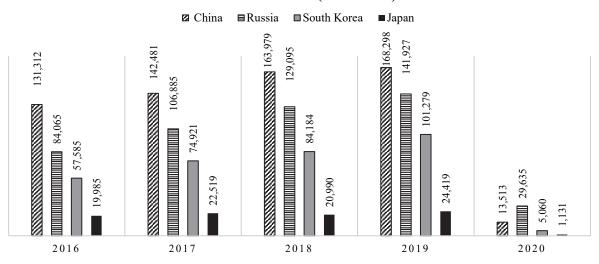


Figure 6. Statistics on the Number of Inbound Foreign Tourists from the Northeast Asian Countries (2016-2020)

Source: Mongolia Statistical Information Service: Number of Inbound Tourists, by Country

Table 4. Proportion of the Total Number of Inbound Tourists from the Northeast Asian Countries (2000-2020)

Unit: person, %

year	2000	2005	2010	2015	2016	2017	2018	2019	2020
Total number from the world	154,207	338,768	456,090	386,204	404,163	469,309	529,370	577,300	58,859
Total number from the Northeast Asia	122,869	272,010	371,748	282,187	292,849	346,806	398,248	435,923	49,339
%	79.7	80.3	81.5	73.1	72.5	73.9	75.2	75.5	83.8

Source: Mongolia Statistical Information Service: Number of Inbound Tourists, by Country

## 3. Negative Influence of the COVID-19 Epidemic on Regional Tourism Cooperation in Northeast Asia

## 3.1 An Significant Interruption of the Cross-border Tourism Market due to Entry Restrictions

In order to prevent the spread of the COVID-19 epidemic, to ensure national security and protect public health, countries around the world have successively introduced entry restrictions. In the early days of the outbreak, Northeast Asian countries quickly introduced relevant entry restrictions, including continued tightening of entry visa policies, suspension and reduction of international flights and closure of land border ports, and called on residents to avoid unnecessary travel abroad, which almost interrupted cross-border tourism market among Northeast Asian countries.

**Table 5. Northeast Asian Countries' Relevant Entry Restrictions** 

Northeast Asian Countries	Time	Restriction
China	March 28, 2020	temporarily stopping foreigners' entry with current valid visas and residence permits; suspending the entry of foreigners with APEC business travel cards, as well as policies such as port visa, 24/72/144-hour transit visa-free, Hainan visa-free entry, Shanghai cruise visa-free, 144-hour visa-free entry to Guangdong for foreigners from Hong Kong and Macau, and Guangxi visa-free entry for ASEAN tourist group.
Russia	March 18, 2020	promulgating Decree No. 635-R on March 16, 2020 to ban foreign citizens' entry.
	March 30, 2020	restricting people from entering the territory of the Russian Federation through roads, railways, walking, and rivers in accordance with Order No. 763-r.
Japan	March 3, 2020	rrestricting arrival airports for passenger flights from China or Republic of Korea to Narita International Airport and Kansai International Airport
March 8, 2020		suspending single and multiple-entry visas in China (including Hong Kong and Macau) and Republic of Korea.
South Korea	March 13, 2020	suspending 89 of the 124 routes operated by Korean Air.
	April 10, 2020	emporarily suspending all valid short-term visas that were issued on or before 5 April 2020, and visa-free entry and visa-waiver programs for nationals of countries imposing entry bans on Koreans.
Mongolia	February 1, 2020	closing all air, rail and road transport borders with China and most of the non-regular border crossings.
	February 27, 2020	suspending regular international flights to Asian routes.
	March 11, 2020	suspending the remaining regular international flights and virtually closing the country

### 3.2 Suspension of Tourism Business and Closure of Tourist Attractions

In order to curb the spread of the epidemic, cut off the spread of the virus, and ensure the safety and health of the people, the Ministry of Culture and Tourism of China issued an emergency notice on January 24, 2020. National travel agencies and online travel companies suspend operating group tours and "air tickets + Hotel" tourism product.

The World Tourism Organization predicts that in 2020, international tourism revenue will be reduced by 300-450 billion US dollars. Affected by the epidemic, the tourism industry of Northeast Asian countries has suffered a severe blow, and many tourism-related companies are facing a crisis of loss or even bankruptcy. In early March 2020, Japan's Kobe Yeguang Cruise Company announced that it had filed for bankruptcy. This is the first cruise company to declare bankruptcy since the outbreak. According to data from the Korea Hotel Industry Association, in March 2020, the occupancy rate of Korean hotels exceeded 90%. It is estimated that the loss of 44 South Korean hotels in 2020 will be as high as 83.5 billion won, or about 480 million yuan. According to statistics from the National Bureau of Statistics of Mongolia, the number of tourism companies in the first quarter of 2020 decreased by 21% to 1,274, and there were 1,191 companies in operation in the second quarter, a year-on-year decrease of 27.0% and a month-on-month decrease of 6.5%. The loss and closure of tourism enterprises also means that tourism practitioners are forced to be "unemployed" and indirectly affect the development of cross-border tourism cooperation.

In order to curb the spread of the epidemic, cut off the spread of the virus, and ensure the safety and health of the people, the Ministry of Culture and Tourism of China issued an emergency notice on January 24, 2020. National travel agencies and online travel companies suspend operating group tours and "air tickets + hotel" tourism product. Various provinces in China actively responded and adopted effective measures to promptly close tourist attractions, museums, cultural centers, theaters and other cultural tourism venues, stop performances, foreign visits, travel agency group operations, public gatherings, star-rated hotels, and large-scale events, and earnestly maintain them. The lives of the broad masses of the people are safe. The temporary closure of tourist attractions has led to the temporary loss of inbound tourist destinations, thereby interrupting the development of the inbound tourist market.

### 3.3 Weakened Tourists' Willingness across Borders

On March 13, 2020, the Survey Report on Tourists' Traveling Willingness after the Epidemic jointly issued by Ivy's Joint Travel Advisory Agency, China Kanghui Tourism Group, and the Asia-Pacific Travel Association showed that 45% of the respondents would plan to travel abroad after the epidemic. Among them, Asian destinations are the first choice for many tourists, and 18% of the respondents said that the country they most want to go to after the epidemic is Japan. It can be seen that relevant countries in Northeast Asia are still the preferred cross-border travel destinations for Chinese tourists. According to the 15 Discoveries and Traveling To Be Started: A Survey Report on Chinese People's Traveling Willingness after the Epidemic jointly released by the China Tourism Research Institute and the Ctrip Tourism Big Data Joint Laboratory, more than 90% of the respondents chose domestic tour. At the same time, according to the number of inbound tourists from Northeast Asian countries in 2020 shown in this text, it can be judged that due to the impact of the epidemic, tourists from various countries in the region have significantly

weakened their willingness to travel across borders, so that cross-border tourism cooperation within the region has been temporarily suppressed.

# 4. Trends of Cross-border Tourism Cooperation in Northeast Asia in the post-epidemic era and China's Response

# **4.1 Domination of the Combination of Industry, Official and University to Cross-border Tourism Cooperation**

Since the outbreak of the epidemic, countries in Northeast Asia have always united and helped each other to fight the epidemic. Today, the epidemic has entered an era of normalization. Countries in the region are actively responding to the many challenges posed by the epidemic through various forms of cooperation, accelerating the full recovery of cross-border cooperation in multiple fields, and promoting the coordinated development of regional integration. On September 27, 2021, the "Northeast Asian Culture and Tourism Industry Development Forum" sponsored by the Foreign Affairs Office of the People's Government of Liaoning Province and the Liaoning People's Association for Friendship with Foreign Countries and undertaken by the Liaoning Northeast Asia Economic and Cultural Promotion Association was successfully held in Shenyang. This forum has received active participation and enthusiastic response from embassies of Northeast Asian countries in China, experts and scholars in related institutions, and business representatives. Adequate exchanges and discussions have further strengthened the confidence in the development of the cultural and tourism industry in Northeast Asia, and fully demonstrated the common desire of all parties in Northeast Asia to overcome the impact of the epidemic and strengthen mutually beneficial cooperation.

### 4.2 Development of a New Digital Format for Cross-border Tourism Cooperation

The epidemic has brought a huge impact on global economic development, and at the same time highlights the important role of the Internet in the development of human society and the hard core strength and development vitality of the digital economy. Under the background of "Internet + tourism", the way of travel gradually tends to be mobile, individualized and personalized. At the same time, major changes on the consumer side, including experience enrichment, group segmentation, self-service travel design, rationalization of travel shopping, and e-commerce in the transaction process, have become important factors for tourists to consider when planning travel. In addition, new digital technologies such as artificial intelligence technology and big data technology are gradually being integrated into the tourism industry, effectively promoting the diversified integration of online and offline.

### 4.2.1 Deepening Multilateral Digital Economic Cooperation in Northeast Asia

In recent years, the digital economy of China, Japan, South Korea, and Russia in Northeast Asia has developed rapidly (Table 6). Under the situation of normalization of epidemic prevention and control, major countries in Northeast Asia can take advantage of the digital advantages of each country to carry out digital information technology integration and sharing, regional cultural and tourism resources collaboration and integration, and jointly create a "cloud travel in

Northeast Asia" smart cultural tourism platform project, through interconnection, Digital cutting-edge technologies such as the Internet of Things, artificial intelligence, and big data applications have multi-dimensional interpretation of the landscape effect on the scenic spot, creating a truly smart tourism experience, which can not only meet the travel needs of tourists who are difficult to travel across borders during the epidemic, but also can be used in the region through platform projects. The publicity of scenic spots in various countries attracts tourists' eagerness to visit here after the epidemic is over, helping to accelerate the recovery of the cross-border tourism industry in Northeast Asia and further deepen international cooperation in the digital economy.

Table 6. Statistics on the Digital Economy Scale and Global Ranking of Related Countries in Northeast Asia (2018-2020)

Unit: US\$100 million

a a symptomia a	20	18	20	19	2020		
countries year	total value	rank	total value	rank	total value	rank	
China	47,290	2	51,954	2	53,565	2	
Japan	22,901	4	23,949	4	24,769	4	
South Korea	7,636	7	7,995	7	8,478	7	
Russia	2,942	13	3,076	13	2,756	14	

Source: CAICT: White Paper on Global Digital Economy (2019-2021).

### 4.2.2 Launching Digital Industrial Integration of Culture and Tourism in China

Many provinces in China have launched smart cultural tourism projects, using the Internet platform to promote the integrated and innovative development of "culture + tourism + technology", and launched a number of "cloud tourism" projects to meet the needs of tourists who are restricted from staying at home due to the epidemic. Therefore, smart cultural tourism is an important field for the development of the digital economy in the future, and it is also an objective need to realize the digital transformation and development of the tourism industry. "Cloud shopping" has entered people's field of vision. The world as a whole has entered the "normalized epidemic prevention and control era". Northeast Asian countries have successively introduced new measures to rebuild the tourism industry, supporting the continuous recovery of the tourism industry with more flexible tourism products, and promoting the digitalization and green transformation of the tourism industry so as to redefine the future development model of tourism.

#### 5. Conclusion

In March 2020, when the World Health Organization declared the COVID-19 epidemic to be a "global pandemic", in order to prevent the epidemic from spreading on a large scale, various countries have adopted a "reclusive" policy to try to block the movement of people at home

and abroad. At present, the COVID-19 epidemic is still prevalent all over the world. Epidemic prevention and control measures in Northeast Asian countries will continue. It is worth noting that although the tourism industry in some regions is gradually restarting, cross-border tourism has shown a gradual and cautious liberalization trend. How to capture the new needs of the cross-border tourism market and how to seize the initiative in the cross-border tourism market competition are challenges for all countries in Northeast Asia. The new trends in the cross-border tourism market that the epidemic has spawned are a reshaping of the development of cross-border tourism. This requires countries in the Northeast Asia region to make innovations in tourism products, improve service quality, and improve tourism experience. Innovative thinking, constantly creating new forms of tourism, meeting the new needs of tourists, and creating a new situation for the development of cross-border tourism in various countries.

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### References

- CAICT (2019): *Global New Business Forms for the Development of Digital Economy*, pp.1-74. https://zhuanlan.zhihu.com/p/367689765 16 August 2021). [In Chinese]
- China Academy of Tourism (2020): *China Outbound Tourism Development Report 2020*. http://www.ctaweb.org.cn/cta/ztyj/202103/87a492a44eda4038b7fe8f6428ed3d5d.shtml (retrieved 16 August 2021). [In Chinese]
- China Industrial Economic Information Network (2021): *The Analysis Report on Tourism Economy Operation in the First Half of 2021*. http://www.cinic.org.cn/hy/ly/1125342.html (retrieved 14 July 2021). [In Chinese]
- China Academy of Tourism (2020): Reshaping the Image of Tourist Destinations under the Impact of the Epidemic-<China Inbound Tourism Development Report 2020> Online Release. http://www.ctaweb.org.cn/cta/ztyj/202103/bcab3f512fd843b9b6b12d59dbfded32.shtml (retrieved 16 August 2021). [In Chinese]
- China Academy of Tourism (2020): *China Outbound Tourism Development Report 2020*, http://www.ctaweb.org.cn/cta/ztyj/202103/87a492a44eda4038b7fe8f6428ed3d5d.shtml (retrieved 17 August 2021). [In Chinese]
- Culture and Tourism Industry Association (2020): 15 Discoveries and Traveling To Be Started: A Survey Report on Chinese People's Traveling Willingness after the Epidemic. http://www.hbwhcyxh.com/new\_content.asp?id=2728 (retrieved 8 October 2021). [In Chinese]
- CQ.QQ.COM (2020): Korean Air responds flexibly to the challenge of the epidemic, uses grounded passenger aircraft to meet global cargo demand. https://cq.qq.com/a/20200319/004274.htm (retrieved 26 August 2021). [In Chinese]
- ENKHBAYAR Shagdar (2021): "On the Special Feature: COVID-19 Economic Impacts in Mongolia" *in ERINA REPORT (PLUS)*, No. 158, pp.1-2.
- Federal Agency for Tourism (2021): Chislo v''yezdnykh turistskikh poyezdok inostrannykh grazhdan v Rossiyskuyu Federatsiyu v 2014–2020gg [The number of inbound foreign tourist to the Russian Federation in 2014–2020]. https://tourism.gov.ru/contents/analytics/statistics/chislo-vezdnykh-turistskikh-poezdok-inostrannykh-grazhdan-v-rossiyskuyu-federatsiyu/ (retrieved 26 July 2021). [In English]
- Federal Agency for Tourism (2021): OGRANICHENIYe V"YeZDA V ROSSIYSKUYU FEDERATSIYU I VYYeZDA IZ ROSSIYSKOY FEDERATSII [LIMITATION OF ENTRY TO THE RUSSIAN FEDERATION AND EXIT FROM THE RUSSIAN FEDERATION]. https://tourism.gov.ru/contents/turistam/ogranichenie-vezda-na-territoriyurossiyskoy-federatsii/ (retrieved 26 July 2021). [In English]
- FU Xiaoling (2021): "Civil Aviation in the Year of Resumption of the Epidemic: 80% of Domestic Flights before the Resumption of the Epidemic, Air Tickets Cheaper by 20%" *in Nanfang Metropolis Daily.* https://www.sohu.com/a/447121669 161795 (retrieved 25 August 2021). [In Chinese]

- Industry Information Network (2021): 2020 Global Digital Economy Industry Development Status and New Development Trends: Digital Economy Is Accelerating in the Direction of Intelligence. http://news.sohu.com/a/495250511 120956897 (retrieved 16 October 2021). [In Chinese]
- Japan National Tourism Organization (2021): Visitor Arrivals for Oct. 2021 (preliminary figures by JNTO) (compared to 2019). https://www.jnto.go.jp/jpn/statistics/visitor\_trends/index.html (retrieved 16 July 2021). [In Japanese]
- Japan National Tourism Organization (2021): Visitor Arrivals by Country/Area & Purpose of Visit for Jan.-Aug. 2021 (provisional figures) (Compared to 2019). https://www.jnto.go.jp/jpn/statistics/data\_info\_listing/pdf/2021\_august\_zantei.pdf (retrieved 16 July 2021). [In Japanese]
- KOSIS Statistical Database (2021): *Visitor Arrivals-by purpose / by nationality (2016-2021)*. https://kosis.kr/eng/statisticsList/statisticsListIndex.do?menuId=M\_01\_01&vwcd=MT\_ETITLE&parmTabId=M\_01\_01&statId=2002032&themaId=#SelectStatsBoxDiv (retrieved 16 July 2021). [In Japanese]
- Ministry of Culture and Tourism of the People's Republic of China (2021): 2021 National Day Holiday Culture and Tourism Market Situation. https://www.mct.gov.cn/whzx/whyw/202110/t20211007\_928156.htm (retrieved 8 October 2021). [In Chinese]
- Ministry of Culture and Tourism of the People's Republic of China (2021): *National Day Holiday Culture and Tourism Market Situation*. https://www.mct.gov.cn/whzx/whyw/202110/t20211007\_928156.htm (retrieved 6 November 2021). [In English]
- Ministry of Foreign Affairs of Japan (2021): *Border enforcement measures to prevent the spread of novel coronavirus* (COVID-19). https://www.mofa.go.jp/ca/fna/page4e 001053.html#no3 (retrieved 14 July 2021). [In English]
- Ministry of Foreign Affairs of Japan (2021): *Border enforcement measures to prevent the spread of novel coronavirus* (COVID-19). https://www.mofa.go.jp/ca/fna/page4e\_001053.html#no3 (retrieved 13 September 2021). [In English]
- Ministry of Justice Korea Immigration Service (2020): *Announce on Suspension of Visas and Visa-Waiver*: https://www.immigration.go.kr/immigration\_eng/1832/subview.do?enc=Zm5jdDF8QEB8JTJGYmJzJTJGaW1taWdyYXRpb25fZW5nJTJGMjI5JTJGNTIyNjQ5JTJGYXJ0Y2xWaWV3LmRvJTNGcGFzc3dvcmQlM0QlMjZyZ3NCZ25kZVN0ciUzRCUyNmJic0NsU2VxJTNEJTI2cmdzRW5kZGVTdHIIM0QlMjZpc1ZpZXdNaW5lJTNEZmFsc2UlMjZwYWdlJTNENSUyNmJic09wZW5XcmRTZXElM0QlMjZzcmNoQ29sdW1uJTNEJTI2c3JjaFdyZCUzRCUyNg%3D%3D (retrieved 5 August 2021). [In English]
- Mongolia Statistical Information Service (2021): NUMBER OF INBOUND AND OUTBOUND FOREIGN PASSENGERS, by country of origin. https://www.1212.mn/tables.aspx?tbl\_id=DT\_NSO\_1800\_004V2&13999001\_select\_all=0&13999001SingleSelect=\_T1&HH3\_select\_all=0&HH3SingleSelect=\_1&YearQ\_select\_all=0&YearQSingleSelect=&YearY\_select\_all=0&YearYSingleSelect=\_2020\_2019&viewtype=table (retrieved 5 August 2021). [In English]
- Mongolia Statistical Information Service (2021): *NUMBER OF INBOUND TOURISTS, by country.* https://www. 1212.mn/tables.aspx?tbl\_id=DT\_NSO\_1800\_003V2&HH3\_select\_all=0&HH3SingleSelect=\_1&YearQ\_select\_all=0&YearQSingleSelect=\_202102\_202101\_202002\_202001&YearY\_select\_all=0&YearYSingleSelect=\_2020\_2019&viewtype=table (retrieved 5 August 2021). [In English]
- OECD (2021): *Initiative for Safe International Mobility during the COVID-19 Pandemic*. https://www.oecd.org/coronavirus/policy-responses/oecd-initiative-for-safe-international-mobility-during-the-covid-19-pandemic-including-blueprint-d0594162/ (retrieved 6 November 2021). [In English]
- OECD (2020): Rebuilding Tourism for the Future COVID-19 Policy Responses and Recovery. https://read.oecd-ilibrary.org/view/?ref=137\_137392-qsvjt75vnh&title=Rebuilding-tourism-for-the-future-COVID-19-policy-response-and-recovery&\_ga=2.31836861.2028423613.1627608380-1566127774.1627362896 (retrieved 30 July 2021). [In English].
- Official Website of the Embassy of the People's Republic of China in the Russian Federation (2020): *Regarding the Temporary Closure of Personnel Passages at the China-Russia Land Border Port.* http://ru.china-embassy.org/chn/ggl/t1767482.htm (retrieved 16 August 2021). [In Chinese]
- TAKEFOT.CN (2020): Survey Report on Chinese Tourists Travel Intent after the End of COVID-19 Epidemic. https://www.takefoto.cn/viewnews-2082648.html (retrieved 16 August 2021). [In Chinese]
- Tencent.com (2020): 84 Confirmed Cases of 2443 People Entering the Country in 18 Days at Suifenhe Port in Heilongjiang Province. https://new.qq.com/omn/20200408/20200408A0Q1UX00.html (retrieved 16 August 2021). [In Chinese]

- The National Bureau of Statistics (2021): *Statistical Communiqué of the People's Republic of China on National Economic and Social Development in 2020.* http://www.stats.gov.cn/tjsj/zxfb/202102/t20210227\_1814154. html (retrieved 16 October 2021). [In Chinese]
- ULZIIKHAND Nyamsuren, GEREL Bat (2021):
  - "Kankō-gyō ni taisuru COVID-19 pandemikku no inpakuto" ["COVID-19 Pandemic Impact to Tourism Sector"] *in ERINA REPORT (PLUS)*, No.158, pp.18-21. [In Japanese]
- UNSD (2021): *SG's progress report 2021--Progress towards the Sustainable Development Goals*, pp.1-26. https://unstats.un.org/sdgs/files/report/2021/secretary-general-sdg-report-2021--ZN.pdf (retrieved 16 October 2021). [In Chinese]
- www.chyxx.com (2020): *Domestic Tourism Revenue, Number of Inbound Tourists and Number of Outbound Tourists in 2019.* https://www.chyxx.com/industry/202005/863224.html (retrieved 16 October 2021). [In Chinese]
- www.cwestc.com (2020): Due to the Threat of the Epidemic, Mongolia Decides to Close 4 More Freight Channels at China-Mongolia Border Ports. http://www.cwestc.com/newshtml/2020-2-11/600569.shtml (retrieved 16 October 2021). [In Chinese]