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FORECASTS DESIGN FOR MANAGEMENT OF TRAVEL&TOURISM INDUSTRY SUSTAINABLE DEVELOPMENT AND MITIGATION OF THE CONSEQUENCES OF THE COVID-19 PANDEMIC

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Abstract. Restrictions on transportation between countries because of the lockdown caused by COVID-19 have slowed down economic activity worldwide. Therefore, in this paper we examine and estimate the short-term economic impact of the COVID-19 pandemic on the global market situation in terms of the international tourism industry. The purpose of the study is to analyze the current economic situation of the world tourism sector, which suffered the most because of the COVID-19 pandemic, determine the main tourist flows (inbound and outbound tourism) and identify main tourism trends that characterize travel and tourism in world in 2020, to form practical directions for improving the tourism industry, domestic tourism in particular. The dynamics of the international tourists' destinations with complete/partial closure of borders and other restrictions through the region in 2020 during the COVID-19 pandemic are analyzed. The major trends in the tourism sector during the corona crisis are highlighted. The main practical directions for the resuscitation of the tourism industry have been formed, which will have to reduce the negative consequences of the COVID-19 pandemic, and have created a basis for increasing the competitiveness of domestic tourism. It is determined that support for the development of the tourism industry at the central and local levels should be based on the expected preferences of tourists and the risk of using illegal resorts with the possibility of infection. The article examines the main problems of the tourism sphere of Ukraine, which have arisen as a result of the introduction of measures to overcome the coronavirus pandemic in the world and in Ukraine in particular. Using the experience of other countries and international recommendations, measures for intersectoral cooperation in the context of increased epidemic risks are proposed. The article reveals the peculiarities of the development of the tourist sphere of Ukraine in the conditions of increased epidemic risks. Modern tendencies of functioning of the tourist sphere of the country are investigated. The tourism sector is suffering on a global scale due to the implementation of measures to overcome the coronavirus pandemic and the uncertainty of further development of the situation. According to various scenarios, the volume of international tourist arrivals is expected to fall by 58-78% in 2020 compared to the previous year. According to experts, the recovery of demand to the level of 2019 will take at least two years. According to experts, the sphere of tourist services of the corona crisis period will be characterized by giving consumers priority in terms of: choice of shorter rest periods, predominance of individual movement and individual accommodation, choice of health, sea and rural tourism.

Key words: tourist flows, international tourism, quarantine restrictions, epidemic risks, COVID-19, international prognosis, tourism development.

JEL Classification: C82, E32, L90, I19, Z32

Introduction

Every year there are over 800 million trips globally, half of which are within Europe. About 60% of these trips are leisure-motivated. The share of tourism in

the exports of goods and services constitutes about 13% in the world and 14% in the EU countries. The travel&tourism (T&T) industry accounts for 8% of the total GDP of the EU, provides almost 11% of

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economic growth, 12% of the world's labor force is employed in the industry (World Tourism Organization (UNWTO) reports (2020).

World practice suggests that tourism has a significant impact on the development of socio-economic processes in the country and is an important element of its overall strategy. Therefore, the economic and social prognosis for the tourism industry is a part of the national economic and social development forecast, and requires considerations of its features under current conditions.

Many countries conduct research on tourism's impact on the state's economy. The T&T sector is known to impact the national economy more than industry. The low level of imports and intensive use of local raw materials in this sector of the economy serves to the above end. Thus, we explore the current trends in world tourism and describe the features of forecast design for the development of the T&T industry considering risk factors and uncertainty.

The global crisis caused by the COVID-19 pandemic has radically affected the T&T industry around the world, including Ukraine in particular. As a result, the key provisions of the Roadmap for a Competitive Development of the Ukrainian Travel and Tourism Industry require revision to ensure their relevance in the turbulent times of the COVID-19 pandemics. The working materials reveal updating the situational analysis results and the reorientation of the priority actions plan for T&T industry of Ukraine in order to overcome the consequences of the crisis (Communication from the commission COVID-19).

Methodology of research Theoretical bases of forecasts

1.1. Theoretical bases of forecasts for tourist industry

T&T represents an industry of a high level of competition. Therefore, it is important to have reliable forecasts of its development. The T&T industry development in any country depends on several factors, namely: political and social stability; national policy and interethnic relations; the situation on the international T&T market; degree of state support for travel and tourism; the state of tourism infrastructure; investment attractiveness of the T&T industry; reasonable pricing policy; global and regional integration of domestic tourism; demographic and social structure of the population; safety of travels; availability of highly qualified personnel; national traditions; existence of recreational areas; natural and human-made cataclysms that are difficult to predict.

The nature of the T&T industry causes a low level of various events forecasts' reliability, because of the influence of a large number of factors, many of which are unmanageable. The probability of the total risk multiplier depends on the probabilities of each of the

factors. Therefore, the forecasting of travel and tourism development requires application of economic and statistics methods and models.

The type of forecasting is chosen by time (operational, short-term) and/or by area scale: state, regional, local, etc. In addition, considerations include factors impacting T&T directly and indirectly, and the strength how each factor influences on the forecast parameters the risk and uncertainty of the processes

In addition to factors influencing the development of T&T directly or indirectly and the strength of each factor impact on the forecasted parameters the risk and uncertainty of the processes require a proper assessment. Following the theory of economic risk, the uncertainty has to deal with incompleteness or lack of information about the conditions of the forecasted parameters, and, about the costs and results, in particular.

Relevant indicators inform the forecast design, including intensity, mobility, tourists flows by modes of transport, directions (in- and outbound), countries and regions of origin, volumes of services by tourism types, profit volumes, level of profitability, number of employees, etc.

The task foresees determining changes, trends and growth rates of these indicators in time and space. It is essential to establish the level of reliability of forecasts and perform a socio-economic assessment of their implementation, i.e. the work out of economic, budgetary, commercial, and social efficiency.

The long-term forecast for T&T industry involves the probabilistic business planning of its development indicators and the assessment of its effectiveness under uncertainty and risk. These terms determine the specifics of the forecasts (Tourism and transport in 2020 and beyond). The above means considering the sources of uncertainties and methods of taking them into account when assessing the effectiveness of the forecast. In addition, design has to determine the methods of estimation of uncertainties accounting by check of the forecast stability (before the changes of external factors, in particular), formalization of the description of uncertainties, adjustment of parameters of the forecast, as well as include the limit (permissible) values of selected parameters (indicators).

Uncertainty and risk factors should deserve consideration if they significantly influence the efficiency, the cost of forecasting, in particular. The forecast assessment relies estimation of risks and uncertainties types as follows:

- the risk associated with the instability of economic legislation, the current economic situation, investment conditions and use of profits;
- foreign economic activities risk (supply restrictions, trade, border closures);
- uncertainty of political situation;
- incompleteness or inaccuracy of information on the dynamics of selected technical and economic indicators;

- fluctuations in market conditions, prices, exchange rates:
- uncertainty of natural and climatic conditions (for example, due to global warming mountain winter tourism has become risky), the probability of natural disasters;
- production and technological risk;
- uncertainty of the purposes, interests and behavior of participants of T&T services market;
- incompleteness and inaccuracy of information about the financial condition and business reputation of the partner (bankruptcy, insolvency, etc.).

2. Results and discussion

2.1. Key economic forecasts for 2020

The crisis will seriously affect the global economy. According to the IMF, the projected decline in Ukrainian GDP from April 2020 will reach 7.7%. Quite different estimates suggest the further recovery of the global economy: from the V-shaped scenario, which provides for economic recovery at 2019 level in 2021, to a longer recovery and even a long-term recession (World Travel & Tourism Council, 2020). T&T represents one of the sectors of the world economy that has suffered the most from restrictions on movement, given the particular difficulties in aviation.

As of April 20, 2020, due to a pandemic, 100% of all international destinations have imposed entry restrictions (Table 1). However, pinpointing future prospects remains extremely difficult.

Ukraine currently experiences a significant lag in the pace of implementation of measures to support the T&T sector, which seriously jeopardizes the competitiveness of the industry in the global market during the projected recovery period during 2021.

Key industry players, including international hotel chains, introduce number of external and internal solutions to minimize the COVID-19 pandemic impacts: market security guarantees (rescheduling or reimbursement of booked rooms, optimized loyalty programs, community support), health and safety measures and

internal reorganization (staff reductions, unpaid leave, reductions/waivers of capital investments, etc.).

Countries that have already crossed the peak of COVID-19 are gradually lifting restrictions on business activities and services. However, T&T sector starts to recover locally (within one country). The next step in its retrieval foresees the opening of borders between neighboring countries with a relatively similar situation (for example, Australia and New Zealand, Thailand and China, etc.).

The European Commission has issued a number of recommendations on the opening of borders in two stages. The first phase envisages gradual removal of restrictions on border crossings between the EU member states. The second step includes plans to lift all coronavirus-related restrictions between member states. The situation regarding the opening of the EU's external borders to third-country nationals (including Ukraine) remains uncertain.

As of May 12, 2021, the number of people infected with COVID-19 since the beginning of the pandemic in Ukraine constituted 2,129,073 people, with 46,987 death cases and 1,797,136 people cured. Globally compared, more than 160.3 million people got ill since the beginning of the pandemic, among which more than 3.3 million died and almost 139.1 million were cured (Commission recommendation of 13.5.2020).

The date of the first recorded case of COVID-19 is almost the same (March 1 to 7, 2020) in neighboring countries (e.g., Poland, Romania, Slovakia, Hungary). Yet, each country developed and applied different approaches to combating the pandemic, and therefore had different rates of diseases and deaths. The key EU countries (e.g., Germany, Great Britain, Italy) recorded the first cases of the virus almost in the same period (mid-February), but later got the highest number of people infected with COVID-19 (Communication from the commission COVID-19).

After the outbreak of coronavirus infection, the forecast for 2020 decreased several times, which was caused by a high level of uncertainty. Current

Table 1
The IMF Economic Forecast (April 2020)

	Years	World	European Union	Developing countries *	Poland	Ukraine
GDP (% of change)	2019	2.9	1.7	2.1	4.1	3.3
	2020	-3.0	-7.1	-5.2	-4.6	-7.7
	2021	5.8	4.8	4.2	4.2	3.6
Inflation (% of change)	2019	3.6	1.4	6.5	2.3	7.9
	2020	3.0	0.6	5.1	3.2	4.5
	2021	3.3	1.2	5.0	2.6	7.2
Unemployment (% of labor force)	2019	n/a	n/a	n/a	3.3	8.5
	2020	n/a	n/a	n/a	9.9	10.0
	2021	n/a	n/a	n/a	8.0	9.3

^{*}According to the IMF, developing European countries include Albania, Belarus, Bosnia and Herzegovina, Bulgaria, Croatia, Hungary, Kosovo, Moldova, Montenegro, Northern Macedonia, Poland, Romania, Russia, Serbia, Turkey, and Ukraine (World Travel & Tourism Council, 2020).

scenarios indicate a decline in international tourist arrivals to 58-78% per year, depending on the rate of spread of coronavirus infection and the duration of restrictions and border closures. At the same time, the prospects for further developments remain unclear. The scenarios envisage three possible options for monthly changes in the number of arrivals between April and December 2020: the movement restriction will be lifted and the national borders will be reopened in early July (scenario 1: -58%), in early September (scenario 2: -70%), or in early December (scenario 3: -78%) (Figure 1).

The world still faces serious challenges, ranging from the indefinite duration of the pandemic to restrictions on movement, all in the context of the global economic recession. Countries around the world are implementing a wide range of solutions to minimize the effects of the COVID-19 pandemic and stimulate the recovery of the T&T sector.

According to the UNWTO report on COVID-19-related restrictions on movement, published on 20 April 2020, all international destinations have imposed restrictions on movement due to a pandemic (World Tourism Organization (UNWTO) reports (2020):

- 97 destinations (45%) completely or partially closed their borders to tourists;
- 65 destinations (30%) completely or partially suspended international flights;
- 39 destinations (18%) close their borders on more differentiated grounds (prohibiting entry for passengers from certain countries of origin).

The scenarios follow models with different recovery patterns for different regions of the world. The Asia-Pacific countries seem to meet trend changes much earlier – as the pandemic in this region began much earlier than in the rest of the world. In addition, seasonality in Asia is a less important factor compared to other areas, where the bulk of demand loads the period from June to September.

Potential global impacts in 2020 (compared to 2019) include as follows:

- reducing the number of international tourist arrivals from 850 million to 1.1 billion USD;
- loss of export earnings from T&T amounting from 910 billion to 1.2 trillion USD;
- the risk of losing 100 to 120 million jobs in T&T.

Currently there are two common approaches to overcoming the crisis: the first is to provide affordable credit lines for businesses, and the second is to defer payment of debt and tax liabilities.

Despite the fact that countries focus on both approaches, more developed economies having a higher credit rating rely mostly on available credit lines realizing that this will restore the competitiveness of the national economy in the shortest possible time.

By the logic of things, the total cost of economic measures as a% of GDP positively correlates with the level of GDP per capita.

The rest of the countries, having no other choice, rely more on delaying the payment of tax and debt liabilities which can lead to a negative chain reaction in the economy in the long run (long-lasting budget deficit, problems with overall solvency, etc.).

The T&T industry enjoys particular attention by those countries which prioritize the sector and guarantee the return of the cost of tourist trips booked but canceled due to the COVID-19 pandemic.

Air transportation, as an industry with a relatively low margin (up to 10%) and high turnover, is in a particularly difficult situation.

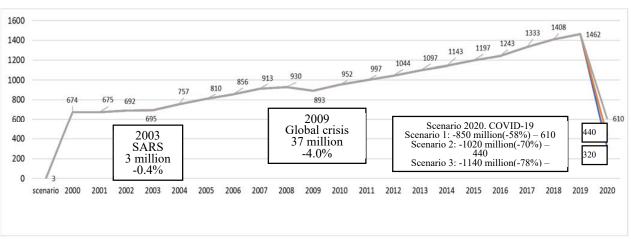


Figure 1. Arrival of international tourists, 2000–2019 and scenarios for 2020 (in millions) (World Tourism Organization (UNWTO), reports (2020)

All three presented scenarios for the development of international tourism in 2020 are not and forecasts, but they can't be wrong. The smell is based on the available tourist tributes for the period from very early to birch and the latest information, from the old days of these national cordons around the world at the beginning of the day, with a few of the number of deaths.

The European approach currently demonstrated by France and Germany excersises the gradual nationalization of major airlines (Air France and Lufthansa).

Some countries (e.g., Hungary, Croatia) facilitate programs to introduce "tourist cards" or certificates, which will allow employees to receive partial compensation from their company to pay for recreation services domestically in order to keep tourism contributions to the economy as high as possible.

The HoReCa sector (hotels, restaurants, catering) пще зукьшішщт to resume restrictions in some European countries during May 2021, subject to strict rules to prevent a recurrence of a pandemic outbreak.

Given that these rules will inevitably reduce the enterprises profits due to the limitations on the number of visitors and, at the same time, increase their operating costs, the future of the HoReCa sector is causing great concern globally.

For example, a proponent of the "soft response" method, Lithuania, took the first step in solving the problem and allowed restaurants and cafes to use city-squares and public areas. This decision simplified the procedure for obtaining permits to use such places and provided support to entrepreneurs in achieving a critically important economy of scale.

2.2. Measures taken to restore the international hotel industry

The hotel industry found itself internationally in an unprecedented situation: a large number of hotels and resorts in each country were forced to close due to the implemented quarantine measures to combat COVID-19.

The majority responses to the problems of the hotel industry included three logical pillars (Communication from the commission COVID-19):

- 1. Market and community responses:
- a. market promotion for booked rooms the possibility of re-booking or receiving compensation for the full cost of the booked room, depending on the applicable regulations of the country / market;
- b. suspension of loyalty programs in cases when the accumulated points or bonuses expire;
- c. community support providing hotel accommodation for medical staff, availability of hotels for quarantine, cooking for people in need and emergency response.
 - 2. Health and safety responses:
- a. programs to implement stricter health and safety rules cleanliness, hand hygiene, cleaning of hotel rooms, products, protocols to prevent the risk of virus infection (for example, Hilton CleanStay program together with the manufacturer of the antiseptic Lysol);
- b. financial assistance to employees of international hotel chains who need support due to the financial crisis.

- 3. Responses related to the internal structure and organization of the company:
- a. reduction of arbitrary costs, salaries and bonuses, including owners and management of companies;
- b. complete exclusion of additional costs (including capital costs) and suspension of all operations in the capital markets;
- c. granting unpaid leave for all employees for a period of 60-90 days and closing all real estate facilities.

T&T also embraces a number of specific sub-sectors, including bars and restaurants, meetings and events, museums, translation centers, nature reserves and national parks. All of them were in a similar situation during the period of isolation: closed and without any opportunity to earn money and receive visitors.

Recently, the governments of Asian (mainly China) and European countries have been easing restrictive measures. The decisions made in the process of gradually opening accessibility of certain T&T services are various.

Bars and restaurants (mostly restaurants and fast food restaurants) during the quarantine could only provide "takeaway" or "delivery" services. After the quarantine easing, the institutions wishing to resume work must follow the rules of physical distance and hygiene. Visitors are only allowed in the open air, and customers must sit at different tables at a distance of at least two meters.

Cinemas and theaters were completely closed. So, all they had to do was wait for the government's permission to resume work. European theaters have already begun to open with restrictions: at least one empty seat between guests, as well as one empty row between rows occupied by visitors.

Museums, galleries and information centers have mainly switched to virtual tours, video blogs on social networks and educational content. After re-opening, they must follow the same rules as the stores, i.e., follow the hygienic standards and social distancing with a limit on the maximum number of people who can be in the room at the same time.

Meetings and conferences are held in virtual scapes, and the vast majority of the largest conferences are currently held online at a very low cost of participation. Currently, the issue of lifting restrictions in this area are still under consideration, but organizers may hold small meetings subject to social distancing and hygiene measures in conference rooms/meeting rooms.

Concerts and grand-events are still the subject of governmental consideration around the world, given the high risk of spreading the coronavirus. By canceling concerts and large-scale events, the organizers are trying to find a way to reimburse those customers who have already purchased tickets for the event. In particular, the possibility of issuing certificates for next year's events or a complete waiver of reimbursement (due to lack of funds from the organizers) is being considered.

3. Conclusions

Based on the results of the study, we form the conclusions as follows.

The positive trends in the global T&T industry manifest themselves despite the economic crisis.

Ukraine lacks the rapid systemic response from the government in the form of possible measures to support the T&T industry, compared to the average responses and the types of solutions implemented by the governments of neighboring countries and the EU member states. Such a course of events further complicates the situation of small and medium-sized businesses (SMEs) operating in the hospitality, tourism and leisure sectors.

At the end of 2019, the intensive work of all key stakeholders in T&T sector of Ukraine with the EBRD support and participation of external partners resulted in elaboration of the Roadmap for a Competitive Development of the Ukrainian Travel and Tourism Industry.

As the global COVID-19 pandemic ends, it is necessary to initiate the implementation of the steps and follow-up measures recommended by the Roadmap for Competitive Tourism Development in Ukraine, as well as to monitor and adapt to possible irreversible T&T changes caused by this crisis globally.

The conclusions of the authors shown in the article are confirmed and a number of international organizations, including the IMF, the World Bank, and the OECD, have published their economic forecasts for the effects of the COVID-19 crisis on the world economy, the most up-to-date and complete being

the IMF report published in April 2020. According to this report, in 2020 GDP in Ukraine is projected to fall to 7.7%, with unemployment reaching 10% (figures analyzed in the article).

Inflation is expected to decline in 2020 both in Ukraine and around the world. Ukraine, as well as the rest of the world, will be able to restore its economy in 2021, but it is impossible to fully compensate for the negative consequences caused in 2020. It is projected that the international economy will be able to reach the state of 2020 only in 2022.

The pace and model of economic recovery remain the subject of intense debate:

– A number of experts expect that the recovery will take place according to the V-shaped scenario, which envisages the continuation of the situation as it is. This applies to both the global economic model and economic relations between countries, conclusions in view of the financial reforms recently introduced by Ukraine, as well as the relatively small share of T&T sector in the country's economy.

– Others, however, predict a longer period of crisis and even a recession with significant social consequences, which, in turn, can lead to significant changes in the socio-economic model of the world.

At present, the latest official documents of international agencies (such as the European Commission's May 6 report 2021), leading banks and economists, actively emphasize the seriousness of the negative effects of the COVID-19 pandemic on the world economy and its reduction.

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