

The Impact of Coronavirus on Tourism Sector - An Analytical Study

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Abstract:

The covid-19 pandemic is still taking its toll on all aspect of human life and on all sectors of the global economy without any exception, perhaps among its most perceptible effects was its impact on the tourism sector as banning flight, and restricting mobility and travel were among the first measures that were meant to curb the propagation of the virus. Therefore the aim of the study is to shed light on the impact that Covid-19 pandemic has inflicted and still inflicting on tourism sector, in a bid to fulfill the purposes of the study we conducted an analytical study, the scale of the analysis was of an international level, with special focus on some of the best worldly recognized touristic destinations, along with alluding to the case of Algeria, the study concluded that the tourism sector in countries featuring high dependency on tourism revenues are affected most by the pandemic, while in Algeria the impact of the pandemic on the tourism sector was relatively weak since Algerian's revenues from tourism are very low. Finally, the study suggested a set of recommendations for Algerian government to lessen the impact of corona virus on tourism sector.

- **Keywords:** Coronavirus; Crises; Hospitality; International Tourism.
- **Jel Classification Codes:** Z32 ; Z39

الملخص:

لا تزال جائحة كوفيد-19 تلقي بظلالها على جميع جوانب الحياة البشرية وعلى جميع قطاعات الاقتصاد العالمي دون أي استثناء، ولعل من بين أكثر أثارها الملموسة كانت على قطاع السياحة، بسبب حظر الطيران، وفرض قيود على التنقل والسفر والتي كانت من بين الإجراءات الأولى التي كانت تهدف للحد من انتشار الفيروس، لذلك تهدف هذه الدراسة لتسليط الضوء على الأثر الذي أحدثه وباء كوفيد-19 على قطاع السياحة، لتحقيق أهداف الدراسة أجرينا دراسة تحليلية، وقد شمل نطاق التحليل المستوى الدولي بالتركيز بشكل خاص على بعض أفضل الوجهات السياحية المعترف بها عالمياً، مع الإشارة إلى حالة الجزائر، وقد خلصت الدراسة إلى أن قطاع السياحة في البلدان التي تعتمد بشكل كبير على عائدات السياحة هي الأكثر تأثراً بالوباء، في حين أن أثر الفيروس على قطاع السياحة في الجزائر كان ضعيفاً نسبياً لأن الجزائر تتميز بعائدات سياحية منخفضة. في الأخير قدمت الدراسة بعض التوصيات للحكومة الجزائرية للحد من تأثيرات فيروس كورونا على قطاع السياحة.

- **الكلمات المفتاح:** كورونا فيروس؛ أزمات؛ ضيافة؛ سياحة دولية.

- **تصنيف JEL:** Z32 ; Z39

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I-Introduction:

A COVID-19 pandemic has been propagating in china and in the entire globe; the pandemic risk has not been confined only to threaten lives due to infection, but also has inflicted a humongous psychological pressure (Cao et al., 2020). Then, the COVID-19 outbreak has turned out to be an economic challenge (Erokhin & Gao, 2020). It is causing massive damage to all sectors without any exception; however, the ambit of the damage varies from one sector to another and from one country to another (Mouloudj, Bouarar, & Fechit, 2020). By mid-February, global air transportation had already transmitted the virus to all continents and, by mid-March, it has reached 146 countries (Gössling, Scott, & Hall, 2020). And by 15 April, confirmed cases neared 2 million, causing the death of more than 125,000 in more than 200 countries (ECDC, 2020). The COVID-19 pandemic has resulted in over 6 million confirmed cases and over 370,000 Deaths globally as of 31 may 2020. In Algeria, according to the official website of the Algerian Ministry of Health, there were 9394 confirmed cases and 653 deaths cases of COVID-19 in Algeria as of 31 may 2020 (Algerian Ministry of Health, 2020). This relatively large number of infections and deaths, created a tremendous pressure on the Algerian government, medical and healthcare providers, and the general public. So, facing the impossibility of curbing the propagation of the virus, the entire world imposed mobility restriction (Idres, Lassassi, Djani, & Yousfi-halimi, 2020). Huge hotel cancellations followed, causing rife unemployment, loss of income.

The entire world is encountering an unparalleled global health, social and economic emergency with the COVID-19 pandemic. Like any other industries tourism in turn has been at stake from the health, economic and emotional repercussions ensued by the COVID-19 pandemic, all the indicators prognosticate that we are going to experience a shift of paradigm, a new world and new context that is yet to be unraveled, to which we must comprehend, accept and cope (Santos Del Valle, 2020). Countries initiatives to ban flights from nations with H1N1 outbreaks in 2009 were proved futile in containing the virus; and the estimated loss regarding the H1N1 outbreak for the Mexican tourism industry was \$5 billion. Likewise, between 2002 and 2004, as a result of Severe Acute Respiratory Syndrome (SARS), Hong Kong incurred a 41% reduction in tourism GDP, Singapore 43% and China a 25% reduction as well as a loss of 2.8 million jobs (Calderwood & Soshkin, 2019). Accordingly, tourism is currently encountering one of its most devastating crises of all time caused by the propagation of the COVID-19 pandemic (Mendoza & Reinoso, 2020). In these difficult circumstances of the COVID-19 global pandemic and its impact on travel, tourism and affiliated sectors, the debate about fostering or restricting tourism has vigorously sparked again.

(Higgins-Desbiolles, 2020). Airline industry players mentioned that the underway travel restriction and low demand around the world have threatened the loss-making carrier of bankruptcy (Foo et al., 2020). The COVID-19 pandemic crisis had disastrous impact on travel, tourism, and events affiliated sectors (Higgins-Desbiolles, 2020).

In a very recent time, many studies have been conducted to verify and evaluate the impact of COVID-19 epidemic on the economic (Fetzer et al., 2020; Ozili & Arun, 2020), socio-economic implications (Nicola et al., 2020), global macroeconomic (McKibbin & Fernando, 2020); food Security (Erokhin & Gao, 2020; Mouloudj et al., 2020), e-business (Hasanat et al., 2020), and tourism (Anzai et al., 2020; Foo, Chin, Tan, & Phuah, 2020; Gössling et al., 2020; Mendoza & Reinoso, 2020; Ying et al., 2020). Undoubtedly tourism has become a significant

tool in promoting sustainable human development such as: alleviating poverty, environmental regeneration, job creation, women empowerment, and other disadvantaged categories (Bharathi, 2017). Constraints on freedom of movement laid down by several governments around the world to halt the propagation of the corona virus, have not only affected tourism services providers whom incurred a massive turnover losses, but have also impacted tourism demand (Scaglione, Larpin, Mabillard, & Schegg, 2020).

Based on the above, the problematic of the study hovers around the following central question: what is the impact of COVID-19 pandemic on the global tourism sector? To cover the problematic main question we address following sub-questions: (1) how was the situation of tourism sector prior to COVID-19 pandemic?; (2) what is the current situation of the tourism sector in the light of COVID-19 pandemic?; (3) what is the major impact COVID-19 has inflicted to the tourism sector on some studied chosen countries (Italy, Spanish, China, United States, and Sub-Saharan Africa)?; and (4) what are the most possible scenarios of COVID-19 implications on tourism sector on the short-run?.

Accordingly, the study seeks to achieve three main objectives: (1) Identifying the reality of tourism sector prior and during the COVID-19 propagation; (2) Laying down the potential scenarios of COVID-19 impact on tourism industry; and (3) Providing recommendation to the Algerian government with regard of mitigating the impact of COVID-19 pandemic on tourism sector.

In a bid to answer the pre-stated questions and fulfill research objectives, we opted to rely on the descriptive analytic methodology, through conducting a comprehensive description and a nuanced in-depth analysis of data extracted from reports and published studies on the studied topic. The remainder of this paper is organized as follows. Section 2 describes the previous situation of the tourism sector. Section 3 discusses the current situation of the tourism sector. Section 4 discusses the major implications that COVID-19 has inflicted on tourism sector in some countries. Section 5 presents the main scenarios about impact of COVID-19 on tourism sector. And we ultimately present in Section 6 the outcome of the research and conclusion.

II– Tourism sector before and during the COVID-19:

II.1. Previous situation in the tourism sector:

Tourism has capacity to catalyze other economic sectors through its intertwined linkages and inter-sectorial synergies with sectors like agriculture, horticulture, poultry, handicrafts, transport, construction, etc (Bharathi, 2017).

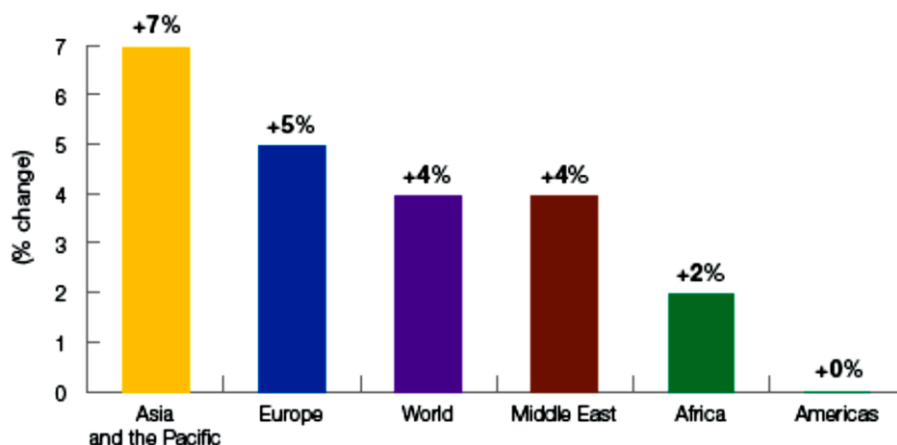
In 2018, in its annual analysis quantifying the global economic and employment impact of Travel & Tourism in 185 countries and 25 regions, the World Travel & Tourism Council's (WTTC) research reveals that (World Travel & Tourism Council, 2019):

- Travel & Tourism contributed US\$8.8 trillion to the global economy, this equates to 10.4% of global gross domestic product (GDP).
- Across the world more than 319 million people's jobs are guaranteed by Travel & Tourism. This represents 10.0% of all employment,. The sector has employed one in five of all net new jobs created across the world over the past five years.
- Worldwide international tourist arrivals (overnight visitors) increased 6% to 1.4 billion in 2018.

• The sector grew by 3.9% in 2018, faster than the global economy's growth of 3.2%. Its rate has grown more than economy growth for eight years successively.

• USA and China remained the most prominent travel and tourism economies in 2018; together represent 35.2% of the world's total travel & tourism GDP, followed by Japan, Germany and the UK.

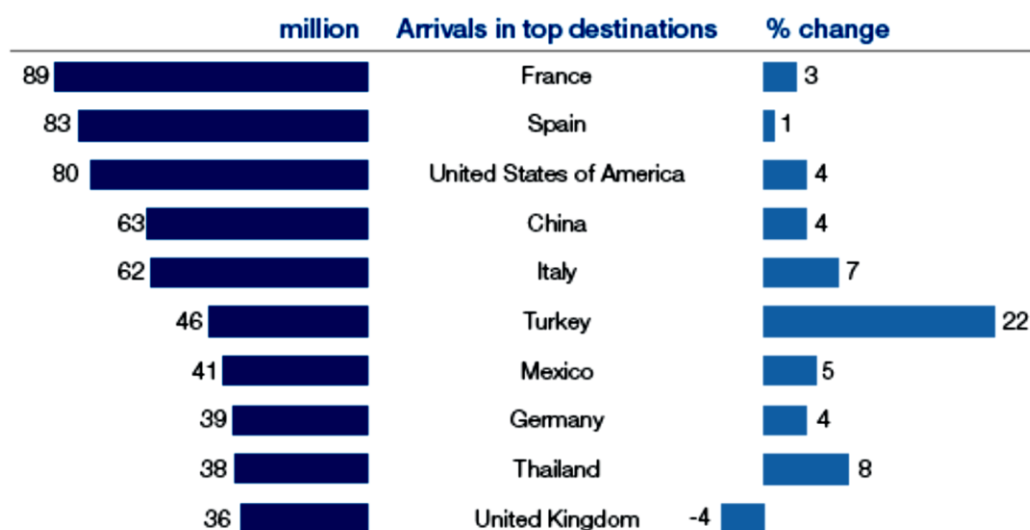
Figure (1): International tourism receipts by regions, 2018 (% change)



Source: WTO, (2019), p.6.

Figure (1) shows that Asian and Pacific countries achieved a considerable growth rate of revenues in 2018 account for 7% comparing to 2017, European countries as well witnessed an increase of 5%, while the global medium growth witnessed a growth of 4% which represent the very same rate registered by middle east countries, whereas Africa growth rate was less than 2%, but despite this rate Americas countries did not reach any significant growth rate.

Figure (2): Top ten destinations by international tourist arrivals, 2018.



Source: WTO, (2020), p.9.

Figure(2) shows the top ten favorite tourist destination among international tourists point of view, these ten destination have the lion share of 40% of all international tourist in the world,

and as shown France ranked first globally in 2018 with 89 million tourists with growth rate of 3% compared to 2017, followed by Spain with 83 million tourist with estimated growth rate of 1%, united states ranks third with 80 million, then china 63 million, Italy 62 million with 7% growth rate, turkey in its turn managed to rank sixth globally through its potentials of attracting 46 million tourists with a record growth rate of 22% which represent the highest growth rate among the ten top destinations, we also note that despite the united Kingdom registered a negative growth rate of 4-% it has managed to rank tenth in the world.

Undoubtedly these countries will also rank on the top list most devastated countries by corona virus pandemic in the field of tourism, and thus countries with economies depending entirely on tourism revenues are vulnerable to devastating implications of the virus, while countries with a debilitated tourism sector (Algeria for instance), will bear a lesser losses compared to top ten destination.

In 2019, travel and tourism's direct, indirect and induced impact accounted for (WTTC, 2019):

- US\$8.9 trillion contribution to the world's GDP.
- 10.3% of global GDP.
- 330 million jobs, 1 in 10 jobs around the world.
- US\$1.7 trillion visitor exports (6.8% of total exports, 28.3% of global services exports).
- US\$948 billion capital investment (4.3% of total investment).

II. 2. Current situation in the tourism sector:

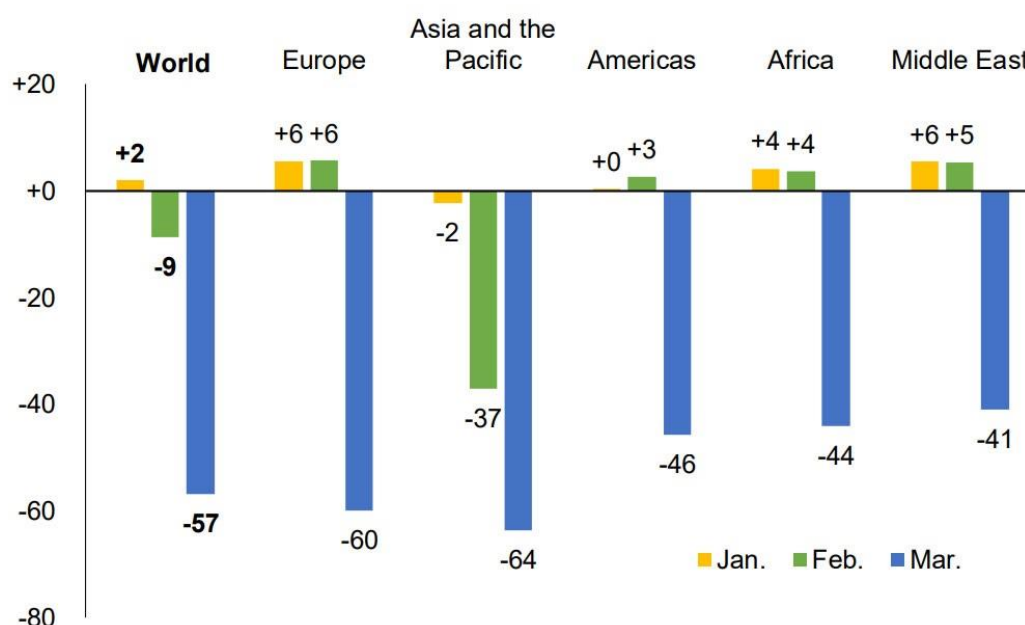
Tourism has the potential to spur socio-economic changes and is invariably intentionally developed to engender economic advantages which ultimately lead to social improvement (Bharathi, 2017). The number and kind of infectious disease outbreaks (e.g. influenza, Ebola, Zika, SARS, MERS-CoV, antibiotic resistant bacteria, etc.) have grown tremendously over the past 30 years and the international propagation of the disease is likely to soar even greater as global trade expand and travel increase (Calderwood & Soshkin, 2019). The current outbreak of COVID-19 pandemic has buffeted the global economy with immediate effect on tourism affiliated businesses such as food and beverages, travel and hotel businesses (Liew, 2020). Tourism bears the heaviest burden of the COVID-19 pandemic, since the sector witnesses a drastic plummet in demand and a soaring of job losses at global scale, putting many SMS at stake (Maniga, 2020).

Travel and tourism alike are among the most affected sectors with airplanes banned; hotels shut and travel prohibition measures laid down almost in all countries around the world. Globally, during these events, Malaysia Airport announced a 30% decline in international passenger traffic for February. Also in Malaysia, Foo et al. (2020) confirmed that the outbreak of COVID-19 has hugely and adversely impact on tourism industry, as the worries about the virus prompted tourists from around the world to annul and postpone travel plans to Malaysia. In addition, Vietnam received nearly 1.45 million Chinese visitors in the first quarter of 2019, decreased by 644,000 in January of 2020. It is estimated that Vietnam's tourist sector would lose a \$5 billion had the COVID-19 pandemic is to survive to the second quarter of 2020 (Nicola et al., 2020).

We can clearly discern from figure (3) that during March 2020 the number of tourists declined to (-57%) compared to March 2019, Asian and Pacific Ocean countries lost 64% of tourists, while Europe lost roughly 60%, while the number of tourists in Americas, Africa and the middle east recede to roughly the same percentage -46%, -44%, and -41% respectively, which is logical due to the undertaken measures such as travel ban, airports closure, and quarantine. globally the impact of the pandemic on global tourism sector during the first quarter of 2020 caused a decline in the number of tourists by twenty million causing financial losses estimated at 80 million dollar.

As a direct consequence of COVID-19, The World Travel and Tourism Council has warned that 50 million jobs in the global travel and tourism sector may be at risk (Nicola et al., 2020, p.12). The large extent of the current pandemic is likely to leave lingering effect on international tourism compared to other industries, more likely to mitigate as soon as intensive restrictions will be relieved. This is also due to the potential impact on the long-run on people's behaviors likely to become more concerned about travelling abroad in the future (Maniga, 2020).

Figure (3): International tourist arrivals, Jan, Feb, March 2020 (% change)



Source: WTO, (2020), Op. cit.

III– Impact of COVID-19 on tourism sector in some countries:

Some countries are likely to experience more harsh difficulties than others owing to their tremendous dependence on tourism, interestingly comparing 10 top destinations by international tourists arrivals (France, Spain, United States, China, Italy, Turkey, Mexico, Germany, UK and Thailand) reveals 8 countries are to receive the most vicious blows of COVID-19, alluding that the economic crisis that buffeted the tourism sector will be more detrimental in these countries (Maniga, 2020). We briefly review in the following points the major negative implications of the coronavirus in some countries:

III. 1. The Italy tourism sector:

It is highly probable that Italy is to end the year with 60% less presences compared to 2019. Italian cities including Rome have been inadvertently affected with a current occupancy

rate of 6%. According to the website Wanted in Rome (2020) despite lack of figures some anecdotes refer to severe plummet in tourists from china, south Korea, and Japan, Barcelona recorded 38% of retail spending by Chinese tourists last year mostly in clothing and luxury goods. In general and according to Statista.com, Italy is expected to register a decrease of roughly 28.5 million tourist arrivals due to the impact of COVID-19 on the tourist sector. According to the estimate, the region of Veneto will witness the highest fall with shrinkage of roughly 4.61 million arrivals. Likewise, Lombardy is expected to register a decrease of about 3.87 million arrivals in 2020 (Statista Research Department, 2020).

III. 2. The Spanish tourism sector:

The Spanish tourism sector would experience losses of around €55 billion by 2020 with Catalonia expected to be the region most affected registering a loss in tourism turnover of almost €11 billion (Maniga, 2020). In general, the COVID-19 pandemic has caused an international turmoil in the hospitality industry, and a major doldrums in the European hotel market. Spanish hotelier's confederation announced that reservation for holiday in particular declined between 20-30% in Catalonia, Valencia, Balearic, and Canary Islands in last February 2020 compared with last year, for hotel booking they fell by 24% in Madrid and 20% in Barcelona. In addition, significant number of events have been annulled in other places in Spain like Las Fallas festival in Valencia which was temporary suspended due to the thousands of visitors from all the over the world that used to attend it.

III. 3. The China tourism sector:

Chinese tourists spent about US\$227 billion abroad in 2018 (Liew, 2020). China has been affected massively since it was the epicenter of the pandemic which create some sense of insecurity in tourists fearing from another wave or another potential virus looming in the horizon. Overall, the COVID-19 crisis has led to significant slumps for the hotel market. China occupancy rates fell 89% by the end of January 2020. Liew (2020) finds that tourism share prices are trending downwards after the lockdown was imposed on Wuhan and nearby cities.

III. 4. The United States tourism sector:

Airlines for America received a government bailout of \$25 billion in grants, \$25 billion in loans, and considerable tax relief in order not to bankrupt, hotel industry Hotel industry revenue per available room in the United States declined 11.6% for the week ending 7th March 2020, other united states hotel companies are hoping to receive almost \$150 billion as a direct aid for employees due to the unparallel plummet in demand, along with an estimated \$1.5 billion loss since mid-February (Nicola et al., 2020).

III. 5. The Sub-Saharan Africa tourism sector:

Harsh crisis will also hit Sub-Saharan Africa where one out of twenty workers livelihood depends on tourism sector: a recent study from the African Union, estimates that the tourism and travel sector in Africa is likely to lose more than \$50 billion owing to the pandemic crisis and at least 2 million direct and indirect jobs, with a calamitous implications for tourist destination like Seychelles, Cape Verde, Mauritius and The Gambia will dwindle to at least 7% (Maniga, 2020).

III. 6. The Algeria tourism sector:

As for Algeria, tourism crisis that arises from the pandemic is not an issue since it does not have tourism revenues in the first place in order to lose them, according the international tourism organization the number of international tourist visited Algeria in 2010 was 2070 international tourists, where in 2017 it has registered 2451 tourists, consequently Algeria would not get affected from tourism revenues shrinks due to the pandemic comparing to other countries considered as a major tourist destination with millions of international tourists. However, Algerian Airline Company is expected to incur major losses due to the suspension of flight since March 2020. According to Touat & Tabani (2020), the National Company Air Algerie is expected to register a loss of more than \$ 320 million due to the impact of COVID-19 on the air transport sector. In addition, hotels sector as well as tourism and travel agencies would also get affected due to the lockdown measures, and this will definitely engender a whole series of negative implications on tax revenues and on employees' purchasing power working for private tourism and travel agencies, this pandemic will also affect families income whom used to rent their apartments for local tourists during summer, but nevertheless the aggregate of these losses combined is insignificant compared to international hotels losses alone, Marriott international for instance is due to suspend thousands of jobs as its losses reached 1.5 \$ billion since mid-February.

IV– Scenarios of the impact of corona virus on tourism sector:

Due to uncertainty the world is experiencing and in the light of lack of information it is hard to predict risk trends and implications of corona virus on the global economy in general and the tourism sector in particular, all forecasts and analysis related to future events are predicated on a particular hypothesis that ultimately might holds water or completely went to the opposite direction, all analysts and experts in the field of tourism expected the sector to enjoy a significant rate of growth in 2020, but this did not happen, because no one knew beforehand that an unseen virus with a naked eye would prompt a global panic and inflict a humongous damage on global economy, but nevertheless , it is imperative to develop a potential scenarios of corona virus implications, which might help in developing alternative plans and strategies that is more effective at any time and any emergency.

Available data points to a double-digit decline of 22% in Q1 2020, with arrivals in March down by 57%. This reflects a loss of 67 million international arrivals and about USD 80 billion in receipts. Current scenarios refer to fall of 58% to 78% in international tourist arrivals for the year, depending on the pace of the containment and the period of travel ban and close of borders, although the future remains highly uncertain (the scenarios are not predictions and should not be diagnosed accordingly). The scenarios lay down three possible patterns of monthly change in arrivals from April to December 2020 supposing that travel restrictions start to be lifted and national borders opened in early July (Scenario 1: -58%), in early September (Scenario 2: -70%) or in early December (Scenario 3: -78%) (WTO, 2020). We present in table (1) an illustration of four scenarios developed by Santos Del Valle (2020).

Table (1): The four scenarios of the impact of COVID-19 on tourism sector

Scenarios	Impacts
Scenario 1: Low incidence	(1) The pandemic has been overcome, and the undertaken measures start to bear fruit, (2) The economies of the main sending countries

	are reinvigorated at the destination, (3) sense of security is high, and (4) The impact on the tourism sector is low.
Scenario 2: Medium impact	(1) Poor control over the pandemic, and economic measures taken by countries are rigid despite the dedicated efforts, (2) The economies of the major sending countries are poor, (3) Tourists' sense of security is average, and (4) Impact on the tourism industry is average. By virtue of public aid and a situation of expenditure stagnation, activities begin.
Scenario 3: High incidence	(1) The control of the pandemic is futile so far reinvigorate the local economy, (2) reinvigoration of the economies of the main sending countries to the destination is postponed, (3) Tourists' sense of security about the destination is very low, and (4) The impact on the tourism industry is high. Many of the tourism and commercial actors have not resisted the economic crisis and have perished.
Scenario 4: Acute incidence	(1) The control of the pandemic at a global or regional level has been a failure so far and after tremendous social anxiety and pressure on governments, the economy is at stake due to the total lack of results so far. The inability of governments to reinvigorate the local economy is highlighted, (2) The economies of the main sending countries to the destination consider it unsafe, (3) Tourists' sense of security has been very low so far, and (4) The impact on the tourism industry is very high and only a small group of companies have survived, which are in a very threatening situation.

Source: Santos Del Valle, A. (2020). The tourism industry and the impact of COVID-19 scenarios and proposals. Global Journey Consulting, p. 23-24.

We expect more likely the second scenario to take place for several reasons, (1) this study was published in April 1 2020, we are now in early June of the same year and yet all travel restriction still in force hitherto; (2) the impact inflicted by the COVID-19 on tourism sector is huge, therefore the first proposed scenario is unlikely and obsolete, because considerable damage had already occurred; (3) the intention of several European countries such as Italy and Spain for instance to open their borders and touristic facilities and accommodations for international tourists midst June; and (4) the major losses that tourism sector has incurred especially in hotels and airlines industries prompted country to lift travel restrictions for economic and political purposes without taking into account health perspective, consequently these countries are expected to dedicate all their best efforts in order to steer clear of the hazardousness that might arises from the forth scenario.

In order to alleviate the disastrous implications of the pandemic and increase the pace of tourism remedy process Santos del Valle (2020, p.26) suggested the following: (1) taking into account the characteristics and circumstances of each country while providing solutions, since countries differs in their local realities and circumstances; (2) it is incumbent for countries to provide financial assistance for tourism sector and commercial enterprises in order to mitigate crisis repercussion, assuring that this assistance cannot be for an indefinite period; (3) taking decision in this context is determined by a set of factors such as the impact of the COVID-19

crisis, the time of the beginning of the recovery, and the fact of the temporality of the destinations; (4) several companies, institutions and tourist destinations in Africa Central Asia or America require considerable back-up to develop actions and programs that enable them to reinvigorate their activities, and goes in line with post-COVID-19 trends scenarios, and opportunities; and (5) the contribution of dynamic companies and institutions cognizant of these territories must be urgent, since the time of lockdown engendered from this crisis must be investigated to develop tourism proposals in markets that are convenient and lucrative for these territories. Also, Liew (2020) suggest that governments or central banks should enact policies to give breath to those businesses experiencing difficulties in the tourism industry amid the pandemic outbreak, these policies could be corporate tax reduction incentives, job retention incentives, delay in existing loans payment and swift subsistence loans approva.

IV-Conclusion:

Corona virus pandemic has drastically changed people's behavior and thinking, since it has literally permeated all aspects of life, indeed this pandemic is still threatening and putting humanity health and life on the line, particularly in the absence of any vaccines or remedy, additionally, its implications were not confined to humanity life and health ,but it has took its toll on humanity's livelihood as well, causing the loss of millions jobs and vigorously damaging all sectors of the global economy, tourism is among the most affected sectors due the undertaken measures to curb the propagation of the virus has sternly dictated banishing flights and closing hotels in almost all the globe. Traveling sector is encountering unparallel amount of cancellations and acute plummet in demand in the light of rigorous governmental instructions to implement social distancing and lockdowns.

We sought through our study to identify the impact of corona virus pandemic on global tourism sector, we concluded that the corona virus pandemic propagation struck severely tourism sector and left so far on some countries (such as pacific ocean countries and Asia for instance china) a disastrous effects that might last for long, we have also seen that the pandemic engendered global turmoil which eventually lead to recession and depression, however Algeria is far away from going through the same damage or experiencing the same significant losses experienced by top ten countries destination or even African touristic destination (like Egypt, Tunisia, Morocco, Seychelles, Cape Verde, Mauritius, and Gambia) since Algerian revenues from tourism are utterly tenuous. However, this pandemic has scantily impacted Algerian tourism as its effects were most felt by Airline Companies, and private travel agencies, we have also concluded that in order for countries to heal the damage that corona virus has inflicted and still inflicting on the tourism sector, several scenarios are to be developed and meticulously scrutinized and studied.

Based on the study' findings, we suggest the following recommendations for the Algerian government, which can lead if taken into account to cushion the impact of COVID-19 on Algerian tourism sector:

1. Postponing tax payments owed by travel agencies and hotels until the end of the pandemic.
2. - Permitting hotels to reopen according to precautionary measures, and make end to hotels employees suffering, particularly those who work for private hotels.

3. Authorizing travel and tourism agencies to regain some of their activities under strict conditions, so that the period of suspension and the related financial losses won't last longer.
4. Authorizing Algerian Airline Company to conduct some flights for Algerians living abroad particularly those who live in France, Canada, in order to mitigate losses resulting from travel restrictions.
5. Encouraging internal tourism after the pandemic, particularly in the light of many tourists' reluctance and unwillingness to travel in the medium-term, in order to beef up tax revenues from tourism.

Finally, we can say that despite the considerable amount of studies that has addressed the impact of corona virus pandemic on tourism sector around the world, yet this topic features several research gaps that can constitute topics for future researches, for instance, most of the studies including our study has studied the topic at Macro level, therefore we believe that there is a persisting and a dire need to explore the topic and address the impact of corona virus at micro level, such as (1) the impact of corona virus pandemic on tourists intention in future, (2) the impact of perceived risks associated with corona virus on tourists behavior, (3) the impact of electronic word of mouth on the perceived risks associated with corona virus pandemic on tourists behavior, in addition we encourage researchers to address the negative implications of corona virus on (1) financial performance of hotels, (2) touristic enterprises marketing performance, (3) Job dropout in the tourism sector.

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