



**THE IMPACT OF COVID-19 ON CONSUMER
PREFERENCES: DOES IT HAVE A PERMANENT
EFFECT? A CASE STUDY FROM TURKEY**

CANSU EKMEKCİBAŞI

Master's Thesis

Graduate School

Izmir University of Economics

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ABSTRACT

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Ekmekcibaşı, Cansu

Master's Program in Financial Economics

Advisor: Asst. Prof. Dr. Sıtkı Değer ERYAR

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Covid-19, which appeared in China in late 2019 and soon took over the world, has affected all humanity deeply. The priorities of consumers have changed. The concept of eating, drinking, traveling, and socializing has been forced to change as a result of social distance measures and temporary business closure. The change in social life has also led to the evolution of consumer habits. The purpose of our work is to understand whether this change in consumer habits is permanent. This study is based on a survey with 172 volunteers. Survey data have been analyzed in the SPSS program. The research found a significant relationship between the level of education and decrease in external spending, auxiliary expenditure, personal development, and hobby spending. Income is a meaningful variable in the reduction of household cleaning expenses and personal development expenses. There is another meaningful relationship between gender and personal care expenditures. All spending categories

are seen to be negatively affected by the Covid-19 period, and the main factor behind the reduction in spending is disease fear. Although the number of people who feel health concerns is high, there are now too many people who do not consider some expenditures necessary or start to acquire them in other ways. The completion of the vaccination is expected to accelerate the demand, but this acceleration will not be the same in all sectors. Recommendations have also been made for sectors that will recover more slowly than other sectors such as personal care and tourism.

Keywords: Covid-19, Consumer Behavior, Demographic and Psychological Features, Consumption Changes



ÖZET

COVID-19'UN TÜKETİCİ TERCİHLERİ ÜZERİNE ETKİSİ: KALICI BİR ETKİSİ VAR MI? TÜRKİYE ÜZERİNE BİR VAKA ÇALIŞMASI

Ekmekcibaşı, Cansu

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2019 yılının sonlarında Çin'de ortaya çıkıp kısa sürede tüm dünyayı etkisi altına alan Covid-19 hastalığı tüm insanlığı derinden etkilemiştir. Kendilerinin ve çevrelerinin sağlığı konusunda endişe hissetmeye başlayan tüketicilerin öncelikleri değişmiştir. Alınan sosyal mesafe tedbirleri ve geçici süre ile kapanan işletmeler sonucu yeme-içme, gezme ve sosyalleşme anlayışı mecburen değişmek durumunda kalmıştır. Sosyal hayatın bu denli değişmesi tüketici alışkanlıklarının da evrilmesine sebep olmuştur. Çalışmamızın amacı tüketici alışkanlıklarında yaşanan bu değişikliğin kalıcı olup olmadığını anlamaya yöneliktir. Bu çalışma bir anket araştırmasıdır ve 172 gönüllüye anket uygulanmıştır. Anket verileri SPSS programında analiz edilmiştir. Araştırma sonucunda eğitim seviyesi ile ev dışı harcamalar, ev temizliği ve kişisel gelişim ve hobi harcamalarının azalması arasında anlamlı bir ilişki bulunmuştur. Gelir seviyesi, ev temizliği harcamaları ve kişisel gelişim harcamalarının azalmasında

anlamli bir deęiřkendir. Cinsiyet ile kiřisel bakım harcamaları arasında yine anlamli bir iliřkiye rastlanmıřtır. Tm harcama kategorilerin Covid-19 srecinden negatif etkilendięi grlmekte olup harcamalarının azalmasının ardındaki ana etken ise hastalık korkusudur. Her ne kadar saęlık endiřesi hissedenlerin sayısı fazla olsa da artık bazı harcamalarını gerekli grmeyen veya bařka řekillerde elde atmaya bařlayan kiřilerin sayısı da yadsınamayacak kadar fazladır. Ařılanmanın tamamlanması ile talebin de hızlanması beklenmektedir fakat bu hızlanma tm sektrlerde aynı hızda olmayacaktır. Kiřisel bakım ve turizm gibi dięer sektrlere gre daha yavař toparlanacak sektrler iin de nerilerde bulunulmuřtur.

Anahtar Kelimeler: Covid-19, Tketiciler Tercihleri, Demografik zellikler, Psikolojik Etmenler, Tketiciler Deęiřiklikleri

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CHAPTER 1: INTRODUCTION

1.1. What is Covid-19?

By the end of 2019, with the first case in China, the world met Covid-19. After the first case in Wuhan, China, the virus spread to the Far East, Europe and The United States and affected the whole world. Covid-19 was defined as a global epidemic by the World Health Organization (WHO) on March 11, 2020. The first Covid-19 case was seen in March 2020 in Turkey. The increasing number of cases and deaths across the whole world has forced governments to take various measures. Partial or total lockdowns have been introduced. To prevent the epidemic, 'Isolation Measures' have been initiated at the global level as defined in the reports of the International Monetary Fund (IMF).

The Covid-19 virus, which appeared in December 2019 in Wuhan, the capital of China's Hubei region, soon spread around the world. First, the virus spread to the Far East, followed by Europe, America, and all over the world. Due to the rapid spread of the Covid-19 pandemic, which caught the whole world off guard, and the rapidly increasing number of cases, problems have arisen in the health system in many countries. With the increasing number of cases and deaths, governments have started taking measures as soon as possible. With the measures taken all over the world, many workplaces in the service sector, especially industry, wholesale and retail trade and tourism, have had to stop their activities completely or in part. The worldwide spread of epidemics has decreased production, disrupted supply chains, and sharply reduced economic activity around the world while affecting consumption, bringing some sectors to a standstill.

According to the World Health Organization, the Coronavirus outbreak has spread to more than 200 countries around the world (WHO, 2020). On March 11, 2020, the World Health Organization described the virus as 'pandemic' (mckinsey.com, 2020). The coronavirus outbreak has significant effects on various areas of life in Turkey and around the world. The panic that began immediately after the pandemic declaration affected the whole world, causing policymakers to take action. Many countries are making extraordinary efforts to avoid this virus. While various restrictions were imposed, we tried to maintain the current state of the economy. It is foreseen that the epidemic, which has taken great effort to control, will also change the attitudes and behaviors of consumers.

1.2.The Difference From The Previous Pandemics

What distinguishes Covid-19 from previous Coronaviruses is the variety of incidences of the disease. 80% of cases are with mild symptoms; many people who carry the disease and do not show symptoms can make it more difficult to control the virus (Newey and Gulland, 2020).

Covid-19 is not the first pandemic in the history of the world but is the first in terms of the number of people infected and the area it affects. Significant pandemics such as smallpox, cholera, plague, dengue fever, AIDS, influenza, severe acute respiratory syndrome (SARS), West Nile disease, and tuberculosis have been recorded in the history of humanity. Influenza pandemics have affected humanity about three times every century since the 1500s. In the last century, there were three flu pandemics called 'Spanish flu' from 1918-1919, 'Asian flu' from 1957-1958, and 'Hong Kong flu' from 1968-1969 (Morens et al., 2010). The disease, which appeared in Asia in 1580, then spread to Africa, Europe, and the America and caused the deaths of 8,000 people, is considered the first pandemic.

The Spanish Flu, which emerged at the beginning of the 20th century, is one of the largest and deadliest epidemics in human history. It started in Europe and took over the whole world. It is not named after the appearance of Spain; it is the fact that Spain is neutral in the First World War and therefore the first to share the news of the pandemic from the press. The Spanish Flu, which appeared in 1918, was described as the most dramatic event in medical history. The virus, whose second and third waves continued until 1920, is thought to have affected half the world's population, although it was not conclusive in the records at the time. (Potter, 2001, p. 91). The H1N1 virus, which was seen between 1918 and 1920, infected 500 million people and caused 50 million deaths.

The economic consequences of the Spanish Flu pandemic include labor shortages and wage increases as well as an increase in the use of social security systems. Economic historians do not agree the headline numbers for the lost GDP. It is difficult to differentiate from the economic effects of World War II from influenza. (Colvin and McLaughlin, 2020).

1.3.The Covid-19 Effects on Global Economy

The Covid-19 pandemic has adversely affected economies by limiting expenditures, especially because of the constraints applied on different scales and the

uncertainties it creates. Covid-19 is estimated to have reduced global GDP by 4.4% in 2020, with the worst performance since The Great Depression.

The IMF's World Economic Outlook (WEO) report, released on June 2020, estimates that global growth will be – 4.9 % in 2020 and that the World Economic View (WEO) estimate (- 3%) will be below 1,9 points in April 2020. Global growth was estimated at a level of 5.4 % in 2021.

After the pandemic was advertised, the whole world began to take health and economic measures. The initial statements came from the finance ministers and central banks of G7 countries. The declaration issued on March 3, 2020, said that all necessary measures to sustain economic growth should be taken (CRS Report, 2020, p. 46). It is also stated that the first intervention will be financial support packages aimed at strengthening health systems in the fight against Covid-19. Many of the central banks of the G7 countries and FED, have taken action to reduce interest rates, reduce reserve requirements, create temporary lending opportunities for banks and businesses, and increase liquidity in their financial systems through several measures, such as easing credit conditions (CRS Report, 2020, p. 47).

According to the World Health Organization report dated July 5th, 2021, the number of cases worldwide exceeded 183 million, and the number of deaths reached 3,978,581. As of 4 July 2021, a total of 2,988,941,529 vaccine doses have been administered (WHO, 2021).

Sectors most affected by the Covid-19 pandemic, such as manufacturing, accommodation, catering, and retail, account for 30% of the midmarket GDP and half of the employees worldwide. It is estimated that a significant amount of time and effort is needed for the recovery of these sectors, while travel and tourism sectors directly affected by the restrictions of Covid-19 account for 10% of global GDP. Many international competitions, conferences, and concerts have been canceled due to pandemics and have caused major losses in the host countries. It is estimated that there will be a 14% labor loss in the tourism sector (Shresta et al., 2020, p. 3).

In the report "Fighting COVID-19", The World Bank stated that the Coronavirus pandemic is the most significant negative shock since the global financial crisis. Although the impact of the pandemic is uncertain as of the date of the report, it has already limited daily activities, brought down commodity prices, disrupted global and regional supply chains, reduced travel, and tourism, and reduced export demand. In 2019, the effect of interest rate cuts in order to increase domestic demand stopped

due to the epidemic. In the projection, it is foreseen that growth will contract, investments will continue to decline, and exports will contract due to weak foreign demand. The World Bank, which previously stated its forecast for Turkey in 2020 at 3%, revised it downwards. The report predicts that growth rates for Turkey will be 0.5%, 4%, and 4% in 2020, 2021, and 2022, respectively. (World Bank, 2020).

Table 1: Overview of the World Economic Outlook Projections (Real GDP, Percent change) (Source: IMF, 2020)

	Projections		Realization
	2020	2021	2020
World Output	-3.3	6	4
Advanced Economies	-4.7	5.1	3.6
United States	-3.5	6.4	3.5
Euro Area	-6.6	4.4	3.8
Germany	-4.9	3.6	3.4
France	-8.2	5.8	4.2
Italy	-8.9	4.2	3.6
Spain	-11	6.4	4.7
Japan	-4.8	3.3	2.5
United Kingdom	-9.9	5.3	5.1
Canada	-5.4	5	4.7
Other Advanced Economies	-2.1	4.4	3.4
Emerging Market and Developing Economies	-2.2	6.7	5
China	2.3	8.4	5.6
India	-8	12.5	6.9
Russia	-3.1	4.4	3.9

The IMF predicted that the global economy would grow by 3.3% in January 2020, while in its April 2020 "World Economic Outlook" report, the global economy predicted that it would contract by 3.0% by 2020. For Turkey, it has revised its growth forecast for 2020 to 5.0% from 3.0% previously (IMF, April 2020).

Countries have started to invest in improving their health conditions, and have provided direct or indirect assistance to their citizens. These investments and benefits, of course, have negatively affected the budgets of all countries. In Figure 1, the

discretionary fiscal response to the Covid-19 crisis in developed G20 economies was observed.

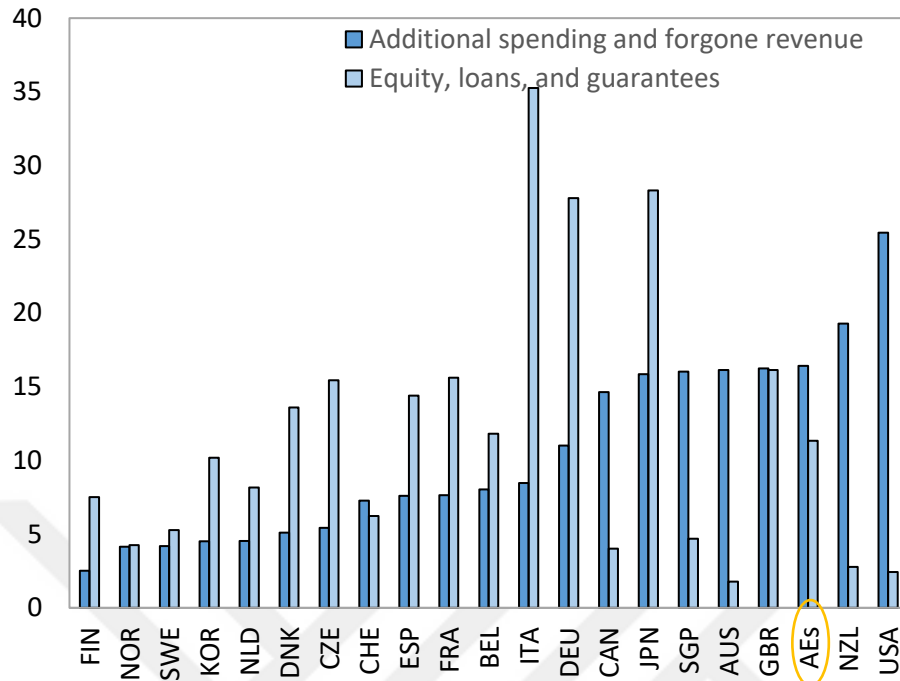


Figure 1: The Discretionary Fiscal Response to the COVID-19 Crisis in Developed G20 Countries (Percent of GDP) (Source: IMF, 2020)

1.4. The Covid-19 Effects on Turkish Economy

The first case of Covid-19 in Turkey was encountered on March 9, 2020, and took some measures. Shopping malls, café restaurants, and hairdressing beauty salons have been completely closed to prevent infection after the first case in Turkey. Thus, demand has been low in the service sector due to the closure of supplies. The study investigates whether this low demand will continue after Covid-19 outbreak.

In Turkey, the number of cases and loss of lives started to decrease with the vaccination process. According to the data from the Ministry of Health of the Republic of Turkey as of July 3, 2021, the current situation in our country is shown in Table 2.

Table 2: The Covid-19 Case Numbers in Turkey (Source: TC Sağlık Bakanlığı, 2021)

Case Numbers	Loss of Life
5,440,368	49,874

By July 3, 2021, the total case number was 5,440,368, and the total loss of life was 49,874. Vaccination has a significant role in reducing case numbers. There are 36

million people with the first dose and 16 million people with the second dose. The first dose Turkey's average is 58.40%, while the second dose average is 25.55%.

It is also necessary to talk about the pre-pandemic economic conjuncture in Turkey, before addressing the effects of the pandemics on the Turkish economy. The liberalization process and the Turkish economy, which is dependent on capital inflows, is based on debt growth and is growing with a construction-oriented growth model, which has a very fragile structure. Although the global financial crisis of 2008 was slightly outlived worldwide, a slowdown has occurred in capital inflows against Turkey, with the Central Bank of America (FED) announcing that it will end its program of mass expansion since 2013. In line with FED decisions, the tightening of the CBRT has slowed the debt-based economy with the 2018 foreign exchange crisis, and the economy has come to a standstill.

Changes in household consumption expenditures, which account for approximately 60% of total expenditures in Turkey, due to Covid-19, and the design of policies both to prevent the slowdown in spending and toward the future of companies in the sectors where these expenditures are made, also emerge as an important research topic (Worldbank, 2020).

Macroeconomic indicators are important sources for understanding the pandemic effect. The data released by the Presidency's Strategic and Budget Presidency show that the growth figures of Turkey's economy have tended to increase with the last quarter of 2019, when they began to shrink from the last quarter of 2018, but have suffered a significant decline with the pandemic process. Turkey's economy has shrunk by -9.9% in the second quarter of 2020, when the pandemic process took place. In the second quarter, the industrial sector was reduced by 16.5%, and the services sector (including construction) was reduced by 10.6%, while the agricultural sector grew by 4%. In the second quarter of 2020, private consumption was reduced by 8.5% and public consumption was reduced by 0.8%. This reduces the total consumption by 7%. Total fixed capital investments have been reduced by 6.1% over the same period. (TUIK, 2020).

According to the unemployment figures, the unemployment rate of 11% in 2018 fell to 13.6% in 2019 and 2020% in 13.3%, according to the Turkish Statistical Institute (TUIK) data.

The financial burden of the state has increased as a result of the support packages described, but revenue sources have been indirectly reduced due to the

reduction of production and the collapse of the economy; the central management budget has given deficit almost every month. In particular, the change in deficit rates in March, April, May, June and July increased in rates of – 78.6, - 135.8, - 43.5, - 60.7, and - 399.9, respectively, compared to the same months of 2019.

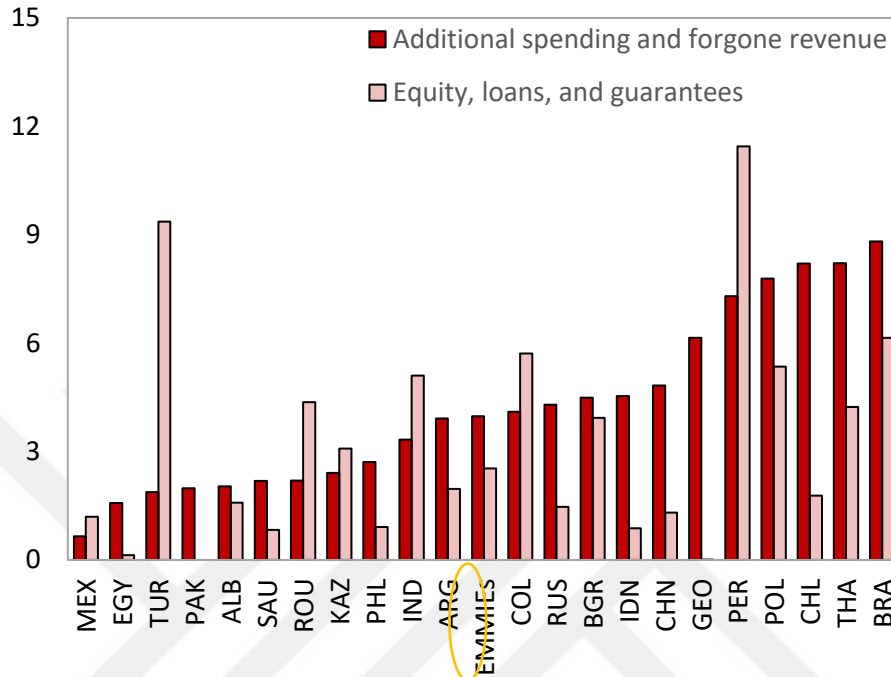


Figure 2: Discretionary Fiscal Response to the COVID-19 Crisis in Developing G20 Economies (Percent of GDP) (Source: IMF, 2020)

According to the IMF Report (2021), Turkey is the country that provides the most liquidity support among the emerging economies of the G20 compared to its GDP. During the outbreak, it was stated that Turkey provides liquid support of 9.4% of its GDP. The Turkish Government spent on medicine, vaccination, and medical equipment TL 4.3 billion, on cash aid and minimum pension TL 7.5 billion, on unemployment benefits TL 5.1 billion, short-time work allowance TL 27.7 billion. The financial burden of the state has increased as a result of the support packages being described, but revenue sources have been indirectly reduced due to the reduction of production and the collapse of the economy. For 2020, the central management budget has given a deficit almost every month.

1.5. Covid-19 Precautions

The easy transmission and death rate of the Covid-19 virus have led decision makers all over the world to take drastic measures. Measures have been taken against the Covid-19 virus, which threatens human health at a global level, restricting or even bringing the daily lives of individuals to a standstill. As a result of these measures,

consumption habits, working conditions, educational methods, and even socializing understandings have changed.

WHO states that the following measures will be useful for protecting Covid-19:

- Avoiding close contact with infected persons,
- Paying attention to hand hygiene, washing hands with soap and water for at least 20 seconds at frequent intervals; using alcohol-based hand antiseptic in the absence of soap and water; especially after direct contact with sick people or their surroundings,
- Avoiding unprotected contact with farms or wild animals,
- If you are infected, maintain distance, cover the mouth and nose with disposable tissues when coughing, sneezing; in cases where there is no tissue paper, use the inside of the elbow, wash the hands; avoid touching your eyes, nose, and mouth,
- Disinfection of surfaces touched by infected persons,
- Thorough cooking of animal foods such as meat and eggs,
- It is important not to enter crowded places if possible, to close your mouth and nose if it is required to enter, and to use a medical mask if possible. (MEDICANA, 2021).

As a result of the measures taken by governments to prevent the Covid-19 pandemic that have affected the whole world since the end of 2019, the consumption habits of people whose lifestyles have been restricted have also been affected. The temporary closure of businesses within the scope of the measures has caused the budgets of individuals and countries to shrink. During epidemics, changes in the needs, activities, and consumption behaviors of consumers began to occur.

Travel restrictions, curfew practices, unpaid leave practices and working hours arrangements, decreased household income, and restrictions on supply naturally caused sectoral demand changes. These contractions in demand and supply have changed the predictions about national income worldwide; international organizations have even warned that the world will suffer its most serious economic crisis since the Great Depression (Deloitte, 2020).

At this point, one of the issues that needs to be examined in particular is the extent to which the changes observed in consumption expenditures due to Covid-19 are permanent. This research, inspired by a new European-wide study (Hodobod et al., 2020), examines the impact of Covid-19 on major consumption items such as tourism travel, entertainment outside the home, personal care outside the home, assisted in

home-related work, and personal development and hobby expenditures outside the home, and analyzes the extent to which these effects are permanent.

The Covid-19 outbreak, which has affected the world, has changed many things from eating and drinking to our socializing habits. Identification of the causes of the changes in consumer behavior due to an epidemic, the fact that it is being made and whether these changes are permanent is an important finding to predict the economy's recovery phase.

In this study, we inspired from An European study (Hodbod et al., 2020), The Covid-19 effects on key consumer items, such as tourism and travel expenditures, entertainment expenditures, personal care expenditures, auxiliary expenditures, and personal development and hobby expenditures have been examined and analyzed in statistical methods for how long these effects are permanent.

Using the online survey, after the first-term constraints of participants (June-September 2020), data were collected on how much change they observed in the current spending groups and what factors they were associated with if these expenditures were reduced. Besides demographic factors, the financial restrictions that participants face, their experiences with disease, their future concerns, and changes in their preferences for the products/services mentioned were also evaluated to explain changes in consumption expenditure as other factors. These data have been collected analyzed by using Pearson Chi-square, in which possible changes in consumption expenditure are related to the previously mentioned factors and to how long these changes are permanent. Specifically, the separation of permanent and temporary changes provides significant empirical findings on the design of policies that are implemented in these areas and the future of companies in these sectors.

As a result of the research, the relationship between expenditures and demographic characteristics, psychological influences and Covid-19 relation was examined. When analyzing the gender effect, it determined that personal care category is the only category that females have reduced spending more than males. The result is parallel to national and international studies. A statistically significant result was found between education and level and decrease in expenditures. As the level of education increases, consumers who are more conscious have reduced their consumption to protect themselves. When questions related to Covid-19 were examined, it was concluded that the spending of over 40 years of age in people with chronic disorders around them or someone over 65 years of age decreased more. Men

who are afraid of losing their jobs have reduced their spending more than women. It is normal for men to feel more pressure on them because in Turkey, men are seen as the main bread maker of the house.

The thesis started with an introduction part, the definition of Covid-19, its effects on the world and Turkish economy, and precautions taken have been emphasized.

In the second part, previous studies in the literature on the impact of shocks such as Covid-19 were included. Then the conceptual framework was drawn with the changing consumer behaviors in crisis moments, and the research was discussed in the field.

In the third part, the methodology and hypothesis were explained. In the survey applied, it was questioned whether the consumption preferences of individuals have changed with Covid-19 and whether this change is permanent. The results of the survey conducted were evaluated with the tables.

In the fourth chapter empirical results were discussed. The results obtained were analyzed in detail and focused on the similarities and differences between the previous studies.

In the fifth and last chapter, the results have been interpreted and made predictions and recommendations for the future.

CHAPTER 2: LITERATURE REVIEW

In this part of the study, details of previous works are provided. The fundamental structure of expenditures focused on the importance of income, the risk of future expectations, and the focus on meeting the most basic needs of mankind. The Covid-19 impact is covered by total expenditures, industry-based studies, and studies where demographic, economic, and Covid-19 related factors are analyzed.

2.1. The Basic Structure of Consumption

In order to analyze the change in consumer spending during Covid-19, it is first necessary to know the basic structure of expenditures. According to conventional economic theories, one of the key determinants of consumption expenditures is income, and the number of expenditures increases as income rises. In cases where individuals have low incomes or in a negative expectation, their spending is also reduced in order to increase future savings, such as the natural disaster and economic crisis. The concern of the Covid-19 pandemics among consumers also drives individuals toward savings and tends to reduce spending.

Many individuals had to suffer from difficulties in the labor market due to lockdowns and lower earnings. In addition to the concerns of disease capture, the concern of loss in income or business has led consumers to less purchase and savings.

It is an undeniable fact that the Covid-19 pandemic will permanently change the way people live and work even after the discovery of vaccines and treatment. Consumer spending, the lifeblood of the global economy, is also projected to change. After the outbreak of the epidemic, the priorities and consumption habits of consumers began to change. As Maslow (1943) noted in his study of the hierarchy of needs or the pyramid of Maslow (Figure 3), people's needs are in a particular priority. For individuals to reach higher needs, they must first address their lower-level needs in the hierarchy. From the bottom of the hierarchy, it is possible to list the needs of the top to the top: physiological, safety, love and belonging, respect, and self-fulfillment. (McLeod, 2020, p. 1).

Human physiological needs must be met to survive as a biological being. Other needs may vary from person to person, but physiological needs are the same for everyone. In other words, to reach the top step, it is necessary to satisfy the basic needs in the lower steps to a certain degree. The individual who meets his/her basic needs only feels good in this way, finally reveals his/her full potential, and can realize

himself/herself. Faced with the Covid-19 pandemic, a shock, and an extraordinary situation, consumers have turned to their needs at the bottom of this hierarchy pyramid. Sudden shocks can put pressure on the elimination of physiological needs. Therefore, after the pandemic announcement, it can be attributed to the human beings who think they cannot meet their physiological needs to empty the shelves in the markets and start stocking them.

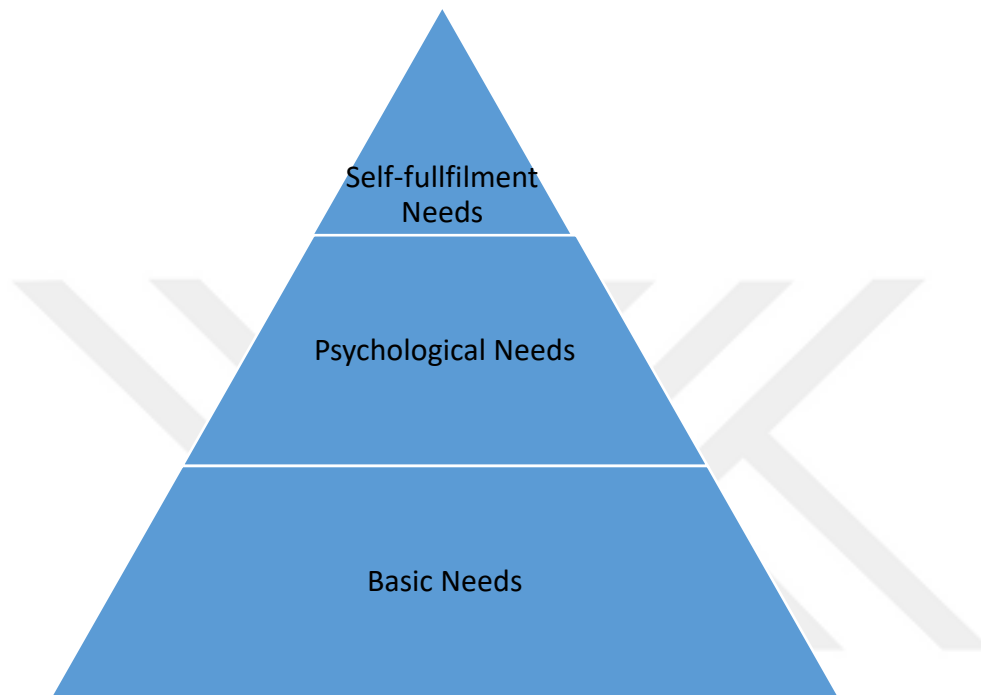


Figure 3: Maslow's Hierarchy (Source: Wikipedia, 2021)

2.2. Covid-19 Impact on Total Expenses and Industries

Human beings have fought epidemics before. However, the impact on none of them has been felt so deeply, and no such war has been launched against any of them. Financing the use of all available health resources to limit the crises, mitigation efforts, quarantine measures, travel restrictions, and infection has forced the economies of all countries.

The work that examines the Covid-19 pandemics on a sectoral basis was discussed and the most affected sectors were discussed. After that, the Covid-19 impact of total expenditure was examined.

Many studies are already in the literature about predicting or understanding the effects of the Covid-19 pandemic on consumer behavior. The effects of the Covid-19 on consumer attitudes worldwide were tried to be understood by the studies carried out immediately after the start of the process. The studies on this subject were discussed under the headings of the theoretical framework summarizing the literature

part of this study, the studies on the pandemic process, and the studies carried out in Turkey.

Consumer purchasing behaviors tend to change in difficult and stressful times, crises are the best examples. In times of economic crisis, it has been stated that there have been changes in the consumers' behavior; they have gone to simplification and tend to consume less than before. The importance of saving has increased. The era of responsible consumption began by turning to organic products or fair trade products (Voinea and Filip, 2011, p. 18).

The Black Plague outbreak, which occurred in the late 14th century, killed more than 200 million people, the majority of the dead population being a working male population, caused labor shortage, and the income of the landowners decreased. The Black Plague has led to the decline of feudal disease and has led to the beginning of capitalism in Europe. It is emphasized that Covid-19 can also cause similar effects. Will Covid-19 result in the disruption of the capitalist production style, as Black Death has led to the elimination of the feudal production style? Would Covid-19 lead to a potential shift from the United States to another country of global leadership, potentially to China, such as the Black Plague, which causes regional leadership to shift from Mediterranean Europe to Northwest Europe? (Chatuverdi, 2020).

McKibbin and Fernando (2020), using Dynamic Stochastic General Equilibrium (DSGE) Models and Computable General Equilibrium (CGE) Models developed by McKibbin and Wilcoxon (1999, 2013), prepared to guide the rule makers in the face of uncertainty created by the Covid-19 pandemic, which affected the entire world's economy, they then focused on seven different scenarios. In an optimistic scenario, 15 million deaths are expected worldwide, but in the worst-case scenario, this number is up to 68 million. A Hong Kong flu-scale outbreak can reduce the world's GDP by \$2.4 trillion, while a Spanish flu-scale outbreak could cause a loss of \$9 trillion. According to scenario 7, which is the worst-case scenario, the highest consumption demand decline will occur in the United States. Government spending is expected to increase. In particular, health expenditures are projected to increase. Countries with the highest number of people affected by the pandemic process have been identified as China and India.

The effect of the Covid-19 pandemic on some sectors has been negative. According to the results of research on consumer expenditures due to the Covid-19 crisis, which McKinsey & Company did globally between March 15 and April 6, 2020,

the trend of decline in restaurants and entertainment centers has been mentioned. The impact of international and long-distance travel barriers in the transportation and tourism sectors has been a narrow one. On Turkey's scale, results showed that 43% of the population's income was negatively affected by the epidemic, 47% of consumers were absent from investing or acquiring new products due to economic uncertainty caused by the outbreak, and 56% of them from spending money. (McKinsey & Company, 2020).

According to UNIDO's Report, manufacturing industrial production, which slowed even before Covid-19, has been hit severely by the pandemic. The Coronavirus pandemic has already caused major health crises in many countries and major disruptions to the global economy. Despite the positive divergence in sectors such as basic pharmaceutical products, beverages, and food products, the situation is likely to worsen in the coming weeks and months, and the economic fallout from the epidemic may represent one of the biggest shocks in recent decades (UNIDO, 2020).

DORinsight conducted research on “changing consumer behavior after the outbreak” with the participation of 5,000 people between 15 and 20 April 2020 and found results on how Turkish people's purchasing behavior was affected. According to the results of the study, 92% of female respondents and 84% of male respondents have said that their purchasing behavior has changed, while 60% have increased monthly spending because of the predicament. "Are you planning to make a major purchase for the next 3 months?" When the question was asked, 72 percent said "No", while 28 percent said "Yes." 63 percent of the participants said they did not plan to take a summer vacation, while 78 percent said the outbreak had changed their summer vacation plans (DORinsight, 2020).

According to the results of KPMG's Turkey Covid-19 survey; while all sectors are feeling the economic effects of Covid-19, it is predicted that the impact will be felt less in the energy, pharmaceutical, industrial production, and chemical sectors than in productions in other sectors. Although the expectations of recovery based on sectors are in line with the expectations in the country's economy, it is predicted that the recovery in the industrial production, textile, tourism, non-domestic consumption, energy, construction, and food and beverage sectors will extend beyond 2020. 88% of survey respondents think that Turkey's economy will be affected by the coronavirus pandemic. 65% of respondents expect high unemployment, and 62% of respondents think budget deficits will increase significantly (KPMG, 2020)

High-frequency, transaction-based consumption data are used to study the impact of Covid-19, in the three-month post-out-break period in prefecture-level cities in China. Spending on goods and services declined by 33% and 34%. As a result of the ban on going out and shutting down businesses in most cities, dining and entertainment and travel consumption fell by 64% and 59%. The daily needs category, the least affected by Covid-19, was reduced by 15%. There is a strong relationship between all spending categories and the interaction of the disease. The results show that the severity of the outbreak has a strong negative correlation between consumptions. In cities which had a higher risk of importing cases and spreading the disease, offline consumption decreased by 11%, and the highest decrease was seen in Wuhan. In regions where case numbers are increasing, expenditures are decreasing, and in areas where cases are reduced, expenditures are increasing. This trend is also explained by the restraint measures taken based on the increase in case counts. The study also discusses whether online spending can be equivalent to offline spending, while online spending in 2018 among the 30 largest cities in China increased by 44% compared to the previous year, while the pandemic increased by 31%. The decrease in online spending has not been as much as offline (Chen et al., 2020).

According to the analysis of the weekly survey conducted by Deloitte in 18 countries, personal consumption expenditures, which account for about 70% of GDP, contracted at a record level in the first quarter of 2020. In the second quarter of the year, we also passed the first quarter and showed a negative change of 10.1% compared to the first quarter. The sharpest contraction in the second quarter was seen in the service sector with 13.3%. This fall in the service sector plays an important role in consumers cutting spending that they no longer see or need to go out to achieve. Recreational services, food services and accommodation on spending with reduced social activities have fallen sharply. The Covid-19 pandemic has caused consumers to worry more about their health and their families, and 33.2% of respondents have expressed concern over last week. The elderly are more concerned about their health than the young, and the women are more concerned about their health than men. There is negative interference on anxiety-level expenditures. Although the number of cases tends to decrease, there has been no decrease in health concerns for consumers, 46.6% said they avoid entering crowded environments such as bar restaurants and 64% said they would not feel safe in activities such as concerts and theaters. In addition to the contraction of the economy, an increase in unemployment has led people to save more.

While 1/3 of people are afraid of losing their jobs; the personal saving rate increased from 8.3% in February to 19% in June (Barua and Levin, 2020).

The Covid-19 crisis has also caused some consumers to save more money than ever before. Because widespread fear has radically changed consumer spending habits. The personal savings rate reached 33% in April, according to the U.S. Bureau of Economic Analysis. This is considered the highest rate of savings since the 1960s. This decrease in savings also resulted in a record 13.6% drop in spending in April. More than 40 million Americans have applied for unemployment pension since the virus appeared, and consumers from closed businesses and income have been forced to build up. In the Great Depression, the market was faced with such a demand shock. Consumer behavior will determine whether the economy will be out of the way soon. However, in this insecure environment, the consumer is beginning to save more money for the future, and the recession continues (Fitzgerald, 2020).

Another factor that affects the consumer behavior is concern. The UK and US-based study examined average family spending for the early period and after Covid-19 and found that a significant proportion of household incomes were allocated to grocery spending and rent expenses during the pandemic while eating out were less budgeted and investment and savings were given more importance. More than the 40% of respondents indicate that they feel worried and anxious during this period. Participants are mostly concerned about their health and economic expectations, and the British are more concerned about their health than Americans. Due to uncertainty about the future, participants in both countries have stated that they reduced their outdoor spending but increased their market spending and started cooking more at home. American participants have started to save and invest more. More than half of the respondents were concerned about losing their income. People experienced an increase in anxiety levels from sitting at home and uncertainty, with nearly half identifying themselves as anxious and worried. The re-increase in the number of infected people indicates that consumer spending will be cut over the next few months (Widjaja and Chipeta, 2020).

In regression analysis with transaction-level data acquired from nonprofit Fintech companies across The United States (Baker et al., 2020), market shelves started to empty, and stocking started as Covid-19 cases began to sound. Household spending has increased by around 50% between February 26 and March 11, and credit card spending increased compared to last year. People's housing and restaurant

spending have reduced by 1/3. Families with children initially made more purchases than families without children, and their shopping expenses fell much more than parents without children because they were stocked. The study also explored the impact of political vision on expenditures and Covid-19 and observed that Republicans were more comfortable than the Democrats, changing both shopping and other spending habits less. However, it was revealed that Republicans had more stockpilers than Democrats. In men, it was concluded that spending habits were less affected by women and were less stocker than women. Since people under 30 are less subject to curfews, there is a slight decrease in spending. In men, it was concluded that spending habits were less affected by women and were less stocker than women. The expenses of individuals from different income groups have been reviewed, and no significant change in the expenses of the high-income group has been observed.

In the study conducted with bank data in France, expenditures dropped from mid-March to mid-May due to the lockdown implemented throughout the country. Besides the decline in spending, there is a strong increase in the personal wealth of the household, which is higher for people with higher income levels. The total increase in personal wealth was 47 billion Euros. While consumers' purchase of durable goods has declined during the lockdown, it is seen that it has recovered very quickly. In the Hospitality sector, this rapid recovery is not available. Hard-ware stores, bookshops, etc. are in the process of recovery, but the recession continues in places like travel agencies, museums, leisure centers (Bounie et al., 2020)

In the study of Aydın and Doğan (2020)'s pandemic on the effects of tourist consumer behavior and tourism sector, as of May 2020, the control of the epidemic and the changing land and behavior of consumers during the period called "New Normal" are examined in the framework of mobility constraints, physical distance, and various hygiene rules. Research is based on previous academic research, reports, and statistical data. Consumers who are worried about getting sick are expected to have changes in their holiday life based on past periods. According to the United Nations World Tourism Organization (UNWTO), the number of international tourists at 1.5 billion in 2019 is expected to decrease by 60% to 80% due to pandemics. (UNWTO, 2020). Tourism is expected to affect other sectors as tourism is a roof sector that affects many sectors from transportation to construction. Social distance measures are expected to increase the focus on more boutique and individual holidays than mass tourism. The concept, including everything that appeals to mass tourism, which dominates Turkish

tourism, is also envisaged by influencing the pandemic. Consumers have started to choose from large hotels such as camping, caravans, seasonal housing rentals, yacht rentals, which have increased interest in these sectors and will continue to increase. The need to take incentive measures for domestic tourists is revealed, as the measures implemented by countries are different from each other, and international travel still does not have full freedom. The concept of tourism for 12 months should be encouraging to follow the social distance rules and avoid stacking up to certain dates (Aydın and Doğan, 2020).

According to a study by McKinsey in 45 countries, including Turkey, consumer sentiment varies among countries. Countries such as China, India, and Indonesia are more optimistic in economic conjuncture expectations after Covid-19, while countries such as Italy, Spain, and Japan are more pessimistic. In other countries, except China and India, expenditures other than mandatory necessities are observed to be reduced. Soon, the survey is expected to reduce the cost of the gym, personal care, vacations, restaurants, and entertainment in almost every country. The survey on when to return activities to stores, restaurants, and out-of-home shows differences between the service and the food/grocery industry. While the delegates say they will return faster, there is a serious segment still within the service sector. In countries other than China, holiday spending is expected to be reduced (McKinsey & Company, 2020).

In McKinsey's future travel sensitivity survey, which tests whether they are ready to travel in China with 1,600 travelers, more than 1/3 participants are optimistic about the economy, while confidence in travel questions has been lower. 56% said they were waiting for September-October to take a vacation. Typically, young, single, and middle-class consumers seem more willing to travel. Compared to April and May, the number of people who find it safe to travel is increasing. More than half of the participants say they will consider domestic travel opportunities instead of abroad. 68% do not find public holidays safe (McKinsey & Company, 2020).

According to a study conducted in, Spanish, the lockdown was introduced on March 15, similar to the whole of Europe and the world, and public gatherings were canceled, online education was switched, and businesses entered the uncertainty process. Despite the financial crisis in 2007, the necessary measures have been taken housing and private sector borrowing has been lowered, but revenue losses have been observed in almost all sectors. It is also important that the Spanish economy has a

greater role in GDP than other European countries. As a result of travel restrictions, restaurants and cafes, accommodation, transport, and entertainment sectors are the sectors with the biggest revenue losses, as well as the sectors with the highest risk of default. Specifically, to ease stagnation in these sectors and stimulate the economy, the public sector can access liquidity and capital and incentivize demand in struggling sectors. Businesses should also aim to increase customer trust and try to move to an online line of business where possible. In the banking sector, for example, customers indicate that they can do transactions themselves that reduce pandemic reasons, and branch numbers should be reviewed in the industry. Another issue that needs to be reviewed is supply chains. (McKinsey & Company, 2020).

According to recent research on the consumer index (EY Future Consumer Index, 2020), Covid-19 revealed four different consumer segments. These are the things that are going to "save and stockpile" (35%), "cut deep" (27%), "stay calm and carry on" (26%), and "hibernate and spend" (11%). What all four categories have in common is that leisure time activities expenses have decreased. At the end of the crisis, the participants say that from the current state of "save and stockpile" to the post-pandemic "stay frugal" and "cautiously extravagant". After the end of the pandemic, cautiously extravagant consumers stated that they expected a global recession. "Get to normal" consumers expect everything to go back to the way it was with the end of the pandemic. After the end of the pandemic, 77% of cautiously extravagant respondents said their spending on activities and leisure would increase, compared to 74% for vacations and holidays, and 55% for outdoor dining. Based on the survey results, two different scenarios were focused, the first being "Society First" claims that people would not hesitate to share their personal information for the health of the community. Fifty-three percent of survey respondents said their personal data were available if it helped monitor and track an infection cluster. The second scenario is the "Waste Nothing" scenario, where consumers will focus on the value of money rather than the price and treat time, talent, and natural resources as equally precious.

In the research conducted by Deloitte, the first negative effects from the Covid-19 pandemic were seen in service sectors that are highly dependent on social interaction. The sectors most affected by the decrease in social interaction were: cinema-culture, events, and entertainment sectors, transportation services, jewelry and jewelry, and sexual health products. It has been observed that consumers prefer to do cook and clean themselves instead of ordering food from outside and cleaning

services. The sharp decline in engagement in categories such as transport and hotel accommodation services, which have a high share of employment but have a relatively low recovery rate, is alarming. It has been observed that individuals who start spending more time at home spend more time and money on hobbies such as knitting and handicrafts. While the first week of increase in personal care and cosmetic expenditures was observed, in the second week there were decreases in demand; successful brands in e-commerce positively diverged during this period. It is expected that the demand for hygiene products and household consumer products will continue to increase in the future. It is observed that the decrease of professional life and office life while working at home and the need for savings negatively affect this category. It is thought that professionals working at home prefer to cook at home due to hygiene concerns and to evaluate their time, and interest in recipe sites have increased. Due to the epidemic, domestic and international holidays and accommodation activities started to slow down in March and continued to decrease rapidly in the following weeks. It is thought that this negative trend will continue in the future. Of all the categories examined, by far the most negatively divergent category was the Culture and Cinema category, which included cultural community activities such as cinema, concerts, and theatre. The sharp decline, which began in early March before the incoming safeguards, continued in the following weeks by losing 95% of the interaction in the comparable January period. It is thought that this downward trend will continue (Deloitte, 2020).

According to another study by Deloitte in December 2020, in parallel with the decrease in the number of cases in the third quarter, personal consumer expenditure (PCE) increased by 8.9% compared to the previous period. This increase in spending has not reduced the unemployment figures. In 2020, expenditure shifted from the service sector to the goods sector, and the nature of consumer spending changed. The unemployment figure is expected to decrease with the increase in vaccinations in the second half of 2021. In 2022, more money is expected to be spent on travel, food services, and entertainment. The number of cases that have increased and decreased continues to affect consumption. In addition to increasing the unemployment figures, 33.2% of those who do not lose their jobs are worried about losing their jobs, and individuals who are worried about their future continue to increase their savings. In addition, the closure of schools may cause women to fall behind in business in the future (Deloitte, 2020).

According to the results of over 10,000 in US surveys, half of the respondents said their income and wealth fell due to Covid-19. Respondents living in counties, expect unemployment to rise in the next 3 to 5 years due to Covid-19. The industries that are most affected by reduced expenditure have been travel and apparel industries. The closure of houses, especially due to quarantine, has caused a decline in shoe sales. Lockdowns caused a decrease in all expenditure categories. Recreation, travel, and entertainment expenses, clothing and footwear, housing expenses including rent and maintenance, transportation, and debt payments, auto, and student loans had the largest declines. As unemployment grows, households' revenues start to fall, households default on their debt payments and rents. Food, education, and childcare consumption had modest drops. Troubled supply chains around the world may create anxiety and increase inflation, while falling demand may negatively affect inflation (Coibion et al., 2020).

Koşaroğlu, Ünal and Yalman, (2020) in the study where the epidemic explores the effects of consumers on demand structure, there has been a decrease in the income of about half of the consumers involved in the research at certain levels, and the negative impact on demand of the loss of business caused by the outbreak was mentioned. Participants have stated that they are avoiding borrowing and making installments due to future uncertainty. During the epidemic, consumers stated that they started making their own bread and food, doing personal care, sports, cleaning and renovation themselves. Most of the people who say they are doing their own bread and personal care have stated that they will not continue after the outbreak. The key percentage of respondents stated that they will continue to perform their activities after the outbreak of sports, hobby, cleaning, food, renovation. In the study, a meaningful relationship was observed between the average monthly income and the cash usage rate, the prepaid shopping rate, the rate of installments, the rate of borrowing, the rate of lending to others and the rate of savings.

2.3. Covid-19 Impact on Demographic, Economic and Covid-19 Related Features

After the social distance measures were removed, it was emphasized that there may be changes in the confidence and preferences of consumers and that there may be permanent changes in consumption expenditure. A total of 7,500 people have been surveyed in five European countries following the change in spending in tourism, hospitality, service, retail and public transport sectors as a result of the measures taken was lackened after the wave. Consumption expenditures for the period of closure and normalization of the study are compared. According to Hodbord et al., (2020), the reasons behind the reduction of expenditures are classified as financial inadequacy, risk of infection, more savings due to future insecurity, shifting to online alternatives, and changing preferences. While financial inadequacy or the desire to save more can be addressed through financial support packages provided by governments, health concerns can be eliminated by controlling the disease. In the results, most of the participants stated that their expenditure was reduced compared to the past, and the biggest decrease was in the tourism, public transport, and hospitality sectors, respectively. While the socioeconomic features of participants such as income and education are not effective in changing spending, their experiences with the disease have been effective and their expectations of the future have been effective. The factor in reducing spending in all categories is the concern of being infected. Especially in the service and hospitality sectors, participants have started to find their previous expenditures unnecessary. The necessity of future savings in Italy and Spain has been effective in reducing spending. Participants who say their spending has decreased due to the financial restrictions are very few. Since there are no financial difficulties behind the reduction of expenditures, VAT discounts will have no impact on estimating the economy, but demand shrinking, especially due to the change of preferences in the service and retail sectors, could increase unemployment in these sectors in the long term. It is underlined that governments must provide industry assistance and configuration to prevent unemployment in some sectors. According to the Probit Estimation Model results created by the data obtained, women in all categories have reduced spending more than men. Age and education levels have not been found as a meaningful variable in reducing expenses. As the income level increases, personal maintenance expenditures have been observed to decrease during Covid-19. (Hodbod et al., 2020).

The study (Cotton et al., 2021), examined the effect of high-frequency credit/debit card data on economic, demographic, and Covid-19 factors (such as lockdowns, virus fear, and vaccination rate) expenditures, and concluded that political affiliation, age, education, and Covid-19 factors have a significant relationship with the reduction of spending. It has been revealed that high-income and highly trained groups spend less than low-income and low education groups. Although it was mentioned that older people spend less than young people, the increase in case numbers has also been effective in reducing spending. It was stated that people who were vaccinated started to spend more time. The spending categories are also classified as social-distancing-sensitive and nonsocial-distancing-sensitive, with more reduction in social-distancing-sensitive spending, such as travel and restaurant dining.

In the microeconomic model created (Martin et al., 2020), the effects of social distance practices on household income, savings, expenditure, and poverty have been explored. Two periods are considered in the model; it is the period when their incomes decrease (crisis period) and they use their existing savings to meet their expenses and the period when incomes return to normal and they save to replace their savings (recovery period). A three-month shutdown period to be implemented will increase the poverty rate from 17.1% to 25.9% as there is no social assistance and is expected to affect the low-income group the most. Individual spending and consumption will decrease significantly and the recovery process will take a year. With a general decrease in demand, the change in people's consumption behavior, and the general slowdown in economic activities, the process may be prolonged. In the second scenario with state support, the poverty rate will increase from 17.1% to 19%, and the recovery period will be 6.7 months on average. According to the results, citizens who do not benefit from any state aid fell below the hunger limit and experience sharp reductions in spending and savings and the average recovery time for individuals is almost one year. Citizens who benefit from the financial assistance offered by the state are found to have no change in their spending.

According to the results of the survey conducted in March to measure consumers' concerns about Covid-19, their expectations about the FED, and their expectations about inflation and unemployment, while almost all of the participants follow the developments about the Coronavirus, their answers about the effects on the economy, their health and income rate. 28% of consumers have canceled or postponed their travel programs, and 40% have made expenditures for stock purposes. It was

observed that participants who were more concerned about their own and their families' health canceled their programs. Those who follow developments related to the disease more closely tend to be more worried. Compared to men, women follow developments related to the disease more closely and are more concerned about the economy and their financial situation. No significant relationship was mentioned between other demographic characteristics and expectations. 36.1% of respondents expect unemployment to rise, while 57.4% expect it to remain at the same level (Barro et al., 2020).

According to the Study of Guder et al., (2020), lower-income groups (those who receive 3,000TL and below income), public transportation usage according to higher-income participants, public activities (cinema, concert, match, etc.) participation, canceling holiday plans, and using online shopping differs from the higher-income group. It is seen that participants between the ages of 18 to 30 do not care much about the Covid-19 outbreak on holiday, do not change holiday plans for consumers with other age ranges, and do not have any ideas about staying away from crowded places. It is different from undergraduate and graduate education students are reduced in entertainment/art spending according to primary education and high school graduates, and there will be an increase at the end of the epidemic. Public vehicles are less used than primary and high school graduates, and graduate students are less likely to use public transport vehicles for 6 months (cinema, concert, match, etc.) than those at lower educational levels of graduate education. It appears that higher education will cancel their holiday plans compared to those at low educational levels.

Kurtoğlu and Dalkılıç (2021), has conducted a one-way MANOVA analysis, while studying whether individuals face impact on the daily life and behavior varies according to their demographic and socio-economic characteristics, and four factors whose specifics are greater than 1.00 have been identified. The analysis of “Mask-Distance-Hygiene”, “Conscious Shopping”, “Price and Environmental Sensitivity” and “Online Shopping Factors” have resulted in significant differences in the evaluation of individuals based on age, education, economic situation and chronic discomfort. Consumers over the age of 35 have found that they shop more consciously during the epidemic than consumers in other groups, and consumers between the ages of 26-34 prefer to shop online more than consumers in other groups. The level of education and conscious shopping, price and environmental sensitivity and meaningful relationships in online shopping factors were observed.

In the literature review, the Covid-19 epidemic has affected the service sector, where social contact is the most common result of the data obtained. Research in the literature shows that the sectors most affected are those related to transportation, entertainment, retail, accommodation, and eating. Closing country borders, stopping flights, and travel restrictions within the country negatively affected the tourism sector. Tourism revenues are falling worldwide. The closing measures, restaurants and cafes felt the effects of closure most deeply. Once again, one of the most affected businesses is hairdressers and beauty centers. Where it is not possible to maintain social distance while receiving service, these places have been visited less by consumers even after the ban was lifted. Consumers who are spending more time in their homes have started spending more time and money on their homes. There has also been reduced personal development and hobby spending, which has also been taken from social distance rules.

During Covid-19, many studies have been conducted about demographic features. The impact of demographic features such as gender, age, income level, and education levels have been discussed. Similarly to demographic features, it has been seen that disease relationships, anxiety, and expectations for the future have an impact on expenditure.

CHAPTER 3: METHODOLOGY

3.1. Purpose and Importance of Research

The aim of the research is to determine the effects and interactions of the current process on consumer behavior. This is possible by analyzing the reactions of consumers well.

In this section, information is given about the purpose of the research, sampling, data collection methods, hypotheses of the research, and the analyses used in the research. April was the month when the pandemic effect was felt most intensely. There have been serious shocks both in terms of supply and demand. In June, due to the declining trend in the number of cases and deaths, it was decided to loosen travel and curfew restrictions to stimulate the stalled economy and to open businesses such as barber shops, shopping malls, and restaurants in whole or in part. The survey asked consumers to compare past habits with the June-September period when they acted more comfortably as a result of relaxation. The study aims to detect changes in purchasing behavior experienced by consumers due to the Covid-19 pandemic. Due to the measures taken all over the world and quarantine practices, it has been predicted that there will be changes in the purchasing behavior of consumers. In the thesis study, the hypothesis suggests that the Covid-19 pandemic changes consumer preferences, and the answers to this question will be sought with the survey application. According to the emergence of the pandemic, the spending trends of consumers was examined.

According to the results of the survey conducted by 500 people in India, where the impact of epidemics on consumption habits was analyzed, 90% of the respondents stated that their spending habits had changed, and 73% of the expenditures were reduced. Participants said they spent more money on the required products, avoiding large purchases. More than half of the consumers are out of business because of the pandemic. The fear of Covid-19 has given participants the answers they will pay attention to and prioritize in the future. Consumers believe that spending trends will change permanently (Kumar and Abdin, 2020).

According to the results of the survey conducted to measure willingness to pay for participation in everyday life and amusement events, the social distance measures taken have reduced people's willingness to participate in everyday life activities. Pearson correlation analysis was conducted with the collected survey results, WTP (pay willingness to pay) a strong negative correlation between WTP (willingness to

pay) and case numbers were observed. Negative and significant relationships for females and 45+ and risk groups were reported (Warkulat et al., 2021).

3.2. Method

For this purpose, an online survey was applied. The survey used the snowball method and was delivered to participants via Whatsapp, LinkedIn and Twitter. In the snowball sampling method, first of all, it's the one that's in the research universe, the first unit (person or entity) that the researcher can reach its determination. In light of the data from these units to be able to represent the universe by reaching the next unit, the creation of the sampled example, and thus the sample volume, which initially consists of a single unit, it is intended to be enlarged like a snowball (Ural, 2011:46). The snowball method used in the survey study is a nonrandom sample selection model, and while generalizing the results, it needs to be cautious.

The survey asked the attendants how their consumption has changed during the dance phase compared to before the Covid-19 outbreak. Also, the main reason for their consumption change was evaluated. The survey covers three sectors and activities: tourism (traveling abroad for private reasons), hospitality (restaurants, bars, and cafes), and services (such as house cleaning and personal care services). The survey analyzed five different reasons for explaining consumer behavior changes, (i) financial constraints, (ii) worry of infection risk, (iii) a lack of confidence in the future that induces a rise in precautionary savings, (iv) no longer seen as a necessity, or (v) obtain it in another way (making it yourself at home, obtaining it without purchasing). To achieve meaningful results, these responses were evaluated under three categories, including the risk of disease capture, economic factors, and other causes. While the risk of infection and economic factors have temporary effects, other causes may have a lasting impact on expenditures.

3.3. Research Hypotheses

In the thesis study, the relationship between 10 different variables and the reduction of their expenditures has been examined, and 5 sub hypotheses have been prepared under each hypothesis.

The most important factors affecting consumer litigation are demographic features (age, education, vocational, gender, etc.), it can be classified as economic factors and psychological factors.

In this study, hypotheses were established and used in previous studies to focus on these factors.

The first six hypotheses are based on the demographic characteristics of the participants, and the other hypothesis is based on factors linked to Covid-19.

Hypothesis 1

H0: There is no relationship between the gender of participants and cutting expenditures due to Covid-19.

H1: There is a relationship between the gender of participants and cutting expenditures due to Covid-19.

Hypothesis 2

H0: There is no relationship between the age of participants and cutting expenditures due to Covid-19.

H1: There is a relationship between the age of participants and cuts in expenditures due to Covid-19.

Hypothesis 3

H0: There is no relationship between the education level of participants and cutting expenditures due to Covid-19.

H1: There is a relationship between the education level of participants and cutting expenditures due to Covid-19.

Hypothesis 4

H0: There is no relationship between the income level of participants and cutting expenditures due to Covid-19.

H1: There is a relationship between the income level of participants and cutting expenditures due to Covid-19.

Hypothesis 5

H0: There is no relationship between the income sufficiency of participants and cutting expenditures due to Covid-19.

H1: There is a relationship between the income sufficiency of participants and cutting expenditures due to Covid-19.

Hypothesis 6

H0: There is no relationship between the close relationship with elderly/chronical diseased ones of participants and cutting expenditures due to Covid-19.

H1: There is a relationship between the close relationship with elderly/chronical diseased ones of participants and cutting expenditures due to Covid-19.

Hypothesis 7

H0: There is no relationship between being infected and cutting expenditures due to Covid-19.

H1: There is a relationship between being infected of participants and cutting expenditures due to Covid-19.

Hypothesis 8

H0: There is no relationship between a deterioration in the economic situation and cutting expenditures due to Covid-19.

H1: There is a relationship between a deterioration in the economic situation and cutting expenditures due to Covid-19.

Hypothesis 9

H0: There is no relationship between feeling more depressed and cutting expenditures due to Covid-19.

H1: There is a relationship between feeling more depressed and cutting expenditures due to Covid-19.

Hypothesis 10

H0: There is no relationship between being worried about losing jobs/income and cutting expenditures due to Covid-19.

H1: There is a relationship between being worried about losing jobs/income and cutting expenditures due to Covid-19.

3.4. Analysis of The Data

All statistical analyses were analyzed by IBM SPSS 26.0 program. (Statistical Package for Social Science). In the analysis of the research, descriptive and statistical analysis techniques were used according to the attendants' answers. Determination of the relationship between attendants' spending habits and their socio-demographic information evaluated by "Chi-Square" analysis.

Statistical significance was evaluated at $p < 0.05$ level in all found the results.

3.5. Results

Covid-19 Impact on Expenses Questionnaire was applied 172 attendants for research data. Demographic questions were asked in the survey content. The data analysis carried out 'Economic and demographic profiles of the participants include descriptive analysis for variables and Chi-square test results'.

Determination of the relationship between participants' demographic characteristics and cutting expenditures evaluated by "Chi-Square" analysis.

In this part of the study, the relationship between participants' expenditures and gender, age, education status, household income level, working status, economic satisfaction, relationship with elderly/chronical diseased people, getting infected, deterioration in the economic situation, feeling less or more concerned about Covid-19 and being worried about losing their job/revenue.

3.5.1. Economic and Demographic Profile of Participants

In this part of the study, participants' gender, age, education level, household income level, worry status, economic satisfaction, and having anyone in the household (or in the environment they see all the time) who has chronic disease and/or is over 65 were analyzed with frequency analysis.

The distribution of the gender status of the participants in the study is given in Table 3.

Table 3: Distribution of Gender Status of Participants

	Demographic Feature	F	%
Gender Status	Female	97	56.4
	Male	75	43.6
	Total	172	100

According to the results of the frequency analysis made in Table 3; it was concluded that 56.4% of the participants involved in the study were female, and 43.6% were male. The age distribution of participants is shown in Table 4.

Table 4: Distribution of Age Status of Participants

	Demographic Feature	F	%
Age Status	20-29	34	19.8
	30-39	72	41.9
	40-49	46	26.7
	50-65	20	11.6
	Total	172	100

According to the results of the frequency analysis made in Table 4; It is seen that 11.6% of the participants involved in the study are 50 to 65 years old, 26.7% are 40 to 49 years old, 41.9% are 30 to 39 years old and 19.8% are 16 to 18 years old. The distribution of the participants involved in the study according to the education level presented in Table 5.

Table 5: Distribution of Education Level of Participants

	Demographic Feature	F	%
Education Level	Primary/Secondary School	9	5.2
	High School	20	17.4
	University	105	61.0
	Master/Ph. D	28	16.3
	Total	172	100.0

According to the results of the frequency analysis made in Table 5; It is observed that 16.3% of the participants included in the survey were graduated from master/ph. D, 61% of the participants included in the survey were graduated from university, 17.4% of the participants were graduated from high school and 5.2% of the participants were graduated from primary/secondary school. The income distribution of participants included in the study is presented in Table 6.

Table 6: Distribution of Household Income Level of Participants

	Demographic Feature	f	%
Household Income	<5,000 TL	36	20.9
	5,000-7,500 TL	40	23.3
	7,500-10,000 TL	19	11.0
	>10,000 TL	77	44.8
	Total	172	100.0

According to the results of the frequency analysis made in Table 6; 44.8% of the participants included in the survey has household income above 10,000 TL, 11% of the participants included in the survey has household income between 7,500 TL and 10,000 TL, 23.33% of the participants has household income level between 5,000 TL

and 7,500 TL and 20.9% of the participants has household income below 5,000 TL. The working status of participants included in the study is presented in Table 7.

Table 7: Distribution of Working Status of Participants

	Demographic Feature	f	%
Working Status	Working	129	75.0
	Not working	30	17.4
	Looking for a job	13	7.6
	Total	172	100.0

According to the results of the frequency analysis made in Table 7; It is seen that 75% of the participants have a job, 17.4% of the participants is not working and 7.6% of the participants are looking for a job. The economic satisfaction of the participants in the study is presented in Table 8.

Table 8: Distribution of Economic Satisfaction of Participants

	Demographic Feature	f	%
Economic Satisfaction	Not Satisfied	77	44.8
	Satisfied	95	55.2
	Total	172	100.0

The answers to the question 'which of the following best describes your current household income' were combined and evaluated as two categories, 'those experiencing existing income and economic distress' and 'those who have no economic problems with existing income'.

According to the results of the frequency analysis made in Table 8; 44.8 % of the participants states that with existing income, they have economic distress and 55.2% of the participants states that with existing income, they don't have economic problems. The distribution of participants having anyone in the household who has chronic disease and/or is over 65 years old is presented in Table 9.

Table 9: Distribution of Having Anyone Who Has Chronic Disease and/or is over 65 of Participants

	Demographic Feature	f	%
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Table 9 (cont'd): Distribution of Having Anyone Who Has Chronic Disease and/or is over 65 of Participants

Chronical diseased/elderly relationship	Yes	98	57.0
	No	73	42.4
	Total	171	99.4

According to the results of the frequency analysis made in Table 9; While 57% of the participants have someone in the household who has chronic disease and/or is over 65, 42.4% of the participants have not. The distribution of the participants themselves or their immediate neighborhood are infected is presented in Table 10.

Table 10: Distribution of the participants themselves or their immediate neighborhood are infected

		f	%
Getting infected	Yes	118	68.6
	No	54	31.4
	Total	172	100.0

According to the results of the frequency analysis made in Table 10; 68.6% of respondents said that they or their immediate environment had been infected, and 31.4% said they had not been infected. The distribution of the participants' deterioration in their or their families' economic situation is presented in Table 11.

Table 11: Distribution of the participants' deterioration in their or their families' economic situation

		f	%
Deterioration in the economic situation	Yes	118	68.6
	No	54	31.4
	Total	172	100.0

According to the results of the frequency analysis made in Table 11; 51.2% of the participants state that Covid-19 has caused a deterioration in the economic situation of themselves or their family (loss of business, reduced jobs, bankruptcy, debt payment, etc.) and 48.8% of the participants state that Covid-19 has not caused a deterioration in the economic situation of themselves or their family. The distribution of Participants' Concern Level is presented in Table 12.

Table 12: Distribution of Participants' Concern Level

		f	%
Concern Level	Less Concerned	124	72.1
	More Concerned	48	27.9
	Total	172	100.0

The answers to the question “When you think of COVID-19, how often do you feel a sense of desperation?” were combined and evaluated as two categories, 'those less concerned (who said never, 1-2 times in the last month and sometimes) and 'those more concerned'(who said often in the last month and a few times every day in the last month).

According to the results of the frequency analysis made in Table 12; 72.1% of respondents say they are less concerned when considering Covid-19 and 27.9% are more concerned. The Distribution of Participants' Being Worried About Losing Their Job/Revenue is presented in Table 13.

Table 13: Distribution of Participants' Being Worried About Losing Their Job/Revenue

		f	%
Being worried about losing their job/income	Yes	89	51.7
	No	83	48.3
	Total	172	100.0

According to the results of the frequency analysis made in Table 13; 51.7% of the participants feel worried about losing their job/revenue while 48.3% do not have worries about losing their job/revenue.

3.5.2. Distribution of Participants Answers to the Expenditure Changes Answers

In this part of the study, the distribution of the answers given by the participants to the tourism expenditure changes presented in Table 14. The answers were analyzed by frequency analysis.

Table 14: The Distribution of The Answers to Changes in Tourism Expenditures

		F	%
Travel Expenses	Decreased	144	83.7
	Did not change	28	16.3
	Total	172	100.0

According to the results of the frequency analysis made in Table 14; 83.7% of the participants state that their travel expenses for tourism purposes during June-September decreased and 16,3% of the participants did not changed. The distribution of the answers to change in cafe-restaurant expenditures during June-September 2020 is presented in Table 15.

Table 15: Distribution of The Answers to Changes in Cafe-Restaurant Expenditures

		F	%
Cafe-Restaurant Expenses	Decreased	145	84.3
	Did not change	27	15.7
	Total	172	100.0

According to the results of the frequency analysis made in Table 15; 84.3% of the participants state that their travel expenses outside home (cafe, bar and restaurants) during June-September decreased and 15.7% of the participants did not changed. This spending group is also important that restaurants and cafes are not open at closing and consumers are not able to go to eat there, whether they want to. The reason behind this reduction is important for the results of the thesis. The distribution of the answers to change in personal care expenditures during June-September 2020 is presented in Table 16.

Table 16: Distribution of The Answers to Changes in Personal Care Expenditures

Table 16 (cont'd): Distribution of The Answers to Changes in Personal Care Expenditures

		F	%
Personal Care Expenses	Decreased	117	68.0
	Did not change	55	32.0
	Total	172	100.0

According to the results of the frequency analysis made in Table 16; it is seen that 68% of the participants stated that their personal care expenses outside home during June-September decreased and 15,7% of the participants did not changed. The category that shows the most reduction in all spending categories is the category of personal maintenance expenditures. Also, the long-term closure of hairdressers and beauty parlors is effective in decreasing this category. People are also afraid to receive this service because social distance cannot be maintained while taking personal care. The reason behind its decline is important to understand the behavior ahead. The distribution of the answers to change in auxiliary expenditures on household-related work (house cleaning) during June-September 2020 is presented in Table 17.

Table 17: Distribution of The Answers to Changes in Auxiliary Expenditures on household-related work (house cleaning)

		f	%
Auxiliary Expenses	Decreased	52	30.2
	Did not change	120	69.8
	Total	172	100.0

According to the results of the frequency analysis made in Table 17; While 30.2% of the participants states that their auxiliary expenditures on household-related work (house cleaning) during June-September 2020 is decreased and 69.2% did not. This has been the category that shows the least decrease compared to other categories. The majority of participants are working, so they continue to seek outside help even if it is pandemic. The distribution of the answers to change in personal development and hobby expenses outside home during June-September 2020 is presented in Table 18.

Table 18: Distribution of The Answers to Changes In Personal Development and Hobby Expenses Outside The Home

		f	%
Personal Development and Hobby Expenses	Decreased	84	48.8
	Did not change	88	51.2
	Total	172	100.0

According to the results of the frequency analysis made in Table 18; 48.4% of the participants states that their personal development and hobby expenses outside the home during Covid-19 period decrease, otherwise 51.2% did not change. The only category of personal development and hobby participants have responded to in half has been the category where we get the meaningful answers to change groups and causes.

3.5.3. The Demographic Characteristics and Covid-19 Related Questions with Their Changes in Consumption in Different Categories

In this part of the study, participants' responses to the demographic features and the responses to the Covid-19 related questions were analyzed to five different spending categories.

Table 19: Comparison of Participants' Demographic Characteristics and Covid-19 Related Questions with Their Changes in Tourism Expenditures

		Tourism Expenses			
		Decreased		No change	
		n	F	N	f
Gender	Female	85	87.6%	12	12.4%
	Male	59	78.9%	16	21.3%
Age	20-29	28	82.4%	6	17.6%
	30-39	67	93.1%	5	6.9%
	40-49	33	71.7%	13	28.3%
	50-65	16	80%	4	20%

Table 19 (cont'd): Comparison of Participants' Demographic Characteristics and Covid-19 Related Questions with Their Changes in Tourism Expenditures

Education	Primary/Secondary School	6	66.7%	3	33.3%
	High School	24	80%	6	20%
	University	89	84.8%	16	15.2%
	Master/Ph. D.	25	89.3%	3	10.7%
Income Level	<5,000 TL	29	81.6%	7	19.4%
	5,000 TL-7,500 TL	33	82.5%	7	17.5%
	7,500 TL-10,000 TL	17	89.5%	2	10.5%
	>10,000 TL	65	84.4%	12	15.6%
Working Status	Working	110	85.3%	19	14.7%
	Not working	23	76.7%	7	23.3%
	Not working but Looking for a job	11	84.6%	2	15.4%
Income Sufficiency	Have difficulties	63	81.8%	14	18.2%
	Don't have difficulties	81	85.4%	14	14.7%
Elderly& Chronical Disease Relationship	Yes	82	83.7%	16	16.3%
	No	61	83.6%	12	16.4%
Getting infected	Yes	98	83.1%	20	16.9%
	No	46	85.5%	8	14.8%
Deterioration in the economic situation	Yes	74	84.1%	14	15.9%
	No	70	83.3%	14	16.7%
Feeling depressed	Less concerned	102	82.3%	22	17.7%
	More concerned	42	87.5%	6	12.5%

Table 19 (cont'd): Comparison of Participants' Demographic Characteristics and Covid-19 Related Questions with Their Changes in Tourism Expenditures

Worried about losing job/revenue	Yes	79	88.8%	10	11.2%
	No	65	78.3%	18	21.7%

87.6% of female respondents and 78.9% of men stated that tourism spending has decreased. Although most of the participants' tourism expenditures have decreased, the rate in women appears to be more than men. Tourism expenditures in all age groups have been significantly reduced, while the maximum age range of 30-39 years has reduced their spending in this category, on the other hand, the least affected is the age range of 40-49. Given the impact of the education level on tourism spending, it is seen that the spending of primary and secondary school graduates is at least affected. As the level of education increases, the decrease in tourism spending also tends to increase. The impact of income level on tourism spending is equal in all income groups. It has been observed that working participants have reduced holiday spending compared to those who do not work. It has been concluded that those who are worried losing their jobs and revenues have reduced their spending more on tourism.

Table 20: Comparison of Participants' Demographic Characteristics and Covid-19 Related Questions with Their Changes in Outside Home Expenditures

		Bar & Cafe Expenses			
		Decreased		No change	
		n	f	n	F
Gender	Female	85	87.6%	12	12.4%
	Male	60	80%	15	20%
Age	20-29	26	76.5%	8	23.5%
	30-39	66	91.7%	6	8.3%
	40-49	36	78.3%	10	21.7%
	50-65	17	85%	3	15%

Table 20 (cont'd): Comparison of Participants' Demographic Characteristics and Covid-19 Related Questions with Their Changes in Outside Home Expenditures

Education	Primary/Secondary School	6	66.7%	3	33.3%
	High School	21	70%	9	30%
	University	92	87.6%	13	12.4%
	Master/Ph.D.	26	92.9%	2	2,
					7.1%
Income Level	<5,000 TL	25	69.4%	11	30.6%
	5,000 TL-7,500 TL	36	90%	4	10%
	7,500 TL-10,000 TL	17	89.5%	2	10.5%
	>10,000 TL	67	87%	10	13%
Working Status	Working	112	86.8%	17	13.2%
	Not working	23	76.7%	7	23.3%
	Not working but looking for a job	10	76.9%	3	23.1%
Income Sufficiency	Have difficulties	62	80.5%	15	19.5%
	Don't have difficulties	83	87.4%	12	12.6%
Elderly& Chronical Disease Relationship	Yes	85	86.7%	13	13.3%
	No	59	80.8%	14	19.2%
Getting infected	Yes	101	85.6%	17	14.4%
	No	44	81.5%	10	18.5%
Deterioration in the economic situation	Yes	75	85.2%	13	14.8%
	No	70	83.3%	14	16.7%

Table 20 (cont'd): Comparison of Participants' Demographic Characteristics and Covid-19 Related Questions with Their Changes in Outside Home Expenditures

Feeling depressed	Less concerned	103	83.1%	21	16.9%
	More concerned	42	87.5%	6	12.5%
Worried about losing job/revenue	Yes	77	86.5%	12	13.5%
	No	68	81.9%	15	18.1%

It is seen that women reduce bar and cafe spending more than men. The age group that most reduces their spending in this category is 30-39 years old. Age groups that reduce their spending at least are ages 20-29 and 40-49. Those who change their spending at least are graduates of elementary school and secondary school. As the level of education increases also in this category, the decrease in spending has increased. Under 5,000 TL income owners reduced restaurant cafe spending less than those in higher income groups. Again, employees have reduced spending more than those who don't work. Interestingly, participants who saw their income inadequate reduced restaurant and cafe spending less than those who considered it adequate.

Table 21: Comparison of Participants' Demographic Characteristics and Covid-19 Related Questions with Their Changes in Personal Care Expenditures

		Personal Care Expenses			
		Decreased		No change	
		N	f	N	f
Gender	Female	66	74.2%	31	25.8%
	Male	45	60.00%	30	40%
Age	20-29	26	76.5%	8	23.5%
	30-39	51	70.8%	21	29.2%
	40-49	25	54.3%	21	45.7%
	50-65	15	75,00%	5	25%
Education	Primary/Secondary	4	44.4%	5	55.6%
	High School	21	70,00%	9	30%
	University	73	69.5%	32	30.5%
	Master/Ph.D.	19	67.9%	9	32.1%

Table 21 (cont'd): Comparison of Participants' Demographic Characteristics and Covid-19 Related Questions with Their Changes in Personal Care Expenditures

Income Level	<5,000 TL	26	72.2%	10	27.8%
	5,000 TL-7,500 TL	25	62.5%	15	37.5%
	7,500 TL-10,000 TL	14	73.7%	5	26.3%
	>10,000 TL	52	67.5%	25	32.5%
Working Status	Working	86	66.7%	43	33.3%
	Not working	21	70,00%	9	30%
	Not working but looking for a job	10	76.9%	3	23.1%
Income Sufficiency	Have difficulties	51	66.2%	26	33.8%
	Don't have difficulties	66	69.5%	29	30.6%
Elderly& Chronical Disease	Yes	69	70.4%	29	29.6%
	No	48	65.8%	25	34.2%
Relationship					
Getting infected	Yes	81	68.6%	37	31.4%
	No	36	66.7%	18	33.3%
Deterioration in the economic situation	Yes	69	78.4%	19	21.6%
	No	48	57.1%	36	42.9%
Feeling depressed	Less concerned	80	64.5%	44	35.5%
	More concerned	37	67.1%	11	22.9%
Worried about losing job/revenue	Yes	69	77.5%	20	22.5%
	No	48	56.5%	35	42.2%

In the category of personal care expenditures, it also appears that women are reducing their spending more than men. The spending of 40-49 years old varies at least and 20-29 at most. Those who suffer from deterioration in their economic situation have reduced their personal care spending more than those who do not. Similar to other categories, those who are afraid of losing their job or income have reduced their spending more than those who are not afraid.

Table 22: Comparison of Participants' Demographic Characteristics and Covid-19 Related Questions with Their Changes in Auxiliary Expenditures

		Auxiliary Expenses			
		Decreased		No change	
		N	f	n	f
Gender	Female	32	33,00%	65	67,00%
	Male	20	26.7%	55	73.3%
Age	20-29	4	11.8%	30	88.2%
	30-39	29	40.3%	43	59.7%
	40-49	14	30.4%	32	69.6%
	50-65	5	25,00%	15	75,00%
Education	Primary/Secondary School	0	0,00%	9	100,00%
	High School	3	10,00%	27	90,00%
	University	38	35.2%	68	64.8%
	Master/Ph.D.	12	42.9%	16	57.1%
Income Level	<5,000 TL	8	22.2%	28	77.8%
	5,000 TL-7,500 TL	19	47.5%	21	52.5%
	7,500 TL-10,000 TL	6	31.6%	13	68.4%
	>10,000 TL	19	24.7%	58	75.3%

Table 22 (cont'd): Comparison of Participants' Demographic Characteristics and Covid-19 Related Questions with Their Changes in Auxiliary Expenditures

Working Status	Working	39	30.2%	90	69.8%
	Not working	10	33.3%	20	66.7%
	Not working but looking for a job	3	23.1%	10	76.9%
Income Sufficiency	Have difficulties	27	35.1%	50	64.9%
	Don't have difficulties	25	26.3%	70	73.7%
Elderly& Chronical Disease Relationship	Yes	27	27.6%	71	72.4%
	No	25	34.2%	48	65.8%
Getting infected	Yes	31	26.3%	87	73.7%
	No	21	38.9%	33	61.1%
Deterioration in the economic situation	Yes	31	35.2%	57	64.8%
	No	21	25,00%	63	75,00%
Feeling depressed	Less concerned	36	29,00%	88	71,00%
	More concerned	16	33.3%	32	66.7%
Worried about losing job/revenue	Yes	31	34.8%	5	62.1%
	No	21	25.3%	62	74.7%

The category showing the least reduction is a category of auxiliary expenses. By a small difference, women have reduced their spending more than men. The group that most reduces their spending has been 20-29 years old. As the level of education

increases, the decrease in spending in this category increases. The participants who indicated that they were infected were less affected than those who were not. Those who are concerned about losing their job or income have reduced their spending also in this category.

Table 23: Comparison of Participants' Demographic Characteristics and Covid-19 Related Questions with Their Changes in Personal Development and Hobby Expenditures

		Personal Development &Hobby Expenses			
		Decreased		No changes	
		n	f	n	f
Gender	Female	47	48.5%	50	51.5%
	Male	37	49.3%	38	50.7%
Age	20-29	12	35.3%	22	64.7%
	30-39	34	47.2%	38	52.8%
	40-49	28	60.9%	18	39.1%
	50-65	10	50,00%	10	50,00%
Education	Primary/Secondary School	4	44.%	5	55.6%
	High School	8	26.7%	22	73.3%
	University	55	52.4%	50	47.6%
	Master/Ph.D.	17	60.7%	11	39.3%
Income Level	<5,000 TL	12	33.3%	24	66.7%
	5,000 TL-7,500 TL	18	45,00%	22	55,00%
	7,500 TL-10,000 TL	7	36.8%	12	63.2%
	>10,000 TL	47	61.00%	30	39.00%
Working Status	Working	70	54.3%	59	45.7%
	Not working	11	36.7%	19	63.3%
	Not working but looking for a job	3	23.1%	10	76.9%

Table 23 (cont'd): Comparison of Participants' Demographic Characteristics and Covid-19 Related Questions with Their Changes in Personal Development and Hobby Expenditures

Income Sufficiency	Have difficulties	27	35.1%	50	64.9%
	Don't have difficulties	57	60.00%	38	40.00%
Elderly& Chronic Disease Relationship	Yes	49	50,00%	49	50,00%
	No	34	46.6%	39	53.4%
Getting infected	Yes	60	50.8%	58	49.2%
	No	24	44.4%	30	55.6%
Deterioration in the economic situation	Yes	37	42.00%	51	58.00%
	No	47	5600%	37	44.00%
Feeling depressed	Less concerned	66	53.2%	58	46.8%
	More concerned	18	37.5%	30	62.5%
Worried about losing job/revenue	Yes	39	43.8%	50	56.2%
	No	45	54.2%	38	45.8%

The most decrease is seen in the hobby and entertainment category, and the obtained results are surprising. Unlike other categories, gender awareness has not been noticed in this category. The least affected group has the age group of 40-49, similar to other categories. The higher the level of education, the lower the spending in the hobby and entertainment category. Those who see their income inadequate have reduced their spending more. Those who stated that there was no loss of income, reduced their spending more than those who lived. The other two interesting findings were; who identified themselves as more concerned and those who were worried about losing their job or income less impacted by the spending.

In this part of the study, the relationship between participants' cutting expenditures and gender, age, education status, household income level, working

status, economic satisfaction, relationship with elderly/chronical diseased people, getting infected, deterioration in the economic situation, feeling less or more concerned about Covid-19 and being worried about losing their job/revenue.

Table 24: The Relationship Between Demographic Characteristics and Covid-19 Related Questions of Participants Between Spending Categories

		p- tourism	p- outside home	p- personal care	p- auxiliary	p- personal development
Demographic Characteristics						
Gender		0.114	0.173	0.047*	0.371	0.909
Age		0.008**	0.255	0.100	0.745	0.070
Education		0.400	0.027*	0.482	0.004**	0.044*
Income level		0.850	0.05*	0.767	0.048*	0.025*
Working Status		0.514	0.290	0.727	0.798	0.034*
Participants satisfaction	economic	0.543	0.220	0.651	0.214	0.001**
Covid-19 Related Questions						
Elderly/chronical		0.984	0.294	0.517	0.346	0.658
Female		0.658	0.850	0.922	0.125	0.557
Male		0.807	0.270	0.5400	0.810	0.990
<40		0.028*	0.267	0.953	0.050	0.143
>40		0.006**	0.001**	0.140	0.233	0.029*
Getting infected		0.725	0.491	0.796	0.094	0.436
Female		0.714	0.788	0.484	0.010*	0.654
Male		0.802	0.270	0.910	0.339	0.062
<40		0.879	0.953	0.228	0.534	0.291
>40		0.585	0.340	0.276	0.054	0.899
Deterioration in the economic situation		0.893	0.733	0.03*	0.144	0.068
Female		0.784	0.730	0.030*	0.275	0.274
Male		0.792	0,068	0.059	0.383	0.130
<40		0.884	0.593	0.005**	0.576	0.110
>40		0.654	0.761	0.301	0.106	0.572

Table 24 (cont'd): The Relationship Between Demographic Characteristics and Covid-19 Related Questions of Participants Between Spending Categories

Feeling depressed	0.404	0.473	0.113	0.582	0.064
<hr/>					
Female	0.581	0.913	0.322	0.720	0.080
Male	0.673	0.334	0.311	0.771	0.444
<40	0.621	0.648	0.026	0.427	0.056
>40	0.947	0.770	0.406	0.749	0.953
<hr/>					
Worried about losing job/income	0.064	0.408	0.006**	0.174	0.173
<hr/>					
Female	0.132	0.376	0.113	0.947	0.626
Male	0.286	0.817	0.024**	0.031*	0.133
<40	0.431	0.534	0.017**	0.576	0.110
>40	0.161	0.091	0.219	0.146	0.879
<hr/>					

We tested the relationship between gender of the participants and cutting expenditures due to Covid-19 in five sub categories; Tourism, outside home (café and restaurant), personal care, auxiliary and personal development & hobby expenditures.

A statistically significant relationship was found between gender and cutting personal care expenditures due to Covid-19 ($p < 0.05$). According to this result, "H0: There is no relationship between the gender of participants and cutting personal care expenditures due to Covid-19." hypothesis rejected, "H1: There is a relationship between the gender of participants and cutting personal care expenditures due to Covid-19." hypothesis was accepted. In other words, females are more likely to cut their personal care expenditures than man due to Covid-19.

We tested the relationship between age of the participants and cutting expenditures due to Covid-19 in five sub categories; Tourism, outside home (café% restaurant), personal care, auxiliary and personal development & hobby expenditures.

A statistically significant relationship was found between age and cutting tourism expenditures due to Covid-19 ($p < 0.05$). According to this result, "H0: There is no relationship between the age of participants and cutting tourism and personal development and hobby expenditures due to Covid-19." hypothesis rejected, "H1: There is a relationship between the age of participants and cutting tourism

expenditures due to Covid-19." hypothesis was accepted. Young people are more likely to reduce tourism spending than old people.

We tested the relationship between education level of the participants and cutting expenditures due to Covid-19 in five sub categories; Tourism, outside home (café and restaurant), personal care, auxiliary and personal development & hobby expenditures.

The level of education has been the variable that makes the most meaningful responses in demographic characteristics.

A statistically significant relationship was found between education level and cutting outside home, auxiliary and personal development expenditures due to Covid-19 ($p < 0.05$). According to this result, " There is no relationship between the education level of participants and cutting expenditures due to Covid-19." hypothesis rejected, "H1: There is a relationship between the age of participants and cutting outside home, auxiliary and personal development expenditures due to Covid-19." hypothesis was accepted. As the level of education increases, the reduction in café & restaurant, auxiliary and hobby-personal development spending is also increasing.

We tested the relationship between income level of the participants and cutting expenditures due to Covid-19 in five sub categories; Tourism, outside home (café and restaurant), personal care, auxiliary and personal development & hobby expenditures.

A statistically significant relationship was found between income level and cutting auxiliary and personal development expenditures due to Covid-19 ($p < 0.05$). According to this result, " There is no relationship between the income level of participants and cutting expenditures due to Covid-19." hypothesis rejected, "H1: There is a relationship between the age of participants and cutting auxiliary and personal development expenditures due to Covid-19." hypothesis was accepted. People with higher income are more likely to reduce auxiliary and hobby and personal development spending.

We tested the relationship between income satisfaction of the participants and cutting expenditures due to Covid-19 in five sub categories; Tourism, outside home (café and restaurant), personal care, auxiliary and personal development & hobby expenditures.

A statistically significant relationship was found between income satisfaction and cutting personal development expenditures due to Covid-19 ($p < 0.05$). According to this result, " There is no relationship between the income satisfaction of participants

and cutting expenditures due to Covid-19." hypothesis rejected, "H1: There is a relationship between the age of participants and cutting personal development expenditures due to Covid-19." hypothesis was accepted. Those who have sufficient income tend to reduce their personal development expenditures more than those who do not.

We tested the relationship between the close relationship with elderly/chronical diseased ones of the participants and cutting expenditures due to Covid-19 in five sub categories; Tourism, outside home (café and restaurant), personal care, auxiliary and personal development & hobby expenditures.

There was no statistically significant relationship between the close relationship with elderly/chronical diseased ones of participants and cutting expenditures due to Covid-19 ($p > 0.05$). According to this result, "H0: There is no relationship between the close relationship with elderly/chronical diseased ones of participants and cutting expenditures due to Covid-19." hypothesis has been accepted. In addition, "H1: There is a relationship between the close relationship with elderly/chronical diseased ones of participants and cutting expenditures due to Covid-19." hypothesis was rejected.

The presence of an elderly or chronic patient in the immediate vicinity of the participants was also analyzed in gender and age when looking at the impact of its spending. The presence of an elderly or chronic patient in the immediate vicinity of the participants while the gender difference does not make sense, a meaningful relationship was observed in the home external and personal development hobby spending of participants over 40 years old ($p < 0.05$). Having a patient or older person in the house does not help reduce spending on young people, but affects reducing spending on 40 years of age.

We tested the relationship between being infected and cutting expenditures due to Covid-19 in five sub categories; Tourism, outside home (café and restaurant), personal care, auxiliary and personal development & hobby expenditures.

There was no statistically significant relationship between being infected and cutting expenditures due to Covid-19 ($p > 0.05$). According to this result, "H0: There is no relationship between being infected and cutting expenditures due to Covid-19." hypothesis has been accepted. In addition, "H1: There is a relationship between being infected of participants and cutting expenditures due to Covid-19. " hypothesis was rejected.

The effects of participants' capture of Covid-19 disease on consumption expenditure have been analyzed in gender and age-specific as well. In the category of auxiliary expenses for women who suffer from Covid-19 disease, meaningful results have been achieved ($p < 0.05$).

We tested the relationship between a deterioration in the economic situation and cutting expenditures due to Covid-19 in five sub categories; Tourism, outside home (café and restaurant), personal care, auxiliary and personal development & hobby expenditures.

A statistically significant relationship was found between a deterioration in the economic situation and cutting personal care expenditures due to Covid-19. ($p < 0.05$).

Participants who suffer from economic difficulties have seen a more meaningful relationship between women cutting personal maintenance expenditures compared to men ($p < 0.05$). Men have a weak association. ($p < 0.1$)

There was also a more meaningful relationship between those under the age of 40 and those suffering from economic difficulties and reducing personal maintenance expenditures ($p < 0.05$)

We tested the relationship between feeling more depressed and cutting expenditures due to Covid-19 in five sub categories; Tourism, outside home (café and restaurant), personal care, auxiliary and personal development & hobby expenditures.

There was no statistically significant relationship between feeling more depressed and cutting expenditures due to Covid-19 ($p < 0.05$). According to this result, "H0: There is no relationship between feeling more depressed and cutting expenditures due to Covid-19." hypothesis has been accepted. In addition, "H1: There is a relationship between feeling more depressed and cutting expenditures due to Covid-19." hypothesis was rejected.

While the impact of pessimism on Covid-19 has been observed, gender and age categories have been analyzed separately; no significant results can be achieved from the gender variable, while a meaningful result has been achieved in reducing personal care expenditures for people under the age of 40 ($p < 0.05$), a weak relationship has been found in reducing personal development and hobby spending ($p < 0.01$).

We tested the relationship between being worried about losing job/income and cutting expenditures due to Covid-19 in five sub categories; Tourism, outside home (café and restaurant), personal care, auxiliary and personal development & hobby expenditures.

A statistically significant relationship was found between being worried about losing job/income and cutting personal care expenditures due to Covid-19 ($p < 0.05$).

While a weak relationship between being worried about losing a job and tourism spending has been observed ($p < 0.01$), significant relationships have been found between men who are worried about losing their jobs reducing spending such as personal care and household cleaning ($P < 0.05$).

While participants under the age of 40 are more likely to reduce their personal care spending ($p < 0.05$), there is a weak relationship between participants over the age of 40 reducing their outside home spending ($p < 0.01$).

Table 25. The Reason Behind Reducing Tourism Expenses

			Frequency	Percent	Valid Percent
The Reason Behind Cutting Tourism Expenses	Economic		38	22.1	27.3
	Health Concerns		92	53.5	66.2
	Other		9	5.2	6.5
	Total		139	80.8	100.0
Missing	System		33	19.2	
Total		172	100.0		

The rate of participants who said that they reduce tourism expenditures is 80.8%. The main reason behind cutting expenditures is health concerns. 66.2% of the participants said that they are afraid of getting Covid-19. 27.3% of them have reduced tourism spending for economic reasons and 6.5% because they don't need it or can get it in other ways. While health concerns are the main factor in reducing tourism expenditures, the proportion of those who have reduced their spending for economic reasons is too high to denigrate (27.3%).

Table 26: The Reason Behind Reducing Cafe-Restaurant Expenses

		Frequency	Percent	Valid Percent

Table 26 (cont'd): The Reason Behind Reducing Cafe-Restaurant Expenses

The Reason	Economic	23	13.4	16.3
Behind	Health	95	55.2	67.4
Cutting	Concerns			
Cafe-	Other	23	13.4	16.3
Restaurant	Total	141	82.0	100.0
Expenses				
Missing	System	31	18.0	
Total	172	172	100,0	

82% of the participants claim that they reduce their restaurant and cafe expenditures during Covid-19 period. They said that those who stated that their spending was reduced were reduced because 67.4% were afraid of being infected. 16.3% of them have reduced cafe/restaurant spending for economic reasons and 16.3% because they don't need it or can get it in other ways.

Table 27: The Reason Behind Reducing Personal Care Expenses

		Frequency	Percent	Valid Percent
The Reason	Economic	11	6.4	9.7
Behind	Health	63	36.6	55.8
Cutting	Concerns			
Personal	Other	39	22.7	34.5
Care	Total	113	65.7	100.0
Expenses				
Missing	System	59	34.3	
Total	172	172	100.0	

65.7% of respondents stated that personal care expenditures were reduced or never made during the Covid-19 period. Who indicate that they do not spend at all or that their expenses are also reduced.

55.8% of them have reduced them because they are concerned about being sick. 9.7% of them have reduced personal care spending for economic reasons and 34.5%

because they don't need it or can get it in other ways. 1/3 of the participants have answered “I get in other ways” and whether they will continue to receive service again should be discussed.

Table 28: The Reason Behind Reducing Auxiliary Expenses

			Frequency	Percent	Valid Percent
The Reason Behind Cutting Auxiliary Care Expenses	Economic		6	3.5	11.3
	Health Concerns		22	12.8	41.5
	Other		25	14.5	47.2
	Total		53	30.8	100.0
	System		119	69.2	
Missing		172	100.0		

30.5% of respondents say their household cleaning spending has decreased during the Covid-19 period, and this category is differentiated from the others. 41.5% of those who have reduced their spending have reduced their spending by fear of being infected. 11.3% of them have reduced auxiliary spending for economic reasons and 47.2% because they don't need it or can get it in other ways. Approximately half of the participants have answered “I get in other ways” and whether they will continue to receive service again should be discussed.

Table 29: The Reason Behind Reducing Personal Development-Hobby Expenses

			Frequency	Percent	Valid Percent
The Reason Behind Cutting Personal Development & Hobby Expenses	Economic		8	4.7	9.3
	Health Concerns		56	32.6	65.1
	Other		22	12.8	25.6
	Total		86	50.0	100.0
	System		86	50.0	
Total		172	100.0		

50 % of the respondents stated that they never spent or reduced on personal development and hobby spending in Covid-19. 65.1% of these are disease concerns. 9.3% of them have reduced personal care and hobby spending for economic reasons and 25.6% because they don't need it or can get it in other ways. 1/4 of the participants have answered "I get in other ways" and whether they will continue to receive service again should be discussed. It is also an important point whether 25% of the participants will start outsourcing these services in the future. Participants stating that they "gained in other ways" will also be influential in whether the sectors will revive after the Covid-19 pandemic ends.



CHAPTER 4: DISCUSSION OF RESULTS

Our study tested the relationships between the analysis and demographic features and the Covid-19 relationship and the changes in tourism, cafe-restaurant, personal care, auxiliary and personal development expenditures categories.

In all of the spending categories we have reviewed, expenditures have been reduced during Covid-19, and these results are consistent with previous works. The most reductions have been seen in travel and cafe & restaurant expenses.

In the literature examined, Hodbod et al., (2020) observed a decrease in all spending categories, similar to our work, while the most reduction was highlighted in tourism, public transportation and hospitality sectors respectively. Chen et al., (2020) stated that the spending of eating-drinking and entertainment, Barua and Levin (2020) hobby and accomodation, Widjaja and Chipela (2020), Baunion et al., (2020) restaurant expenses, Aydın and Doğan (2020) personal maintenance and holiday expenses were most affected during Covid-19.

In demographic features, the most meaningful results were given by the education level category. Cotton et al., (2020), Martin et al., (2020) and Guder et al.,(2020) also found a similar significant relationship between education and cutting expenditures. All categories, except tourism and auxiliary expenditure categories, have seen lower spending as the level of education increases. The level of education is followed by the level of income. A significant relationship has been observed between income level and the reduction of auxiliary and personal development expenditures. While Hodbod et al.,(2020) did not find a relationship other than the personal care category, Güler et al., (2020) had concluded that the spending of the low income group is less affected. While it was concluded that older people were more inclined to reduce tourism spending, women were more inclined to reduce their personal care spending than men.

Regardless of the demographic features, the category of hobby and personal development expenditures most affected in overall expenditure categories. It has been found that there is a significant relationship between the level of education, income level, working status and economic satisfaction. The category of hobby and personal development expenditures is followed by auxiliary expenditures. As the level of education and income increases, these expenditures have been declined.

In the section that examines the impact of the participants' connections with Covid-19 on expenditure, all questions have been looked at gender and age discrimination to achieve more meaningful results. Age category is analyzed under 40 and above 40. There has been a significant relationship between economic deterioration and worrying about losing your business revenue and personal care expenses.

The presence of patients or elderly in the home alone has no impact on the reduction of expenses, but results in meaningful age category. It has been effective for over 40 years to reduce tourism, restaurant & cafe and personal development spending. Under the age of 40, only significant relations have been found with the reduction of tourism spending.

While there was no significant relationship between the decrease in spending and getting infected, it was the result that women which got infected reduced their auxiliary spending more than men. Hodbod et al., (2020), Chen et al., (2020), Martin et al., (2020) have seen more reductions in the spending of participants with disease experienced.

While there is significant relationship between economic deterioration and personal care expenditures, it is found that women and under 40 tend to lower their personal care spending more when looking at gender and age.

There has been no significant relationship between feeling pessimistic and the reduction in spending.

While there is a significant relationship between worrying about losing business-income and reducing personal maintenance expenses, it has been observed that men who are concerned about losing their jobs and under 40 have reduced their personal care spending more. Barua and Levin (2020), Widjaja and Chipeta (2020), Aydın and Doğan (2020) and Barro et al., (2020) concluded that those who were worried about losing their jobs reduced their spending more.

Personal care expenditures category is the category that shows the most reduction in questions related to Covid-19. It is again parallel with Hodbod et al., (2020) study.

The actual purpose of the study is to analyze whether changes in the expense categories will be permanent. To do this, participants were asked for reasons to reduce their spending. In order to achieve more meaningful results, the answers are divided

into three groups: Economic reasons, fear of disease and other. The results have been evaluated for the five expense categories.

The reason behind the decrease in tourism spending is health concerns with 66.2%, followed by economic reasons with 27.3%. After the end of the pandemic, the tourism sector is expected to revive, and those who reduce their spending for economic reasons will not be able to make the same compensation. And due to the recession in this sector, industry workers will be unemployed. The share of tourism in GDP is also very high, and Turkey growth will be negatively affected.

67.4% of the decline in the cafe-restaurant category depends on health concerns and the recovery of the demand will be shorter than the relative tourism sector. But the key point here is that the 16.3% see these expenditures no longer necessary. Realizing that these expenditures are unnecessary during the pandemic period, the consumer may start to redirect their resources elsewhere. Jobs and bankruptcy will continue in this sector if businesses that are already closed for months continue to fail during the normalization period.

55.8% of those who reduce personal maintenance expenditures are reduced due to health concerns, while 34.5% receive this service differently. Those who start to acquire different ways can also stop receiving these services during the normalization period. One of the most difficult sectors to follow the rules of social distance, the hairdresser and beauty centers can be negatively affected, even if they take the necessary hygiene measures.

Although the auxiliary spending has decreased slightly compared to other categories, 47.2% of respondents have started to obtain this service differently. Although it has less impact on the total, unemployment is inevitable for this sector, which often lacks social security.

One of the most affected spending categories by social distance is of measures is hobby and personal development expenses. 65.1% stated that they have reduced their spending due to health reasons, while 25.6% of them have started to obtain it in another way. The increased sales of sports equipment and hobby items in this period also supports this data. Consumers who are able to deliver these services themselves are also demonstrating that recovery in this sector will be slow.

CHAPTER 5: CONCLUSION

As we mentioned in the study, according to Maslow's Pyramid, human needs have a certain priority. Individuals who meet their physiological needs focus on satisfying their higher-level needs. In times of crisis, with the fear that they will not be able to provide their basic needs, individuals begin to focus on their needs at the bottom of the hierarchy pyramid. In the extraordinary process we live in, human beings have been in a hurry to meet their essential needs and have started to run to the markets in a panic atmosphere. The possibility of famine has pushed people to stockpile. In the first days of the pandemic, there was an explosion in spending and market shelves were empty. As the course of the disease and death rates increased, people started to stay in their homes and a demand shock was experienced.

The Covid-19 epidemic, which affected the whole world, closed the borders, stopped flights and brought world trade to a standstill. With the contraction of economic activities and supply chains coming to a standstill, we were faced with an unprecedented crisis. Due to the global crisis, some countries have made urgent changes in their economic policies. Many countries have directly or indirectly announced aid packages to their citizens.

In December 2019, the COVID-19 pandemic, which started in Wuhan, China and soon spread to almost all countries around the world, has caused casualties in every country around the world, and many measures have been implemented to minimize these losses. The measures implemented have particularly affected the service and tourism sector.

The pandemic disrupts the functioning of global supply chains and negatively influences the activities of the service sector around the world, leading to the economic collapse process. It remains uncertain when the pandemic will end, how effective the vaccinations will be, and when economic activities will return to their pre-pandemic levels.

In order to be protected from the ethics of the epidemic, many workplaces have switched to remote working order and still maintain this order. Observing the significant reduction in costs, companies have started to make this order permanent.

The effects of the COVID-19 pandemic have not affected all industries equally. As in all cases, there were sectors that were affected positively and negatively. As a result of the full or partial closure decisions taken, the activities of sectors such as air

transport, accommodation, restaurants, travel, retail trade were restricted or even stopped. As a result of the measures taken, the service sector was worst affected. According to March 2020 TUIK data, 57.6% of those employed work in the service sector, and more than half of the working population has received all or part of their income. Although the ban measures taken prevented the layoffs to some extent, the business owners who could not continue their activities could not pay their employees their salaries. The reason why there has not been a significant change in the unemployment figures is the dismissal bans.

The main factor behind the reduction of all expenditures in the analysis is health concerns. Given the results, the decrease in demand is temporary. The reduction observed in the categories of personal care and household cleaning is compared to other categories they'll have more lasting results. While 34,5% say that personal care expenditures are reduced because they have their own acquisition and no longer need them, this ratio is 47,2% on auxiliary expenditure. After the end of the pandemic, many consumers will continue to maintain their own personal care and continue to do their own house work. The loss of demand in these two service sectors will lead to increased unemployment in these sectors. The long-term quarantine of hairdresser, barber and beauty centers, one of the key players in the personal care sector, has changed the habits of consumers and allowed them to see how self-sufficient they can be. By starting work from home, with less time at home and on the road, consumers began to spend more time on housework and began to reduce the service they received from the outside.

If the Pandemic is quickly controlled, it will take place rapidly in return to normal economic life, so that all economic sectors, especially service sectors, can be recovered quickly. If the process of controlling the pandemic takes longer, the effects of economic growth and employment will be more damaged. The introduction of various incentives and support for all sectors, especially those that are most affected by the panel, will also speed up the economic recovery process after the pandemic.

Employees who are not able to gain incentive and income for businesses that remain closed during the Lockdowns are also required to provide financial assistance. It will also stimulate the request for financial assistance received. Those who have reduced their spending for health reasons will be able to return to their old consumption levels, as well as the vaccination will gain speed.

In the same way, reduced demand for economic reasons can still be revived by financial aid. Citizens who suffer income and loss of work must announce financial support packages by the state. The environment must be created for a reduction in interest rates and for consumers to spend more.



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APPENDIX-1

ETHICS COMMITTEE REPORT

SAYI : B.30.2.İEÜ.0.05.05-020-124

28.04.2021

KONU : Etik Kurul Kararı hk.

Sayın Cansu Ekmekçi, başı,


"The Impact of COVID-19 on Consumer Preferences: Does it have a permanent effect?" başlıklı projenizin etik uygunluğu konusundaki başvurunuz sonuçlanmıştır.

Etik Kurulumuz 19.04.2021 tarihinde sizin başvurunuzun da içinde bulunduğu bir gündemle toplanmış ve projenin incelenmesi için bir alt komisyon oluşturmuştur. Projenizin detayları alt komisyon üyelerine gönderilerek görüş istenmiştir. Üyelerden gelen raporlar doğrultusunda Etik Kurul 28.04.2021 tarihinde tekrar toplanmış ve raporları gözden geçirmiştir.

Sonuçta 28.04.2021 tarih ve 120 numaralı **"The Impact of COVID-19 on Consumer Preferences: Does it have a permanent effect?"** konulu projenizin etik açıdan uygun olduğuna oy birliği ile karar verilmiştir.

Gereği için bilgilerinize sunarım.

Saygılarımla,


Prof. Dr. Murat Bengisu
Etik Kurul Başkanı