Digitalization of the International Trade and Business Development

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ABSTRACT

Advances in technology have directly affected many aspects of our lives. Digitalization, which comes with the development of technology, has become a concept that plays a big role in the perspective from our daily life to our business life.

The purpose of my work is to show how important the advantages brought by digitalization are within the scope of business development and international trade, and where exactly they come into play in the process. Apart from the advantages of digitalization, I also aimed to provide information about international trade theories, international trade institutions/organizations, the history and stages of business development.

Keywords: Digitalization; internationaltrade;import; export; supply

INTRODUCTION

In the era of digitalization so many topics and so many variables have been affecting the human perceptions.Facing the pandemic has brought us in such a different period that preferences have completely changed.

Distributive technologies such as artificial intelligence, virtual reality, ogmentit realty, big data analytics, cyber security, 3D printers, software integrations, cyber physical systems, simulation, autonomous robots, blockchain, digital twin, cloud computing, horizontal and vertical system, 5G, internet of thing, blockchain, cloud computing (Ref:1)

Therefore, all these technologies make people to differ their perception. Whoever not all of the people have changed in the same direction.

Changes have occurred sometimes with respective some demographic variables. In this study the perception of digitalization with respect to Age, Education Level, Gender, Level of Position have been investigated.Of course, there could be so many contributor variables which effects the topic but for simplicity those variables have been used in order to interpret the results easily.

Digitalization on international trade has been continuing to bring us to many advantages such us easy to follow up logistics operations, money transfers, documentation movements etc. On the other hands without any trace of hesitation, sustainability (Ref:2), internet of things (Ref:3) and gamification (Ref:4) topics are contributing as a side effect to digitalization perceptions.

Literature Rewiew

In the literature especially in the last decade so many variables effecting digitalization have been investigated.

Ercan&Kutay (2016), in their study investigated the impact of and contribution of İnternet of things to the business life. They informed that adaptation of IoT into the industrial production, discussed its positive contributions in different application examples such as automatic storage, preventive maintenance, underground mining, smart environmental systems and given additional information about the open research issues.

Paolo Guerrieri& Valentina Meliciani (2014), in their study they reached that digitalization can increase productivity and employment growth.

Morteza (2020), With this study she contributed to the sustainability literature by systematically defining the sustainability functions of Industry 4.0. This study can serve Industry 4.0 stakeholders – leaders in the public and private sectors, industrialists, and academicians – to better understand the opportunities that the digital revolution may offer for

sustainability, and work together more ability functions around the world as effectively, equally, and fairly as possible.

Kantarci, Öget, Murat Özalp, and Cenk Sezginsoy (2017), in their study they aim to understand the e-commerce sector and the changes in the factors affecting the sector in the world and in Turkey, identify the development areas that may affect Turkey's e-commerce growth with new perspectives and present the steps that can be taken to the evaluation of the relevant stakeholders.

Magomedov, I A, H A Murzaev& A M Bagov (2020), in their study they focused on the main aspects of the development of the digital economy. It looks at the role of digital technologies in the economic development of modern society. The world's largest companies that affect the development of the digital economy are discussed and the impact of digital technologies on society's attitude towards the economy is also discussed.

Taşel (2020), mentioned in his study the increase of global trade and digital networks in recent years.It has been possible to observe the effects of digitalization in various sectors, especially with the increase in the use of internet-based technologies due to the recent COVID-19 global epidemic. Physical trade has been significantly affected due to reasons such as people avoiding physical contact and curfews. In this period, when attention is paid not only to the business dimension, but also to social and physical distance, individuals also benefit from digital technologies in many areas. For this reason, an increase in e-commerce volume has been observed, especially with the increase in the demand for mobile applications, the time spent on the internet, and the integration of all socialization processes in daily life into the digital environment.

Görçün (2018), mentioned in this study how robots and robotic systems will be functional and what will happen in the future and evaluations about them are mentioned. This article also tried to examine the roles of robots in logistics, transportation, distribution and manufacturing.

Korcan; ARSLANTEKİN, DOĞAN. (2016), they mentioned in their study In the study big data has been discussed conceptually and its relation with other concepts, big data technologies and methods used for processing of big data have been explained and different examples regarding institutions creating awareness for big data and usage area of big data around the world have been given.

Shen, Zhidong, and Qiang Tong. (2010) They mentioned in this article focuses on the security requirements in cloud computing in the digitalization-enhancing business environment. A method and model are proposed to create a reliable computing environment for the cloud

computing system by integrating the reliable computing platform into the cloud computing system.

Teo, Thompson S.H. (2001) The aim of this study was to evaluate existing research on the digital economy, involve the private sector in the development of research that informs investment and policy decisions, and promote a better understanding of the growth and socioeconomic impacts of information technology and electronic commerce. Aspects of the digital economy covered include macroeconomic assessment, organizational change, small businesses, access, market structure and competition, employment and workforce.

Özkanlısoy and Akkartal(2021), mentioned about the digital transformation, especially in supply chains. They figured out the current applications, contributions and challenges of it in such a significant way that effects the managerial decisions.

Digitalization implementations have wide range of applications also in fleet management(Akkartal and Aras, 2021) which is a tool used for trade. Especially, as far as sustainability issues concern, digitalization has many benefits supporting management in diversified areas.

Internet of thing(IoT) is playing a vital role for traceably in trade in last decades as well(Abdelhadi and Akkartal, 2019). It facilitated international Trade and creates added value. It also helps logistics operations which is an invariable part of international trade.

Simulations, which is one of the most important parts of decision making process for international trade, can be performed by digitalization much easier and motivates the managers to take tactical decisions in internationaltrade(Akkartal at.al, 2010).

By digitalization, some advanced methos such as gamification(Akkartal G.R. et all, 2019), can be performed and simulated for trade scenarios for the future as well

Another facility of digitalization was revealed by Aslan et. al.(2021), which explains the cloud applications implemented in business and trade by the information systems used in international trade.

Purpose of the Research

In this study, it was tried to determine whether there is a relationship between the research questions measuring the digitalization of international trade and demographic variables. The relationship of each of the 21 questions asked about the digitalization of international trade with demographic variables such as gender, last graduated school, age and position worked was tested. Thus, for example, it has been determined whether the groups of women and men are related to the groups of variables that measure the digitalization of international trade.

Data Collection Method

The data were collected through a questionnaire consisting of 25 questions prepared online on the Survey Monkey website.

Sample and Population

The sample of this study consisted of 100 people who participated in the online survey. However, since 13 of the participants did not answer the research questions, the data were analyzed on a total of 87 samples.

Analysis of Data

In this study, there are 21 research questions consisting of 5 categories between completely agree (1) and completely disagree (5). The gender variable, which is one of the demographic questions, consists of 2 categories as male and female. The last graduated school variable consists of 4 categories: high school, university, master's and doctorate. The age variable consists of 5 categories: 18-25, 25-40, 41-50, 51-65 and 65+. Finally, the position level variable consists of 5 categories: director, senior manager, mid-level manager, Specialist and Specialist Assistant. Whether the demographic variables were related to the research variables was tested with the chi-square test since all of the variables were categorical.

The chi-square test measures the relationship between two categorical variables by means of the contingency table obtained from the variable groups. As a result of the calculation made on the observed and expected cell values, it is revealed whether the variable groups are independent from each other. For tables larger than 2x2, at most 20% of the expected cell values in the Chi-square test can be less than 5 (Yates, Moore & McCabe, 1999). For samples with more than 20% cell values less than 5, Fisher's exact test should be used instead of the chi-square test. This test gives the Fisher-Freeman-Halton Exact Test value for tables larger than 2x2. [1]If the results of the Chi-square or Fisher-Freeman-Halton Exact Test are significant (significant), the significance value should be checked for each cell individually. This value is the adjusted residuals value in SPSS. If the adjusted residual values are less than the critical value of -1.96 or greater than +1.96, which is the critical value for 5% significance, it can be said that that cell differs significantly from other cells. MacDonald & Gardner (2000) stated in their study that since this significance value is calculated for many cell values, Bonferroni adjustments should be made in order to prevent Type 1 Error. However, Sharpe (2015) stated in his study that adjusted residual values can be used without the need for Bonferroni

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[1]https://www.ibm.com/support/pages/node/420335

adjustments. Adjusted residual values in our study were used without Bonferroni adjustments and the results were interpreted accordingly.

Finally, the correlation relationships of the research variables with each other were examined. Since the research variables were categorical variables, Kendall's Tau was used for correlation measurement. Kendall's Tau measures the strength of the relationship between two ordinal variables (Puka, 2011). The results were interpreted by looking at the Kendall's Tau correlation coefficient for the variables that had a significant correlation between them.

Research Hypotheses

In this study, analyzes were made on categorical data. Chi-square independence test is used in analyzes with categorical data. This test tells whether two categorical variables are independent of each other. In this case, the hypotheses to be established will be "H0: two variables are independent of each other" and "H1: two variables are not independent of each other". In this study, it was measured whether there was a relationship between demographic variables and research variables. In this case, the null and alternative hypotheses for the relationship between the gender variable and the research variables will be established as follows.

H0.1: Gender and Q1 is independent of each other.
H1.1: Gender and Q1 is dependent of each other.
H0.2: Gender and Q2 is independent of each other.
H1.2: Gender and Q2 is dependent of each other.
H0.3: Gender and Q3 is independent of each other.
H1.3: Gender and Q3 is dependent of each other.
H0.4: Gender and Q4 is independent of each other.
H1.4: Gender and Q4 is dependent of each other.
H0.5: Gender and Q5 is independent of each other.
H1.5: Gender and Q5 is dependent of each other.
H0.6: Gender and Q6 is independent of each other.
H1.6: Gender and Q6 is dependent of each other.
H0.7: Gender and Q7 is independent of each other.
H1.7: Gender and Q7 is dependent of each other.
H0.8: Gender and Q8 is independent of each other.
H1.8: Gender and Q8 is dependent of each other.
H0.9: Gender and Q9 is independent of each other.
H1.9: Gender and Q9 is dependent of each other.

H0.10: Gender and Q10 is independent of each other.

H1.10: Gender and Q10 is dependent of each other.

H0.11: Gender and Q11 is independent of each other.

H1.11: Gender and Q11 is dependent of each other.

H0.12: Gender and Q12 is independent of each other.

H1.12: Gender and Q12 is dependent of each other.

H0.13: Gender and Q13 is independent of each other.

H1.13: Gender and Q13 is dependent of each other.

H0.14: Gender and Q14 is independent of each other.

H1.14: Gender and Q14 is dependent of each other.

H0.15: Gender and Q15 is independent of each other.

H1.15: Gender and Q15 is dependent of each other.

H0.16: Gender and Q16 is independent of each other.

H1.16: Gender and Q16 is dependent of each other.

H0.17: Gender and Q17 is independent of each other.

H1.17: Gender and Q17 is dependent of each other.

H0.18: Gender and Q18 is independent of each other.

H1.18: Gender and Q18 is dependent of each other.

H0.19: Gender and Q19 is independent of each other.

H1.19: Gender and Q19 is dependent of each other.

H0.20: Gender and Q20 is independent of each other.

H1.20: Gender and Q20 is dependent of each other.

H0.21: Gender and Q21 is independent of each other.

H1.21: Gender and Q21 is dependent of each other.

The null and alternative hypotheses for the graduation variable were established as follows.

H0.1: Graduation and Q1 is independent of each other.

H1.1: Graduation and Q1 is dependent of each other.

H0.2: Graduation and Q2 is independent of each other.

H1.2: Graduation and Q2 is dependent of each other.

H0.3: Graduation and Q3 is independent of each other.

H1.3: Graduation and Q3 is dependent of each other.

H0.4: Graduation and Q4 is independent of each other.

H1.4: Graduation and Q4 is dependent of each other.

H0.5: Graduation and Q5 is independent of each other.

H1.5: Graduation and Q5 is dependent of each other.

H0.6: Graduation and Q6 is independent of each other.

H1.6: Graduation and Q6 is dependent of each other.

H0.7: Graduation and Q7 is independent of each other.

H1.7: Graduation and Q7 is dependent of each other.

H0.8: Graduation and Q8 is independent of each other.

H1.8: Graduation and Q8 is dependent of each other.

H0.9: Graduation and Q9 is independent of each other.

H1.9: Graduation and Q9 is dependent of each other.

H0.10: Graduation and Q10 is independent of each other.

H1.10: Graduation and Q10 is dependent of each other.

H0.11: Graduation and Q11 is independent of each other.

H1.11: Graduation and Q11 is dependent of each other.

H0.12: Graduation and Q12 is independent of each other.

H1.12: Graduation and Q12 is dependent of each other.

H0.13: Graduation and Q13 is independent of each other.

H1.13: Graduation and Q13 is dependent of each other.

H0.14: Graduation and Q14 is independent of each other.

H1.14: Graduation and Q14 is dependent of each other.

H0.15: Graduation and Q15 is independent of each other.

H1.15: Graduation and Q15 is dependent of each other.

H0.16: Graduation and Q16 is independent of each other.

H1.16: Graduation and Q16 is dependent of each other.

H0.17: Graduation and Q17 is independent of each other.

H1.17: Graduation and Q17 is dependent of each other.

H0.18: Graduation and Q18 is independent of each other.

H1.18: Graduation and Q18 is dependent of each other.

H0.19: Graduation and Q19 is independent of each other.

H1.19: Graduation and Q19 is dependent of each other.

H0.20: Graduation and Q20 is independent of each other.

H1.20: Graduation and Q20 is dependent of each other.

H0.21: Graduation and Q21 is independent of each other.

H1.21: Graduation and Q21 is dependent of each other.

The null and alternative hypotheses for the age variable were established as follows.

H0.1: Age and Q1 is independent of each other.

H1.1: Age and Q1 is dependent of each other.

H0.2: Age and Q2 is independent of each other.

H1.2: Age and Q2 is dependent of each other.

H0.3: Age and Q3 is independent of each other.

H1.3: Age and Q3 is dependent of each other.

H0.4: Age and Q4 is independent of each other.

H1.4: Age and Q4 is dependent of each other.

H0.5: Age and Q5 is independent of each other.

H1.5: Age and Q5 is dependent of each other.

H0.6: Age and Q6 is independent of each other.

H1.6: Age and Q6 is dependent of each other.

H0.7: Age and Q7 is independent of each other.

H1.7: Age and Q7 is dependent of each other.

H0.8: Age and Q8 is independent of each other.

H1.8: Age and Q8 is dependent of each other.

H0.9: Age and Q9 is independent of each other.

H1.9: Age and Q9 is dependent of each other.

H0.10: Age and Q10 is independent of each other.

H1.10: Age and Q10 is dependent of each other.

H0.11: Age and Q11 is independent of each other.

H1.11: Age and Q11 is dependent of each other.

H0.12: Age and Q12 is independent of each other.

H1.12: Age and Q12 is dependent of each other.

H0.13: Age and Q13 is independent of each other.

H1.13: Age and Q13 is dependent of each other.

H0.14: Age and Q14 is independent of each other.

H1.14: Age and Q14 is dependent of each other.

H0.15: Age and Q15 is independent of each other.

H1.15: Age and Q15 is dependent of each other.

H0.16: Age and Q16 is independent of each other.

H1.16: Age and Q16 is dependent of each other.

H0.17: Age and Q17 is independent of each other.

H1.17: Age and Q17 is dependent of each other.

H0.18: Age and Q18 is independent of each other.

H1.18: Age and Q18 is dependent of each other.

H0.19: Age and Q19 is independent of each other.

H1.19: Age and Q19 is dependent of each other.

H0.20: Age and Q20 is independent of each other.

H1.20: Age and Q20 is dependent of each other.

H0.21: Age and Q21 is independent of each other.

H1.21: Age and Q21 is dependent of each other.

The null and alternative hypotheses for the Position Level variable were established as follows.

H0.1: Level of Position and Q1 is independent of each other.

H1.1: Level of Position and Q1 is dependent of each other.

H0.2: Level of Position and Q2 is independent of each other.

H1.2: Level of Position and Q2 is dependent of each other.

H0.3: Level of Position and Q3 is independent of each other.

H1.3: Level of Position and Q3 is dependent of each other.

H0.4: Level of Position and Q4 is independent of each other.

H1.4: Level of Position and Q4 is dependent of each other.

H0.5: Level of Position and Q5 is independent of each other.

H1.5: Level of Position and Q5 is dependent of each other.

H0.6: Level of Position and Q6 is independent of each other.

H1.6: Level of Position and Q6 is dependent of each other.

H0.7: Level of Position and Q7 is independent of each other.

H1.7: Level of Position and Q7 is dependent of each other.

H0.8: Level of Position and Q8 is independent of each other.

H1.8: Level of Position and Q8 is dependent of each other.

H0.9: Level of Position and Q9 is independent of each other.

H1.9: Level of Position and Q9 is dependent of each other.

H0.10: Level of Position and Q10 is independent of each other.
H1.10: Level of Position and Q10 is dependent of each other.
H0.11: Level of Position and Q11 is independent of each other.
H1.11: Level of Position and Q11 is dependent of each other.
H0.12: Level of Position and Q12 is independent of each other.
H1.12: Level of Position and Q12 is dependent of each other.
H0.13: Level of Position and Q13 is independent of each other.
H1.13: Level of Position and Q13 is dependent of each other.
H0.14: Level of Position and Q14 is independent of each other.
H1.14: Level of Position and Q14 is dependent of each other.
H0.15: Level of Position and Q15 is independent of each other.
H1.15: Level of Position and Q15 is dependent of each other.
H0.16: Level of Position and Q16 is independent of each other.
H1.16: Level of Position and Q16 is dependent of each other.
H0.17: Level of Position and Q17 is independent of each other.
H1.17: Level of Position and Q17 is dependent of each other.
H0.18: Level of Position and Q18 is independent of each other.
H1.18: Level of Position and Q18 is dependent of each other.
H0.19: Level of Position and Q19 is independent of each other.
H1.19: Level of Position and Q19 is dependent of each other.
H0.20: Level of Position and Q20 is independent of each other.
H1.20: Level of Position and Q20 is dependent of each other.
H0.21: Level of Position and Q21 is independent of each other.
H1.21: Level of Position and Q21 is dependent of each other.

For hypotheses measured with 95% confidence, if the significance value is less than 0.05, the null hypothesis will be rejected. In other words, it will be concluded that the variables are not independent from each other.

Frequencies of Demographic Variables

In this study, gender, graduation status, age and working position variables were analyzed as demographic variables.

Frequencies of Research Variables

The question contents of 21 questions determined as research variables in this study,

Factor and Reliability Analysis of Research Variables

Factor and reliability analysis was conducted for 21 questions, which are research questions.

Factor loadings, reliability value, KMO and Bartlett's test values can be seen in the table below.

Table *1*

Factor and Reliability Analysis

Factor Name	Factor Items	Factor Loadings
digitalization	**Reliability: 0.844**	
	Data security of international trade has decreased in the digitalization process.	0.842
	Post-tender contract signing must be completely digitalized.	0.814
	Digitalization has made access to global supply channel easier.	0.814
	Digitalization has a huge impact on reducing our purchasing costs.	0.812
	Our delivery time of products have decreased with digitalization in international trade.	0.796
	Companies should use an Enterprise Resource Planning (ERP) software.	0.751
	Our company's foreign sales volume has increased with digitalization.	0.740
	The impact of digitalization on international trade is very high in operational dimension.	0.735
	All citizens should have a digital signature.	0.725
	The realization of the tender should be done completely in digital environment.	0.720
	All money transactions must be done in 100% digital environment.	0.703
	Planning of distribution operation should be done in a completely digital environment.	0.668
	Warehousing and stock control must be performed completely by Internet of Things.	0.662
	After digitalization, our company's competitiveness in global markets has increased.	0.659
	Electronic media provides many advantages at the stage of writing specifications.	0.643
	The role of digitalization is important in determining the selling price of the product / service.	0.611
	Digitalization, provides confidence in the field of international trade.	0.598
	Digitalization has increased transparency in international trade.	0.549
	Customer relationship management has become much easier with electronic channels.	0.503
	Our operational costs decreased with digitalization.	0.449
	Digitalization has made the process easier to measure customer satisfaction.	0.401

KMO and Bartlett's Test

Kaiser-Meyer-Olkin Measure of Sampling Adequacy		0.750
Bartlett's Test of Sphericity	Approx. Chi-Square	661,788
	df	210
	Shallow.	0,000

Principal components analysis and Cronbach's Alpha value were used in the factor and reliability analysis for the values obtained in the table. Varimax was used as the rotation method in principal component analysis (PCA). A KMO value of 0.5 and above and a significant Bartlett's test value indicate that the correlation matrix is suitable for PCA analysis (Durmuş, Yurtkoru, &Çinko, 2011).

Reliability values of factor items were measured with Cronbach's Alpha coefficient. A Cronbach's Alpha value of 0.6 and above is sufficient for reliability (Akgül&Çevik, 2003; 435–436). In this case, it can be said that the items used in the scale are appropriate.

Association of Gender and Research Variables

The relationships between gender, a two-group categorical variable, and 21 categorical variables measuring the digitalization of trade were tested with the chi-square test. Analyzes showing the relationships between gender and research variables were performed separately for each research variable.

Gender and The Role of Digitalization is Important in Determining the Selling Price of The Product/Service

The result of the chi-square test, which measures the relationship between gender and the first question.There is no significant relationship between gender and the first question (p>0.05).

Gender and Electronic Media Provide Many Advantages at The Stage of Writing Specifications

The result of the chi-square test, which measures the relationship between gender and the second question, there is a significant relationship between gender and the second question (p<0.05). As a result of pairwise comparisons made over Adjusted Residual values, it is seen that the number of women who say they have no idea is significantly higher than the number

of men. In this case, it can be said that men think that the electronic environment provides many advantages in writing specifications compared to women.

Gender and The Realization of The Tender Should be Done Completely in Digital Environment

The result of the chi-square test, which measures the relationship between gender and the third question, there is no significant relationship between gender and the third question (p>0.05).

Gender and Post-Tender Contract Signing Must be Completely Digitalized

The result of the chi-square test, which measures the relationship between gender and the fourth question, there is no significant relationship between gender and the fourth question (p>0.05).

Gender and All Citizens Should Have a Digital Signature

The result of the chi-square test, which measures the relationship between gender and the fifth question, there is no significant relationship between gender and the fifth question (p>0.05).

Gender and All Money Transactions Must Be Done in 100% Digital Environment

The result of the chi-square test, which measures the relationship between gender and the sixth question, there is no significant relationship between gender and the sixth question(p>0.05).

Gender and Warehousing and Stock Control Must Be Performed Completely by Internet of Things

The result of the chi-square test, which measures the relationship between gender and the seventh question, there is no significant relationship between gender and the seventh question (p>0.05).

Gender and Companies Should Use an Enterprise Resource Planning (ERP) Software

The result of the chi-square test, which measures the relationship between gender and the eighth question, there is no significant relationship between gender and the eighth question (p>0.05).

Gender and Planning of Distribution Operation Should Be Done in a Completely Digital Environment

The result of the chi-square test, which measures the relationship between gender and the ninth question, there is no significant relationship between gender and the ninth question (p>0.05).

Gender and The Impact of Digitalization on International Trade is Very High in Operational Dimension

The result of the chi-square test, which measures the relationship between gender and the tenth question, there is no significant relationship between gender and the tenth question (p>0.05).

Gender and Digitalization Have Made Access to Global Supply Channel Easier

The result of the chi-square test, which measures the relationship between gender and the eleventh question, it is seen that there is no significant relationship between gender and the eleventh question (p>0.05).

Gender and Data Security of International Trade Have Decreased in The Digitalization Process

The result of the chi-square test, which measures the relationship between gender and the twelfth question, there is no significant relationship between gender and the twelfth question (p>0.05).

Gender And Digitalization Have Increased Transparency in International Trade

The result of the chi-square test, which measures the relationship between gender and the thirteenth question, there is no significant relationship between gender and the thirteenth question (p>0.05).

Gender And Customer Relationship Management Has Become Much Easier with Electronic Channels

The result of the chi-square test, which measures the relationship between gender and the fourteenth question, there is no significant relationship between gender and the fourteenth question (p>0.05).

Gender And Digitalization, Provides Confidence in The Field OfInternational Trade

The result of the chi-square test, which measures the relationship between gender and the fifteenth question, there is no significant relationship between gender and the fifteenth question (p>0.05).

Gender And After Digitalization, Our Company's Competitiveness in Global Markets Has Increased

The result of the chi-square test, which measures the relationship between gender and the sixteenth question, there is no significant relationship between gender and the sixteenth question (p>0.05).

Gender And Our Company's Foreign Sales Volume Has Increased with Digitalization

The result of the chi-square test, which measures the relationship between gender and the seventeenth question, there is no significant relationship between gender and the seventeenth question (p>0.05).

Gender And Our Operational Costs Decreased with Digitalization

The result of the chi-square test, which measures the relationship between gender and the eighteenth question, there is no significant relationship between gender and the eighteenth question (p>0.05).

Gender and Our Delivery Time of Products Have Decreased with Digitalization in International Trade

The result of the chi-square test, which measures the relationship between gender and the nineteenth question that there is no significant relationship between gender and the nineteenth question (p>0.05).

Gender and Digitalization Have a Huge Impact on Reducing Our Purchasing Costs

The result of the chi-square test, which measures the relationship between gender and the twentieth question, there is no significant relationship between gender and the twentieth question (p>0.05).

Gender and Digitalization Have Made the Process Easier To Measure Customer Satisfaction

The result of the chi-square test, which measures the relationship between gender and the twenty-first question, that there is no significant relationship between gender and the twenty-first question (p>0.05).

The p value between gender and question 2 is less than 0.05. In this case, the null hypothesis for question 2 with gender is rejected. Gender and question 2 are not independent of each other.

Association of Graduation of Latest School and Research Variables

The relationships between the last graduated school variable, which is a three-group categorical variable, and 21 categorical variables measuring the digitalization of commerce were tested with the chi-square test. Analyzes showing the relationships between graduation and research variables were made separately for each research variable.

Graduation and the Role of Digitalization is Important in Determining The Selling Price of The Product/Service

The result of the chi-square test, which measures the relationship between graduation and the first question, that there is no significant relationship between graduation and the first question (p>0.05).

Graduation and Electronic Media Provide Many Advantages at The Stage of Writing Specifications

The result of the chi-square test, which measures the relationship between graduation and the second question, that there is no significant relationship between graduation and the second question (p>0.05).

Graduation and the Realization of The Tender Should Be Done Completely in Digital Environment

The result of the chi-square test, which measures the relationship between graduation and the third question,that there is no significant relationship between graduation and the third question (p>0.05).

Graduation And Post-Tender Contract Signing Must Be Completely Digitalized

The result of the chi-square test, which measures the relationship between graduation and the fourth question, that there is no significant relationship between graduation and the fourth question (p>0.05).

Graduation And All Citizens Should Have a Digital Signature

The result of the chi-square test, which measures the relationship between graduation and the fifth question, that there is no significant relationship between graduation and the fifth question (p>0.05).

Graduation And All Money Transactions Must Be Done In 100% Digital Environment

The result of the chi-square test, which measures the relationship between graduation and the sixth question, that there is no significant relationship between graduation and the sixth question (p>0.05).

Graduation And Warehousing and Stock Control Must Be Performed Completely by Internet of Things

The result of the chi-square test, which measures the relationship between graduation and the seventh question, that there is no significant relationship between graduation and the seventh question (p>0.05).

Graduation and Companies Should Use an Enterprise Resource Planning (ERP) Software

The result of the chi-square test, which measures the relationship between graduation and the eighth question, that there is no significant relationship between graduation and the eighth question (p>0.05).

Graduation and Planning of Distribution Operation Should Be Done in a Completely Digital Environment

The result of the chi-square test, which measures the relationship between graduation and the ninth question, that there is no significant relationship between graduation and the ninth question (p>0.05).

Graduation and the Impact Of Digitalization On International Trade Is Very High In Operational Dimension

The result of the chi-square test, which measures the relationship between graduation and the tenth question, that there is no significant relationship between graduation and the tenth question (p>0.05).

Graduation and Digitalization Have Made Access to Global Supply Channel Easier

The result of the chi-square test, which measures the relationship between graduation and the eleventh question, that there is a significant relationship between graduation and the eleventh question (p<0.05). As a result of the pairwise comparisons made over the Adjusted Residual values, it is seen that the number of high school graduates who say they have no idea is significantly higher than the number of undergraduate and master/doctorate graduates. In addition, it is seen that the number of high school graduates who say I Strongly Agree is significantly lower than the number of undergraduate and master/doctorate graduates. In this case, it can be said that high school graduates are less likely to agree with the idea that digitalization facilitates access to the global supply chain.

Graduation and Data Security ofInternational Trade Have Decreased in The Digitalization Process

The result of the chi-square test, which measures the relationship between graduation and the twelfth question that there is no significant relationship between graduation and the twelfth question (p>0.05).

Graduation and Digitalization Have in Creased Transparency in International Trade

The result of the chi-square test, which measures the relationship between graduation and the thirteenth question, that there is a significant relationship between graduation and the thirteenth question (p<0.05). As a result of the pairwise comparisons made over the Adjusted Residual values, it is seen that the number of doctoral graduates who say they agree is significantly higher than the number of high school and undergraduate graduates. In this case, doctorate graduates think that digitalization increases transparency in international trade more than university and high school graduates.

Graduation and Customer Relationship Management Have Become Much Easier withElectronic Channels

The result of the chi-square test, which measures the relationship between graduation and the fourteenth question, that there is no significant relationship between graduation and the fourteenth question (p>0.05).

Graduation and Digitalization, Provides Confidence inThe Field of International Trade

The result of the chi-square test, which measures the relationship between graduation and the fifteenth question, that there is no significant relationship between graduation and the fifteenth question (p>0.05).

Graduation And After Digitalization, Our Company's Competitiveness in Global Markets Has Increased

The result of the chi-square test, which measures the relationship between graduation and the sixteenth question, that there is no significant relationship between graduation and the sixteenth question (p>0.05).

Graduation And Our Company's Foreign Sales Volume Has Increased with Digitalization

The result of the chi-square test, which measures the relationship between graduation and the seventeenth question, that there is no significant relationship between graduation and the seventeenth question (p>0.05).

Graduation And Our Operational Costs Decreased with Digitalization

The result of the chi-square test, which measures the relationship between graduation and the eighteenth question, that there is no significant relationship between graduation and the eighteenth question (p>0.05).

Graduation And Our Delivery Time of Products Have Decreased with Digitalization in International Trade

The result of the chi-square test, which measures the relationship between graduation and the nineteenth question, that there is no significant relationship between graduation and the nineth question (p>0.05).

Graduation and Digitalization Havea Huge Impact on Reducing Our Purchasing Costs

The result of the chi-square test, which measures the relationship between graduation and the twentieth question, that there is no significant relationship between graduation and the twentieth question (p>0.05).

Graduation and Digitalization Have Made the Process Easier to Measure Customer Satisfaction

The result of the chi-square test, which measures the relationship between graduation and the twenty-first question, that there is no significant relationship between graduation and the twenty-first question (p>0.05).

The p values between graduation and questions 11 and 13 are less than 0.05. In this case, the null hypotheses for questions 11 and 13 are rejected upon graduation. Graduation and questions 11 and 13 are not independent of each other.

Association of Age and Research Variables

The relationships between the age variable, which is a four-group categorical variable, and 21 categorical variables measuring the digitalization of trade were tested with the chi-square test. Analyzes showing the relationships between age and research variables were performed separately for each research variable.

Age and the Role of Digitalization is Important in Determining The Selling Price of The Product/Service

The result of the chi-square test, which measures the relationship between age and the first question, that there is no significant relationship between graduation and the first question (p>0.05).

Age and Electronic Media Provide Many Advantages at The Stage of Writing Specifications

The result of the chi-square test, which measures the relationship between age and the second question, that there is no significant relationship between age and the second question (p>0.05).

Age and the Realization ofThe Tender Should Be Done Completely in Digital Environment

The result of the chi-square test, which measures the relationship between age and the third question, that there is no significant relationship between age and the third question (p>0.05).

Age and Post-Tender Contract Signing Must Be Completely Digitalized

The result of the chi-square test, which measures the relationship between age and the fourth question that there is no significant relationship between age and the fourth question (p>0.05).

Age and All Citizens Should Have a Digital Signature

The result of the chi-square test, which measures the relationship between age and the fifth question, that there is no significant relationship between age and the fifth question (p>0.05).

Age and All Money Transactions Must Be Done In 100% Digital Environment

The result of the chi-square test, which measures the relationship between age and the sixth question, that there is no significant relationship between age and the sixth question (p>0.05).

Age and Warehousing and Stock Control Must Be Performed Completely ByInternet Of Things

The result of the chi-square test, which measures the relationship between age and the seventh question, that there is no significant relationship between age and the seventh question (p>0.05).

Age and Companies Should Use an Enterprise Resource Planning (ERP) Software

The result of the chi-square test, which measures the relationship between age and the eighth question, that there is no significant relationship between age and the eighth question (p>0.05).

Age and Planning of Distribution Operation Should Be Done in a Completely Digital Environment

The result of the chi-square test, which measures the relationship between age and the ninth question, that there is no significant relationship between age and the ninth question (p>0.05).

Age and the Impact of Digitalization on International Trade is Very High in Operational Dimension

The result of the chi-square test, which measures the relationship between age and the tenth question, that there is no significant relationship between age and the tenth question ($p > 0.05$).

Age and Digitalization Have Made Access to Global Supply Channel Easier

The result of the chi-square test, which measures the relationship between age and the eleventh question, that there is no significant relationship between age and the eleventh question ($p > 0.05$).

Age and Data Security of International Trade Has Decreased in The Digitalization Process

The result of the chi-square test, which measures the relationship between age and the twelfth question, that there is no significant relationship between age and the twelfth question ($p > 0.05$).

Age and Digitalization Havein Creased Transparency in International Trade

The result of the chi-square test, which measures the relationship between age and the thirteenth question, that there is no significant relationship between age and the thirteenth question ($p > 0.05$).

Age and Customer Relationship Management Has Become Much Easier with Electronic Channels

The result of the chi-square test, which measures the relationship between age and the fourteenth question, that there is no significant relationship between age and the fourteenth question ($p > 0.05$).

Age and Digitalization, Provides Confidence in The Field of International Trade

The result of the chi-square test, which measures the relationship between age and the fifteenth question, that there is no significant relationship between age and the fifteenth question ($p > 0.05$).

Age and After Digitalization, Our Company's Competitiveness in Global Markets Has Increased

The result of the chi-square test, which measures the relationship between age and the sixteenth question, that there is a significant relationship between age and the sixteenth question ($p<0.05$). As a result of pairwise comparisons made over Adjusted Residuals values, it is seen that the number of 18-25 age groups who say they completely agree is significantly higher than the number of other age groups. Therefore, the younger age group thinks that digitalization increases the company's global competitive advantage more than other age groups.

Age and Our Company's Foreign Sales Volume Has Increased with Digitalization

The result of the chi-square test, which measures the relationship between age and the seventeenth question, that there is no significant relationship between age and the seventeenth question ($p>0.05$).

Age And Our Operational Costs Decreased with Digitalization

The result of the chi-square test, which measures the relationship between age and the eighteenth question, that there is no significant relationship between age and the eighteenth question ($p>0.05$).

Age and Our Delivery Time of Products Have Decreased with Digitalizationin International Trade

The result of the chi-square test, which measures the relationship between age and the nineteenth question, that there is no significant relationship between age and the nineteenth question ($p>0.05$).

Age and Digitalization Have a Huge Impact On Reducing Our Purchasing Costs

The result of the chi-square test, which measures the relationship between age and the twentieth question, that there is no significant relationship between age and the twentieth question ($p>0.05$).

Age and Digitalization Have Made The Process Easier to Measure Customer Satisfaction

The result of the chi-square test, which measures the relationship between age and the twenty-first question, that there is no significant relationship between age and the twenty-first question (p>0.05). P value between age and question 16 is less than 0.05. In this case, the null hypothesis for age and question 16 is rejected. Age and question 16 are not independent of each other.

Association of Level of Position And Research Variables

The relationships between the position level variable, which is a categorical variable with five groups, and 21 categorical variables measuring the digitalization of trade were tested with the chi-square test.

Level of Position and The Role Of Digitalization is Important in Determining the Selling Price of the Product/Service

The result of the chi-square test, which measures the relationship between Position Level and the first question, that there is no significant relationship between Position Level and the first question (p>0.05).

Level of Positionand Electronic Media Provides Many Advents Level of Positions at The Level of Position of Writing Specifications

The result of the chi-square test, which measures the relationship between Position Level and the second question, that there is no significant relationship between Position Level and the second question (p>0.05).

Level of Position and the Realization of the Tender Should be Done Completely in Digital Environment

The result of the chi-square test, which measures the relationship between Position Level and the third question, that there is no significant relationship between Position Level and the third question (p>0.05).

Level of Position and Post-Tender Contract Signing Must Be Completely Digitalized

The result of the chi-square test, which measures the relationship between Position Level and the fourth question, that there is no significant relationship between Position Level and the fourth question (p>0.05).

Level of Position and All Citizens Should Have a Digital Signature

The result of the chi-square test, which measures the relationship between Position Level and the fifth question, that there is no significant relationship between Position Level and the fifth question (p>0.05).

Level of Position and All Money Transactions Must Be Done in 100% Digital Environment

The result of the chi-square test, which measures the relationship between Position Level and the sixth question, that there is no significant relationship between Position Level and the sixth question (p>0.05).

Level of Position and Ware housing and Stock Control Must be Performed Completely By Internet of Things

The result of the chi-square test, which measures the relationship between Position Level and the seventh question, that there is no significant relationship between Position Level and the seventh question (p>0.05).

Level Of Position and companies Should Use An Enterprise Resource Planning (ERP) Software

The result of the chi-square test, which measures the relationship between Position Level and the eighth question, that there is no significant relationship between Position Level and the eighth question (p>0.05).

Level Of Position And Planning Of Distribution Operation Should Be Done in a Completely Digital Environment

The result of the chi-square test, which measures the relationship between Position Level and the ninth question, that there is no significant relationship between Position Level and the ninth question (p>0.05).

Level Of Position and The Impact Of Digitalization On International Trade is Very High in Operational Dimension

The result of the chi-square test, which measures the relationship between Position Level and the tenth question, that there is no significant relationship between Position Level and the tenth question (p>0.05).

Level Of Position And Digitalization Has Made Access To Global Supply Channel Easier

The result of the chi-square test, which measures the relationship between Position Level and the eleventh question that there is no significant relationship between Position Level and the eleventh question (p>0.05).

Level Of Position and Data Security OfI nternational Trade Has Decreased In The Digitalization Process

The result of the chi-square test, which measures the relationship between Position Level and the twelfth question, that there is no significant relationship between Position Level and the twelfth question (p>0.05).

Level Of Position andDigitalization Has Increased Transparency InInternational Trade

The result of the chi-square test, which measures the relationship between Position Level and the thirteenth question, that there is no significant relationship between Position Level and the thirteenth question (p>0.05).

Level Of Position and Customer Relationship Management Has Become Much Easier With Electronic Channel

The result of the chi-square test, which measures the relationship between Position Level and the fourteenth question, that there is no significant relationship between Position Level and the fourteenth question (p>0.05).

Level Of Position and Digitalization, Provides Confidence InThe Field Of International Trade

The result of the chi-square test, which measures the relationship between Position Level and the fifteenth question, that there is no significant relationship between the Position Level and the fifteenth question (p>0.05).

Level Of Position AndAfter Digitalization, Our Company's Competitiveness In Global Markets Has Increased

The result of the chi-square test, which measures the relationship between Position Level and the sixteenth question, that there is no significant relationship between the Position Level and the sixteenth question (p>0.05).

Level of Position and Our Company's Foreign Sales Volume Has Increased with Digitalization

The result of the chi-square test, which measures the relationship between Position Level and the seventeenth question, that there is no significant relationship between Position Level and the seventeenth question ($p > 0.05$)

Level of Position and Our Operational Costs Decreased with Digitalization

The result of the chi-square test, which measures the relationship between Position Level and the eighteenth question, that there is no significant relationship between the Position Level and the eighteenth question ($p > 0.05$).

Level Of Position and Our Delivery Time Of Products Have Decreased With Digitalization In International Trade

The result of the chi-square test, which measures the relationship between Position Level and the nineteenth question, that there is no significant relationship between Position Level and the nineteenth question ($p > 0.05$).

Level of Position and Digitalization Has aHuge Impact on Reducing Our Purchasing Costs

The result of the chi-square test, which measures the relationship between Position Level and the twentieth question, that there is a significant relationship ($p < 0.05$) between the Position Level and the twentieth question. As a result of the pairwise comparisons made over the Adjusted Residual values, it is seen that the number of experts who say they completely agree is significantly higher than the number of other occupational groups. In addition, the number of assistant experts who say I agree, have no idea and disagree is significantly higher than the number of other occupational groups. In this case, it can be said that experts agree with the idea that digitalization reduces purchasing costs more than other occupational groups. On the contrary, assistant experts do not agree with the idea that digitalization reduces purchasing costs.

Level of Position and Digitalization Has Made The Process Easier To Measure Customer Satisfaction

The result of the chi-square test, which measures the relationship between Position Level and the twenty-first question, that there is no significant relationship between Position Level and the twenty-first question ($p > 0.05$).p value between the position level and question 20 is less than 0.05. In this case, the null hypothesis for question 20 with position level is rejected. Position level and question 20 are not independent of each other.

Correlations of Research Variables

The correlation values of the research variables among themselves were measured with the Kendall's tau correlation coefficient (τ). The values shown in Table 87 are correlation coefficients. There is no negative significant correlation in any of the research variables. In this case, it can be said that the values of the research variables increase and decrease together. It is seen that the highest correlation value is between Q16 and Q17 ($\tau = 0.556$). In this case, there is a significant positive relationship between digitalization and the strengthening of the company's position in global competition and the increase in import figures. Those who state that digitalization strengthens the company's position in global competition also state that the company's import figures have increased.

Table x was obtained as a result of subtracting the correlation values of the questions that did not have a significant relationship between them. As can be seen from the table, the 12th question has no significant relationship with any other question. The question with the most significant relationship with the other questions is the 10th question.

	Q1	Q2	Q3	Q4	Q5	Q6	Q7	Q8	Q9	Q10	Q11	Q12	Q13	Q14	Q15	Q16	Q17	Q18	Q19	Q20	Q21
Q1	1,000	0.189	0.031	0.130	-0.050	-0.050	,222 *	0.066	0.083	,225 *	0.146	0.130	,199 *	,235 *	0.150	.308 **	0.171	0.176	,233 *	0.130	0.114
Q2		1,000	,263 **	,373 **	0.165	,199 *	,189 *	0.162	,295 **	,426 **	,351 **	0.017	,466 **	,222 *	,219 *	,240 *	,228 *	.289 **	,196 *	,226 *	,270 **
Q3			1,000	,484 **	,265 **	0.158	0.176	,200 *	,430 **	,241 *	0.151	-0.075	,227 *	0.141	,405 **	0.156	0.116	,233 *	0.081	,202 *	0.065
Q4				1,000	,393 **	,231 *	,319 **	,210 *	,361 **	,191 *	0.054	-0.061	,371 **	0.049	,295 **	,199 *	,208 *	0.140	0.027	0.135	0.079
Q5					1,000	.355 **	,413 **	,237 *	,290 **	0.181	-0.020	-0.085	,449 **	0.006	,238 *	0.187	,219 *	0.053	0.094	0.050	0.080
Q6						1,000	.364 **	,245 **	,185 *	,224 *	0.092	0.030	0.172	0.043	0.127	,206 *	0.112	0.130	0.120	0.158	0.115
Q7							1,000	,241 *	,517 **	,326 **	0.096	0.098	.358 **	,198 *	,228 *	,345 **	,316 **	0.190	0.165	,212 *	,245 *
Q8								1,000	.358 **	,324 **	0.181	-0.113	,256 **	0.128	.355 **	,260 **	0.119	0.072	,214 *	0.028	,254 *
Q9									1,000	.458 **	,245 *	0.017	,407 **	0.125	,344 **	.308 **	,237 *	,282 **	0.116	,230 *	0.166
Q10										1,000	,537 **	0.161	.354 **	,239 *	,332 **	.394 **	,200 *	,376 **	,259 **	,231 *	,254 *
Q11											1,000	0.081	0.150	,310 **	,260 **	,318 **	,226 *	.354 **	,206 *	0.145	,235 *
Q12												1,000	-0.127	0.064	-0.141	0.037	-0.034	0.104	-0.011	0.035	-0.107
Q13													1,000	.284 **	,315 **	,428 **	,407 **	,362 **	0.177	,200 *	,361 **
Q14														1,000	,333 **	,376 **	,345 **	,337 **	,281 **	,292 **	,482 **
Q15															1,000	,404 **	,228 *	,326 **	.356 **	,273 **	,313 **
Q16																1,000	,556 **	,494 **	,340 **	,248 *	,372 **
Q17																	1,000	,425 **	0.176	,212 *	,383 **
Q18																		1,000	,360 **	,411 **	,425 **
Q19																			1,000	,493 **	,437 **

Q20	1,000	,266 **
Q21		1,000

Table 1. Correlations of Research Variables

*Correlation is significant at the 0.05 level (2-tailed).

**Correlation is significant at the 0.01 level (2-tailed).

Table 2. Significant Correlations of Research Variables

	Q1	Q2	Q3	Q4	Q5	Q6	Q7	Q8	Q9	Q10	Q11	Q12	Q13	Q14	Q15	Q16	Q17	Q18	Q19	Q20	Q21
Q1							,222*			,225*			,199*	,235*		,308**			,233*		
Q2			,263**	,373**		,199*	,189*		,295**	,426**	,351**		,466**	,222*	,219*	,240*	,228*	,289**	,196*	,226*	,270**
Q3		,263**		,484**	,265**			,200*	,430**	,241*			,227*		,405**			,233*		,202*	
Q4		,373**	,484**		,393**	,231*	,319**	,210*	,361**	,191*			,371**		,295**	,199*	,208*				
Q5			,265**	,393**		.355**	,413**	,237*	,290**				,449**		,238*		,219*				
Q6		,199*		,231*	.355**		,364**	,245**	,185*	,224*						,206*					
Q7	,222*	,189*		,319**	,413**	,364**		,241*	,517**	,326**			,358**	,198*	,228*	,345**	,316**			,212*	,245*
Q8			,200*	,210*	,237*	,245**	,241*		,358**	,324**			,256**		.355**	,260**			,214*		,254*
Q9		,295**	,430**	,361**	,290**	,185*	,517**	,358**		,458**	,245*		,407**		,344**	,308**	,237*	,282**		,230*	
Q10	,225*	,426**	,241*	,191*		,224*	,326**	,324**	,458**		,537**		,354**	,239*	,332**	,394**	,200*	,376**	,259**	,231*	,254*
Q11		,351**							,245*	,537**				,310**	,260**	,318**	,226*	,354**	,206*		,235*
Q12																					
Q13	,199*	,466**	,227*	,371**	,449**		,358**	,256**	,407**	,354**				,284**	,315**	,428**	,407**	,362**		,200*	,361**
Q14	,235*	,222*					,198*			,239*	,310**		,284**		,333**	,376**	,345**	,337**	,281**	,292**	,482**
Q15		,219*	,405**	,295**	.238*		,228*	.355**	,344**	,332**	,260**		,315**	,333**		,404**	,228*	,326**	,356**	,273**	,313**
Q16	,308**	,240*		,199*		,206*	,345**	,260**	,308**	,394**	,318**		,428**	,376**	,404**		,556**	,494**	,340**	,248*	,372**
Q17		,228*		,208*	,219*		,316**		,237*	,200*	,226*		,407**	,345**	,228*	,556**		,425**		,212*	,383**
Q18		,289**	,233*						,282**	,376**	,354**		,362**	,337**	,326**	,494**	,425**		,360**	,411**	,425**
Q19	,233*	,196*						,214*		,259**	,206*			,281**	,356**	,340**		,360**		,493**	,437**
Q20		,226*	,202*				,212*		,230*	,231*			,200*	,292**	,273**	,248*	,212*	,411**	,493**		,266**
Q21		,270**					,245*	,254*		,254*	,235*		,361**	,482**	,313**	,372**	,383**	,425**	,437**	,266**	

RESULTS

As a result of my studies, I have learned that technology and digitalization in the developing world order affect all areas of our lives, as well as areas such as international trade and business development, and provide and will provide great benefits in terms of time and economy. With my study, I aimed to contribute to the literature with data such as the history of trade, international trade theories, business development models and the explanation of the concepts brought by digitalization.

DISCUSSION

While preparing my thesis, my main hypothesis was that the digitalization phenomenon is a time and cost saving concept for companies serving in the field of international trade. According to the data I obtained as a result of the literature review, I made; It contains information on how much it facilitates the business development process and international trade. As I mentioned above, I used the literature review method while preparing my thesis. I also resorted to collecting information using the survey method to help me control the data I obtained.

CONCLUSION

International trade is on the verge of a new era. The digital revolution, referred to as the Fourth Industrial Revolution – whose advent is generally believed to have come with the early twenty-first century – will change the nature and forms of manufacturing processes and trade in goods and services. Globalization and regionalism are making them ever more international. This means that goods and services are becoming more complex and more costly in their realization. We may safely assume that the modern technologies and devices will play a critical role in overcoming these barriers to the development of global economy. The vast number of these devices

– including computers, the Internet, and mobile phones – was already in use during the Third Industrial Revolution; what we are witnessing now is their further development.

Other inventions

– including the Internet of Things, cloud computing, big data, artificial intelligence, 3D printing, augmented reality, Blockchain, nanomaterials, and synthetic biology – are at the stage of advanced research, with their experimental use about to be tested in practice. These innovations are expected to significantly impact the growth of world trade volume, also leading to a decline in

its costs and information asymmetry, besides shortening the time needed for transaction completion and the delivery of goods and services. The digital era will see the international transfer marked by reliability, punctuality, security, the elimination of losses caused by errors and fraud, along with a high guarantee that payments will be made.

We will also witness significant changes in the global trade structure. The growth trend of services will accelerate.

Instruments in the Internet of Things, online platforms, smart devices, Blockchain and other digital infrastructure will greatly simplify communication between manufacturers, exporters, importers and consumers.

Trading conditions will change significantly with the implementation of 4IR devices. Those who move first will be those who benefit the most. Developed countries have the best chance of competition with their advantages in terms of capital and technology. With falling trade costs and reduced requirements for the material infrastructure of trade, small and medium-sized enterprises from developing countries will be able to increase their share of world trade.

In this study, I evaluated the effects of demographic variables in areas such as age, gender, education level, experience level of rapidly digitalizing international trade.

As a result of this study,

Digitalization makes a positive contribution to improving the business processes of a company that trades internationally, making it transparent, reducing costs, measuring customer satisfaction accurately and efficiently, and increasing its market share in exports.

In this context, it can be said that there is a positive correlation between the increase in education and position level and digitalization processes. Therefore, the progress to be made in this field has a great contribution to the digitalization processes.

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