

The Impact of Logistics Activities on Customer Satisfaction from an E-Commerce Perspective

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Abstract

In the digital era, the e-commerce industry is developing unexpectedly and has emerge as an integral phase of people's lives. It is now impossible to stay except e-commerce, as it gives comfort and will become embedded in our day by day routines. In the online shopping market, numerous components contribute to satisfying online shoppers, with logistics services playing a significant role in this regard. The purpose of this study is to demonstrate the impact of logistics activities from an e-commerce perspective on customer and satisfaction, and to uncover the relationship between them. A survey organized for the find out about examined the satisfaction of end-users with the logistic services supplied via e-commerce websites. An online survey was performed with a hundred and ten people who had been 18 years or older and had preceding online buying experience from e-commerce websites. Tests had been utilized the use of the SPSS statistical program. Based on the study findings, it was perceived logistics activities had an impact on customer satisfaction influenced by some independent variable. Findings were deliberated in the discussion and conclusion, accompanied by a review of relevant literature.

Keywords: Customer satisfaction; e-commerce; logistics

INTRODUCTION

The thought of change has been ingrained in human records considering that historic times. With the development of technology, commerce has developed thru a variety of stages, main to the emergence of e-commerce as a innovative idea with the creation of the internet. On the other hand, we cannot think e-commerce without logistics activities.

The necessary intention of logistics, from a holistic perspective, is to fulfil client wishes by means of skill of coordinating the go with the flow of materials and records from the market through the affiliation and its operations, extending to suppliers.

According to some research about the utilization of files from online consumer rankings to find out how the relationship between logistics ordinary overall performance and client loyalty is influenced with the aid of capacity of the hazard qualities of merchandise and the efficiencies of websites. The findings set up that the efficiencies of websites, rather than the threat qualities of products, considerably realistic the impact of logistics ordinary overall performance on customer loyalty. (Zeng and Bolz, 2017)

In this study, the impact of logistics acitivities on customer satisfaction from an e-commerce perspective were analyzed. Data used to be gathered thru online google survey performed with people who experienced online shopping alongside with a complete evaluation of severa articles and theses.

RESULTS

1. Reliability Analysis

Reliability analysis is employed to confirm whether all the elements in the questionnaire align with the equal goal and to determine the amalgamation of these elements inside a single framework. At this juncture, when the variety of plausible values for an expression exceeds two, the Cronbach's Alpha size approach is utilized, which is drastically employed in inside consistency calculations. Considering its everyday utilization in Likert-type scales (Akbulut, 2010), the modern learn about will additionally appoint Cronbach's Alpha method.

The alpha coefficient furnishes records about the degree to which the gadgets included in the scale showcase consistency amongst themselves and symbolize the latent variable in the history (Çakmur, 2012, p. 340). The Cronbach's Alpha protection coefficient stages from 0 to 1. A coefficient nearer to one implies that every item in the scale measures the identical attitude. This coefficient serves as an indicator of inside consistency and homogeneity. Based on the α coefficient, the reliability of the scale can be interpreted as follows:

If $0.00 \leq \alpha < 0.40$, the scale is unreliable,

If $0.40 \leq \alpha < 0.60$, the reliability of the scale is low,

If $0.60 \leq \alpha < 0.80$, the scale is quite reliable,

If $0.80 \leq \alpha < 1.00$, the scale is highly reliable.

Table 1.

Reliability Test

CUSTOMER SATISFACTION (CS)

Cronbach's Alpha	N of Items
,901	8

LOGISTIC SATISFACTION (LS)

Cronbach's Alpha	N of Items
,910	9

Based on the Reliability Statistics assessment, which measures the consistency of the questionnaire, a reliability rating of $\alpha = 0.910$ used to be obtained. As the alpha value methods 1, it can be inferred that the find out about reveals a significantly excessive degree of reliability.

2. Normality Analysis

Table 2.

Normality Test

	Skewness	Kurtosis
Customer Satisfaction	-1,310	3,453
Logistic Satisfaction	-,698	1,696

Skewness refers to the extent of asymmetry in a normal distribution. If the distribution has a lengthy tail on the right side, it is regarded proper (positive) skewed, whereas if it has a lengthy tail on the left side, it is viewed left (negative) skewed. Kurtosis, on the different hand, measures the degree of sharpness or flatness of the normal distribution curve (Akbulut et al., 1998). According to Huck (2008), a skewness value within the vary of +1 to -1 is viewed normal, whilst a kurtosis cost inside the vary of two to -2 shows a regular distribution.

3. Descriptive Analysis on Demographics

Table 3.

Frequencies on Gender

	Frequency	Percent	Valid Percent	Cumulative Percent
Gender Female	53	48,2	48,2	48,2
Male	57	51,8	51,8	100,0
Total	110	100,0	100,0	

According to the Table 3, 48,2 % (n=53) of the participants were female and 51,8 % (n=57) were male.

Table 4.

Frequencies on Age

		Frequency	Percent	Valid Percent	Cumulative Percent
Age	18 -29 years old	65	59,1	59,1	59,1
Groups	30-39 years old	26	23,6	23,6	82,7
	40 years and older	19	17,3	17,3	100,0
	Total	110	100,0	100,0	

According to the Table 4, 59.1 % of participants were between the ages 18 - 29, 23.6% participants were between the ages of 30-39, 17,3% of participants were the ages of 40 and over.

Table 5.

Frequencies on Education Level

		Frequency	Percent	Valid Percent	Cumulative Percent
Education	High school graduate	9	8,2	8,2	8,2
Level	Associate degree	5	4,5	4,5	12,7
	Bachelor's degree	71	64,5	64,5	77,3
	Master-Doctorate	25	22,7	22,7	100,0
	Total	110	100,0	100,0	

As per the Table 5, 8.2 % (n=9) were graduated from high school, 4.5 % (n=5), were graduated from associate degree, 64,5 % (n=71) were graduated from bachelor's degree, 22.7 % (n=25) of the participants graduated from Master-Doctorate.

Table 6.

Frequencies on Occupation

		Frequency	Percent	Valid Percent	Cumulative Percent
Occupation	Student	6	5,5	5,5	5,5
	Employee	90	81,8	81,8	87,3
	Unemployed	5	4,5	4,5	91,8
	Retired	9	8,2	8,2	100,0
	Total	110	100,0	100,0	

Based on the Table 6, 5.5 % (n=6) were student, 81.8 % (n=90) were employee, 4.5 % (n=5) were unemployed, 8,2% (n=9) of the participants were retired.

Table 7.

Frequencies on Marial Status

		Frequency	Percent	Valid Percent	Cumulative Percent
Marital Status	Married	55	50,0	50,0	50,0
	Single	55	50,0	50,0	100,0
	Total	110	100,0	100,0	

In accordance with the Table 7, 50 % (n=55) of the participant was married, 50% (n=55) of the participant was single.

Table 8.

Frequencies on Number of Children Had

		Frequency	Percent	Valid Percent	Cumulative Percent
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Children	,00	88	80,0	80,0	80,0
	1,00	15	13,6	13,6	93,6
	2,00	7	6,4	6,4	100,0
	Total	110	100,0	100,0	

According to the Table 8, 80% (n=88) of the participants had no children, 13.6% (n=15) of the participants had 1 child, 6.4% (n=7) of the participants had 2 or more children.

Table 9.

Frequencies on Number of Owned Pets

		Frequency	Percent	Valid Percent	Cumulative Percent
Having	,00	65	59,1	59,1	59,1
Pet	1,00	35	31,8	31,8	90,9
	2,00	10	9,1	9,1	100,0
	Total	110	100,0	100,0	

According to the Table 9, 59.1% (n=65) of the participants had no pets, 31.8% (n=35) of the participants had 1 pet, 9.1% (n=10) of the participants had 2 or more pets.

Table 10.

Frequencies of Using Hepsiburada

		Frequency	Percent	Valid Percent	Cumulative Percent
Using	Yes	105	95,5	95,5	95,5
Hepsiburada	No	5	4,5	4,5	100,0
	Total	110	100,0	100,0	

In accordance with the Table 10, 95.5% (n=105) of the participants had used Hepsiburada, 4.5% (n=5) of the participants never used Hepsiburada.

Table 11.

Frequencies of Online Shopping

		Frequency	Percent	Valid Percent	Cumulative Percent
Online shopping	Once every 2-3 months	29	26,4	26,4	26,4
	Once a month	31	28,2	28,2	54,5
	2 to 5 per month	34	30,9	30,9	85,5
	5 or more per month	16	14,5	14,5	100,0
	Total	110	100,0	100,0	

As per the Table 11, 26.4% (n=29) of the participants doing online shopping 1 time in every 2-3 months, 28.2% (n=31) of the participants doing online shopping once a month, 30.9% (n=34) of the participants doing online shopping 2 or 5 times per month, 14.5% (n=16) of the participants doing online shopping 5 or more times per month.

Table 12.

Frequencies of Awareness of Tracking Services

		Frequency	Percent	Valid Percent	Cumulative Percent
Aware of live tracking services	Yes	64	58,2	58,2	58,2
	No	46	41,8	41,8	100,0
	Total	110	100,0	100,0	

According to the Table 12, 58.2% (n=64) of the participants were aware of live tracking services, 41.8% (n=46) of the participants were not aware of live tracking services.

Table 13.

Frequencies of Using Live Tracking Services

		Frequency	Percent	Valid Percent	Cumulative Percent
	Yes	40	36,4	36,4	36,4

Using live tracking services	No	70	63,6	63,6	100,0
	Total	110	100,0	100,0	

Based on the Table 13, 36.4% (n=40) of the participants had used live tracking services, 63.6% (n=70) of the participants had not used live tracking services.

4. Hypothesis Analysis

4.1 Correlation Analysis

Correlation analysis indicate the degree and direction of the linear relationship between 2 variables. It can be observed R value. The scale can be interpreted as follows:

0.00 – 0.25: Very weak

0.26 – 0.49: Weak

0.50 – 0.69: Normal

0.70 – 0.89: Strong

0.90 – 1.00: Very Strong

H1: There is a relationship between logistics activities and customer satisfaction.

Table 14.

Correlations

		csTOTAL	lsTOTAL
CS	Pearson Correlation		,731**
	Sig. (2-tailed)		,000
	N	110	110
LS	Pearson Correlation	,731**	
	Sig. (2-tailed)	,000	
	N	110	110

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

Correlation analysis suggests that at least two variables are associated to every other. It targets to define its route and strength. The most vital assumption of the evaluation is that the relationship between the variables is linear. (Kurtuluş, 2010, p.181).

H₀: There is statistically significant positive relationship with logistics activities and customer satisfaction.

4.2 Model Summary Analysis

In this chapter, it is analysed if logistics activities affect customer satisfaction. The findings of the model summary analysis may be seen as follow.

H₂: Logistics activities affect customer satisfaction.

Table 15.

Model Summary Customer Satisfaction

Model	R	R Square	Adjusted R Square	Std. Error of the Estimate
1	,731 ^a	,534	,530	2,93458

a. Predictors: (Constant), Logistic Services

The summary table of the model provides information on the proportion of the variance in the logistic satisfaction variable that is explained by the variance in the customer satisfaction variable. Since the Adjusted R Square value is determined as .53, our percentage can be explained as 53%.

H₁₂: Logistic activities have an effect on the customer satisfaction.

According to the data given in the analysis, 48,2 % (n=53) of the participants were female and 51,8 % (n=57) were male. 59.1 % of the participants were between the ages 18 - 29, 23.6% of the participants were between the ages of 30-39, 17,3% of the participants were the ages of 40 and over. 8.2 % (n=9) were graduated from high school, 4.5 % (n=5), were graduated from associate degree, 64,5 % (n=71) were graduated from bachelor's degree, 22.7 % (n=25) of them graduated from Master-Doctorate. 5.5 % (n=6) were student, 81.8 % (n=90) were employee, 4.5 % (n=5) were unemployed, 8,2% (n=9) of them were retired. 50 % (n=55) of the

participant was married, 50% (n=55) of the participant was single. 80% (n=88) of the participants had no children, 13.6% (n=15) of the participants had 1 child, 6.4% (n=7) of the participants had 2 or more children. 59.1% (n=65) of the participants had no pets, 31.8% (n=35) of the participants had 1 pet, 9.1% (n=10) of the participants had 2 or more pets. 95.5% (n=105) of the participants had used Hepsiburada, 4.5% (n=5) of the participants never used Hepsiburada. 26.4% (n=29) of the participants doing online shopping 1 time in every 2-3 months, 28.2% (n=31) of the participants doing online shopping once a month, 30.9% (n=34) of the participants doing online shopping 2 or 5 times per month, 14.5% (n=16) of the participants doing online shopping 5 or more times per month. 58.2% (n=64) of the participants were aware of live tracking services, 41.8% (n=46) of the participants were not aware of live tracking services. 36.4% (n=40) of the participants had used live tracking services, 63.6% (n=70) of the participants had not used live tracking services.

Bases on the research there is a significant relationship between logistics activities and customer satisfaction. And according to model summary analysis logistics activities have an impact on customer satisfaction.

DISCUSSION

In modern day digital era, the enormous utilization of the internet allows customers to without difficulty join from any location, at their convenience, to get admission to immediately data on any subject matter of interest. Additionally, this connectivity lets in them to interact with corporations worldwide, posing challenges for organizations competing in the market. Previously, digital commerce was once restricted to computers, however now it extends to cell telephones and tablets. Thanks to e-commerce, shoppers can gather product facts and examine costs throughout a range of offerings.

Consumer behaviour has usually captivated the interest of researchers and sellers. With the increase of the usage of internet, has emerged as a huge catalyst in the improvement and development of online purchaser behaviour, main toward e-commerce.

Numerous meticulous research has explored the modifications in buying behaviour. Demographic elements play a necessary position in shaping each normal and digital shopping

for habits. As a result of the pandemic, consumers, who now spend extra time at home, have extended their online purchases of food, textiles, and interest products. Notably, these buying patterns have additionally been influenced by way of demographic characteristics.

In online commerce, consumer contentment is influenced with the aid of quite several elements linked to logistics and provider excellence. These variables consist of the accessibility of products, transport time, transport location, packaging of items, and information transmission (Skurpel, 2020).

CONCLUSION

Based on the literature evaluations conducted and the findings of my personal survey, the goal is to look at the impact of logistics activities on customer satisfaction from an e-commerce perspective, thinking about demographic attributes. Substantial correlations had been recognized between logistics activities and customer satisfaction.

From a commercial enterprise perspective, being existing in the online retail landscape is an increasing number of turning into a fundamental requirement alternatively than a choice. And online retailers should consider how logistics activities are impacting customer preference of e-commerce company.

Given the ongoing improvement and increase of e-commerce and logistics, it is anticipated that these sectors will proceed to develop further. Considering that digital commerce is a modern-day development in the annals of humanity and is placed for similarly expansion, I accept as true with that investigations pertaining to this challenge will increase and diversify each domestically and globally.

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