

An empirical study on consumer acceptance of products in electronic markets: a transaction cost model

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Abstract

Electronic commerce is gaining much attention from researchers and practitioners. Although increasing numbers of products are being marketed on the web, little effort has been spent on studying what product is more suitable for marketing electronically and why. In this research, a model based on the transaction cost theory is developed to tackle the problem. It is assumed that customers will go with a channel that has lower transactional costs. In other words, whether a customer would buy a product electronically is determined by the transaction cost of the channel. The transaction cost of a product on the web is determined by the uncertainty and asset specificity. An empirical study involving eight-six Internet users was conducted to test the model. Five products with different characteristics (book, shoes, toothpaste, microwave oven, and flower) were used in the study. The results indicate that (1) different products do have different customer acceptance on the electronic market, (2) the customer acceptance is determined by the transaction cost, which is in turn determined by the uncertainty and asset specificity, and (3) experienced shoppers are concerned more about the uncertainty in electronic shopping, whereas inexperienced shoppers are concerned with both. © 1998 Elsevier Science B.V. All rights reserved.

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1. Introduction

Electronic commerce is a modern business practice associated with the buying and selling of information, products, and services via Internet [13]. The rapid proliferation of Internet and the world-wide web (WWW) has created a fast growing electronic channel for marketing. A major reason for this is that the growing popularity of Internet attracts businesses to invest in online presence [17]. According to re-

ports from the Internet Society, over 186 countries have Internet access. The total number of users was approximately 30 million by the end of 1996 [2]. More than half US Internet users purchased merchandise online, and sales totalled US\$500 million in 1996. The cases in other countries are similar. For instance, over 42% of Internet users have visited at least one electronic store in Taiwan [16]. This figures are very much underestimated, as they do not reflect users who consulted the Internet before purchasing offline. As the Internet continues to grow, analysts predict US\$100 billion in retail Internet sales by 2000 [10].

Given the enormous business potential, the number of electronic stores increases in an unprecedented

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speed. Research issues in electronic commerce have also attracted much attention. For instance, Hamilton [10] and Hoffman [11] examined the commercial opportunities and challenges of the web. Tennebaum, et al. [22] proposed an architecture for Internet commerce. Kambil [14] studied potential electronic business processes. Bhimani [1] and Denning [4] discussed the security in electronic commerce. Panurach [19] and Neuman [18] studied electronic payment systems. Gupta, et al. [8,9] studied the economic issues in electronic commerce. Liang and Lai [16] developed guidelines for designing electronic malls. Since Internet may have significant impact on the way we do business, the economic issue will play a key role in future development of electronic commerce. These include pricing network services, offering proper products and services, governance structures of electronic trading, marketing and consumer behavior on the electronic market, and so on.

As a new channel for marketing, the web is capable of accommodating many different kinds of products and services. Due to the nature of electronic channels, however, not all products and services are suitable for marketing electronically. Failed cases on the Internet are as common as successful ones. Therefore, the key is not whether to market, but *what to market on the web*. Although some practical guidelines are available, theoretically sound research is highly desired.

The purpose of the research is to develop a consumer choice model based on the transaction cost theory, which would allow us to answer the questions of *what products and services are suitable for electronic markets and why they are suitable*.

Transaction cost economics (TCE) [3,24–27] examines the appropriate governance structures to conduct transactions. It argues that transaction costs are the major concern when a company is choosing between producing internally and acquiring over the market. TCE has been applied to analyze many issues such as strategic impact of information systems, resource allocation, and outsourcing decisions. Since doing business on Internet can be considered as an alternative channel to the traditional channel, TCE is a viable theory to explain the acquisition decision in electronic commerce.

The paper is organized as follows. First, the characteristics and product acquisition cycle of electronic

commerce are introduced. Then, TCE is applied to build a consumer choice model for electronic commerce. This is followed by an empirical test of the model. The results indicate that the TCE-based model performs well in explaining the sample surveyed in the study. Specifically, whether a consumer would buy a product from electronic markets is determined by the perceived transaction costs, which is in turn determined by (1) product and process uncertainty, and (2) the specificity of the product, which includes site specificity, physical asset specificity, human asset specificity, and brand name specificity. An interesting observation is that, for experienced electronic shoppers, the effect of asset specificity diminishes. The perceived uncertainty becomes the sole factor that determines the consumer choice.

2. Transaction process and transaction cost theory

There are many factors that may affect a customer's decision to purchase from electronic stores. For example, one may like the design of a particular shop or the discount offered by a shop. From the economic point of view, we focus on the economic factors for a consumer to purchase over the web instead of a traditional store. One particular aspect that we examine is the costs associated with the transaction process. In other words, given that all other factors are equal, a customer will go with a channel that has lower transaction costs. In this section, we review customer transaction processes and costs associated with these processes.

2.1. Customer transaction processes

When customers purchase a product from a seller, they must go through a process. This is called a transaction process. A typical consumer decision process includes five stages: problem recognition, search, alternative evaluation, choice, and outcome [5]. Another approach, called the customer resource life cycle (CRLC), divides the linkage between a company and its customers into four major stages: requirement, acquisition, stewardship, and retirement [12]. Each stage is composed of a few tasks as listed in Table 1. Another mercantile model decomposes

Table 1
Comparison of several customer decision models

Customer decision process	CRLC	Mercantile model	Transaction process
Problem recognition	Establish requirement Specify attributes		
Search		Search	Search
Alternative evaluation		Comparison	Comparison Examination
Choice	Select source Authorize and pay Acquire Test and accept Integrate Monitor Upgrade Maintain Transfer or dispose Account for	Bargaining Order Authorize payment	Bargaining Order Payment
		Receipt of product Post-service	Delivery Post-service

the process into three stages: purchase determination, purchase consumption, and postpurchase interaction [13].

In fact, these models propose a similar process by which a customer interacts with a seller. The major difference is their emphasis. As we see in Table 1, if we use the customer decision model as a base, CRLC emphasizes more on the activities after making a choice, whereas the mercantile model is more balanced. For the purpose of this research, we define the transaction process as a seven-step process (as listed in the fourth column in Table 1):

1. Search: search for relevant product or service information.
2. Comparison: compare prices or other attributes.
3. Examination: examine the products to be purchased.
4. Negotiation: negotiate terms, e.g., price, delivery time, etc.
5. Order and payment: place an order and pay for it.
6. Delivery: delivery of products from the seller to the customer.
7. Post-service: customer service and support.

2.2. Transaction cost theory

A transaction is a process by which a good or service is transferred across a technologically separa-

ble interface [24,27]. In the classical economic theory, it is assumed that information is symmetric in the market. Since both buyers and sellers are assumed to have the same amount of information, the transaction can be executed without cost. In reality, however, markets are often inefficient. In order to proceed with a transaction, consumers must conduct activities such as searching for information, negotiating terms, and monitoring the on-going process to ensure a favorable deal [3]. The costs involved with such transaction-related activities are called transaction costs.

TCE theoretically explains why a transaction subject chooses a particular form of transaction instead of others. The basic principle of TCE is that people like to conduct transactions in a way that minimizes their transaction cost. TCE has been successfully applied in many domains. Among the well-known examples are TCE applications to facilitate the make-or-buy and business integration decisions. The market mechanism is popular when the transaction cost of buying outside is lower than manufacturing inside, while organizational hierarchy is used otherwise. In automobile and petrochemical industries, forward integration is common because transaction costs of forward-integrated companies are much lower than those of non-integrated ones. Detailed review of TCE applications is available in Refs. [20,21].

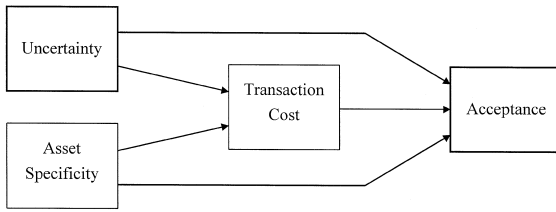


Fig. 1. Research framework.

Since purchasing from electronic stores can be considered as a choice between the web and traditional stores, it is reasonable to assume that the consumer will go with the channel that has a lower transaction cost (assuming other costs being equal). Given our previous description of transaction steps, the transaction costs that affect the decision of whether to buy from an electronic store include *costs for searching information, comparing attributes, examining products, negotiating terms, paying for products, delivering products, and post-sales services*.

The transaction cost may be affected by several factors including uncertainty and asset specificity. Uncertainty refers to the cost associated with the unexpected outcome and asymmetry of information. A higher level of uncertainty generally implies a higher transaction cost. Asset specificity refers to 'durable investments that are undertaken in support of particular transactions, the opportunity cost of which investment is much lower in best alternative uses or by alternative users' [27]. Transactions that are supported by high levels of asset specificity should be governed by hierarchical structures, whereas transactions that require only general-purpose investments will most efficiently be conducted over markets. For electronic commerce, therefore, we infer that the uncertainty and asset specificity of the product offered on the web will affect the transaction cost and, in turn, affect the customer decision of whether to buy electronically.

3. Research framework

Based on TCE, we build a framework for assessing the marketability of different types of products on the web. Since customers choose the channel that

minimizes their transaction costs and transaction costs are affected by transaction characteristics such as uncertainty and asset specificity, the model is composed of four constructs, as shown in Fig. 1.

This model allows us to generate two sets of propositions concerning marketing products or services on the web.

Proposition 1: Transaction costs of marketing a product through the electronic channel are determined by the uncertainty and asset specificity of the product and the process.

Proposition 2: The decision to purchase on the web is determined by the uncertainty and asset specificity of the product to be marketed on the web and the transaction cost.

4. Research method

To test the transaction cost model presented above, an empirical study was conducted. Five products, book, shoes, toothpaste, microwave oven, and flower, were chosen to assess the customer acceptance. A questionnaire was designed to collect information from 85 subjects who were familiar with Internet

Table 2
Operationalization of model constructs

Constructs	Operational measures
Acceptance	Perceived acceptance of electronic channel
Transaction cost	Search cost
	Comparison cost
	Examination cost
	Negotiation cost
	Payment cost
	Delivery cost
	Post-service cost
Uncertainty	Product uncertainty
	Process uncertainty
Asset specificity	Site specificity
	Physical asset specificity
	Human asset specificity
	Brand name specificity
	Temporal specificity

Table 3
Statistics of survey data

Variables	Mean	Standard deviation	Cronbach alpha
Acceptance	3.797	1.972	0.800
Search cost	3.722	1.828	0.735
Comparison cost	3.990	1.650	0.734
Examination cost	4.635	1.781	0.705
Negotiation cost	4.090	1.372	0.722
Payment cost	4.306	1.426	0.739
Delivery cost	3.979	1.713	0.732
Post-service cost	4.644	1.699	0.717
Product uncertainty	4.838	1.619	0.709
Process uncertainty	4.824	1.702	0.708
Site specificity	3.393	1.682	0.708
Physical asset specificity	3.948	1.768	0.709
Human asset specificity	2.868	1.688	0.719
Brand name specificity	3.760	1.733	0.726
Temporal specificity	3.670	1.756	0.763

(i.e., potential customers for electronic markets). The data were then analyzed to evaluate the model.

4.1. Operationalization of constructs

The model has four constructs: customer acceptance, transaction cost, uncertainty, and asset specificity. Since it is difficult to obtain the actual cost data incurred in a transaction, the study focuses on the perceived information of the customer. This is appropriate because it is, in fact, the perceived information that leads to customer decisions (due to the bounded rationality). The operationalization of the constructs is listed below.

(1) Acceptance of the electronic channel. The web is an alternative to the traditional channel. Different

customers may have different levels of acceptance for different products. A product with a higher customer acceptance level will have a higher likelihood of being successful when marketing on the web. In the study, we use a seven-point Likert-scale, ranging from *absolutely no* to *absolutely yes*, to assess the subject's intention of purchasing a particular product electronically.

(2) Transactional costs. Transaction cost is the cost involved in the transaction process. As we decompose a transaction process into seven stages (see Table 1), the overall transaction cost is measured by the cost associated with each of these stages, as follows:

- Search cost: the perceived cost incurred at the stage of finding relevant product or process information, such as finding the source.

Table 4
Consumer acceptance of different products

Product	Overall		Experienced		Inexperienced	
	Mean	Standard deviation	Mean	Standard deviation	Mean	Standard deviation
Book	5.576	1.169	6.107	0.832	5.316	1.227
Shoes	2.381	1.231	2.370	1.182	2.386	1.264
Toothpaste	2.670	1.809	2.750	1.974	2.632	1.739
Microwave oven	3.294	1.667	3.179	1.588	3.351	1.716
Flower	5.600	1.516	5.222	1.450	4.982	1.552

Note: The center of the measurement scale is 4.0.

Table 5
Difference between experienced and inexperienced customers

Sources	<i>d.f.</i>	MSE	<i>F</i>	<i>P</i>
Experience	1	11.759	9.69	0.003
Background	1	2.194	1.81	0.183
Interaction	1	2.487	2.05	0.156
Error	81	1.214		

- Comparison cost: the perceived cost incurred at the stage of comparing alternatives based on their attributes (e.g., price) or comparing alternative channels.
- Examination cost: the perceived cost incurred at the stage of examining the products to be purchased, such as browsing a book and trying shoes.
- Negotiation cost: the perceived cost incurred at the stage of negotiating terms with the seller.
- Payment cost: the perceived cost incurred at the process of ordering and paying for the product.
- Delivery cost: the perceived cost incurred at the process of receiving products, such as delay in receiving time or higher transportation costs.
- Post-service cost: the perceived cost incurred after receiving a product, such as maintenance and customer support.

Comparing to the traditional channel, the electronic one may have higher costs in some categories and lower costs in others. For instance, the electronic

channel may provide a search engine that lowers the search and comparison costs by helping customers find product sources and allowing customers to compare different prices, but increases the examination cost by not allowing the customer to physically examine a product.

(3) Uncertainty. In a transaction, there are two kinds of uncertainties. First, the received product may not meet the customer's expectation at ordering. This is called *product uncertainty*. Then, the customer may not have a complete confidence in the transaction process. This is called *process uncertainty*. The overall effect of uncertainty on the perceived transaction cost will be the aggregated effect of these two kinds of uncertainties.

(4) Asset specificity. Asset specificity refers to the durable investment to support particular transactions. In Ref. [26], asset specificity is decomposed into several aspects, as follows: (a) site specificity. A product may be more efficient to be traded in a

Table 6
Results from the confirmatory factor analysis

Measure specificity	Construct		
	Transaction cost	Uncertainty	Asset
Search cost	0.63	-0.25	-
Comparison cost	1.18	-0.84	-0.02
Examination cost	0.75	-	-
Negotiation cost	0.41	-	0.15
Payment cost	0.47	-0.17	-
Delivery cost	0.39	-	-
Post-service cost	0.37	0.26	-
Product uncertainty	0.27	0.58	-
Process uncertainty	-	0.86	-
Site specificity	-	-	0.75
Special asset specificity	-	-	0.68
Human asset specificity	-	-	0.63
Brand name specificity	-	-0.24	0.79
Temporal specificity	-	-	-0.05

Note: the significance level was set at 0.05.

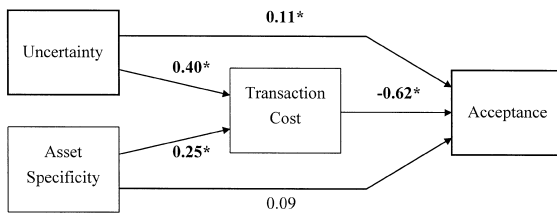


Fig. 2. The empirical model.

particular location. Higher site specificity may favor the traditional channel. (b) Physical asset specificity. Transactions of certain products may need special physical equipment. A product with a higher physical asset specificity may favor the traditional channel. (c) Human asset specificity. Transactions of certain products may need special human expertise. A product with a higher human asset specificity may favor the traditional channel. (d) Brand name specificity. Sometimes customers prefer buying a particular brand-name product, such as having dinner in a well-known restaurant. A product with a higher brand name specificity may favor the traditional channel. (e) Temporal specificity. The timing of transactions may affect the transaction cost. Its exact effect varies.

In the research, asset specificity is measured based on these aspects. Table 2 summarizes the operationalization of the constructs.

4.2. Data collection

Based on the operationalization of model constructs, a questionnaire of fifteen questions, as shown in Appendix A, was designed to collect data for testing the model. The questionnaire was tested and modified before using for data collection. Five products of different characteristics were chosen as repre-

sentatives in the questionnaire. They were book, shoes, toothpaste, microwave oven, and flower. These products were selected carefully to represent different types of products. For example, books are information-rich. Shoes have special needs of physical trial. Toothpaste is a convenient goods that most consumers buy without much thinking. Microwave ovens need maintenance. Buying flowers may have temporal considerations.

The research was conducted in Taiwan. Subjects were volunteers who had experience in using Internet. A total of eighty-six subjects was recruited. Twenty-eight of them had actual web shopping experience, while the other fifty-seven did not. Thirty-seven had work experience ranging from one to twenty years. The other forty-nine were undergraduate and graduate students.

The procedures for data collection were: (1) designing the questionnaire, (2) pre-testing and revising the questionnaire, (3) recruiting survey subjects, (3) giving instructions to the subject, (4) performing the survey, and (5) verification of the collected data. The Cronbach alpha of the collected data is 0.873 for raw variables and 0.871 for standardized variables. The Cronbach alpha for each item is also high, as listed in Table 3. This indicates that the instrument is reliable.

5. Data analysis and results

The collected data were analyzed to see (1) whether products with different characteristics have different levels of customer acceptance in electronic commerce and (2) whether the transaction cost model in Fig. 1 is valid for explaining the consumer choice between the electronic and traditional channels.

Table 7

Coefficient matrix of the structural model

	Transactional	
	Cost	Acceptance
Transactional cost	–	–0.62 (0.0001)
Uncertainty	0.40 (0.0001)	0.11 (0.035)
Asset specificity	0.25 (0.0001)	0.09 (0.0631)
R^2	0.32	0.29

Note: the numbers in the parentheses are the significance levels.

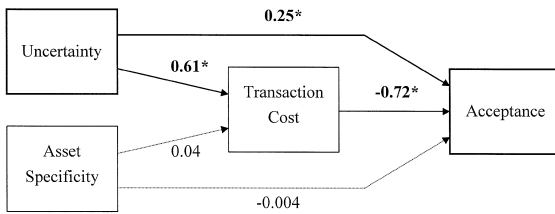


Fig. 3. The experienced model.

Structural equation modeling is used to test the model. Structural equation modeling is an approach to assessing a model that involves multiple constructs with multiple observation items. It evaluates the structural component and the corresponding measurement component simultaneously. The approach is a powerful second generation multivariate analysis technique for studying causal models. It is superior to traditional regression and factor analysis because the measurement model is assessed within the context of the theoretical structural model [7]. In this research, LISREL 8 was used to analyze data.

5.1. Difference in customer acceptance

A simple statistical analysis shows that (1) overall, customers prefer traditional markets over the web. The average customer acceptance level is 3.797 in Table 3, which is less than 4.0 ($t = 2.15$, $p < 0.05$), and (2) different products do have different levels of acceptance for selling on the web. The results listed in Table 4 show that books and flowers are more acceptable to consumers (i.e., means are higher than the indifference level of 4.0, $p < 0.01$), whereas shoes, toothpastes, and microwave ovens are less acceptable (i.e., means are smaller than the indifference level of 4.0, $p < 0.01$). The One-way ANOVA results in an F -value of 77.94 ($p < 0.0001$).

If we decompose the data into two groups: experienced web shoppers and inexperienced shoppers, then the experienced shoppers show a sharper discrepancy in terms of what they would buy over the web. The means of experienced shoppers are 6.107 for books and 5.222 for flowers, compared to 2.370, 2.750, and 3.179 for shoes, toothpaste, and microwave ovens. For inexperienced shoppers, the means are 5.316, 4.982, 2.386, 2.632, and 3.351, respectively.

Table 8
Coefficient matrix of experienced shoppers

	Transactional	
	Cost	Acceptance
Transactional cost	–	–0.72 (0.0001)
Uncertainty	0.61 (0.0001)	0.25 (0.0065)
Asset specificity	0.04 (0.6237)	–0.004 (0.9520)
R^2	0.38	0.36

Note: the numbers in the parentheses are the significance levels.

A further examination of the subjects having experience in buying books, we find that a statistically significant difference exists between those who have prior purchasing experience and those who do not have (see Table 5).

5.2. Testing the measurement model

Our measurement model consists of 14 items used to measure four constructs (see Table 2). We need to test the relationship between the constructs and their respective measurement items. We used the confirmatory factor analysis to assess their discriminant validity. Discriminant validity is the degree to which items differentiate between constructs, or measure different constructs. A simple test of discriminant validity is to verify that each item loads more highly on its associated construct than on any other construct [23]. The resulting output from LISREL under the significance level of $p = 0.05$ is shown in Table 6. All factors except the temporal specificity are significant statistically. All factors have higher significant loads on their associated constructs than on any other construct. The fit between the data and the theoretical model is also acceptable ($\chi^2 = 55.94$, $p = 0.29$). Therefore, we conclude that the measurement model discriminated adequately between the constructs.

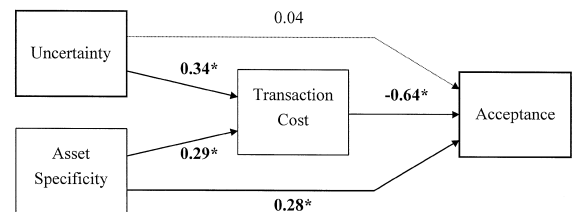


Fig. 4. The inexperienced model.

Table 9
Coefficient matrix of inexperienced shoppers

	Transactional	
	Cost	Acceptance
Transactional cost	–	–0.64 (0.0001)
Uncertainty	0.34 (0.0001)	0.04 (0.5419)
Asset specificity	0.29 (0.0001)	0.28 (0.0001)
R^2	0.30	0.32

Note: the numbers in the parentheses are the significance levels.

5.3. Testing the model

Following the confirmation of the measurement model, we proceeded to examine the structural model. The evaluation consisted of the evaluation of the size, sign, and significance of the standardized path coefficients. Fig. 2 shows the results of the structural model. Table 7 shows the related coefficients. All paths except the linkage between asset specificity and acceptance are significant at least at the 5% level. The linkage between asset specificity and acceptance is also very close to significance ($p = 0.063$). Thirty-two percent of the variance in transaction costs and 29% of the variance in consumer acceptance are accounted for by the model. The percentages of variance explained by the model are greater than 10%, which implies a satisfactory and significant model [6].

The result allows us to accept our two propositions. In order to examine whether the experience and inexperience shoppers in electronic commerce may have different considerations, we ran two sub-models. The results for experienced shoppers are shown in Fig. 3 and Table 8, whereas those for inexperienced shoppers are shown in Fig. 4 and Table 9.

It can be seen from the models that uncertainty is the most significant construct for experienced shoppers, whereas asset specificity is the most significant for inexperienced shoppers. The difference may be due to a learning effect to be discussed later.

6. Discussion and conclusions

The above results show some interesting findings. First, they conform our initial argument that *some*

products are more suitable for marketing on the web than others. In our study, books and flowers are more likely to be ordered by consumers than shoes, toothpaste, and microwave ovens. This is primarily due to the difference in their perceived transaction costs. The higher the perceived transaction costs (compared to those of the traditional channel), the less likely a product will be purchased electronically.

In general, the electronic commerce lowers the search cost but raises the examination, payment, and post-service costs. Table 10 shows that books take most advantage of the web by reducing the search cost, whereas shoes have troubles when customers would like to examine products. Therefore, products that need detail examination or trial before purchase (such as shoes) and post-sales services (such as microwave ovens) are considered to be less appropriate for electronic markets. The payment method also, to some extent, bothered the customer.

The TCE model gives us guidelines regarding what products are more suitable for electronic markets. Does the result imply that we cannot sell shoes, toothpaste, or microwave ovens on the web? The answer is no. What the result indicates is that they are less acceptable to customers at least at their current forms. They may become marketable, however, if their packaging or other related attributes change. For instance, customers may not want to order toothpaste over the web when they are out of it early in the morning, but may order a dozen pack of toothpaste electronically once in a while and put in the closet for convenience if the price is good. Similarly, buying microwave ovens over the web may become acceptable if convenient post-sales services are available (e.g., through contracts with local

Table 10
Transaction costs by types of transaction and product

Transaction cost	Book	Shoes	Toothpaste	Microwave oven	Flower	Mean
Search	3.07	4.55	3.62	4.12	3.25	3.72
Comparison	3.21	4.89	4.06	4.26	3.54	3.99
Examination	4.04	6.16	3.36	5.29	4.32	4.64
Negotiation	3.54	4.74	3.52	4.75	3.89	4.09
Payment	3.80	4.60	4.55	4.45	4.13	4.30
Delivery	3.24	4.42	4.14	4.55	3.53	3.98
Post-service	4.02	5.35	3.82	5.66	4.36	4.64

13. To what extent do you insist on purchasing the following items from a particular store due to particular persons working there?

	Absolutely low	Very low	Low	Medium	High	Very high	Absolutely high
Books	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
Shoes	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
Toothpaste	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
Microwave oven	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
Flowers	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>

14. To what extent do you insist on particular brand names when purchasing the following items?

	Absolutely low	Very low	Low	Medium	High	Very high	Absolutely high
Books	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
Shoes	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
Toothpaste	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
Microwave oven	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
Flowers	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>

15. To what extent do you insist on purchasing the following items due to a particular chance or other temporal considerations?

	Absolutely low	Very low	Low	Medium	High	Very high	Absolutely high
Books	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
Shoes	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
Toothpaste	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
Microwave oven	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
Flowers	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>

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