

# PROPOSED CONCEPTUAL FRAMEWORK TOWARD FACTORS THAT IMPACT BUYER TRUST THROUGH E-COMMERCE CHANNELS

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**Abstract:** In line to the rapid development of online shopping, investigating factors that impact buyer trust has maximized in return. This paper proposed a conceptual framework that produces factors impact buyer trust through e-commerce channels. Constructing this framework is based on several related theories to the acceptance of online transaction. After the literature review, it was identified that the most influential factors in it are the reputation of the seller, the perceived risk (risks such as functional, financial, and temporary), privacy, security, and the gender of the buyer, factors that if improved at the time of establishing a relationship with customers through electronic means, will allow a higher conversion rate and therefore greater utility.

**Keywords:** Seller reputation, privacy and transaction security, perceived risk, gender, trust in e-commerce.

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## 1. INTRODUCTION

Tsai and Cheng (2012) briefly tells us that, during the history, interpersonal relations between the first nomadic tribes, civilizations, reigned to modern and contemporary society occurred under the circulation of goods and services; starting with it the realization of trade. Being the farmers and ranchers who practiced this activity primitively, initially they only sought to cover their needs, but having a surplus of products that they did not need to consume, they decided to start exchanging these with those of third parties, what they called barter, currently called as swap. With the passing of time, economic models have changed and this is largely due to globalization, which helped the worldwide creation of interstate and interregional integration agreements. In this political, economic and social context the phenomenon called Internet is located and this is joined by globalization and commerce. Thus the power of electronic commerce is born. The sales reached by B2C e-commerce worldwide in 2018 was 3,500 billion dollars, a 20.1% increase over the previous year, due to the increase in users connected to the Internet as well as to mobile phones (Damodharan and Ravichandran, 2019).

In a competitive market like the one we have today, for companies there is a need to be able to communicate with their customers, make known and finally sell their products and / or services, they must take actions that really generate a positive impact that allow to survive and achieve growth, in addition, both the organizations themselves and the environment in which they are immersed are constantly changing, making it more difficult to meet their need. With the creation of the World Wide Web (www) and Web browsers (Browsers), the Internet was transformed from being a purely instrument for communication, to a truly revolutionary technology; With the explosive growth in its use, the Internet worldwide is the heart of the so-called New Economy, it gives both consumers and businesses the advantage of connectivity by allowing them to access and share unprecedented amounts of information, it is configured as a Potential distribution channel and its development is clearly affecting consumer habits, therefore, to be competitive in the current market, companies must adopt the technology of the Internet, otherwise they run the risk of falling behind (Kotler and

Armstrong, 2003). However, despite the potential of this tool, the lack of consumer confidence through these means makes it difficult to buy through electronic channels, which makes the use of the Internet as an alternative for increasing sales and distribution of products. It does not develop as expected, and even more so in the local sphere where the subject is still something new (Wang et al., 2019). It has been shown that when a person receives the Internet as a marketing channel, trust becomes a fundamental factor, since the conversion rates of users are directly related to it. In a virtual environment the degree of uncertainty of economic transactions is greater than in traditional environments, and that is that online transactions may be susceptible to several risks that are either caused by the uncertainty implicit in the use of technological infrastructures to the exchange, that is, of the system, or can be explained by the behavior of the actors participating in the online transaction. Made as the buyer's inability to evaluate the products offered by the seller, or that the payment must be made before receiving the product, in addition to the incessant reports about computer viruses and hacker attacks that steal personal and bank data, increases the perception of user risk, and the consumer's decision-making process is affected, since the consumer is unable to process all the information available or the inability to distinguish opportunistic behaviors, often decides to go to the establishment to analyze, evaluate and make the purchase decision. Therefore, this paper aims to explore and analyze the factors that affect trust in online purchases and validate them in the market, thus seeking to contribute to the generation of advantages for companies that develop electronic commerce such as market channel (Budke and Ferguson, 2017)

## 2. E-COMMERCE CONCEPT

Electronic commerce, or "e-commerce", is defined by the Global Electronic Market Center as: "any form of transaction or exchange of information for commercial purposes, in which the parties interact using Information and Communication Technologies (TIC), instead of through direct physical exchange or contact" (Gai et al., 2015), likewise, the World Trade Organization (WTO) defines it as: "the production, advertising, sale and distribution of products through networks of telecommunication". It can be said that electronic commerce is the final stage in the evolution of a company's Internet presence, since they carry out commerce through the Internet instead of through any other means (Kolhar, 2018). Electronic commerce has been and continues to be praised as a revolutionary force that can improve the way business is carried out today, and that is that through the Internet, inefficient markets are now more efficient, thus sending a domino effect to the whole economy. It is expected that companies that use the Internet can modify their industrial structures, their business processes, optimize their supply chain and eliminate their inefficiencies with greater automation (Humair et al., 2015). Although many of the advantages of e-commerce or e-commerce, these have not been sufficiently developed yet (Fasolato et al., 2018), despite this, it has allowed small businesses to compete with large companies in a more even environment, allows to serve customers in a geographical area almost without limits. E-commerce operations can help solve cash flow problems by reducing the sales cycle, that is, the time and process between the receipt of the order and its conversion of sales into cash (Wang et al., 2018), this reduces costs related to transactions, and finally increase the efficiency and effectiveness of relationships (Zhang et al., 2019); However, Internet marketing must become an integral part of the marketing strategy, marketers must understand how customers use the Internet to make decisions, choose brands and negotiate.

## 3. THEORETICAL DISCUSSION

Theory of Reasoned Action (TRA), which is originally drawn from social psychology, is one of the most influential theories in the behavioral and social sciences and information systems. TRA is concerned with predicting behavior on the basis of the posited associations between behavior, behavioral intentions, and attitudes. One of the most significant tenets of TRA is the proposed relationship between behavioral intention and behavior. Behavioral intention is defined as a "person's subjective probability that he or she will perform some behavior" (Fishbein and Ajzen, 2011). Behavioral intention is determined by the attitude towards behavior and subjective norm. The attitude towards a behavior is a bipolar (positive or negative) feeling about performing a behavior. A subjective norm is "a person's perception that most people who are important to [her or] him think [she or] her should or should not perform the behavior in question". TRA suggests that attitudes, whether positive or negative, arise as a result of beliefs about the perceived consequences of a given action or behavior. A subjective norm is more related to a person's motivation or normative beliefs about complying with the perceived normative standards. In technology acceptance research, the use of TRA has been prevalent, whether it is used directly, as a basis for explaining acceptance, or used as a springboard to advance new models or theories (Hsu et al., 2015).

The importance of TRA and Theory of Planned Behavior (TPB) resides in their applicability to a variety of settings and their successful projections of behavioral intention and behavior. TPB is a descendent of TRA where there is always a need to provide a more detailed explanation for the complex human behavior (Kim et al., 2019). The construct of perceived behavior control, which influences both behavior, and behavioral intention and the addition of the correlations between the antecedents of behavioral intention. Perceived behavioral control represents the extent to which “the resources and opportunities available to a person dictate the likelihood of behavioral achievement”. The Decomposed Theory of Planned Behavior (DTPB) is an adoption of TPB to the field of information systems. The main components of TPB (attitudes, subjective norms, and perceived behavioral control) are decomposed into other related factors. Attitude was influenced by relative advantage, complexity and compatibility, subjective norms was influenced by normative influences and perceived behavior control was influenced by efficacy and facilitating conditions. DTPB was also influential in the emergence of widely cited theories such as UTAUT. DTPB was not only an extension of TPB, but also of TAM, which is discussed in the following section.

Among the different approaches concerning the adoption of new technology, a major approach in the field of information systems is the Technology Acceptance Model (TAM). TAM is an adaptation and technology oriented contextualization of the social psychological TRA. The majority of the research on TAM has been conducted on organization employees' perceptions of technology (Moon and Kim, 2001). Nonetheless, (Burton-Jones and Hubona, 2005) concluded that the TAM constructs are insignificant in determining system usability. (Lu et al., 2003) argued that the TAM, as a result of its generality, is unable to provide detailed information on users' opinions of a system. Another major criticism mentioned by (Legris et al., 2003) is that TAM should have included social and organizational factors which are considered the most important factors for determining technology acceptance.

TAM continued to be extended and developed, and eventually included the influence of utilitarian and hedonic outcomes perceptions, until it reached the current UTAUT form, which is considered in the next section. Nevertheless, it should be noted that McCoy et al. (2007) indicated that TAM does not fully apply for individuals who scored highly in Hofstede's (1980) cultural dimensions of uncertainty avoidance, power distance, masculinity and collectivism. This raises many questions regarding the influence of culture on technology acceptance, at least in Libyan society cultural context. Researchers such as (Jamshidi and Hussin, 2016) used it to measure its role in ecommerce system acceptance and compare e-learning acceptance between Malaysia and Sri Lanka.

The Unified Theory of Acceptance and Use of Technology 2 (UTAUT) were developed as a comprehensive and integrated model for better investigating user's acceptance of new technology or system. (Venkatesh et al., 2016) identified three types of prediction ratio of technology acceptance and they are; firstly, culture and population, secondly adding different concepts to the model to expand the theoretic relationships of UTAUT and thirdly type to synthesize new predictor of variables into the UTAUT. Despite the integrated model in which some variables are usually added, (Venkatesh et al., 2016) stressed the needs to add important predictor variables which could be applied within the technology use context of the user. They also investigated individual behavioral studies relating to consumers and changed the previous perspective (from organizations to individuals) by modifying the initial UTAUT model to add and strengthen a new prediction framework. The new framework is named as UTAUT2. Hedonic motivation construct was regarded a salient predictor and was added into the UTAUT2 to provide better stressing utility. Price value construct was also integrated in UTAUT2 model as cost; product quality and price affect adoption decisions. Also considered the roles of behavior intention in recent studies and therefore integrated habit as a new construct into the UTAUT2. These new added constructs continues to be validated and tested verified by many researches as vital factors determining users' technology acceptance.

(Rogers et al., 2005) conceptualized the process of innovation acceptance and distribution by creating a framework that includes definitions and attributes of Diffusion of Innovation (DOI). Rogers (2005, p. 5) defined diffusion as “the process in which an innovation is communicated through certain channels overtime among the members of social system,” adding that “an innovation is an idea, practice, or object that is perceived as new by an individual or other unit of acceptance”. DOI has four elements derived from the definition of the diffusion process, namely “(1) an innovation (2) is communicated through certain channels (3) over time (4) among the members of a social system” (Rogers, 2005, p. 11). According to Rogers, (2005), in the DOI model, the evaluation of an innovation is based on the five attributes of relative advantage, compatibility, complexity, trial-ability, and observability. Rogers (2005, p.229) defined relative advantage as

“the degree to which an innovation is seen as being better than the idea it supersedes”; compatibility as “the consistency of an innovation to a potential adopter’s needs, past experiences, and values”; trial-ability refers to “the opportunity offered to potential adopters to try out the innovation on a limited basis, complexity refers to whether the innovation satisfies the basic needs of potential adopters’ and is in line with their social norms, values, and belief systems” while observability refers to “the ability of potential adopters to observe the impacts of using the new innovation on others before they make their own adoption decision”, compatibility refers to “whether the innovation satisfies the basic needs of potential adopters’.

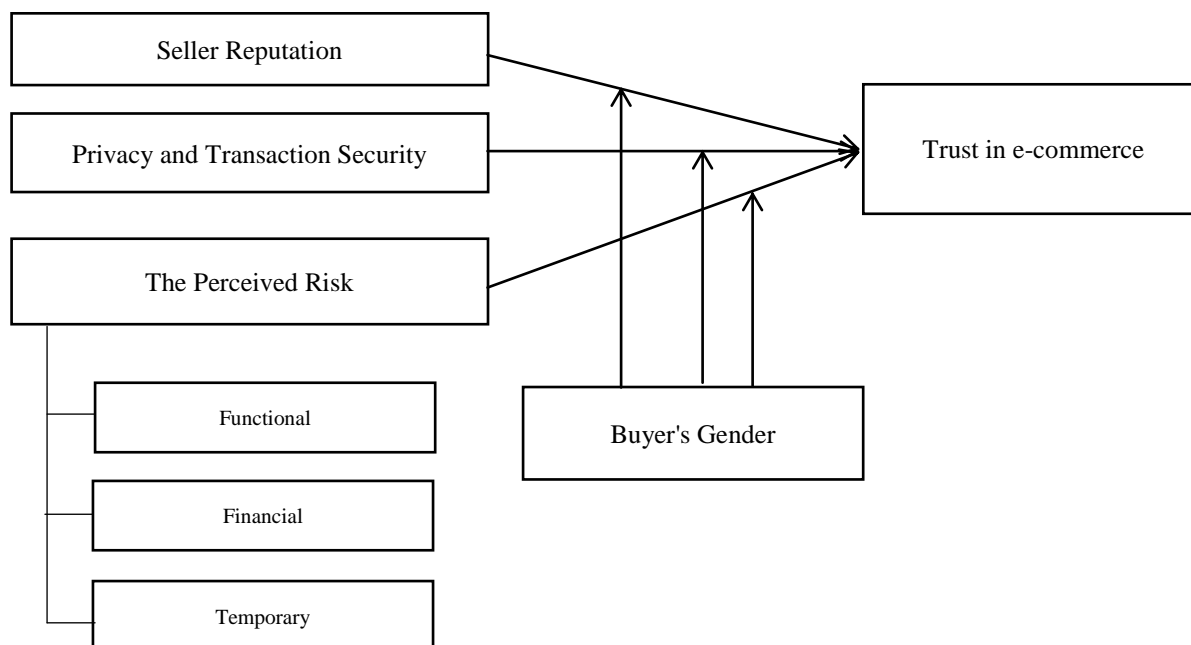
#### 4. PROPOSED FRAMEWORK

The business-to-business (B2B) model is based on electronic sales to business or industrial customers. The amounts of money generated by the companies that use this business model (which they sell to customers that are other businesses) are significantly greater than those of the other models, and although there are few companies that are known to be successful, the potential of this model It should not be overlooked (Longenecker et al., 2007). Not all B2B companies work the same way, a form of B2B strategy highlights sales transactions, that is, using for example the possibilities offered by online production. A B2B company can achieve greater efficiencies in its sales, since when dealing directly with its corporate customers, its line can manufacture according to their specifications once it receives buyer’s order, thereby eliminating inventory costs, intermediaries and delivery, which is reflected in the price for the customer. The business-to-consumer (B2C) model is an electronic model based on electronic sales to the final consumer. This model works similarly to the traditional way of retail sales; but in which the consumer instead of approaching the physical location of the business to acquire the product does so through its virtual location, that is why the B2C model is also called Electronic Retail 24/7. The business-to-consumer model offers several advantages over traditional sales: speed of access, speed to perform the transaction and access at all times to services and products, in addition, B2C companies have the ability to quickly change the mix of merchandise and prices as well as the appearance of the store (in this case, your website), aspects that for traditional stores are expensive and require more time. In this business model, consumers sell their items online without the need of a website or their own store; they do it through e-commerce sites. These sites are businesses located on the Internet that allow users or companies to listen to their products to be acquired, exchanged, or auctioned by potential customers, their income comes from sales commissions, fees charged, or advertising. The first sites under this modality sold collectible items, currently almost any kind of product can be sold, exchanged or auctioned, from new to used and from anywhere in the world. Finally, another model of e-commerce, perhaps less known but not less important, is the consumer-to-business model, and thanks to the Internet for consumers, contact and communication with companies has become easier, so much so that the Most of them invite their real and potential customers to comment on their websites and on the experience with the product or service; For their part, now customers, instead of waiting for companies to send them their catalogs or information, can search for them on the web and start the purchase process. Through the web, even consumers can have control of the transactions instead of the companies that control them, in this case the user enters an e-commerce platform (that works under this modality) and places the price they are willing to pay for a product or service, and it is the companies that choose whether or not to accept the offer (Kotler & Armstrong, 2003).

To understand trust, it is necessary to clarify what is not trust, this because many concepts are often confused with it, for example trust is not the same as trustworthiness, a difference that is not always clear in the literature. Trust is an act of a settlor, a person who puts his trust in some object or person, regardless of whether said trust is well placed or not, that is, the trust emanates from a person; in contrast, reliability is a characteristic of someone or something that is the object of trust, however, there is a logical link between them and it is illustrated in the following sentence: “ I trust (an object or person), since It presents characteristics that demonstrate its reliability ” (Corritore et al., 2003). At the same time, cooperation is often used as a synonym for trust by game theorists, however, cooperation is a cause or manifestation of trust rather than being self-confidence; In other words, cooperation boosts trust, and likewise, trust can produce cooperation. Similarly, trust is not the same as faith, it is commonly said “ I have faith in you ”, in the same sense of “I trust you,” and you have to understand that faith is something that goes against or beyond reason, while trust starts precisely from it; when it is trusted, a rational decision is taken to adopt a risk in a condition of uncertainty, on the other hand, faith consists in taking a leap that is not totally compatible with reason. Trust is also used to refer to credibility, for example, in the phrase “ trust in information ”, a person really means that the information is credible or acceptable. Trust

is also confused with dependence; however, it is possible to depend on a person without trusting those. The benefits of trust are numerous and invaluable, from the satisfaction of the one who trusts, to a positive perception of the party they trust, fosters short and long-term exchange relationships and contributes to collaboration between the parties.

Online trust can arise from numerous relationships between the settlor and the trustee, so it is not obvious that all forms of online trust relationships can be understood through a single definition. Therefore, it becomes inevitable to restrict the definition of online trust to a form of relationship, that is, to the interaction of an individual with a specific website whether transactional or informative, or with the people behind it, and the trust that occurs in said individual towards the website resulting from this interaction is that which is denoted as online trust. In this type of relationship, the buyer is usually seen as the party that is in a vulnerable situation (trustee), while the seller on the Internet is then the trustor, in whom the trust is placed and who has the opportunity to take advantage of the trustor's vulnerability, so that the trust the buyer places on the online seller is contingent on a set of beliefs about credibility, competition, benevolence and integrity of the latter (Kim et al., 2012). Corritore et al (2003), propose three levels or degrees of trust online: At the most elementary level, they postulate that a trustor acts more confidently in a risk situation where there is not much at stake, that is, there is Little amount of money or personal information involved, meanwhile, at an intermediate level, the settlor already has some experience and familiarity with a website, so he is in a risk situation in which such knowledge can be used to predict the behavior of the counterpart and therefore assign trust. Finally, the latter is the most complex and deepest level of trust, at this level, the settlor expects that his interests will be respected by the website and that he or she does not have to calculate the level of risk anymore, this calculation will It can be based on deterrence, as on the basic level, or on predictability and knowledge, as on the intermediate level. Based on the above discussion, Figure 1 composites factors that impact the buyer trust in e-commerce transactions, which constructed as seller reputation, privacy and transaction security, and perceived risk, and buyer's gender, for the perceived risk through the online shopping, it categorizes into three types of perceived risks that functional, financial, and temporary.



**Figure 1: Proposed conceptual framework**

## 5. CONCLUSION

The Internet is a technology that develops so quickly that new aspects often arise, including electronic commerce. Success in an electronic business model depends on the marketing strategy designed by the organization, which makes it necessary for electronic marketing to become an integral part of the value chain. Confidence on the other hand, is a strategic aspect of modern business management, and in a wide variety of contexts, including marketing; Research has highlighted the importance of trust as a flattering instrument, hence the importance of its study. After the literature review, it was identified that the most influential factors in it are the reputation of the seller, the perceived risk (risks such as functional,



physical, financial, social, and psychological), privacy, security, and the gender of the buyer, factors that if improved at the time of establishing a relationship with customers through electronic means, will allow a higher conversion rate and therefore greater utility.

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