

TRANSACTION COST AND VALUE CO-CREATION IN ELECTRONIC COMMERCE: A NEW CONCEPTUAL FRAMEWORK

Yi Zhang, Elayaraja Aruchunan, Fumitaka Furuoka
Faculty of Business and Economics, University Malaya
Asia Europe Institute, University Malaya

*Corresponding author's email:
fumitaka@um.edu.my

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ABSTRACT

Theories of transaction costs and value co-creation have significantly contributed to altering the foundational theoretical tenets of microeconomics and consumer behavior. Traditionally, neoclassical microeconomic models often operated under the assumption of frictionless markets and passive consumption. However, this paper argues that such models are increasingly inadequate for explaining the complexities of contemporary market dynamics. Firstly, transaction cost theory emphasizes the critical importance of “friction” in economic transactions by explicitly incorporating the costs associated with maintaining and operating the economic system. These include, but are not limited to, the supplementary expenditures involved in the planning, monitoring, and enforcement of production and exchange processes. These expenditures are formally defined as transaction costs within the economic institutional framework, serving as a pivotal variable that determines organizational boundaries and consumer choices. Secondly, the conceptual role of consumers has undergone a profound transformation, shifting from a “passive” recipient of value to an “active” collaborator who co-creates value in conjunction with producers. This proactive engagement, conceptualized as value co-creation, suggests that value is not merely delivered but is realized through the integration of resources and relational exchanges between multiple actors. Building upon these theoretical shifts, this paper proposes an integrated conceptual framework designed to synthesize these dual perspectives into a cohesive understanding of modern consumer behavior. By reconciling the efficiency-oriented logic of transaction costs with the relational logic of value co-creation, the study provides a more holistic explanatory model. This framework offers significant insights into how firms can minimize informational asymmetries while simultaneously maximizing collaborative value. Ultimately, the synthesis provides a robust theoretical foundation for future empirical research into digital platform economies and service-dominant logic.

INTRODUCTION

Transaction cost economics (TCE) and value co-creation theory remain notably underutilized in the analysis of consumer behavior; specifically, there is a pronounced dearth of systematic inquiry that integrates these pivotal theoretical lenses into the domain of consumer labor research. Against this backdrop, four seminal studies have emerged, employing TCE or value co-creation to elucidate the intricacies of online customer behavior (Liang & Huang, 1998; Teo & Yu, 2005; Yu & Chen, 2018; Nysveen & Pedersen, 2014). Liang and Huang (1998) pioneered this by incorporating transaction costs into the traditional five-step consumer decision-making process—from problem recognition to final decision—within the e-commerce context. Building on this, Teo and Yu (2005) identified the critical role of uncertainty, operationalizing it through brand, performance, behavioral, and environmental dimensions. Yu and Chen (2018) further refined the framework by emphasizing trust through a tripartite structure of product, service, and firm trust. Finally, Nysveen and Pedersen (2014) posited that value in co-creation is not an inherent product attribute but a subjective, experiential outcome emerging from producer-consumer interactions. By mobilizing idiosyncratic resources, consumers actively shape their perceived value. In e-commerce, this co-created value mitigates uncertainty and cognitive effort, effectively minimizing transaction costs and fostering online purchase intentions.

Against this scholarly backdrop, this paper seeks to bridge the identified research gap by articulating a novel conceptual framework that systematically integrates the principles of transaction cost economics (TCE) and value co-creation theory. This synthesized theoretical lens is designed to provide a robust analytical foundation for scrutinizing the multifaceted nature and evolving dynamics of online consumer behaviors. Specifically, the primary theoretical contribution of this inquiry lies in the development of a comprehensive model intended to evaluate digital consumption patterns through the dual prisms of economic efficiency and collaborative value generation, thereby moving beyond traditional paradigms. In effect, the current paper aspires to significantly enrich the extant body of literature on consumer behavior by formally embedding these two cornerstone theories into a unified analytical structure. By doing so, this research not only addresses a critical theoretical void but also establishes a strategic framework for future empirical investigations into the complex interactions within the digital marketplace.

This paper consists of five sections. Following this

introductory section, the second section delineates the fundamental tenets of transaction cost economics. The third section assesses the theory of value co-creation. The fourth section is hypothesis development. The final section is the conclusion.

TRANSACTION COST

Three foundational economists introduced and developed the concept of transaction costs within economic analysis (Commons, 1931; Coase, 1937; Williamson, 1985). Commons (1931) argued that the fundamental unit of economic analysis should be the transaction, reflecting individuals' active participation in bargaining, managing, and rationing activities. Unlike traditional economics, which emphasizes the physical exchange of commodities, Commons highlighted the legal and institutional dimensions of transactions. Bargaining determines price, managerial transactions regulate quantity, and rationing allocates resources. Within this framework, transaction costs arise from the frictions associated with negotiating prices, coordinating quantities, and allocating resources.

Building on this foundation, Coase (1937) used transaction cost reasoning to explain the existence of firms. He argued that firms internalize transactions to avoid the costs of using the price mechanism in the market. Reliance solely on market exchange would require numerous discrete contracts with external suppliers, thereby increasing coordination expenses. Firms therefore substitute market transactions with hierarchical coordination to minimize transaction costs, making internal organization a strategic response to market frictions (Coase, 1937).

Williamson (1985) further advanced this perspective by shifting attention from production costs to governance costs, including planning, adaptation, and monitoring. Emphasizing bounded rationality, he argued that cognitive and informational limitations prevent the drafting of complete contracts that anticipate all contingencies. As a result, firms incur additional transaction costs in managing and adapting to unforeseen changes. This highlights the dynamic and organizational nature of transaction costs in economic systems (Williamson, 1985).

Building on these theoretical blocks, economic theorists have developed a microfoundations framework that offers a more granular understanding of economic phenomena determined by the intricate interactions among various agents, the market, and its governance mechanisms. In other words, there have been notable pioneering attempts that offered mathematical rigour to the descriptive understanding and conceptual insights into transaction costs. This formalization is widely recognized as the Grossman-Hart-Moore (GHM)

theory of the firm, which stands as a foundational assumption and analytical pillar in modern microeconomics. This theory is based on the following equation, which mathematically formalizes the relationship between asset ownership, investment incentives, and transaction-specific frictions:

$$\frac{\partial B}{\partial x} = \sum P(S)v'(S, \alpha) = \frac{\partial C}{\partial x} \quad (1)$$

where B is the benefit or payoff of investment x, which could be considered as "efforts" of the agent, P(S) is the possibility that any agency would form a coalition S, v' is the marginal product of investment ($v' = \partial v / \partial x$), α is the amount of assets owned by this coalition S, C is the cost of investment x. The assumption of this equation is that the actual amount of effort (x) is unknown because of the bounded rationality assumption.

Furthermore, Tadelis and Williamson (2012) offered a systematic model to elucidate the underlying mechanism for transaction costs by separating the "seller" and buyer". In their model, the purpose of sellers is to maximise their utility (Tadelis & Williamson, 2012):

$$\max U_s(e, z, g) \quad (2)$$

where U_s is the utility of sellers, which could be considered as a function of three variables, namely effort (e), cost-sharing ratio (z) and market governance (g). Furthermore, this utility of seller could be separated in three components (Tadelis & Williamson, 2012)

$$U_s = f - z \times c(e, g) - y(e) \quad (3)$$

where the first component is f that is the amount of fixed price payment from the buyer to the seller, the second component s ($z \times c$) that is the production cost (c) borne by the sellers, the production (c) is function of efforts (e) and governance (g), the third component is y that is opportunity cost of efforts. In this production function, cost sharing ratio is z which could be considered as the strength of cost incentive and $z \in [0, 1]$. If $z=0$, it means that the sellers would bear all production costs. If $z=1$, it implies that the sellers would not bear any production cost. Furthermore, there are two types of market governance, namely markets or M ("buy") or hierarchies or H ("make") and $g \in (M, H)$. Among two modes of governance, the market M tends to have a governance structure where incentive intensity (i.e. the profitability of separable stages of production) is strong and the administrative control (i.e. autonomy of separate stages of production) is weak. By contrast, the hierarchy H tends to have a governance structure where incentive intensity is weak, and the administrative

control is strong.

According to their model, the purpose of buyers is to maximise their utility (Tadelis & Williamson, 2012):

$$\max U_b(z, g, \rho, \delta) \quad (4)$$

where U_b is the utility of buyers, which could be considered as a function of four variables, namely the cost-sharing ratio (z), market governance (g), asset specificity (σ) and contractual incompleteness (δ). Furthermore, this utility of buyer could be separated in four components (Tadelis & Williamson, 2012)

$$U_b = v - f - (1 - z) \times c(e^*, g) - \sigma \delta \times k(z, g) \quad (5)$$

where the first component is v which is the amount of the value creation or value given to the buyers (v), second component is f which is fixed payment from the buyer to the seller, the third component is $((1-z) \times c)$ which is production cost borne by the buyers and the final and the most important component is $(\sigma \times k)$ which is expected adaptation cost. In this production process, production cost depends on the optimal level of sellers' efforts (e^*) and market governance (g). More importantly, in this adaptation cost function, its main element is "nominal" level of adaptation cost which is expressed as k. However, the "expected" level of adaptation cost depends on the asset specificity ($\sigma \in [0, 1]$) and contractual incompleteness ($\delta \in [0, 1]$). The asset specificity (σ) is the possibility that a supplier could not be replaced by competitors. If $\sigma=0$, it means that the transaction is not entirely specific, so that there are numerous competitors which would easily replace the sellers. If $\sigma=1$, it implies that the transaction is totally specific so that there is no competitor which would replace the sellers. Furthermore, the contractual incompleteness (δ) is a possibility that the contract would need to be renegotiated, and extra costs would need to be borne in the adaptation process. If $\delta=0$, the contract is fully complete, and there is no additional cost of adaptation because it would not need to be renegotiated. If $\delta=1$, the contract is fully incomplete, and there would be an additional cost of adaptation because the contract would need to be renegotiated. In the business-to-business (B2B) transaction, based on their model, both sellers and buyers would make efforts to maximise their surplus (Tadelis & Williamson, 2012):

$$\max S_{B2B}(z, g, \rho, \sigma) \quad (6)$$

where S_{B2B} is total surplus ($S = U_s + U_b$) and the total surplus is function of four elements, namely the cost-sharing ratio (z), market governance (g), asset specificity (σ) and

contractual incompleteness (δ). This surplus value in the B2B transaction consists of two main components (Tadelis & Williamson, 2012):

$$S_{B2B} = v - TC_{B2B} \quad (7)$$

where the first component is v which is the amount of the value creation given to the buyers and the second component is TC_{B2B} which is the transaction cost in the B2B transaction. In other words, this surplus value in the B2B transaction is further separated into four main component (Tadelis & Williamson, 2012):

$$S_{B2B} = v - c(e^*, g) - y(e^*) - \sigma\delta \times k(z, g) \quad (8)$$

where the first component is v which is the amount of the value given to the buyers, the second component is c which is production cost, the third component is y which is opportunity cost of the efforts and final component is ($\sigma\delta \times k$) which is the expected level of the adaption cost. In other words, the transaction cost could be considered as a function of four variables, namely cost sharing ratio (z), market governance (g), asset specificity (σ) and contractual incompleteness (δ). More specifically, the transaction cost could be calculated as (Tadelis & Williamson, 2012):

$$TC_{B2B} = c(e^*, g) + y(e^*) + \sigma\delta \times k(z, g) \quad (9)$$

This equation indicates that the transaction cost in the B2B transaction would consist of three cost components. The first component is c which is production cost, the second component is y which is opportunity cost of effort, and the final component is ($\sigma\delta \times k$) which is expected adaptation cost and its main element is the nominal level of adaptation cost (k). In this production process, the production cost depends on the seller's optimal level of effort (e^*) and market governance (g). Also, the opportunity cost of effort depends on the optimal level of effort by the seller (e^*). On the other hand, the expected adaptation cost is proportional to the product of σ and δ . In other words, the asset's specificity and the contract's incompleteness would play complementary roles. For example, a negative effect of contractual incompleteness ($\delta > 0.5$) would be exacerbated if the asset specificity is high ($\sigma > 0.5$).

Since the 1930s, transaction cost theory has been rooted in institutional economics and evolved into a dominant framework for analyzing business-to-business (B2B) transactions, particularly in complex manufacturing contexts. From the 1980s onward, transaction cost economics (TCE) expanded into non-manufacturing domains,

especially the service sector (Bowen and Jones, 1986; Gronhaug and Gilly, 1991). In provider-to-recipient (P2R) settings, service recipients similarly confront make-or-buy decisions. Bowen and Jones (1986) extended TCE to services, identifying performance ambiguity and goal incongruence as key sources of transaction costs. The former refers to difficulties in evaluating service outcomes, while the latter captures misaligned interests between providers and recipients. Thus, TCE provides a valuable framework for analyzing governance issues in P2R relationships (Bowen and Jones, 1986; Gronhaug and Gilly, 1991).

In P2R transactions, two polar governance modes can be identified: market-based competition and hierarchical integration. Market governance prevails when performance ambiguity is low and goal incongruence is high, leading to competitive exchanges between providers and recipients. In contrast, hierarchical integration is more appropriate when performance ambiguity is high but goal incongruence is low, as shared objectives facilitate cooperative relationships despite difficulties in evaluating service quality *ex ante*. These governance mechanisms illustrate how transaction cost considerations shape coordination structures in service exchanges (Bowen and Jones, 1986; Gronhaug and Gilly, 1991).

VALUE CO-CREATION

Classical microeconomic theory assumes that consumers play no direct role in value creation. Under this perspective, value is generated entirely by producers through internal production processes, creating a dichotomy between "active" producers and "passive" consumers. Producers embed value in goods, while consumers simply maximize utility through purchase. As a result, traditional microeconomics separates the production function of firms from the consumption function of households, largely neglecting their interaction and the possibility of co-creating value (De Vries, 2008; Vargo & Lusch, 2004, 2008).

However, since the 1990s, a paradigmatic shift has emerged in which consumers assume an active role in value co-creation. Both producers and consumers are conceptualized as active agents who generate value through reciprocal interaction. Consumers increasingly engage with firms and with one another through networks or "consumer clusters," expressing preferences and shaping product meaning via social media and other platforms (Vargo & Lusch, 2004, 2008). In this view, utility derives not only from the final product but also from the knowledge and experience gained during the purchasing process. This shift marks a transition from a goods-centric, producer-oriented framework toward a more service-centric

and consumer-oriented perspective (De Vries, 2008; Pongsakornrungrasit & Schroeder, 2011).

In this context, Hara et al. (2022) made an excellent contribution to the literature by formulating a balance between “producer-centric” and “customer-centric” views. They used this equation to capture this balance (Hara et al., 2022):

$$m_p = m_r / m_l \quad (10)$$

where m_p is the ratio of the “customer-centric” views to the “producer-centric” view that captures the extent of producers’ willingness for value co-creations, m_r is the producer’s propensity to accept the “customer-centric” views or the willingness for the value co-creation, m_l is the producer’s propensity to maintain the “producer-centric” views or the willingness to maintain the old-fashioned production mode where the consumers are passive players for value co-creation.

In other words, in the traditional “producer-centric” view on production function, in which operand resources, such as labour, raw materials, and machinery, are embedded as values in the goods. In this value-embedding production process, producers would play a dominant role in value creation by using machinery and manufacturing products. By contrast, consumers are passive recipients of the value-embedded goods. The actual values of the products would be determined and manifested in the exchange as the exchange value (De Vries, 2008; Vargo & Lusch, 2008; Hassan, 2012; Uchiyama and Furuoka, 2025). However, in this new service-centric paradigm, goods could be considered the “transmitters” of operand resources, such as knowledge and skills. In this knowledge-embedding process, consumers and producers together play an active role in creating value. In other words, producers would play a role in creating a “value proposition” of goods and services through the marketing mix, such as product, price, distribution and promotion. The value proposition could be defined as producers’ promises to deliver a particular bundle of values in their products and services. At the same time, consumers are active co-producers of values in goods and services by making their own subjective evaluations and appraisals. It means that there is a gap between producers’ value propositions and consumers’ “perceived benefits” or their use values (De Vries, 2008; Vargo & Lusch, 2008; Hassan, 2012; Uchiyama & Furuoka, 2025).

This fundamental shift in microeconomic perspective from the “passive” consumers to

“active” consumers can be explained by several equations that capture the interaction between prices and quantities. In Marshallian microeconomics, the relationship between prices and quantities could be expressed in this simple linear curve of “demand” function (Marshall, 1890; Nieswiadomy, 1985; Pepall et al., 2014):

$$P = \alpha_1 - \beta_{11}Q \quad (11)$$

where P is the price of the product, Q is the quantity of the product, α_1 is the intercept of this demand function, and β_{11} is the slope of this demand function. In this function, the intercept of this function expresses the maximum price which consumers are willing to pay for this product, and the slope of this function is determined by the entry and exit of firms in the production market (Pepall et al., 2014; Eisenhauer, 2024). The total revenue (TR) function could be expressed as (Marshall, 1890; Nieswiadomy, 1985; Pepall et al., 2014):

$$TR = P \times Q = \alpha_1 Q - \beta_{11}Q^2 \quad (12)$$

where TR is total revenue, which is the product of price and quantity. The marginal revenue (MR) function is a derivative of total product in respect to quantity (Marshall, 1890; Nieswiadomy, 1985; Pepall et al., 2014):

$$MR = dTR/dQ = \alpha_1 - 2\beta_{11}Q \quad (13)$$

where MR is marginal revenue, which is a derivative of TR with respect to Q . By contrast, the total cost (TC) function could be expressed as a quadratic form of cost function (Marshall, 1890; Nieswiadomy, 1985; Pepall et al., 2014):

$$TC = \alpha_2 + \beta_{21}Q + \beta_{22}Q^2 \quad (14)$$

where TC is the total cost, α_2 is the intercept, β_{21} is the coefficient for the linear term, and β_{22} is the coefficient for the quadratic term. The marginal cost (MC) could be expressed as (Marshall, 1890; Nieswiadomy, 1985; Pepall et al., 2014):

$$MC = \beta_{21} + 2\beta_{22}Q \quad (15)$$

where MC is the marginal cost, which is the derivative of total cost with respect to quantity. The optimal quantity (i.e. $Q^* = [\alpha_1 - \beta_{21}]/2[\beta_{11} + \beta_{22}]$) could be determined in the intersection between the marginal revenue and marginal cost (i.e. $MR = MC$).

In the new microeconomic perspective, new marginal revenue (MR^*) function could be

expressed (Vargo & Lusch, 2004; Yu & Schwartz, 2018):

$$MR^* = (\alpha_1 + k) - 2\beta_{11}Q \quad (16)$$

where k is the value of co-creation by the active consumer. The new optimal quantity (i.e. $Q^{**} = [\alpha_1 + k - \beta_{21}]/2[\beta_{11} + \beta_{22}]$) could be determined in the intersection between the marginal revenue and the marginal cost.

HYPOTHESIS DEVELOPMENT

Transaction cost economics (TCE) posits that asset specificity and contractual incompleteness are two defining attributes shaping transaction efficiency. As articulated by Tadelis and Williamson (2012), there is an increasing convex relationship between asset specificity and transaction costs. Contractual incompleteness similarly generates adaptation costs, which escalate as renegotiation becomes more frequent and complex. This synthesis implies positive, non-linear relationships between aggregate transaction costs and their two core determinants: specificity and incompleteness (Tadelis and Williamson, 2012; Liang and Huang, 1998; Che et al., 2015).

However, the characteristics of electronic commerce require modifications to traditional TCE assumptions. First, asset specificity may be less relevant in digital contexts. In physical markets, non-transferable investments increase transaction costs, but in e-commerce, key assets—such as internet infrastructure and digital skills—are generally transferable across transactions. Second, contractual incompleteness may play a reduced role. Online consumers typically prioritize price and quality rather than detailed contractual contingencies, and transactions are often completed without extensive attention to contractual completeness (Liang and Huang, 1998; Teo and Yu, 2005; Che et al., 2015; Yu and Chen, 2018).

Instead, uncertainty and trust emerge as primary transactional attributes in electronic commerce and function as mediating variables between transaction cost and consumer behavior. Online consumers rely heavily on digital information and cannot physically inspect products, resulting in information asymmetry between sellers and buyers. Such asymmetry generates uncertainty, a central challenge in online transactions. Under these conditions, trust becomes critical in mitigating uncertainty and reducing perceived transaction costs. Moreover, the active role of consumers should be incorporated into the model. In digital environments, consumers shift from

passive recipients to active participants in value co-creation. Through social media and interactive platforms, producers and consumers jointly shape product value and brand meaning (Liang & Huang, 1998; Che et al., 2015; Yu & Chen, 2018; Vargo & Lusch, 2004; Yu & Schwartz, 2018). Accordingly, value co-creation functions as a moderating variable between transactional attributes and consumer behavior.

Based on these two modifications to the existing model, the value maximisation in electronic commerce (EC) in the B2C could be expressed as:

$$\max S_{EC}(\gamma, \eta) = v - TC_{EC}(\gamma, \eta) \times VCC \quad (17)$$

This formula indicates that the value maximisation in electronic commerce could be determined by uncertainty (γ), trust (η) and value co-creation (VCC). In other words, the EC value maximisation process appears to be independent of the two costs in the B2B value maximisation process, namely production cost (c) and opportunity cost of effort (y). These two costs could be omitted from the conceptualisation of the value maximisation process in electronic commerce in the B2C because they are closely related to brick-and-mortar transactions, such as those between suppliers and buyers in the manufacturing industry. Instead, the expected level of adaptation cost in EC value maximisation depends on uncertainty ($\gamma \in [0,1]$) and trust ($\eta \in [0,1]$). The uncertainty (γ) is the level of difficulty in ensuring the other party's actions or in predicting the outcome in the online transaction. If $\gamma = 0$, it means that online transactions are so clear and entirely predictable that consumers could make sure of the other party's actions and correctly predict the outcome. If so, there is no extra cost of adaptation. If $\gamma = 1$, it implies that the transaction is so unclear and highly unpredictable that consumers could not make sure of product quality and outcome. Furthermore, trust (η) is the level of confidence or belief in achieving a favourable outcome in the online transaction. If $\eta = 0$, it means that consumers have no confidence or expectation to achieve a favourable outcome. If $\eta = 1$, it implies that consumers have full confidence to ascertain a positive outcome. Furthermore, there are two types of purchase modes, namely online purchase or O ("buying in online store") or brick-and-mortar purchase or B ("buying in physical store") and $g \in (O, B)$. Among two alternative modes, the brick-and-mortar purchase mode B tends to have a governance structure where the sense of instant gratification (i.e. immediate satisfaction of desires) is strong and the taste for variety (i.e. unrestricted choice) is weak. By contrast, the online purchase mode tends to have a governance structure where the sense of instant gratification is weak, and the taste for variety is strong.

The formula for the EC value maximisation process allows for the formulation of three fundamental propositions. Firstly, a basic relationship in this process could be the direct positive relationship between perceived values and purchase intention. If perceived value were higher, there would be a greater likelihood of purchasing goods and services in online business transactions.

Hypothesis 1: *There is a positive relationship between perceived value and online purchase intention.*

Secondly, another important relationship in this process could be the direct positive relationship between transaction cost and purchase intention. If transaction costs were higher, there would be a lower likelihood of purchasing goods and services in online business transactions of the B2C.

Hypothesis 2: *There is a negative relationship between transaction cost and online purchase intention.*

Thirdly, there would be two important attributes of electronic commerce, namely uncertainty and trust. As Equation 17 clearly indicates, the transaction attribute would determine the relationship between transaction cost and purchase intentions. In other words, these two attributes would mediate the negative relationship between transaction cost and purchase intention in the online business transaction.

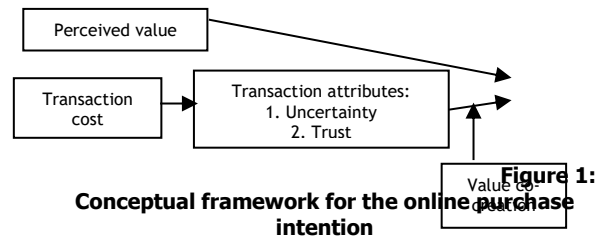
Hypothesis 3: *Uncertainty and trust would mediate the relationship between transaction cost and online purchase intention.*

Fourthly, there would be two important elements in the electronic commerce, which is a active role of consumers. Equation 17 clearly indicates that value co-creation affects the relationship between transaction attributes and purchase intention. In other words, value co-creation would moderate the relationship between transaction attributes and purchase intention in the online business transaction.

Hypothesis 4: *Value co-creation would moderate the relationship between transaction attribute and online purchase intention.*

Based on these propositions, this paper proposed a *direct* effect of transaction cost on online purchase intentions, treating transaction cost as an independent variable rather than a mediating variable. In other words, this new conceptual framework assumes that two online transaction attributes, namely uncertainty and trust, would

mediate the relationship between transaction cost and online purchase intention.



7. CONCLUSION

Transaction cost theory and value co-creation theory have both contributed to reshaping foundational assumptions of microeconomics and consumer behavior. Transaction cost theory introduces “frictions” into economic exchange by accounting for the costs of coordinating and governing transactions, including information search, bargaining, contracting, monitoring, and enforcement. These transaction costs extend beyond production expenses and are central to explaining organizational structure, market governance, and exchange efficiency. By incorporating such frictions, the theory challenges the neoclassical assumption of costless exchange and highlights the institutional and behavioral constraints shaping economic decision-making. In contrast, value co-creation theory emphasizes the increasingly active role of consumers in the value generation process. Rather than passive recipients, consumers are viewed as participants who collaborate with firms in creating and enhancing value. Particularly in digital contexts, consumers contribute through feedback, customization, content creation, and community interaction, thereby influencing product development and brand meaning. This shift toward participatory engagement redefines demand-side behavior and reflects a more relational and interactive form of exchange.

Building on these perspectives, this paper proposes an integrated conceptual framework within consumer behavior research. The model includes perceived value and transaction cost as independent variables and online purchase intention as the dependent variable. Transaction attribute functions as a mediator between transaction cost and online purchase intention, while value co-creation moderates the relationship between transaction attribute and online purchase intention. By combining the governance dimension of transaction cost theory with the participatory dimension of value co-creation theory, the framework offers a more comprehensive microeconomic explanation of consumer decision-making.

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