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What Drives Cryptocurrency Acceptance? Evidence from Pakistan

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Abstract: *In this study, the proposed model of acceptance factors of cryptocurrencies was analyzed to recognize user behavioral intention by using; web quality, facilitating conditions, perceived risk, e-WOM, and perceived ease of use with the mediating role of the trust factor. An efficient and effective better arrangement of understanding this unique virtual delusion of the use of cryptocurrencies has become an essential part of the virtual world for each stakeholder. So many deliberations on the regulatory frameworks of cryptocurrencies have taken place among government regulators, financial advisors, tax consultants, politicians, thinkers, economists, and lawmakers, but there is inconclusive evidence on legislation in Pakistan.*

Key Words: Trust, Web Quality, Perceived Risk, Perceived Ease of Use, e-WOM

Introduction

Cryptocurrency is a new type of electronic currency having unique features as compared to paper currency, such as nature, issuing authority, supervision uses, and denominations (Corbet et al., 2018). Bitcoin has become the most important and most frequently traded cryptocurrency in terms of exchange among the numerous cryptocurrencies available online. It is the ideal method of payment for the internet since it is quick, secure, and transnational. And has decentralized core technologies that are always innovating. With the ascent of Bitcoin in 2008, the term cryptocurrency entered common usage. In general terms, cryptocurrencies are digital peer-to-peer and independent resources that are not endorsed or run by government authorities. These are built with blockchain technology, one that encompasses the mutual, shared ledger wherein everyone consents to exchanges when they are recorded, and all claimants even have a proper copy of the ledger (Nazifi et al., 2021). It is now time to introduce the cryptocurrency-accepting factors such as Trust, Perceived Risk, E-WOM, Web Quality of the cryptocurrency users in Pakistan, studied in this research with the behavioral intention of the cryptocurrency user, miners, cryptocurrency exchanger, investor or speculator, and other relevant stakeholders residing in Pakistan. Trust is a belief that a participant will meet his obligations, especially important in digital monetary transactions (Ituma, Riaz, & Ali, 2021), where people have subjected to risks given the uncertainty of the economic environment and a sense of failure(Lu

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et al., 2011). The concept of cryptocurrencies, which seek to retain faith in the integrity of financial value via the use of technology, was considered promising in exceptional instances whereby trust in state institutions is low, contributing towards a more general or major usage for domestic transactions (Boar & Wehrli, 2021). Word-of-mouth (WOM) has some of the most impactful advertising mediums (Fan et al., 2013). No doubt the quality of web site's color combination, animated images, and interactive features have a significant favorable influence on internet customers' cognitive sensations (Babin et al., 2003; Bu & Go, 2008; Ha & Im, 2012). Bauer (1960) first characterized perceived risk as having a two-dimensional configuration, particularly regarding lack of certainty and unintended influences (Dowling, 1986).When users use a system, they may be exposed to uncertainty and unpredictability (Khatimah & Halim, 2014). Many experts genuinely think that fundamental factors have had no discernible impact on bitcoin pricing. Charisma and/or demographic characteristics (e.g., attributes or states of persons, identity, and maturity level) are examples of individual varying factors that could influence people's perceived ease of use, with the same token system characteristics are those distinguishing highlights of a mechanism that can aid individuals in developing understandings of effectiveness or ease of use (Venkatesh & Bala, 2008). Behavioral intention is a phase in any form of current action that expresses itself at reaching a choice to embrace behavioral intention (Khatimah & Halim, 2014). As a result of the foregoing literature, the following are the study's research questions:

RQ1: What variables influence a consumer's decision to use cryptocurrencies in the first place?

RQ2: What variables influence a consumer's decision to use cryptocurrency?

RQ3: How Trust is using an innovative approach to mediating the elements that influence people's willingness to adopt cryptocurrencies.

Literature Review

The blockchain may be seen as a pyramid, with blocks layered on top of each other. Thus every succeeding block in the blockchain is connected to the prior one by a cryptographic hash. The block header is the first block created in a blockchain. All this is stored in the computers' storage and operates as a real machine.

Relationship of Web Quality between Trust and Intention to Use Cryptocurrency

Acquiring contact details (e.g., mailing address, persons, phones), speed, uniqueness of utility, simplicity of navigation, counter, denomination, phrasing, color, and design are the content characteristics provided (Misic & Johnson, 2014). For academic websites, researchers defined quality parameters. They examined elements such as cohesion by clustering main control entities, absolute control permanence, contextual control consistency, and so on from an engineering standpoint (Liu & Arnett, 2000). Access to the web, content, visuals, layout, ease of operation, navigation, utility, and distinct characteristics were all noted by Bell and Tang (Bell & Tang, 1998). The feeling of specific command over a transaction (Pavlou, 2003) drives subsequent financial activities and develops multiple social relationships since trust minimizes the risks connected with the vendor (A., 2002). The internet enables users to participate in (eWOM) communication by providing Web-based consumer reviews platforms that exchange and share their viewpoints on and perceptions of commodities and services with a large number of other users (Hennig-Thurau et al., 2004).

(H1a): Website quality determines trust.

(H1b): Website quality determines behavioral intention.

Relationship of E-WOM between Trust and Intention to Use Cryptocurrency

A consumer's affiliation with a digital environment can provide socioeconomic value in terms of recognition and social inclusion; consequently, individuals start engaging in eWOM communication to play an active role in and correspond to virtual forums. Consumers can sometimes, for example, give feedback on review sites because doing so indicates their engagement in and involvement with the online world of system users by allowing them to reap social benefits from their affiliation in this online

community (McWilliam, 2000; Richard L. Oliver, 1999).

(H2a): E-WOM determines trust.
(H2b): E-WOM determines behavioral intention.

Relationship of Facilitating Conditions between Trust and Intention to Use Cryptocurrency

The facilitating conditions variable is characterized as an individual's opinion that organizational and technical facilities persist in assisting the system's use. The unified Theory of Acceptance and Use of Technology establishes two direct progenitors to innovation and technology acceptance: the intention to utilize the system and (2) the enabling conditions (San Martín & Herrero, 2012).

(H3a): Facilitating Conditions determines trust
(H3b): Facilitating determines intention to use

Relationship of Perceived Ease of Use between Trust and Intention to Use Cryptocurrency

PEOU use is linked to self-efficacy, described as a person's assessment of his or her competence (Bandura, 1982; Heffernan, 1988), and computer self-efficacy, which is a person's assessment of his or her skill using a computer (Venkatesh & Davis, 1996). Consumer self-efficacy and hence PEOU has been demonstrated to be affected by the environment and support offered (Awad & Ragowsky, 2008).

(H4a): Trust is influenced by perceived ease of use.
(H4b): The perceived ease determines behavioral intention to use.

The Relationship between Trust and Inte ntion to Use Cryptocurrency and Perceive d Risk

The term "social risk" raises the prospect of using such a cashless payment, which may lead to customer dissatisfaction among companions, family, or coworkers. A boost or drop in the number of participants in the general public might be predicated on how online shopping is perceived, which can lead to a positive or negative interpretation. The emergence of online becomes an aspect that influences users' behavior, resulting in both pleasant and unpleasant resource provisioning. The term "financial risk" refers to the possibility of monetary transactions resulting in a loss.

(H5a): Perceived risk determines trust.
(H5b): Perceived risk determines behavioral intention to use.

Trust, Behavioral Intention, and Cryptocurrency

According to the literature, any financial system seeking widespread adoption must be lacking in confidence. Trust is a depiction of worth that is guaranteed by practical value or legal duty to pay back. In terms of confidence, trust is that everyone else will recognize such depictions, so trust in the characterizations of value is also not falsified. Gold and silver were employed as ancient money. Fiat money, on the other side, is backed by the government and must be completely trusted. (Bucko et al., 2015). Unlike traditional banking institutions, Cryptocurrencies are based on decentralized trust. Transactions do not go via a trusted intermediary and instead use a peer-to-peer system.

(H6): The intention to use is influenced by the trust.

Behavioral Intention

The behavioral intention has been widely studied in a wide range of domains, with a particular focus on the use of various adoption models. Behavioral intention is related to many content relationship abstractions, such as a sense of achievement, standard, and involvement, in the context of buying online in online communities (Tsiotsou, 2006). According to academic studies, behavioral intention is one of the most integral variables in developing a suitable framework to address an individual's perceived behavior while using advanced technologies. Individuals' behavioral intentions can be assessed as to their sense of opportunities. In the future, to undertake or not initiate their behavioral patterns (Namahoot & Laohavichien, 2018).

(H7): Trust determines intention to use.

Methodology

The questionnaire's questions were validated by the opinions of various experts. Because our targeted respondents were only prospective

adopters, we chose to collect the data on residents living in Pakistan who were 18 or older and had even some knowledge of cryptocurrencies (Eikmanns & Sandner, 2015). We have used convenience sampling (San Martín & Herrero, 2012). An innominate online form was completed between May 2021 and July 2020. A total of 526 forms were received, with 700 of them being disseminated to various cryptocurrency users, including miners, holders, investors, and cryptocurrency platforms. The elements of each variable were measured using the Likert scale. The first step was to send a targeted, planned questionnaire to the specific cryptocurrency user respondents, which was circulated among them using different social sites, WhatsApp groups, different online networks, cryptocurrency users platforms, and even live face-to-face interviews, rather than their occupation, whether a person is a farmer or businessman, part-time worker or full-time professionals, student or professor, he just has the involvement of cryptocurrency.

Data Analysis and Results

Because when realistic coefficients are the only goal of the study, empirical path analysis becomes simpler and more consistent in terms of standardized ones. The method's implementation of data typically necessitates algebraic rearrangement of coefficients for unmeasured variables on the same basis as measured variables. It's so simple to switch from one form to the other (in circumstances where standard deviations are available to everyone).

Table 1.

Structural Model

Paths	Beta	t-values	p values
C-> UI	0.138	2.134	0.034
EW -> C	0.091	2.157	0.031
EW -> UI	0.282	5.568	0.000
FC -> C	0.252	4.008	0.000
FC -> UI	0.168	3.047	0.002
PEU -> C	0.435	8.438	0.000
PEU -> UI	0.16	2.526	0.011
PR -> C	0.067	1.733	0.078
PR -> UI	0.073	1.981	0.046
WQ -> C	0.116	3.05	0.002
WQ -> UI	0.119	2.832	0.005

The results of the statistical analysis suggest that there are significant relationships between several of the predictor variables and the outcome variable. Specifically, the predictor variables EW, FC, PEU, and WQ have statistically significant positive relationships with the outcome variable (UI), as indicated by the positive beta coefficients and low p-values. The predictor variable C also has a statistically significant positive relationship with the outcome variable, as indicated by the positive beta coefficient and low p-value. On the other hand, the predictor variable PR has a non-significant positive relationship with the outcome variable, as indicated by the positive beta coefficient and high p-value of 0.078.

Conclusions

The framework created for "the acceptance Factors of cryptocurrencies, as well as the mediations impact of the key variable of Trust among the variables" discovered is the primary oddities of this research. The major accomplishment was the development of a new model with a very high explanatory capacity. The primary goal of this research is to conduct an empirical study of the Behavioral Intentions of Cryptocurrency Users.
As a result, after the research model is operation al and the outcomes have been examined, we resulted that the parameter with the major impact on consumer behavioral intention is Trust, followed by facilitating conditions. The facilitating concept places a greater emphasis on trust. Perceived risk, on the other deal, hurts trust. We urge that initiatives and institutions that issue and trade cryptocurrencies concentrate their

endeavors on intensifying customer trust. To strengthen Trust, we urge that cryptocurrency representatives and innovators examine the value of customer satisfaction.

Most people are aware of gender and age disparities in technology use, at least in some ways. In tandem with the growth, it is commonly assumed that elderly users and women are on one extreme, while young males are on the other. This section mostly serves as a recap of the gender and age effects previously covered. The distinction between bio psychosocial designations is beyond the purview of this study, thus gender refers to genetic allocation in this case, as does much of the existing literature.

References

Bhattacherjee, A. (2002). Individual Trust in Online Firms: Scale Development and Initial Test. *Journal of Management Information Systems*, *19*(1), 211–241. http://www.jstor.org/stable/40398572.

Arias-Oliva, M., Pelegrín-Borondo, J., & Matías-Clavero, G. (2019). Variables influencing cryptocurrency use: A technology acceptance model in Spain. *Frontiers in Psychology, 10*(MAR), 1–13. https://doi.org/10.3389/fpsyg.2019.00475

Artiono, P., & Ariyanti, M. (2016). The Impact of Website Quality on Information Quality, Value and Loyalty Intentions on E-commerce Website. The 7th Smart Collaboration for Business in Technology and Information Industries 2016, 99–108.

Awad, N. F., & Ragowsky, A. (2008). Establishing trust in electronic commerce through online word of mouth: An examination across genders. *Journal of Management Information Systems, 24*(4), 101–121. https://doi.org/10.2753/MIS0742-1222240404.

Ayedh, A., Echchabi, A., Battour, M., & Omar, M. (2020). Malaysian Muslim investors' behaviour towards the blockchain-based Bitcoin cryptocurrency market. *Journal of Islamic Marketing, 12*(4), 690–704. https://doi.org/10.1108/JIMA-04-2019-0081.

Babin, B. J., Hardesty, D. M., & Suter, T. A. (2003). Color and shopping intentions: The intervening effect of price fairness and perceived affect. *Journal of Business Research, 56*(7), 541–551. https://doi.org/10.1016/S0148-2963(01)00246-6.

Bandura, A. (1982). Self-efficacy mechanism in human agency. *American Psychologist, 37*(2), 122–147. https://doi.org/10.1037/0003-066X.37.2.122.

Bell, H., & Tang, N. K. h. (1998). The effectiveness of commercial Internet Web sites: a user's perspective. *Internet Research, 8*(3), 219–228. https://doi.org/10.1108/10662249810217768.

Boar, C., & Wehrli, A. (2021). Central bank digital currency. 114.

Bu, O. B., & Go, A. S. (2008). Perceived trustworthiness of online shops. *Journal of Consumer Behaviour, 50*(October), 35–50. https://doi.org/10.1002/cb.

Bucko, J., Palová, D., & Vejačka, M. (2015). Security and Trust in Cryptocurrencies. Central European Conference in Finance and Economics (Cefe2015). https://www.researchgate.net/publication/317955860_Security_and_Trust_in_Cryptocurrencies.

Corbet, S., Meegan, A., Larkin, C., Lucey, B., & Yarovaya, L. (2018). Exploring the dynamic relationships between cryptocurrencies and other financial assets. *Economics Letters, 165*, 28–34. https://doi.org/10.1016/j.econlet.2018.01.004.

Derbentsev, V., Matviychuk, A., & Soloviev, V. N. (2020). Forecasting of Cryptocurrency Prices Using Machine Learning. *Advanced Studies of Financial Technologies and Cryptocurrency Markets*, 211–231. https://doi.org/10.1007/978-981-15-4498-9_12.

Dowling, G. R. (1986). Perceived risk: The concept and its measurement. *Psychology and Marketing*, *3*(3), 193–210. https://doi.org/10.1002/mar.4220030307.

Eikmanns, B. C., & Sandner, P. G. (2015). Bitcoin: The Next Revolution in International Payment Processing? An Empirical Analysis of Potential Use Cases. *SSRN Electronic Journal*, https://doi.org/10.2139/ssrn.2619759.

Eroglu, S. A., Machleit, K. A., & Davis, L. M. (2003). Empirical Testing of a Model of Online Store Atmospherics and Shopper Responses. *Psychology and Marketing, 20*(2), 139–150. https://doi.org/10.1002/mar.10064.

Fan, Y.-W., Miao, Y.-F., Fang, Y.-H., & Lin, R.-Y. (2013). Establishing the Adoption of Electronic Word-of-Mouth through Consumers' Perceived Credibility. *International Business Research, 6*(3), 58–65. https://doi.org/10.5539/ibr.v6n3p58.

Grover, P., Kar, A. K., Janssen, M., & Ilavarasan, P. V. (2019). Perceived usefulness, ease of use, and user acceptance of blockchain technology for digital transactions–insights from user-generated content on Twitter. *Enterprise Information Systems, 13*(6), 771–800. https://doi.org/10.1080/17517575.2019.1599446.

Ha, Y., & Im, H. (2012). Role of web site design quality in satisfaction and word of mouth generation. *Journal of Service Management, 23*(1), 79–96. https://doi.org/10.1108/09564231211208989.

Heffernan, C. J. (1988). Social foundations of thought and action: A social cognitive theory, Albert Bandura Englewood Cliffs, New Jersey: Prentice Hall, 1986, xiii + 617 pp. Hardback. US$39.50. *Behaviour Change, 5*(1), 37–38. https://doi.org/10.1017/s0813483900008238.

Hennig-Thurau, T., Gwinner, K. P., Walsh, G., & Gremler, D. D. (2004). Electronic word-of-mouth via consumer-opinion platforms: What motivates consumers to articulate themselves on the internet? *Journal of Interactive Marketing, 18*(1), 38–52. https://doi.org/10.1002/dir.10073.

Hu, P. J. H., Clark, T. H. K., & Ma, W. W. (2003). Examining technology acceptance by school teachers: A longitudinal study. Information and Management, 41(2), 227–241. https://doi.org/10.1016/S0378-7206(03)00050-8.

Hussain, M., Mollik, A. T., Johns, R., & Rahman, M. S. (2019). M-payment adoption for bottom of pyramid segment: an empirical investigation. *International Journal of Bank Marketing, 37*(1), 362–381. https://doi.org/10.1108/IJBM-01-2018-0013.

Ituma, A. I., Riaz, A., & Ali, M. H. (2021). Examination of Digital and Non-Digital Factors on Perception of Mobile Banking Customers: A Case of Developing Economy. *Gomal University Journal of Research, 37*(4), 388-399.

Jeong, H. J., & Koo, D. M. (2015). Combined effects of valence and attributes of e-WOM on consumer judgement for message and product The moderating effect of brand community type. *Internet Research, 25*(1), 2–29. https://doi.org/10.1108/IntR-09-2013-0199.

Johnson, K. L., & Misic, M. M. (1999). Benchmarking: a tool for Web site evaluation and improvement. *Internet Research*, *9*(5), 383–392. https://doi.org/10.1108/10662249910297787.

Khan, I. U., Hameed, Z., & Khan, S. U. (2017). Understanding online banking adoption in a developing country: UTAUT2 with cultural moderators. *Journal of Global Information Management, 25*(1), 43–65. https://doi.org/10.4018/JGIM.2017010103.

Khatimah, H., & Halim, F. (2014). Consumers' intention to use e-money in Indonesia based on Unified Theory of Acceptance and Use of Technology (UTAUT). *American-Eurasian Journal of Sustainable Agriculture, 8*(12), 34–40.

Liu, C., & Arnett, K. P. (2000). Exploring the factors associated with Web site success in the context of electronic commerce. 38.

Lu, Y., Yang, S., Chau, P. Y. K., & Cao, Y. (2011). Information & Management Dynamics between the trust transfer process and intention to use mobile payment services : A cross-environment perspective. *Information & Management, 48*(8), 393–403. https://doi.org/10.1016/j.im.2011.09.006.

Marella, V., Upreti, B., Merikivi, J., & Tuunainen, V. K. (2020). Understanding the creation of trust in cryptocurrencies: the case of Bitcoin. *Electronic Markets, 30*(2), 259–271. https://doi.org/10.1007/s12525-019-00392-5.

McWilliam, G. (2000). Building Stronger Brands through Online Communities. *Sloan Management Review, 41*(3), 43–54. http://search.ebscohost.com/login.aspx?direct=true&db=bth&AN=3060852&site=ehost-live.

Namahoot, K. S., & Laohavichien, T. (2018). Assessing the intentions to use internet banking: The role of perceived risk and trust as mediating factors. *International Journal of*

Bank Marketing, 36(2), 256–276. https://doi.org/10.1108/IJBM-11-2016-0159.

Nazifi, A., Murdy, S., Marder, B., Gäthke, J., & Shabani, B. (2021). A Bit(coin) of happiness after a failure: An empirical examination of the effectiveness of cryptocurrencies as an innovative recovery tool. *Journal of Business Research, 124*(January), 494–505. https://doi.org/10.1016/j.jbusres.2020.11.012.

Pavlou, P. A. (2003). Consumer acceptance of electronic commerce: Integrating trust and risk with the technology acceptance model. *International Journal of Electronic Commerce, 7*(3), 101–134. https://doi.org/10.1080/10864415.2003.11044275.

Ramayah, T. (2006). Interface Characteristics, Perceived Ease of Use and Intention to Use an Online Library in Malaysia. *Information Development, 22*(2), 123–133. https://doi.org/10.1177/0266666906065575.

Richard L. Oliver. (1999). Whence Consumer Loyalty? Journal of Marketing, 63(Special Issue 1999).

San Martín, H., & Herrero, Á. (2012). Influence of the user's psychological factors on the online purchase intention in rural tourism: Integrating innovativeness to the UTAUT framework. *Tourism Management, 33*(2), 341–350. https://doi.org/10.1016/j.tourman.2011.04.003.

Teo, T. (2010). Examining the influence of subjective norm and facilitating conditions on the intention to use technology among pre-service teachers: A structural equation modeling of an extended technology acceptance model. *Asia Pacific Education Review, 11*(2), 253–262. https://doi.org/10.1007/s12564-009-9066-4.

Trimborn, S., Li, M., & Härdle, W. K. (2020). Investing with Cryptocurrencies - A Liquidity Constrained Investment Approach. *Journal of Financial Econometrics, 18*(2), 280–306. https://doi.org/10.1093/jjfinec/nbz016.

Tsiotsou, R. (2006). The role of perceived product quality and overall satisfaction on purchase intentions. *International Journal of Consumer Studies, 30*(2), 207–217. https://doi.org/10.1111/j.1470-6431.2005.00477.x.

Venkatesh, V., & Davis, F. D. (1996). A model of the antecedents of perceived ease of use: Development and test. *Decision Sciences, 27*(3), 451–481. https://doi.org/10.1111/j.1540-5915.1996.tb00860.x.

Venkatesh, V., Brown, S. A., Maruping, L. M., & Bala, H. (2008). Predicting different conceptualizations of system USE: The competing roles of behavioral intention, facilitating conditions, and behavioral expectation. *MIS Quarterly: Management Information Systems, 32*(3), 483–502. https://doi.org/10.2307/25148853.

Venkatesh, V., Morris, M. G., Davis, G. B., & Davis, F. D. (2003). User acceptance of information technology: Toward a unified view. *MIS Quarterly: Management Information Systems, 27*(3), 425–478. https://doi.org/10.2307/30036540.

Venkatesh, V., Thong, J. Y. L., & Xu, X. (2012). Venkatesh_Thong_Xu_MISQ_forthcoming (GENDER AGE EXPERIENCE). *MIS Quarterly, 36*(1), 157–178.