

# Research on the Acceptance and Benefits of Virtual Currency among People of Different Age Groups in North America

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**Abstract.** Virtual Currency is a peer-to-peer platform, whereby it conveys an entirely different approach compared to the traditional banking system. Virtual currency is not guaranteed by any government or organization because nobody owns the platform. Under the context of the increased adoption of virtual currency across North America among different groups, this study emphasizes the evaluation of the acceptance and benefits of virtual currency among people of different age groups in North America. The researcher applied a quantitative research approach as the preferred research method of the study. The purposive sampling was utilized to obtain a sample size of 12 individuals who are involved in the virtual currency market in North America. The findings of the study illustrate that there is a profound association between the acceptance and benefits of virtual currency and age. Young people between the age of 18 and 25 utilize virtual currency more frequently compared to other age groups.

Keywords: Virtual currency, Acceptance, Benefit, Ease of Usage, Usage Behavior

### 1 Introduction

Virtual currency is a form of decentralized digital currency that is not controlled or managed by any government. The appearance of virtual currency can be trailed back to the late 1980s, when the virtual currency was referred to as a type of cyber currency. In 2008, Satoshi Nakamoto released a publication illustrating digital currencies, and in 2009, the Bitcoin network was launched [1. In 2010, Bitcoin was considered as the only accessible virtual currency within the market, and its price was a few cents at the time [2. Within the following few years, new virtual currencies were introduced to the market, and their prices increased and fell considerably along with that of Bitcoin. During this volatility period, numerous individuals lost their trust on virtual currencies as an appropriate vehicle of investment. In 2017, nonetheless, virtual currencies saw unprecedented growth in the United States. In January 2018, the overall market cap for all virtual currencies was approximately 820 billion USD before crashing in February [3.

Numerous individuals perceive that the price of Bitcoin fluctuates widely since it increased from 1000 USD to 20000 USD in 2017 and then crashed down to 10000 USD [4. Other individuals perceive that the Bitcoin is getting popular because the cryptocurrency has made the transaction easier for the individuals with limited technical experience or knowledge. Virtual currencies can be bought from brokers and users, and people can store them in the cryptographic wallet [5. In conclusion, one thing that appears to be certain is that the virtual currency will continue to be more and more popular as numerous individuals start to get familiar with the concept. The primary objective of this research is to evaluate the acceptance and benefits of the virtual currency among people of different age groups across North America. This study is worth being undertaken because virtual currency is a relatively new concept that has not received considerable academic attention.

### 2 Methodology

### 2.1 Research Participants

The present study utilizes a quantitative research approach through survey and interviews, which were regarded as the most preferable approaches for testing theories as well as quantifying the data. In this study, a purposive sampling technique was used to guarantee that certain groups in the target demographic can be represented sufficiently through the sample [6. The sample consists of 12 individuals chosen from specialized people who utilize the virtual currency. They were divided into 3 age groups, namely the young students (age 18-24), young practitioners (age 25-40), and older practitioners (age 41-70).

### 2.2 Research Design

The questionnaire was structured using 15 questions apart from the demographic questions. A 5-point Likert Scale was applied as the appropriate model for this questionnaire. The questionnaire was formulated this way to offer numerous alternatives and options to the respondents. The Likert Scale ranged from Strongly Disagree to Strongly Agree, in which Strongly Agree (5) referred to full agreement while Strongly Disagree (1) referred to full disagreement. The interviews consisted of 9 questions which were designed to understand the benefit and acceptance of virtual currency among different age groups. The questionnaires and interview questions were sent to selected individuals through emails. Then the researcher conducted a thematic content analysis to the collected information. Three themes were obtained through the analysis of the interviews. They are the perceived benefit, the ease of use, and the usage behavior in age, respectively.

## 3 Result and Analysis

#### 3.1 Demographic Findings

The demographic data obtained are about the age and gender. As seen in Table 1, the sample population are comprised of 12 individuals with an overall of 8 male participants (66.7%) and 4 female participants (33.3%). According to the PEW RESEARCH CENTRE study, twice as many males are investing in the virtual currency compared to females [7. Also, there is a significant relationship between the age and the acceptance rate of virtual currency, especially for people aged 18-25 and 25-30 [8. These findings are in line with the findings of this paper. As seen in Table 2, the group aged 18-24 is the most significant age group in the survey, accounting for 50% of the participants. It is followed by the group aged 25-40, accounting for 33.3%, and lastly is the group aged 41-70, accounting for 16.7%. Table 3 illustrates the findings in the relation between the education level and virtual currency experience of the surveyed participants. As shown in Table 3, 58.3% of the participants are undergraduates, 33.3% are graduates, and 8.3% have attained a master's degree. Moreover, 50% of the participants have used the virtual currency for less than a year, 41.7% for two years, and 8.3% for more than two years.

Gender	Frequency	Percentage
Male	8	66.7%
Female	4	33.3%

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Age Group	Frequency	Percentage				
18-24	6	50%				
25-40	4	33.3%				
41-70	2	16.7%				

**Table 2** Age Group Findings (original)

Table 3. Educational a	ind Experience	Findings (	(original).
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Education	Frequency	Percentage
Undergraduate	7	58.3%
Graduate	4	33.3%
Masters	1	8.3%
How long have you used virtual cur-	Frequency	Percentage
rency?		
Less than 1 year	6	50%
1 to 2 years	5	41.7%
3 to 4 years	1	8.3%

#### 3.2 Descriptive Statistics

**Perceived Ease of Usage.** Perceived ease of use was taken as the first construct within the questionnaires and interviews. It was evaluated by 5 measures. According to Table 4, "learning to use virtual currency is easy" has the highest mean grade and standard deviation of 3.68 and 0.945 respectively. 50% of the participants agreed that it is easy to learn to use the virtual currency, 25% agreed that it is easy to use virtual currency, 33.3% strongly agreed that they can easily convert their flat money to the virtual currency, and 41.7% agreed that it was easy to obtain new skills and tools for virtual currency. According to Abboushi's study, virtual currencies tends to be easy, reliable, and fast because of their network-oriented nature. In international transactions, digital currencies appear to be particularly convenient [9. Also, from the response of the participants in the interview, it was clear that virtual currencies were easy to be utilized due to its accessibility and the learning process is easy and consistent, although it might be challenging for beginners at first to understand how the virtual currency works [10.

Chlow Benze claimed that: "Bitcoin is easy to use for me because I can access it anywhere I am as long as I have my computer or smartphone. Also, I can make international payments without using conventional systems of banking like credit cards."

Selta Nome stated: "Bitcoin can be a bit challenging at the start. But it is an easy platform to use since the transactions are less expensive because there are no middlemen or banks."

Questionnaire Vari- ables	Strongly Agree (5)	Agree (4)	Neutral (3)	Disagree (2)	Strongly disagree (1)	Mean	SD
Ease of Use	33.3%	16.7%	41.7%	8.3%	0	3.47	0.585
It is easy to use vir- tual currency	16.7%	25%	33.3%	16.7%	8.3%	3.60	0.913
Learning to Use Virtual Currency is Easy	16.7%	50%	25%	8.3%	0%	3.68	0.945
I can convert flat money easily to vir- tual currency	33.3%	25%	16.7%	16.7%	8.3%	3.28	0.936
It is easy to obtain and learn new skills and tools for virtual currency	25%	41.7%	25%	8.3%	0%	3.52	0.823

Table 4. Descriptive findings of perceived ease of use (original).

**Perceived Benefit.** Perceived benefits were taken as the second construct within the questionnaires and interviews. It was also evaluated through 5 measures. According to Table 5, "I can transfer money internationally through virtual currency" has the highest mean grade and standard deviation of 4.44 and 0.77 respectively. 50% of the participants strongly agreed that they can transfer money internationally through virtual currencies, 41.7% strongly agreed that they can cheaply transfer through virtual currencies, and 41.7% strongly agreed that it is faster to transact through virtual currencies.

Shilo Tewa stated: "I find using cryptocurrency particularly easy to do international transactions and it is also faster compared to traditional methods."

Some of the benefits of virtual currencies include a faster speed of transaction and the ease of utilization [11. Consequently, virtual currencies have revolutionized the financing sector by allowing faster and cheaper transactions [2.

Questionnaire Variables	Strongly Agree	Agree	Neutral	Disagree	Strongly Disagree	Mean	Neutral
Perceived Bene- fit	33.3%	25%	25%	8.3%	8.3%	4.17	0.531
I can instantly transfer money through virtual currency	41.7%	16.7%	16.7%	16.7%	0%	4.08	1.19
I can transfer money interna- tionally easily through virtual currency	50%	25%	16.7%	8.3%	0%	4.44	0.77
I can transfer money cheaply through virtual currency	41.7%	25%	16.7%	16.7%	0%	4.32	1.069
It is safer to use virtual currency in transferring money	33.3%	50%	8.3%	8.3%	0%	4.12	0.726
It is faster to send money through virtual currency	41.7%	33.3%	25%	0%	0%	4.24	0.831

Table 5. Descriptive findings of perceived benefits (original).

**Usage Behavior in Age.** According to Table 6, 50% of participants strongly agreed that young people use the virtual currency more than old people and 41.7% of the participants strongly believed that young people trust the virtual currency more than old people.

Teta Shida described: "I tend to believe in virtual currency compared to my parents, they still think it's a scam."

Millennials and Generation Z purchasers contribute to approximately 94% of overall cryptocurrency purchasers compared to only 6.14% of crypto buyers above the age of 40 [12. This can be explained by the idea that young people are embracing the social media and various technological devices. Anderson and Jiang mentioned in their study that the majority of young people utilize digital social networks because they believe in associating online through these networks [13. A majority of young people observe virtual currency platforms as a form of social innovation [14.

Questionnaires variables	Strongly Agree	Agree	Neutral	Disagree	Strongly Disagree	Mean	SD
Usage of virtual currency is related to age	16.7%	16.7%	25%	25%	16.7%	1.76	1.012
Young people use virtual currency more than old peo- ple	50%	41.7%	8.3%	0%	0%	5.32	2.072
Young people trust virtual currency more than old peo- ple	41.7%	25%	25%	8.3%	0%	4.21	0.78
t is easy for young people to use the tools and skills of virtual currency compared to old people	33.3%	33.3%	16.7%	8.3%	8.3%	3.28	0.936

Table 6. Descriptive findings of usage behavior in age (original).

### 4 Conclusion

The primary objective of this research is to evaluate the acceptance and benefit of virtual currency among people of different age groups in North America. A quantitative analysis is conducted via interviews and questionnaires. The findings of the study illustrate that there is a significant relationship between the acceptance of virtual currency and age, and young people appear to accept and benefit from the virtual currency more compared to old people. One of the limitations for this paper can be the lack of sufficient time and resources to gather enough data and to interact with the respondents more. Virtual currency is a relatively new concept that has not undergone deep and profound academic scrutiny. Therefore, there might be a relatively substantial gap of knowledge about the virtual currency. Another limitation that might have hindered the findings of this study is the bias of the respondents. The information given by the respondents can only be true from the researcher's point of view. The respondents might be biased when answering the survey questions.

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