

Predicting the Uber Adaptation Behavior among Physically Disable University Students in Bangladesh

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Abstract

The prime goal of the study is predicting the Uber adaptation behavior of physically disable university students in Bangladesh. Data was collected from the sample of 100 public and private university students who live in Dhaka city. One of the non-probability sampling techniques called purposive sampling technique was utilize to gather response from door to door of the respondents. Besides it collected responses on paper-based questionnaire by incorporating five-point Likert scale. The data was analyzed by SmartPLS 4.0. The finding of the research shows that performance expectancy, effort expectancy and attitude positively impact on Uber adaptation intention. But safety experience was found insignificant. Additionally, uber adaptation intention has positively impact on actual uber adaptation behavior. Finally, this paper provides recommendation and practical implications.

Keywords: *Uber, Adaptation intention, Actual behavior, University, Bangladesh.*

1. Introduction:

Functioning in Bangladesh since 2016, the Uber company is a well-known example of the sharing economy. There seems to have a sharp increase in the adaptation of this app-based transportation service since Uber began operating in Dhaka. It is estimated that five million people use Uber in Bangladesh (Billah, 2022). Despite the growing popularity of sharing economies and the growing uptake of new technologies by travellers, not many research has looked at the factors influencing the use of the Uber smartphone application. Even though, it is anticipated that Bangladesh's ride-hailing industry will generate US\$92.64 million in revenue by 2024 (Statista, 2024).

The phrase "universal education" is not exclusive to developed nations; it is frequently utilised in underdeveloped nations. Bangladesh is a growing country that is making steady progress towards universal free education (Ahsan & Burnip, 2007). UNESCO focusses especially on general education, and the country has made numerous efforts to guarantee education for everyone in order to attain excellent education, which is an encompassing objective of the SDGs. In Bangladesh, 40.29% pupils with disabilities participate in different educational levels, according to the BBS. The Citizens with Disabilities Rights and Protection Act of 2013 in Bangladesh made education and accessibility available to citizen with impairments (Mamun et al., 2024). However, according to Mutanga (2017), just a considerable percentage of disabled people pursue postsecondary education, and those who do face several obstacles. One of the major obstacles is

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using public bus or university bus. Physically able people can easily use and take service from public transport. But it is difficult for unable person particularly students who are going to university every day and miss the scheduled bus facility due to physical shortcomings. Rosenbloom (2007) mentioned that people with challenges, transport policy is very significant. It is true that most people with impairments in the global community take private automobiles for their movement, he continued. However, Bangladeshi most of students do not have any private car and they are heavily relying on ride sharing industry. Therefore, students with disabilities in Bangladesh who are perusing higher education suffer in transportation problem (Rahman & Akthe, 2021). Statistics shows a quota of 15 physically disabled students are admitted annually at the Jahangirnagar University (Rahman & Akthe, 2021). According to Daily star about 79 students are staying in Dhaka University. For whom Uber is good solution that might pick and drop them properly from home to university. However, there is lack of study that examine the Uber adaptation behavior among physically disabled students in Bangladesh.

Globally the Uber adaptation behavior among students is studied by many researchers. Such as Goralzik et al. (2022) examined the opinions of impaired clients on these newly developed shared mobility services. It is recommended that inclusive reservation apps, travel data, and doorstep delivery be included in the ride-hailing service. Employing an extension of the unified theory of acceptance and use of technology model, Yu et al. (2023) looked into the major factors influencing university students' behavioral intention to share electric cars in China. They discovered that anxiety-free experience, private mindset, long-term viability and conditional value affecting behavioral intention along with the variables of UTAUT. Besides, the variables of extended UTAUT model such as effort expectancy, performance expectancy, social influence, tech-savviness, environmental consciousness and individual innovativeness found critical to adapt mobility service among university students (Kriswardhana & Esztergár-Kiss, 2024).

In Bangladesh, previous researches such as Bappy et al. (2020) discovered that the desire to adopt Uber is favourably influenced by performance expectations, effort expectations, attitude, price value, and trust in the company. Karim et al. (2020) examined passengers' behavioral intentions to accept commuter service applications in the city of Dhaka and found a significant insight. Islam & Hossain (2023) also examined users' intention to use ride sharing apps in Dhaka city. However, none of the previous study concern on the uber usage behavior of physically disabled students. The term "physical disabilities" refers to a wide range of ailments, such as problems with sensation and movement issues (Urbee et al., 2024). Since, 2.72% of students with disabilities have completed their HSC or are enrolled in university (Mamun et al., 2024). But no previous research in Bangladesh explored their Uber usage behavior. Therefore, this article seeks to investigate the antecedents of Uber adaptation behavior among physically disabled university students. To investigate the actual adaptation behavior of physically disable university students this paper blend UTAUT and TPB model and extended it with safety experience. For which we use effort expectancy and performance expectancy from UTAUT model. Additionally, we added attitude from TPB model and safety experience by studying previous literature to measure the behavioral intention of physically disable university students. Moreover, we will explore the actual uber adaptation behavior.

Since, from the global and domestic point of view there is dearth of study that investigated the Uber adaptation behavior among physically disable university students. Thus, this paper will contribute in several areas. Firstly, it will bring forth new insights regarding which factors are fostering uber adaptation behavior among Bangladeshi physically disabled university students. That will help the marketers and policy makers to introduce accessible infrastructure for the users. Secondly, we added safety experience in the model as disabled people need more safety while travelling. That aware the apps developer, marketers, drivers and policy makers to take initiative regarding safety and security of physically disable students. The main goal of the research is to examine the antecedents uber adaptation behavior among physically disabled

university students in Dhaka city. The specific objectives are firstly it will inspect how performance expectancy impact on Uber adaptation behavior among physically disabled university students. Secondly, it will look into how effort expectancy impact on Uber adaptation behavior among physically disabled university students. Thirdly, how attitude impact on Uber adaptation behavior among physically disabled university students. Fourthly, how safety experience impact on Uber adaptation behavior among physically disabled university students. Finally, how behavioral intention impact on actual Uber adaptation behavior among physically disabled university students.

The following sections are designed on based on the following sequences; chapter two reflects framework, hypotheses and theoretical foundation, chapter three reflects research methodology, chapter four reflects data analysis, then chapter five demonstrates discussion and implication. Final chapter shows conclusion and future research direction.

2. Theoretical foundation and hypotheses development

Figure 1 depicts the theoretical model used in this paper. Several theories pertaining to the adaptation of technology and information systems have been taken into consideration when including hidden concepts into this model. For example, concepts like "effort expectancy" and "performance expectancy" were taken from Unified Technology Acceptance and Use of Technology model (Venkatesh et al., 2003). The UTAUT model asserts that these two constructs can adequately forecast the desire of users to accept technology and their subsequent adaptation behaviors. In addition, this theory is supported by various earlier models, including "innovation and diffusion theory (Rogers, 1995) and Technology Acceptance model-TAM (Davis, 1989). The theory of planned behavior (TPB) contends that a person's intent and actual behavior can be guided by their attitude towards a behavior (Ajzen & Fishbein, 1988). This study has not taken into account constructs like social value from UTAUT or subjective norms from TBP because it has been shown that attitude can project intention more accurately than subjective norms (Sheeran & Orbell, 1999). Moreover, Reports of robberies, bullying, and violence on rides have surfaced (Chaudhry et al., 2018). As result this paper added safety experience as a variable to measure the safety of users while take the ride.

2.1 Performance expectancy (PE)

One of the prime components of the UTAUT analytical framework, Performance Expectancy (PE), denotes to the estate to which people agree that using a technology platform or information system would help them achieve their goals of carrying out specific tasks (Venkatesh et al., 2003). Conceptually, performance expectancy is the same as variables "perceived usefulness" (Davis, 1989). Because clients may call a car from anywhere and have it appeared in minutes, ride-sharing apps are considered as being very handy or high performing these days (Rahman & Zafar, 2018). Performance expectancy has been found to be positively and substantially linked to users' inclination to adopt technology, according to a number of recent research (Iqbal et al., 2024; Wang et al., 2012; Zhou et al., 2020). According to empirical data presented by Liang et al. (2018), higher performance expectancy can increase a person's propensity to embrace ride-hailing services. Yu et al. (2023) also found performance expectancy positive impact on share electric car adaptation intention among university students. Similarly, Kriswardhana & Esztergár-Kiss (2024) said the university graduate's acceptance of mobility service directly impact by performance expectancy. Depending on the evidence we suggest the following hypothesis

H1: *Higher PE with Uber, induces higher levels of Uber adaptation intention among physically disabled students in Bangladesh.*

2.2 Effort expectancy (EE)

Effort Expectancy (EE) measures how easy and free of anxiety one feels to use an idea or piece of apparatus (Venkatesh et al., 2012). According to theory, this element is the same as the idea of "perceived ease of use" (Davis, 1989). Nowadays, ride-sharing services in Bangladesh, like Uber,

Pathao, and O-Bhai, have become a quick and easy mode of transit for Dhaka city's commuters because of their accessibility, ease of navigation, readily downloadable apps, convenient payment methods, and short wait times when requesting a car (Bappy et al., 2018; Farhana, 2019). Numerous studies found relation between effort expectancy and Uber usage intention (Budu, 2020; Iqbal et al., 2024; Kriswardhana & Esztergár-Kiss, 2024). Moreover, Yu et al. (2023) explored that the university students are more inclined to use uber if there is a less anxiety and free of complexity. Therefore, authors found positive relation between effort expectancy and share electric car adaptation intention. So derived from the evidence we come up with the hypothesis:

H2: *Higher EE with Uber, induces higher levels of Uber adaptation intention among physically disabled students in Bangladesh.*

2.3 Attitude (ATT)

A person's affirmative or negative judgements, feelings, and inclinations regarding a certain behavior, item, or concept might be considered their attitude (Kotler et al., 2014). According to Rahman & Zafar (2018), a passenger's attitude towards utilising Uber in this study reflects their preference for, enjoyment from, contentment with, and propensity to adopt the platform. Previous research undertaken in various cultures and circumstances also shows that an individual's attitude towards behavioral intention (Cheah et al., 2023; Hasan, 2022). Moreover, favourable attitude increases the more intention ratio (Rahman & Zafar, 2018). Previous studies show there is positive relationship between attitude and intention to use ridesharing service and uber adaptation intention (Berndt et al., 2021; Cheah et al., 2023; Javid et al., 2022; Min et al., 2021). Particularly, Fu et al. (2022) investigated the attitude of university students towards shared mobility vehicles and found significant relation. Thus, physically special students may show favourable attitude if they find it enjoyable. Thus, we suggest the next hypothesis

H3: *Higher ATT with Uber, induces higher levels of Uber adaptation intention among physically disabled students in Bangladesh.*

2.4 Safety experience (SE)

Safety experience consists of favourable perception about ride sharing such as feelings of security while driving, safe from physical and sexual harassment, maintenance of hygiene, availability of features such as GPS tracking, driver verification, and the emergency button. In case of disable people is much more needed. Therefore, ride sharing company should ensure more convenient mode of transportation especially individual with disabilities (Gluck et al., 2020). The sharing a ride app ought to have a distress alert feature in case a rider is harassed or has safety concerns (Chaudhry et al., 2018). Besides, company should maintain hygiene such as clean and safe environment to safe passenger from diseases (Mims et al., 2022). Moreover, With Uber's GPS tracking feature, customers can instantly share your travelogue with loved ones (Chaudhry et al., 2018). Users will embrace ridesharing more readily as a result of their satisfaction with passenger safety (Gangadharaiah et al., 2023). Previous study revealed that safety has a linkage with trust that ultimately foster use behavioral intention of pooled rideshare (Gangadharaiah et al., 2023). Almoqbel & Wohn (2019) discovered that carriers participated in informal cooperative and communicative behaviors with other drivers both on and off of the ridesharing system, and that they depended on technological, social, and physical techniques to secure their safety. Moreover, Chaudhry et al. (2018) looked the safety measure of service receivers suggested that dash cams, distress alarm, indoor lights during dark time could enhance the user's intention to use ridesharing service. Thus, we propose the next hypothesis:

H4: *Higher SE with Uber, induces higher levels of Uber adaptation intention among physically disabled students in Bangladesh.*

2.5 Uber adaptation Intention (UAI) and Actual Uber adaptation behavior (AUAB)

The likelihood that someone will carry out a behavior is highly predicted by their willingness to do so (Ajzen & Fishbein, 1975; Davis, 1989; Venkatesh et al., 2003; Venkatesh et al., 2012).

Previous research has shown that, in the context of information systems, having an appealing desire to adopt technologies has a beneficial impact on actually adopting, purchasing, using, or accepting technology (Palau-Saumell et al., 2019; Venkatesh et al., 2012). Few studies examined the connection link Uber's intended use and its real adaptation actions (Bappy et al., 2020; Mynuddin, 2021; Soares et al., 2020). Previous studies examined the intention and use behavior of online taxi utilization (similar like Uber), and taxi hailing apps based on UTAUT model and found a significant relationship between intention and actual use (Fiska, 2019; Haba & Dastane, 2018). Ha et al. (2022) explored the continuance intention and use adaptation behavior and found intention has impact on adaptation behavior. As of researcher comprehension, there is a dearth of research that examined the relation between intention and actual behavior of Uber among physically disabled university students including Bangladesh. Therefore, we put forward the next hypothesis

H5: *Uber adaptation intention positively impact on actual adaptation behavior among physically disabled students in Bangladesh.*

2.6 Conceptual framework

The research model is designed based on the UTAUT, TPB and previous literatures review. The exogenous variables such as performance expectancy and effort expectancy are added form the user theory of acceptance and use of technology (UTAUT) model. Besides, attitude is assimilated with this model from theory of planned behavior (TPB). Additionally, safety experience is put in based on literature review because it is inevitable requirement for the disable students. The endogenous variables are uber adaptation intention and actual uber adaptation behavior.

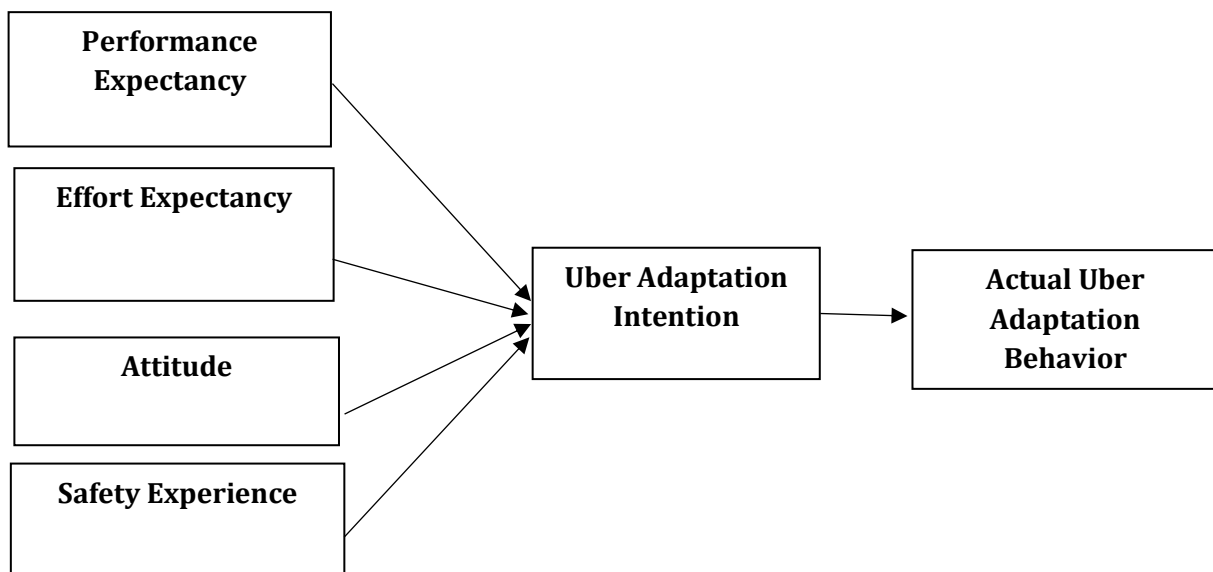


Figure 1: Research model (source: researchers own work)

3. Research Methodology

3.1 Research design and population of the study

To obtain data for the construction and resolution of various research problems, supportive methods are used in research design (Bell, Bryman, & Harley, 2022). This research is descriptive in nature and centres on quantitative data. The population of the study the physically disabled students of Dhaka city who use Uber regularly and occasionally to move from one place to another.

3.2 Data collection and Sampling technique

This paper is focus on the physically disabled university students reside in Dhaka city. To investigate our model, we use the purposive sampling technique because it selects sample based

on special characters. Since, employing the non-probability sampling method, academics may pick participants depending on their individual assessments (Saunders, 2009). The questionnaire was developed with two sections: demographic information and measurement items. Every section of questionnaire was adapted from past research studies and written in English. In compliance with the recommendations made by Mouakket (2015), pilot research with 20 participants was conducted to guarantee that each respondent understood the measuring items. Instead of online survey we went to door to door of the respondents and collect sample and preserve response on paper. Previous studies have not found any meaningful differences among surveys completed on paper and those conducted automatically (Dillman, 2011). We collect data from those respondents who use Uber by themselves or because of family. Besides, we collected a total of 100 responses for our study since June to August 2024. These students are studying in different public and private universities in Dhaka, Bangladesh.

3.3 Measurement scale and questionnaire

No data could be exchanged with any business. Response bias was still another important concern. The questionnaire was meticulously designed to prevent it. The questionnaire was designed with concise, intelligible questions. The study utilized a five-point Likert scale that ranges from 1 (strongly disagree) to 5 (strongly agree). A total of 21 items was formed with six variables (including exogenous and endogenous variables). The questionnaire of performance expectancy was developed and modified from (Iqbal et al., 2024; Venkatesh et al., 2003), effort expectancy was extracted from (Budunel, 2020; Venkatesh et al., 2003), Attitude was adopted from (Cheah et al., 2023; Hasan, 2022), Safety experience was adopted from (Gangadharaiyah et al., 2023), Uber adaptation intention redesigned from (Palau-Saumell et al., 2019; Venkatesh et al., 2003) and actual uber adaptation behavior was modified from (Bappy et al., 2020; Venkatesh et al., 2012).

3.4 Data analysis process

One of the well-known programs for partial least squares structural equation modelling is called SmartPLS (PLS-SEM) developed by (Ringle, 2005). The reliability of data, convergent validity, and discriminant validity and path coefficient of this paper would measure by SmartPLS 4.0 due of its sophisticated reporting capabilities and user-friendly design (Wong, 2013).

4. Data Analysis

4.1 Reliability of Data

Values for component reliability, convergent validity, and discriminating validity were assessed for establishing the suitability of study's measuring methodology (Hulland, 1999). Since social scientists frequently used Cronbach's alpha to verify internal uniformity as well as reliability, earlier research has preferred CR as a substitute. Convergent validity is then determined by analysing each construct's AVE (Bagozzi & Yi, 1988; Hair et al., 2012; Wong, 2013). Table 4.1 illustrates the dependability of the obtained data by showing that all Cronbach alpha and composite reliability values are above the suitable ranges of 0.70 and 0.80, correspondingly except the value of safety experience (F. Hair Jr et al., 2014). Besides, value of item's factor loading more than .60 is acceptable as well as the AVE must be at least 0.50 or more (Bagozzi & Yi, 1988). According to the given values, the result support the previous research. Where the range of Cronbach's alpha 0.772-0.903 (Cronbach's alpha > 0.70) for PE, EE, ATT, UAI, and AUAB except the value of safety experience (SE) of 0.530. Besides, the value of CR is range from 0.789 to 0.904 (CR>.70) for PE, EE, ATT, UAI, and AUAB except the value of safety experience at 0.530. Moreover, the lowest and highest value of AVE are respectively 0.362 and 0.782. Where the value SE (AVE=0.362) is not at acceptable range. So may conclude that each of the value is acceptable except SE.

Table 4.1: Measurement Model of Reliability and Validity of Data

Construct	Items	Loading	Cronbach's alpha	CR	AVE
Performance expectancy	PE1	0.675	0.790	0.792	0.616
	PE2	0.752			
	PE3	0.775			
	PE4	0.773			
Effort expectancy	PE1	0.675	0.772	0.789	0.597
	PE2	0.752			
	PE3	0.775			
	PE4	0.773			
Attitude	ATT1	0.883	0.903	0.904	0.775
	ATT2	0.904			
	ATT3	0.886			
	ATT4	0.849			
Safety experience	SE1	0.983	0.467	0.530	0.362
	SE2	0.217			
	SE3	0.270			
Uber adaptation intention	UAI1	0.854	0.880	0.863	0.782
	UAI2	0.917			
	UAI3	0.881			
Actual Uber adaptation behavior	AUAB1	0.809	0.784	0.831	0.694
	AUAB2	0.800			
	AUAB3	0.887			

Source: researchers own work based on SmartPLS output

4.2 *conversant Validity*

Factor loadings and average variance extracted (AVE) are appointed to verify the convergent validity. Table 4.1 reveals that every construct has an AVE value that surpasses 0.50 except SE. It validates the variable's convergent validity (Fornell & Larcker, 1981). Furthermore, all the different variable's item loadings (excluding SE2, SE3) are higher than 0.60, advocating convergent validity at the parameter level (Bagozzi & Yi, 1988).

4.3: *Discriminant Validity*

For a concept to be considered discriminant, it must be distinct from the other ones. The results additionally backed the discriminant validity of data, as table 4.2's square root of the AVEs surpasses the highest correlation between one construct and the other (Chin, 1998; Fornell & Larcker, 1981).

Table 4.2: Discriminant Validity (Fornell-Larcker criterion)

	SE	ATT	EE	PE	AUAB	UAI
SE	0.758					
ATT	0.690	0.769				
EE	0.757	0.531	0.792			
PE	0.665	0.685	0.556	0.775		
AUAB	0.667	0.722	0.518	0.754	0.880	
UAI	0.620	0.630	0.531	0.761	0.642	0.810

Source: researchers own work based on SmartPLS output

Note: AUAB = Actual Uber adaptation behavior, UAI= Uber adaptation intention, PE= Performance expectancy, EE= Effort expectancy, ATT= Attitude, SE= Safety experience.

4.4 *Structural model and Hypotheses testing*

The significance level for testing the hypothesis was $p < 0.05$ (Efron & Tibshirani, 1994). Employing t-statistics and path coefficient B, the association between the endogenous factors was

computed. The PLS results for the structural model are presented in Table 4.3. The results denotes the relationships among PE and UAI ($t= 2.559, B=.112, p<.05$), EE and UAI ($t= 2.156, B=.113, p<.05$), ATT and UAI ($t= 2.987, B=.532, p<.05$), and UAI and AUAB ($t= 12.832, B=.449, p<.05$). So, hypotheses (H1, H2, H3 and H5) of this study is supported. But the hypothesis(H4) is not accepted because the relation between SE and UAI ($t= 1.785, B=.449, p>.05$).

Table 4.3: Hypotheses testing and findings

Hypotheses	Effects	Path coefficient	Std. Deviation (STDEV)	T statistics (O/STDEV)	P values	Comments
H1	PE to UAI	0.112	0.061	2.559	0.015	Supported
H2	EE to UAI	0.113	0.079	2.156	0.039	Supported
H3	ATT to UAI	0.532	0.069	4.118	0.000	Supported
H4	SE to UAI	0.171	0.079	1.785	0.084	Not Supported
H5	UAI to AUAB	0.449	0.025	12.832	0.000	Supported

Source: researchers own work based on SmartPLS output

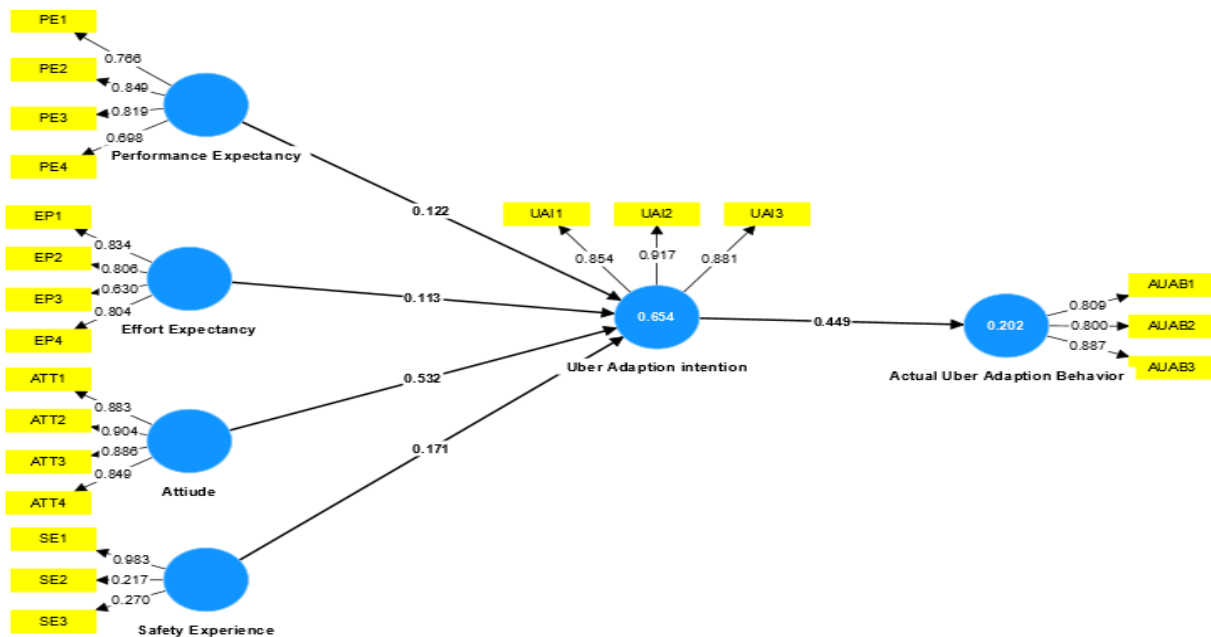


Figure 2: Structural model with path coefficient (source: SmartPLS 4.0 output)

5. Discussion and practical Implication

The results of this study verify that raising performance expectations might greatly boost the intent to use Uber. Findings is supporting the previous studies where performance expectancy positively impact on the use intention of ride sharing service such as Uber (Iqbal et al., 2024; Kriswardhana & Esztergár-Kiss, 2024; Yu et al., 2023). This suggests that people with disability are more likely to employ Uber's automobile services if they anticipate improvements in the company's mobility effectiveness, effectiveness, relaxation, and flexibility. Therefore, Uber could introduce wheelchair accessible vehicles, voice commands, trained drivers from special people as well as special discounts. Moreover, Uber should use social media campaign and advertainment to inform the market about their service and friendliness to physically disabled

people. Besides, this paper found positive correlation with effort expectancy and Uber use intention. Recent studies on ride-hailing services like Uber found effort expectancy significantly impact on consumers intention too (Budu, 2020; Yu et al., 2023). Practically speaking, a high degree of effort expectancy suggests that users with physical disabilities regard Uber's services and UI to be user-friendly, available, and handy, all of which support their intention to utilize the service more often. This emphasizes how crucial it is for Uber to create intuitive features and offer a seamless, effortlessly experience in order to increase its appeal to this demographic. To enhance the effort expectancy, Uber might offer in-app services like voice aid or live chat to users who are disable during the booking process or during a journey, making the app easy to use even in difficult circumstances. Moreover, Uber may allow people with physical disabilities to store their customised choices (such as the kind of vehicle they like or if they require assistance) so they won't have to enter them each time they order a service.

The study's findings further support the idea that respondent's willingness to embrace Uber is directly influenced by their attitudes about utilising it. The researchers think that this connection will motivate Uber's leadership to improve the passengers' optimistic outlook. Studies reveals that positive attitude foster the uber use intention among customers (Cheah et al., 2023; Fu et al., 2022; Javid et al., 2022). Uber must thus continue to provide services that meet international standards and guarantee commuters a tranquil and relaxing trip. Uber might start awareness campaigns that highlight its dedication to inclusiveness and the ways in which its services enable people with impairments to move around freely. Emphasising success stories from disabled consumers can improve perceptions of the business and foster a sense of trust. Give physically impaired consumers access to a specialised support system so that their issues can be resolved quickly and efficiently. Providing prompt, individualised service can increase client satisfaction and positive attitude.

On the contrary it is found that safety experience does not impact Uber adaptation intention. Though Gangadharaiah et al. (2023) said safety experience intensify the level of consumers trust that consequently augment the customers intention to use the ride sharing service. However, our paper finds negative correlation between safety experience and uber use intention. Therefore, Uber may improve safety by teaching its drivers about the unique requirements of physically challenged passengers, such as how to help them get into and out of cars securely. Handling wheelchairs and other aids for mobility correctly can significantly improve safety. Establishing priority or special pick-up zones in strategic Dhaka locations, like medical facilities, retail centres, and educational institutions, so that people with physical disabilities can wait for their rides in secure, accessible spaces. Additionally, Uber may provide a way for people with physical disabilities to comment on their safety experiences. This will help Uber make improvements to its services over time and quickly resolve any safety issues. Not only that Uber should advertise it so that others people come to know about it which will build trust among current and potential users.

Moreover, this paper found that intention is significant impact on actual use like previous studies of (Fiska, 2019; Ha et al., 2022; Haba & Dastane, 2018). Since intention and actual use are positively correlated, students with physical disabilities are increasing their freedom by removing obstacles to their mobility and making it easier for them to get to school, doctor's appointments, and social events. Additionally, it can strengthen favourable perceptions of technology, which promotes frequent use even more. By strengthening intention through satisfying experiences, this reinforcement establishes a positive feedback loop that eventually results in sustained adaptation. Likewise, by using Uber with fulfilment, students with physical disabilities promote inclusivity by inspiring other communities of handicapped people to consider ride-sharing services as a practical form of transportation.

6. Conclusions

This paper aims in predicting the Uber adaptation behavior among physically disable persons. The result of the study shows the strong relation between performance expectancy, effort expectancy and attitude on Uber adaptation intention. Besides safe experience found insignificant in this paper. Moreover, Uber use intention looks have positive impact on actual uber adaptation behavior. So, the result is remarkable insights for the Uber company, advertiser, brand manager and drivers on how to treat the physically disable students.

6.1 Limitations and future research directions

This paper is primarily predicted the Uber adaptation behavior among the physically disabled university students. However, it covered the Dhaka city area only, thus respondent from all over the country may bring new insights in future. Besides the number of respondents are standard but smaller enough. Thus, future research may collect more data from diversified institutions including the schools, colleges and technical and vocational institutions and so on to increase the respondents and get deep insight or behavioral aspect of students. Moreover, this paper only concern on Uber car service only and exclude the others services. Therefore, examining on others service might be examined such as taxi, bike sharing. We use the purposive sampling technique for this study. Further researcher may use probability sampling technique like stratified sampling technique could be utilized to explore the behavior. Moreover, moderating effect of age or family role may also be examined to strengthen the link between exogenous and endogenous variables. Furthermore, the future researcher may include price discount, collaborative partnership and targeted marketing into the model to get new insights. In conclusion, the authors firmly believe this research will encourage Uber Bangladesh and boost Uber adaptation behavior among physically disabled students.

Reference

- Ahsan, M. T., & Burnip, L. (2007). Inclusive education in Bangladesh. *Australasian Journal of Special Education, 31*(1), 61-71.
- Ajzen, I., & Fishbein, M. (1975). A Bayesian analysis of attribution processes. *Psychological Bulletin, 82*(2), 261.
- Ajzen, I., & Fishbein, M. (1988). Theory of reasoned action - Theory of planned behavior. University of South Florida, 2007, 67-98.
- Almoqbel, M. Y., & Wohn, D. Y. (2019). Individual and collaborative behaviors of rideshare drivers in protecting their safety. *Proceedings of the ACM on Human-Computer Interaction, 3*(CSCW), 1-21.
- Bagozzi, R. P., & Yi, Y. (1988). On the evaluation of structural equation models. *Journal of the Academy of Marketing Science, 16*, 74-94.
- Bappy, T. A., Haque, S., Bint Halim, S., & Hossain, M. N. (2020). Predicting passengers' Uber adoption behavior: Evidence from Bangladesh. *South Asian Journal of Marketing, 1*(1), 86-126.
- Bappy, T. A., Haque, S., & Halim, S. (2018). University students' shopping behavior for beauty soap brands in Bangladesh: A comparison of attitude toward foreign versus local brands. *Asian Journal of Management Sciences & Education, 7*.
- Berndt, A., Pretorius, A., & Blaauw, D. (2021). The intention of South Africans to engage in collaborative consumption: The case of Uber. *Acta Commercii - Independent Research Journal in the Management Sciences, 21*(1), 961.
- Billah, M. (2022). The commission we charge is fairly representative of the quality of service we provide: Uber Head, India & South Asia. *The Business Standard*. <https://www.tbsnews.net/features/panorama/commission>
- Budu, J. (2020). Disruptive technology adoption in developing countries: The case of Uber in Ghana. In *Handbook of research on managing information systems in developing economies* (pp. 51-69). IGI Global.

- Chaudhry, B., El-Amine, S., & Shakshuki, E. (2018). Passenger safety in ride-sharing services. *Procedia Computer Science, 130*, 1044-1050.
- Cheah, I., Shimul, A. S., Liang, J., & Phau, I. (2023). Consumer attitude and intention toward ridesharing. In *Relationship Marketing in Franchising and Retailing* (pp. 3-24). Routledge.
- Chin, W. W. (1998). The partial least squares approach to structural equation modeling. In *Modern methods for business research* (pp. 295-336).
- Davis, F. D. (1989). Perceived usefulness, perceived ease of use, and user acceptance of information technology. *MIS Quarterly, 13*(3), 319-340.
- Dillman, D. A. (2011). *Mail and Internet surveys: The tailored design method--2007 Update with new Internet, visual, and mixed-mode guide*. John Wiley & Sons.
- Efron, B., & Tibshirani, R. J. (1994). *An introduction to the bootstrap*. CRC Press.
- Ekman, P., & Friesen, W. V. (1978). *Manual for the facial action coding system*.
- Hair Jr, J. F., Sarstedt, M., Hopkins, L., & Kuppelwieser, V. G. (2014). Partial least squares structural equation modeling (PLS-SEM): An emerging tool in business research. *European Business Review, 26*(2), 106-121.
- Farhana, N. (2019). Factors affecting the holistic perception of Uber in Dhaka City transportation. *DIU Journal of Business Entrepreneurship, 12*(01), 42-49.
- Fiska, Y. (2019). Perceptions of online taxi utilization in Bandar Lampung using UTAUT model (Unified Theory of Acceptance and Use of Technology). *Journal of Physics: Conference Series, 1338*(1), 012059.
- Fornell, C., & Larcker, D. F. (1981). Evaluating structural equation models with unobservable variables and measurement error. *Journal of Marketing Research, 18*(1), 39-50.
- Fu, X., Nie, Q., Liu, J., Zhang, Z., & Jones, S. (2022). How do college students perceive future shared mobility with autonomous vehicles? A survey of the University of Alabama students. *International Journal of Transportation Science and Technology, 11*(2), 189-204.
- Gangadharaiah, R., Brooks, J. O., Rosopa, P. J., Su, H., Boor, L., Edgar, A., & Jia, Y. (2023). The development of the pooled rideshare acceptance model (PRAM). *Safety, 9*(3), 61.
- Gluck, A., Boateng, K., Huff Jr, E. W., & Brinkley, J. (2020). Putting older adults in the driver seat: Using user enactment to explore the design of a shared autonomous vehicle. In *12th International Conference on Automotive User Interfaces and Interactive Vehicular Applications* (pp. 291-300).
- Goralzik, A., König, A., Alčiauskaitė, L., & Hatzakis, T. (2022). Shared mobility services: An accessibility assessment from the perspective of people with disabilities. *European Transport Research Review, 14*(1), 34.
- Ha, M.-T., Nguyen, G.-D., Nguyen, M.-L., & Tran, A.-C. (2022). Understanding the influence of user adaptation on the continuance intention towards ride-hailing services: The perspective of management support. *Journal for Global Business Advancement, 15*(1), 39-62.
- Haba, H. F., & Dastane, D. O. (2018). An empirical investigation on taxi hailing mobile app adoption: A structural equation modelling. *Business Management and Strategy, 9*(2).
- Hair, J. F., Sarstedt, M., Ringle, C. M., & Mena, J. A. (2012). An assessment of the use of partial least squares structural equation modeling in marketing research. *Journal of the Academy of Marketing Science, 40*, 414-433.
- Hasan, A. A.-T. (2022). Technology attachment, e-attitude, perceived value, and behavioral intentions towards Uber-ridesharing services: The role of hedonic, utilitarian, epistemic, and symbolic value. *Journal of Contemporary Marketing and Science, 5*(3), 239-265.
- Hulland, J. (1999). Use of partial least squares (PLS) in strategic management research: A review of four recent studies. *Strategic Management Journal, 20*(2), 195-204.
- Iqbal, M. K., Ahmed, F., & Ali, A. (2024). Investigating factors impacting the use of ride-hailing service applications. *International Journal of Management Research and Emerging Sciences, 14*(3).
- Islam, M. T., & Hossain, M. T. (2023). Understanding the factors influencing customer's behaviours to choose ride-sharing apps: A case study in Dhaka city.

- Javid, M. A., Abdullah, M., & Ali, N. (2022). Travellers' perceptions about ride-hailing services in Lahore: An extension of the theory of planned behavior. *Asian Transport Studies, 8*, 100083.
- Karim, M. W., Muhibbullah, M., Ulfy, M. A., & Hossain, M. A. (2020). Examining the antecedents of using ride-hailing services: A study in Dhaka city of Bangladesh. *Asian Journal of Multidisciplinary Studies, 8*(7), 40-51.
- Kotler, P., Keller, K. L., Ancarani, F., & Costabile, M. (2014). *Marketing management* (14th ed.). Pearson.
- Kriswardhana, W., & Esztergár-Kiss, D. (2024). University students' adoption of mobility as a service with respect to user preferences and group differences. *Journal of Public Transportation, 26*, 100079.
- Liang, X., Jin, Y., & Jiang, J. (2018). Factors impacting consumers' sharing behavior under sharing economy: A UTAUT-based model.
- Mamun, H. A.-R., Rahman, M. M., Al-Amin, M., Erfan, M. M. U., Rahman, S., & Akter, R. (2024). Complications faced by disabled students at higher education institutions in Bangladesh: Observations from nondisabled students. *Open Journal of Social Sciences, 12*(4), 413-439.
- Mims, L., Gangadharaiyah, R., Brooks, J., Su, H. S., & Jia, Y. (2022). What makes passengers uncomfortable in vehicles today? An exploratory study of current factors that may influence acceptance of future autonomous vehicles. *SAE Technical Paper Series*.
- Min, S., So, K. K. F., & Jeong, M. (2021). Consumer adoption of the Uber mobile application: Insights from diffusion of innovation theory and technology acceptance model. In *Future of Tourism Marketing* (pp. 2-15). Routledge.
- Mouakket, S. (2015). Factors influencing continuance intention to use social network sites: The Facebook case. *Computers in Human Behavior, 53*, 102-110.
- Mutanga, O. (2017). Students with disabilities' experience in South African higher education: A synthesis of literature. *South African Journal of Higher Education, 31*(1), 135-154.
- Mynuddin, M. (2021). A study on the adoption intention factors of mobile commerce applying UTAUT model. *Journal of Business Studies, 91*.
- Palau-Saumell, R., Forgas-Coll, S., Sánchez-García, J., & Robres, E. (2019). User acceptance of mobile apps for restaurants: An expanded and extended UTAUT-2. *Sustainability, 11*(4), 1210.
- Rahman, A., & Akthe, F. (2021). Condition of inclusivity in public university of Bangladesh specifically for the disabled student: A case study on Jahangirnagar University. *International Journal of Social Science Human Research, 4*, 313-325.
- Rahman, U. H. F. B., & Zafar, M. K. (2018). Factors influencing adoption of Uber in Bangladesh and Pakistan. NTNU.
- Ringle, C. (2005). *SmartPLS 2.0 (M3)*. University of Hamburg.
- Rogers, E. M. (1995). Diffusion of innovations: Modifications of a model for telecommunications. In *Die diffusion von innovationen in der telekommunikation* (pp. 25-38).
- Rosenbloom, S. (2007). Transportation patterns and problems of people with disabilities. In *The future of disability in America* (pp. 519-560).
- Saunders, M. (2009). *Research methods for business students*. Pearson Education Limited.
- Sheeran, P., & Orbell, S. (1999). Implementation intentions and repeated behaviour: Augmenting the predictive validity of the theory of planned behaviour. *European Journal of Social Psychology, 29*(2-3), 349-369.
- Soares, J. L., Christino, J. M. M., Gosling, M. D. S., Vera, L. A. R., & Cardozo, É. A. A. (2020). Acceptance and use of e-hailing technology: A study of Uber based on the UTAUT2 model. *International Journal of Business Information Systems, 34*(4), 512-535.
- Statista. (2024). Ride-hailing - Bangladesh. <https://www.statista.com/outlook/mmo/shared-mobility/ride-hailing/bangladesh>
- Urbee, A. J., Ridwan, M., & Raihan, A. (2024). Exploring educational attainment among individuals with physical disabilities: A case study in Bangladesh. *Journal of Integrated Social Sciences and Humanities*.

- Venkatesh, V., Morris, M. G., Davis, G. B., & Davis, F. D. (2003). User acceptance of information technology: Toward a unified view. *MIS Quarterly*, 425-478.
- Venkatesh, V., Thong, J. Y., & Xu, X. (2012). Consumer acceptance and use of information technology: Extending the unified theory of acceptance and use of technology. *MIS Quarterly*, 157-178.
- Wang, Y.-S., Wu, S.-C., Lin, H.-H., Wang, Y.-M., & He, T.-R. (2012). Determinants of user adoption of web "Automatic Teller Machines": An integrated model of "Transaction Cost Theory" and "Innovation Diffusion Theory". *The Service Industries Journal*, 32(9), 1505-1525.
- Wong, K. K.-K. (2013). Partial least squares structural equation modeling (PLS-SEM) techniques using SmartPLS. *Marketing Bulletin*, 24(1), 1-32.
- Yu, T., Zhang, Y., Teoh, A. P., Wang, A., & Wang, C. (2023). Factors influencing university students' behavioral intention to use electric car-sharing services in Guangzhou, China. *SAGE Open*, 13(4), 21582440231210551.
- Zhou, M., Zhao, L., Kong, N., Campy, K. S., Xu, G., Zhu, G., & Wang, S. (2020). Understanding consumers' behavior to adopt self-service parcel services for last-mile delivery. *Journal of Retailing and Consumer Services*, 52, 101911.

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