

THOUGHT LEADERSHIP ARTICLE



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A Closer Look at the Sharing Economy, Global Ridesharing, and Ridesharing in Bangladesh

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INTRODUCTION

The act of sharing an underutilized product or service among friends, family, or strangers have existed throughout history. However, sharing enabled by a technology-based platform has its roots in modern day computing devices, driven by the internet. A slightly older example of a technology-enabled sharing service is Napster, when in 1999, Napster facilitated the sharing of digital music among users as a form of peer-to-peer (P2P) file sharing¹.

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Technology-based sharing activities have evolved considerably over time. Start-up companies using web-based platforms accessible with mobile applications, have opened up a brave new world of sharing-based businesses and consequently, a "sharing economy". Although there is some definitional ambiguity among researchers in this area, a useful conceptualization is that a sharing economy is one in which consumers grant each other temporary access to under-utilized assets, often in exchange for payment.²

Sharing economy services are myriad with respect to sectors they encompass, from pet-sitting (e.g. DogVacay) to parking-space sharing (e.g. JustPark). However, some of the major categories of sharing economy services are peer-to-peer lending, crowdfunding, accommodation sharing, co-working, ridesharing, knowledge/talent sharing (online distant work)³ and so forth.

It can be safely said that sharing economy services have already disrupted several industries and according to analysts, the growth potential of the sharing economy is





rather compelling. According to PricewaterhouseCoopers (PwC), global revenues from just five sectors of the sharing economy (crowdfunding, online distant work, P2P accommodation sharing, ridesharing and online music/video streaming) will increase 2133% between 2015 and 2025, from \$15 billion to \$335 billion.⁴ The sharing economy has also broken several social taboos, as on an average, every night, 2.0 million people are sleeping on the bed of a total stranger (over 500 million have done it already, through Airbnb⁵.

Given the disruptive nature of sharing economy services, both with respect to business models as well as cultural norms, controversies have followed in some cases. Meanwhile, regulators, globally, have struggled to keep up with the innovative business models on offer. There have also been safety concerns arising from situations of total strangers transacting after being connected by the internet. Last but not least, there has also been pushback from traditional sectors against sharing economy companies. For instance, recently, 10 major European city governments have requested the European Union (EU) to regulate Airbnb in the fight against the worsening housing crisis faced by their city dwellers.⁶ There are also high-profile cases of startup failures, even for Unicorns that have dropped significant equity value.⁷ Therefore, it should come as no surprise, that sharing economy services consistently grab headlines.

In light of the global as well as local attention on sharing economy services, this ______ Center for Enterprise & Society (CES) white paper takes a closer look at the sharing Page | 2 economy globally and in Bangladesh, with a specific focus on the ridesharing sector. This paper is based on secondary research and in-depth interviews with stakeholders in ridesharing companies, investors, incubators, and so on.

A SNAPSHOT OF GLOBAL RIDESHARING

In their simplest form, ridesharing services connect drivers with people looking for rides. The app or platform that enables this network, calculates real-time demand/supply data, traffic data, as well as distance, in order to determine the cost of the ride which then allows a driver and a rider to transact.

Ridesharing is arguably the most talked-about of all sharing economy services. Despite recent skepticism about its long-term profitability, analyst forecasts suggest ridesharing services will continue to claim a bigger slice from the transportation pie globally. From 2018 to 2025, the ridesharing market size is expected to grow from around \$61 billion to \$218 billion and likely to reach \$285 billion annually by 2030. Furthermore, ridesharing services are expected to add almost 100 million users globally in the next 3 years.⁸ The North American region represents the largest





ridesharing market at present, while the Asia Pacific region constitutes the fastest growing.⁹

The ridesharing industry has witnessed entries and exits of start-up companies within a very short time. Uber is the poster child of ridesharing services. The industry has also seen the rise of giants such as Ola in India; Lyft in the US; Grab in Malaysia; Carpooling.com in Germany; Gojek in Indonesia; Didi in China; and so on. Many automotive corporate giants are also investing in in-house ridesharing services (e.g. BMW's DriveNow). The industry has also seen fierce competition, resulting in takeovers and exits. In China, Didi's dominance forced Uber to sell its Southeast Asian businesses to Grab in 2018. However, an unexpected winner from ridesharing battles is Japan's Softbank, which holds considerable equity positions in Uber, Ola, Grab, Didi, and Brazil's 99.¹⁰ The following map (Fig 1) situates the major players in ridesharing in their respective geographies.

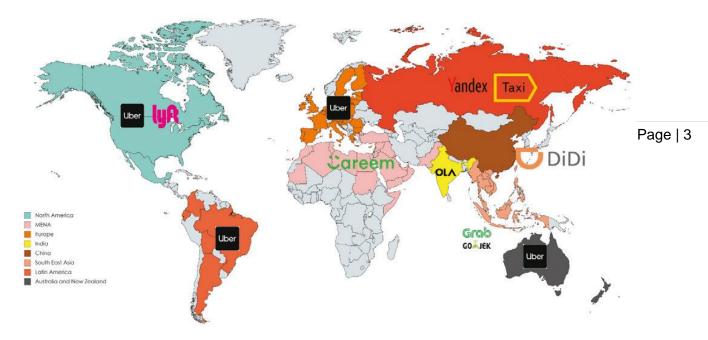


Fig 1: Major Ridesharing Players by Geography

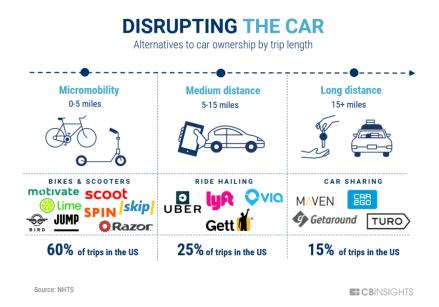
Source: Sector Report, DBS Group Research, 2019

There is a way to categorize ridesharing services further on the basis of different sets of criteria. One such way is to do it by trip distance, as respective share of total trips. (Fig 2)





Fig 2: Classification of Ridesharing Services by Trip Distance



Source: CB Insights, 2018

There are other classifications possible which consider how the service provider and the consumer interface, e.g., whether consumers have to pick up a car from one location and drop it there; or whether they connect person-to-person; or whether they use an app to find a driver, etc. (Fig 3).

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Fig 3: Global Ridesharing Classification							
	Car Sharing 1.0 Station Based		 Early Model of car sharing where vehicles are picked up and returned to the same location; typically through an hourly rental 				
	Car Sharing 2.0 One-to-Many	DriveNow	 Second generation of car sharing where vehicles can be picked up and dropped off in different locations (possibly by zone vs. designated parking spots); typically charged by minute 				
	Car Sharing 3.0 P2P	RelayRides	 Peer-to-peer sharing where individuals can rent out their personal vehicles to others when not in use 				
	Ridehailing	lyR 🕤	 Platform where individuals can hail and pay for a ride from a professional or part-time driver through an app 				
	Shared Ridehailing	BlaBlaCar	 Ridehailing extension where individuals can be matched in real-time to share rides with others going on a similar route 				
	Microtransit	V NQ	 App and technology-enabled shuttle services, typically in a van-size vehicle; some with dynamic routing, others with semi-fixed routes 				
Source: InfrastructureUSA, 2017							

Fig 3: Global Ridesharing Classification





Uber and Lyft typify ridehailing companies but differ significantly from Getaround, which typifies P2P Car Sharing 3.0. For Uber or Lyft, the owner of the car drives the car (or hires a fourth-party driver) and provides the ride as service to the customer. Conversely, in Getaround, the customer takes the car from the owner and drives the car himself/herself. Meanwhile, BlaBlaCar, a shared ridehailing service, differs significantly from Uber and Getaround. Using BlaBlaCar, multiple strangers with same intended destination can request for a ride to a single car owner, if the latter's intended destination is the same as the others. Often the owner and the ride originator will publish his/her destination and price per seat on the platform.

There are also significant differences between Zipcar (marked as Car Sharing 1.0) and DriveNow (marked as Car Sharing 2.0). Zipcar is based on a subscription model and additionally, pay per ride, which is determined by the model of the car booked, duration, and mileage. Moreover, Zipcar requires the customer to return the car to the same station from which the car was taken. DriveNow does not require a subscription and uses the cost-per-minute-driven model. The base cost varies with the model of the car booked. Unlike Zipcar, DriveNow allows the customer to leave the car at any DriveNow Zone. The bicycle sharing services available in cities mostly follow the same operational model as DriveNow, meaning the cycles are returned to any designated station.

RIDESHARING IN BANGLADESH

In Bangladesh, Dhaka has its share of startups offering ridesharing services. High traffic congestion and high internet penetration rate¹¹ have helped the business case of Dhaka-based startups. Since July 2019, when licenses were beginning to be given out to ridesharing companies, 10 companies have obtained a license: Pickme Limited, Pathao, OBHAI, Chaldal, Computer Systems, Akash Technology, Ezzyr Technologies Limited, Segesta Limited, Shohoz Limited and Uber Bangladesh Limited. The top 3 players are Uber, Shohoz and Pathao. There has already been widespread adoption of app-based ridesharing by Dhaka dwellers. It is estimated that ridesharing is already a \$260 million industry (BDT 2200 crore), comprising 23% of the transportation sector.¹² According to January 2019 data, users took 6.0 million rides each month, on an average, from ridesharing services.¹³ However, experts suggest that the number is at least 7.5 million rides per month, at present. For an industry that is still at its early stage, this is clear evidence of massive uptake and growth of ridesharing services.

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DRIVERS OF GROWTH

It is evident that ridesharing services provide users with certain benefits not offered by mainstream transportation services. Dhaka is one of the most densely populated cities in the world, with considerable demand for efficient, reliable, and safe public transport from middle-class citizens since car ownership is an expensive proposition. For them, three-wheeler auto-rickshaws or "CNGs" as they are termed in local parlance, have been popular. However, CNGs have exploited the elasticity of demand for transportation by middle class users, by charging high fares and refusing to go to places that appear unprofitable.¹⁴ Meanwhile, regular cabs charged exorbitant fares in Dhaka, often comparable to fares in more developed cities, leading to this sector not growing at all. App-based ridesharing services have disrupted the sector and provided commuters with ease of finding a transport, pick-up at doorstep, and app-based fare estimation prior to taking a ride, thus obviating pains of haggling.

Dhaka also has notoriously bad traffic. According to a World Bank report, traffic jam wastes 3.2 million work hours per day in Dhaka, which comes to about 660 million work hours per year, to say nothing of the mental and emotional impact of traffic on its citizens. Meanwhile, the average traffic speed in Dhaka is comparable to average walking speeds.¹⁵ Motorbike-based ridesharing services have addressed this issue by being able to circumvent traffic-related challenges.

There are also economic gains for the transacting parties, of course, i.e., the driver Page | 6 and the rider, and the broker, i.e., the app-based platform. It is estimated that carbased ridesharing services entails a lower commuting cost per month for users, compared to the cost of owning a car, using it, and maintaining it. Meanwhile, motorbike-based ridesharing services have been proven to be less expensive than the CNG auto-rickshaws.¹⁶ Motorbike sales are continuing to grow, with year-on-year growth surpassing 40%, driven by the popularity of ridesharing services. These services have also created employment opportunities, even if partially, for thousands. It is estimated that around 200,000 drivers are currently registered under only one ridesharing platform.¹⁷





MARKET DYNAMICS AND ESTIMATIONS

In contrast to western cities in which car-based ridesharing services have grown, Dhaka has seen the boom of motorbike-based ridesharing services. This has been true for other Asian cities as well, namely, Jakarta. Uber Moto, Pathao, and Shohoz all have had early successes in motorbike-based ridesharing services. Purely, in terms of motorbike rides, according to industry insiders, about 200,000 rides are completed every day, across all the major platforms.

Each of these platforms have different strengths. Uber is considered to have the best technology as well as training for drivers; Pathao the most recognizable brand identity and early successes; and Shohoz, the newest entrant with the largest single fundraising round among local startups, and perhaps, the most diversified position across business verticals. Shohoz is a strong player in verticals such as ticket sales and logistics, which are both high-growth sectors. OBHAI provides motorbike and car sharing services and it has ventured further by incorporating CNG auto-rickshaws in their service offerings. Additionally, Jobike, a last mile bicycle-sharing service, first of its kind in Bangladesh, has begun operations earlier this year. Although, the car-based ridesharing sector has a clear market leader in Uber; motorbike-based ridesharing is highly competitive.

Uber's strengths, whether financial, operational or technological, largely comes from its parent company. Industry experts also posit that Bangladeshi ridesharing Page | 7 companies, Shohoz and Pathao will start enjoying similar advantages in the coming years. Pathao has raised \$10 million in funding in 2018 from the investors led by regional ridesharing heavyweight Gojek. Shohoz has raised \$15 million in funding from investors led by Singapore-based Golden Gate Venture. In order to optimally use the driver networks, major ridesharing services are looking to build up their other service verticals, as noted earlier, and there is now increasing competition in the on-demand food delivery space.

In fact, on-demand food delivery is shaping up as the next standalone sector for ridesharing companies given that a gradual behavioral change is expected to take place as more and more people opt to eat-in and use apps to order-in food. This will be fueled by decreasing delivery times, and other incentives food delivery platforms can offer. In this space, Uber Eats, Shohoz Food, and Pathao Food compete not only with each other but also established platforms like Foodpanda Bangladesh, which is the dominant market leader in this space. Foodpanda has solidified its market position by investing in its tech as well as its driver network, on the back of a recent fundraising round.





However, the real fillip for ridesharing companies and justification behind their successful fundraising rounds (and in some cases, indiscriminate attempts at growing too fast), lies in the growth prospects of the various verticals in which they operate. Interviews with ridesharing company executives, investors, economists, and startup ecosystem researchers suggest that there is tremendous growth to be had, in the next five years (Fig 4).

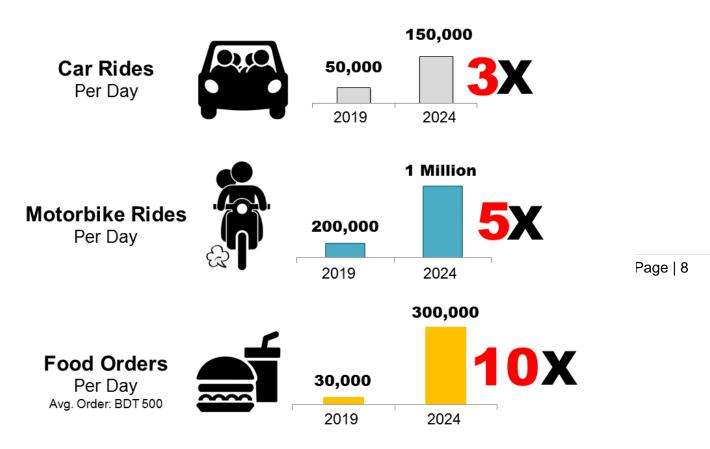


Fig 4: Current and Forecasted Market Size

Overall, the estimated market valuation for the ridesharing startups, all business verticals combined, based on individual interviews, is \$300 million at present. This is expected to reach \$1.0 billion in 5-7 years, although certain insiders suggest that this will happen sooner.





POTENTIAL SHIFTS IN BUSINESS MODELS

Despite early and projected successes of ridesharing, there are growing concerns about the impact of these ridesharing services on a city like Dhaka which is already densely congested.¹⁸ The year-on-year 40% growth in motorbike sales will contribute to traffic congestion, guite clearly. As a remedy to this situation, there is increasing talk about transitioning from high-frequency ridesharing (e.g. single passenger on a vehicle) to high-occupancy ridesharing (multiple passengers with same intended destination on a single vehicle). Interviews with industry experts reveal that at least three ridesharing services are at the pilot stage with this service model. There is Jatri, a bus-sharing service, which will facilitate ticket and seat booking through apps for commuters of the same route and also allow real-time tracking of the bus's location as well as boarding the bus from specific stops. There is also an app-based service called Buddy, which will enable commuters of the same route to instantly share rides with each other on a single car. Meanwhile, there is a startup called Shuttle which also operates on the high-occupancy app-based ridesharing model, focusing exclusively on female commuters. All three are at an early stage. So, how can we categorize all the ridesharing services discussed? Using the classification method discussed earlier, below is model for Bangladeshi startups (Fig 5):

Ride Sharing 1.0 Station Based		 Early Model of car sharing where vehicles are picked up and returned to the same location; typically through an hourly rental 	Page 9
Ride Sharing 2.0 One-to-Many	Jøbike	 Second generation of car sharing where vehicles can be picked up and dropped off in different locations (possibly by zone vs. designated parking spots); typically charged by minute 	
Ride Sharing 3.0 P2P		 Peer-to-peer sharing where individuals can rent out their personal vehicles to others when not in use 	
Ridehailing	Dethão OBHAI UBER sh@hoz	 Platform where individuals can hail and pay for a ride from a professional or part-time driver through an app 	
Shared Ridehailing		 Extension where individuals can be matched in real-time to share rides with others going on a similar route 	
Microtransit		 App and technology-enabled shuttle services, typically in a van-size vehicle; some with dynamic routing, others with semi-fixed routes 	

Fig 5: Classification of Local Ridesharing Services





According to this classification, all major ridesharing players, i.e., Uber, Pathao, Shohoz, and OBHAI operate in the Ridehailing category. The services operating on high-occupancy ridesharing model (Jatri, Buddy, and Shuttle) are categorized as Shared Ridehailing. Only Jobike in Bangladesh is present in the Ridesharing 2.0 which facilitates picking up the bike from one place and dropping off another place. Classifying the services according to these method reveals that there is no service yet that operates on Ridesharing 1.0 (e.g. Zipcar), Ridesharing 3.0 (e.g. Getaround), or Microtransit (e.g. Via). It is worth considering the market opportunities for these categories of sharing services in the context of Bangladesh, with a view towards building this sector further.

MAJOR CHALLENGES

Ridesharing services have had to take the good with the bad: the good being investor funds. access to talent relative to other startup sectors in Bangladesh, extraordinary publicity, etc.; and the bad being regulatory scrutiny and skepticism, unhealthy competition, and in some cases, difficult questions about the sustainability of the ridesharing business model. Globally, share prices of ridesharing powerhouses have fallen this year, sparking serious introspection about the sustainability of the business model. Uber experienced a world-record first-day loss since 1975, after it went public in May 2019.¹⁹ In fact, Uber and Lyft's performance in the capital markets over the last several months, have seriously cast doubts in the minds of investors in ridesharing Page | 10 companies in other geographies. In Bangladesh, the ridesharing star Pathao has had challenges to do with investors backing out from expected funding rounds.²⁰ Consequently, the start-up reportedly valued at \$100 million had to undergo significant downsizing of large numbers of mid- to top-level employees, as per newspaper reports and interviews with industry insiders.²¹ Although this may not have long-term consequences on either the success of other ridesharing players or the startup ecosystem, it did call into question the quality of business leadership available at the helm of startups in Bangladesh.

Then there are challenges globally that ought to be considered in the case of Bangladesh as well. Ensuring that passengers or users stick with one platform has been a critical challenge for global platforms. Churn is rife since switching between services is merely a matter of switching between apps. To counter this, companies compete on promo-code driven strategies for customer acquisition and retention. However, the promo-code driven growth strategy has proved to be detrimental for ridesharing services in several geographies. Uber's promo-code driven growth strategy has been regarded as a failed strategy in Indonesia.²² Heavy investments in promotions, intended to acquire larger and larger market shares, increase valuations,

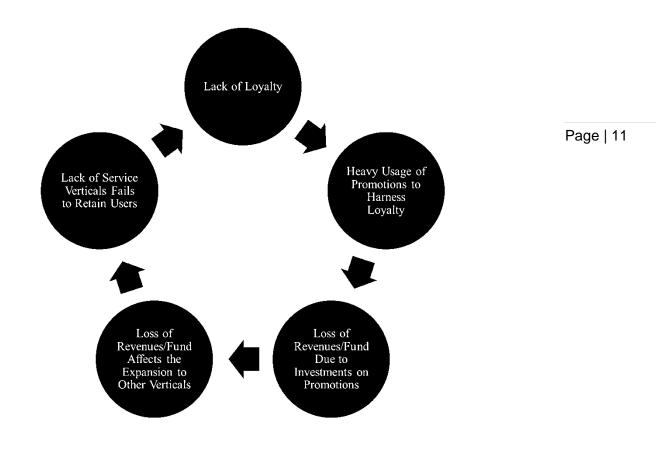




and subsequently, more investor funds, have not quite worked out in many cases. Another popular strategy has been to expand into other service verticals and thus get more users on-board (e.g. food, logistics), but balancing different strategies can drain investor funds too quickly.

According to our research, platforms need to have multiple service verticals to harness the loyalty among the users, since creating a brand loyalty by making users spend considerable amount of time on the apps is more difficult for app-based services, unlike Facebook, Instagram, or even Amazon.²³ Hence, services may find themselves in a vicious loop of lack of loyalty of users, promo-code driven short-term incentives to harness that loyalty, loss of revenue due to the heavy investment in promotions, and inability to sufficiently expand to other service verticals resulting from the loss of revenue or the depletion of funds (Fig 6).









Another problem specific to sharing economy services is that of disintermediation.²⁴ In the context of ridesharing, this is when users and service providers agree to transact bypassing the platform that is intended to connect them. Disintermediation has caused revenue loss for various sharing economy platforms. Disintermediation is also a problem in Bangladesh, and in some cases, led to grave consequences, for which no corporate entity could be held liable. This was particularly true for a recent murder of a ridesharing driver, who picked up a passenger outside the platform.²⁵ Harassment of women passengers is also a worry for many users and disintermediation leaves platforms and its users particularly vulnerable since drivers are not accountable to anyone but the fee-paying customer. An increasingly common visual is that of riders wearing platform-branded safety helmets waiting to be approached by users at particular points in the city. This needs to be regulated as it has safety consequences for the platforms.

SUSTAINABILITY AND POLICY DIRECTIONS

In order to harness loyalty, platforms need a deeper understanding of users. Platforms are increasingly focusing on data analytics to understand and predict the behavior of the users. While predictive analyses are undoubtedly useful to nurture users, platforms also need to engage in empirical research, refine their knowledge about users, and customize the user experience on the app and outside the app, accordingly.

Platforms need to step up and provide more reasons to users to continue to transact on their platforms. It is important that customers recognize and even identify with the brand of a platform, but to this end, marquee advertising and indiscriminate marketing spend may not be the right answers. There is value in understanding how to get customers to spend more time on the app, in order to create the kind of brand loyalty that brick-and-mortar service providers enjoy.

At the policy level, the rising number of ridesharing services²⁷ poses threats such as increasing congestion to the already densely inhabited cities. Shifting from the existing





high-frequency ridesharing model to a high-occupancy can have positive impact on both commuters and city-dwellers. The classification of ridesharing services in Bangladesh reveals that there are at least three categories of ridesharing services and most are operating using the high-frequency ridesharing model. Customers stand to benefit greatly from high-occupancy-based model as well, and to this end, the government can consider providing policy direction or incentives.

Globally, bike-sharing services have been incentivized and encouraged due to evident health, ecological, and traffic-related benefits. Currently, Jobike is the only service that facilitates bike sharing. Expanding bike sharing in cities like Dhaka may seem difficult because of the lack of dedicated bike lanes. Dhaka North City Corporation (DNCC) has recently unveiled a 9-kilometer bike lane²⁸ which is believed to be the first of its kind. City corporations should undertake initiatives to create more bike lanes in the cities, which can, in turn, encourage entrepreneurs in building more bike sharing services.

Meanwhile, there are pending debates to be settled regarding aspects of the Ride Sharing Services Policy 2017. Car owners/service providers differ with ridesharing platforms on the issue of allowing each car to be registered with only one platform, saying it goes against the spirit of entrepreneurship. The draft policy as it stands prescribes that a car has to be more than a year old but does not say much on its maximum age. This needs to be addressed. There is also a growing number of motorbikes in the city and it makes sense to design a mechanism of progressive tax Page | 13 for ridesharing companies that have fleets that have been deemed large enough to significantly contribute to the city's traffic.

Other industry insiders have opined that a crucial issue to explore is the future of the relationship between platform and driver. Currently, ridesharing companies treat drivers as third-party contractors, not providing the latter the benefits and protection of employees, and also by extension, not taking accountability for the actions of the thirdparty contractors to the degree that they might have, had the drivers been the platform's employees. Of course, this platform-based sharing services model thrives on the contractor model which keeps costs of the platform-based business low. But the risks that emerge from this ambiguous relationship with drivers, be it harm to riders by drivers, accidents, or harm to the drivers themselves, are not sufficiently mitigated in the existing operating model. These risks are the heart of the most recent ban of Uber in London.²⁹

There is also the concern that as some of these platforms branch away from ridesharing into food delivery, logistics, fintech, and even e-commerce, as have been contemplated and even piloted by local ridesharing companies, how does the regulator define them? Should they continue to be defined as transportation companies? If so,





can they use user data they obtain from ridesharing to build up their food delivery business? What about tax implications? Last but not least, there are views that it is too early to regulate sharing startups, if we are to seriously build up this startup space, and enable them to drive value creation, growth, innovation and employment. These are all questions and views worth considering, but what is for certain is that digital transformation of various sectors is inevitable, and the time is high for more research and policy dialogues in this space.

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Notes

¹ Belk, R. (2014). You are what you can access: Sharing and collaborative consumption onlin	ne. Journal of
Business Research, 67(8), 1595-1600.	

³ Martucci, M. (2019). What Is the Sharing Economy – Example Companies, Definition, Pros & Cons. Retrieved July 2019, from https://www.moneycrashers.com/sharing-economy/

⁴ PricewaterhouseCoopers LLP. (2015). The Sharing Economy. Retrieved August 2019, from https://www.pwc.fr/fr/assets/files/pdf/2015/05/pwc_etude_sharing_economy.pdf

⁵ Airbnb, Inc. (2019). Airbnb Newsroom. Retrieved September 2019, from Airbnb Website: <u>https://news.airbnb.com/fast-facts/</u>

⁶ Henley, J. (2019, June 20). Ten cities ask EU for help to fight Airbnb expansion. Retrieved August 2019, from The Guardian: <u>https://www.theguardian.com/cities/2019/jun/20/ten-cities-ask-eu-for-help-to-fight-airbnb-expansion</u> ⁷ Monico, P. P. (2019, Sontember 5). Uber and Luft both bit all time laws and continue to struggle sizes their

⁷ Monica, P. R. (2019, September 5). Uber and Lyft both hit all-time lows and continue to struggle since their IPOs. Retrieved September 2019, from CNN Business: <u>https://edition.cnn.com/2019/09/04/investing/uber-lyft-ipo-market/index.html</u>

⁸ Wang, B. (2017, October 27). Worldwide ridesharing at \$285 billion per year by 2030 will be profitable when self driving. Retrieved August 2019, from New big future Inc.:

https://www.nextbigfuture.com/2017/10/worldwide-ridesharing-at-285-billion-per-year-by-2030-will-be-profitable-when-self-driving.html

⁹ Mordor Intelligence. (2019). Ridesharing market - growth, trends, and forecast (2019 - 2024). Retrieved 2019, from <u>https://www.mordorintelligence.com/industry-reports/ridesharing-market</u>

¹⁰ Davis, J. (2018, September 19). The Real Story Behind Uber's Exit from Southeast Asia. Retrieved August 2019, from INSEAD Knowledge: <u>https://knowledge.insead.edu/entrepreneurship/the-real-story-behind-ubers-exit-from-southeast-asia-10096</u>
 ¹¹ Kamal S. M. & Absan N. A. (2018, April 27). "Illege Betheviet is the device of the story of t

¹¹ Kamal, S. M., & Ahsan, N. A. (2018, April 27). 'Uber-Pathao' ride-share's impact on Dhaka. Retrieved August 2019, from The Financial Express: <u>https://thefinancialexpress.com.bd/views/uber-pathao-ride-shares-impact-on-dhaka-1524842540</u>

¹² Rahman, R. (2019, September 27). Motorbike ride-sharing alleviates Dhaka traffic chaos. Retrieved September 2019, from Reuters: <u>https://www.reuters.com/article/us-bangladesh-ridesharing/motorbike-ride-sharing-a-panacea-for-dhaka-traffic-chaos-idUSKBN1WC098</u>

¹³ Kader, R. (2019, January 27). Intelligence Brief: The Ride-hailing Market Updates. Retrieved August 2019, from Future Startup: <u>https://futurestartup.com/2019/01/27/the-ride-hailing-market-updates-2019/</u>

¹⁴ IDLC Finance Limited. (2017). Ride- Sharing in Bangladesh : Disrupting the way we commute. Retrieved 2019, from <u>https://idlc.com/mbr/article.php?id=125</u>

¹⁵ Rahman, R. (2019, September 27). Motorbike ride-sharing alleviates Dhaka traffic chaos. Retrieved September 2019, from Reuters: <u>https://www.reuters.com/article/us-bangladesh-ridesharing/motorbike-ride-sharing-a-panacea-for-dhaka-traffic-chaos-idUSKBN1WC098</u>

¹⁶ Kamal, S. M., & Ahsan, N. A. (2018, April 27). 'Uber-Pathao' ride-share's impact on Dhaka. Retrieved August 2019, from The Financial Express: <u>https://thefinancialexpress.com.bd/views/uber-pathao-ride-shares-impact-on-dhaka-1524842540</u>

¹⁷ Rahman, R. (2019, September 27). Motorbike ride-sharing alleviates Dhaka traffic chaos. Retrieved September 2019, from Reuters: <u>https://www.reuters.com/article/us-bangladesh-ridesharing/motorbike-ride-sharing-a-panacea-for-dhaka-traffic-chaos-idUSKBN1WC098</u>

¹⁸ Antara, N. F. (2019, December 2). Is the high number of motorcycles a burden on Dhaka? Retrieved October 2019, from Dhaka Tribune: <u>https://www.dhakatribune.com/bangladesh/dhaka/2018/09/10/is-the-high-number-of-motorcycles-a-burden-on-dhaka</u>

¹⁹ Helmore, E. (2019, August 4). Will Uber ever make money? Day of reckoning looms for ride-sharing firm. Retrieved September 2019, from The Guardian: <u>https://www.theguardian.com/technology/2019/aug/04/uber-ride-share-lyft-ipo-earnings</u>





²⁰ Rahman, S. (2019, June 27). Pathao undergoing massive downsizing. Retrieved September 2019, from The Daily Star: <u>https://www.thedailystar.net/bytes/tech-happening/news/pathao-undergoing-massive-downsizing-1762357</u>

²¹ Rahman, S. (2019, June 27). Pathao undergoing massive downsizing. Retrieved September 2019, from The Daily Star: <u>https://www.thedailystar.net/bytes/tech-happening/news/pathao-undergoing-massive-downsizing-</u>1762357

²²Davis, J. (2018, April 18). Lesson from Go-Jek: Answer to Uber, Grab. Retrieved August 2019, from The Jakarta Post: <u>https://www.thejakartapost.com/academia/2018/04/18/lesson-from-go-jek-answer-to-uber-grab.html</u>

²³ Future Startup. (2018, December 27). Shohoz, Ride-hailing, and The Ambition Of Building A Platform For Everything Necessary With Maliha M Quadir, Founder and MD, Shohoz (Part-2). Retrieved September 2019, from Future Startup: <u>https://futurestartup.com/2018/12/27/maliha-m-quadir-founder-and-md-shohoz-part-2/</u> 24

²⁴ Iansiti, M., & Zhu, F. (2019, January-February). Why Some Platforms Thrive and Others Don't. Retrieved August 2019, from Harvard Business Review: <u>https://hbr.org/2019/01/why-some-platforms-thrive-and-others-dont</u>
 ²⁵ Star Online Report. (2019, August 26). Ride-sharing biker stabbed dead in Dhaka. Retrieved September 2019,

from The Daily Star: <u>https://www.thedailystar.net/city/news/ride-sharing-biker-stabbed-dead-dhaka-1790932</u>²⁶ Lampinen, A., & Brown, B. (2017). Market Design for HCI: Successes and Failures of Peer-to-Peer Exchange

²⁰ Lampinen, A., & Brown, B. (2017). Market Design for HCI: Successes and Failures of Peer-to-Peer Exchange Platforms. CHI 2017. Denver, CO, USA.

²⁷ The Independent. (2019, July). BRTA begins registration of ride-sharing services. Retrieved August 2019, from <u>http://www.theindependentbd.com/post/205764</u>

²⁸ Chiran, M. (2019, September 29). Dhaka's first bike lane in the offing. Retrieved October 2019, from The Daily Star: <u>https://www.thedailystar.net/city/news/dhakas-first-bike-lane-the-offing-1806895</u>

²⁹ The city of London has banned Uber after Transport for London (TfL) identified 140,000 trips completed by unauthorized drivers using verified Uber accounts to pick up passengers. Details available here: https://www.smh.com.au/world/europe/uber-banned-in-london-over-fake-drivers-scandal-20191126-p53e1h.html

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