



# On-demand, not in demand

TNCs and the provision of transport services in Kampala, Uganda

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# On-demand, not in demand:

## TNCs and the provision of transport services in Kampala, Uganda

### Introduction

Transport is an often underappreciated but vital component of creating successful and inclusive cities. However, Sub-Saharan Africa continues to lag behind in the provision of mass transit, and pays the social, economic and environmental cost. The public sector in most countries has failed to create an adequate and affordable public transport network, despite considerable demand. A recent development in the transport sector is the arrival of transportation networked companies (TNCs) and their technology-led on-demand services. This paper looks at Uber in Kampala, capital of Uganda, how it is being used and by whom, to assess whether this model can fill the gaps in transport provision. Comparisons are drawn with London, a city with one of the best public transport systems in the world, to analyse how Uber is used there.

Discussions on the legal landscape around Uber will be touched on, but how drivers fare under Uber is a complex issue and one beyond the scope of this paper. Data collected for this paper indicates that low-income groups in Kampala prioritise cost of transport, whereas those with higher incomes prioritise time savings, indicating a currently limited market for Uber. While there are likely to be some long-term benefits from the arrival of Uber in Kampala, under the current model TNCs are unable to provide affordable, reliable and safe transport for all, failing to fill the gap in service provision.

### Background

#### TNCs and Uber

TNCs are relatively new to the transport sector, positioning themselves as a technology platform. A mobile app is usually used to request a ride, sending the request to nearby drivers to accept or decline the booking. Fares are usually calculated on a time plus distance basis, plus booking fee, and confirmed on trip completion. Fares may be multiplied by 'surge' pricing, used to encourage non-working drivers to starting driving during periods of high demand. Fares are paid through the passenger's account, with cash often not accepted. Drivers and passengers are rated by each other on trip completion.

Uber is the most well-known TNC, operating in over 500 cities. Its rapid expansion has been somewhat controversial, with concerns about labour practices, an apparent willingness to ignore local regulations, and concerns that it may undermine public transport. Uber considers its drivers independent contractors, although this has been disputed. Uber is currently appealing a UK court ruling that found Uber drivers to be employees, not independent contractors, and is the subject of several more lawsuits in the US, relating to driver rights, background checks and price-fixing<sup>1</sup>.

Uber is more responsive than fixed-route public transport, and often the most convenient option. Uber claims to complement existing public transport systems by extending their reach (e.g. via trips terminating/originating a public transport stations), but the possibility remains that it results in lower

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<sup>1</sup> CNN, 2016.

long-term revenue. Lower revenues usually mean reduced services, often affecting the most marginalised members of society.

Traditional taxis have often been accused of racially-discriminatory practices, but Uber claims its approach removes bias. However, a recent working paper from the US National Bureau of Economic Research showed that in the US, those with African-American sounding names faced longer wait times and more frequent cancellations by TNC drivers than those without. Female passengers were also seen face higher fares than men due to drivers taking them on more circuitous routes.<sup>2</sup>

Uber began operating in Kampala in May 2016, the 11<sup>th</sup> city in sub-Saharan Africa in which it operates. Uber has proved unpopular with more long-standing transport operators in some cities, with violence seen in Nairobi, Kenya between Uber drivers and traditional taxi operators. Uber has had to adapt to the African context, allowing cash payment in addition to app-based payment.

### Transport in sub-Saharan Africa

Transport in sub-Saharan Africa is often marked by a high level of informality and inefficiency, with poor safety levels. Large-scale mass transit projects are expensive, and require significant long-term political support, with most cities lacking the governance, finances or resource-raising ability to build them. Cities instead rely on often unregulated networks of paratransit providers to fill the mobility gap, resulting in high levels of congestion and air pollution, low levels of road safety and significant economic losses. Inadequate mass transit has, in many places, created two classes of city-movers: those with access to a personal car and those without, leading to poor accessibility for those unable to afford access to a car.

### The Situation in Kampala

Kampala is the largest city in Uganda, with relatively low density growth. Approximately 3m of Uganda's 39m live in the Kampala Greater Metropolitan area<sup>3</sup>, with most neighbourhoods delineated by income. Kampala lacks a coherent transport network, relying on a patchwork of paratransit providers and personal vehicles, which are constrained by its poor road networks and radial layout. Major roads cut through the city centre, with increasing automobile dependence creating a vicious circle.

The government is determined to improve transport in the city, producing a strategic plan that includes cable cars, BRT and a flyover<sup>4</sup>. However, affordability for users of major projects is a concern. The reliance on low-capacity transport contributes significantly to poor air quality, high congestion, and traffic-related killed and seriously injured. The head of Kampala Capital City Authority, Jennifer Musisi, estimates that congestion results in up to 24,000 lost person-hours per day, significantly impeding economic growth.<sup>5</sup> Individuals on higher incomes often have personal vehicles, improving their mobility, safety and comfort, with official cars and drivers relatively common among senior public sector officials. For those without a personal vehicle, the main modes of motorised transport are *matatus*, *boda-bodas* and special hires.

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<sup>2</sup> Ge. et al., 2016.

<sup>3</sup> World Bank, 2016.

<sup>4</sup> KCCA, 2015.

<sup>5</sup> The IGC, 2016.

### Matatus

*Matatus* are small 14-seater minibuses operating within and between towns. They are boarded at 'taxi' parks or flagged down en route. They are privately operated, by owner-drivers, or hired/renting drivers. The sector is poorly regulated with many *matatus* running the same routes, resulting in poor behaviour including high speed, missing safety equipment and operating over capacity, resulting in a high number of fatal incidents. They are the cheapest form of motorised transport, often costing a fifth of a *boda-boda*, the next cheapest mode. Journey rates are set between destinations and paid in cash. *Matatus* often only leave taxi parks when full, meaning long waits and low journey time reliability.

### Boda-bodas

*Boda-bodas* (*bodas*) are motorcycle taxis, popular as they can beat congestion by weaving through traffic, although accidents are common. They are hired at a stage, where *bodas* wait for passengers, hailed in the street, or summoned by calling a specific driver in an informal version of on-demand transport. This personal network system can provide an excellent door-to-door service, but there are often delays and problems. Even if the driver arrives on time, other challenges exist, such as lack of route knowledge or insufficient change for the cash-only fare. Few responsible *bodas* operate at night because of the higher risks, so those wishing to travel after 10pm often have to flag one down on the street, which results in significantly higher personal risk, or call a special hire or friend. *Bodas* cost more than *matatus*, as the journey can be personalised and is quicker, with prices relatively set, and agreed ex-ante. Few drivers – unless part of SafeBoda – provide helmets for passengers, and most do not have their own. Drivers also often operate without working lights, making travel at night especially unsafe.

### Special hire

Special hires operate like a taxi-cum-minicab and can be hired for a single trip or longer period. Drivers are hired at a stage or called for, either immediately or for a specific time. Some are independent owner-operators, others are drivers employed by someone else or renting a car. Prices are paid in cash and considerably higher than for *bodas*, despite the possibility of congestion-related delays. Many drivers do not work at night, making travelling by special after dark more challenging unless the passenger is near a stage or has a personal network of drivers.

*Bodas* and special hires require passenger knowledge and confidence, as prices are agreed ex-ante and can rely on negotiating prowess. Passengers may be required to direct drivers around town themselves, as GPS navigation aides are rare, and drivers' city knowledge is usually quite localised. This can make for challenging journeys around town, especially for those new to the city.

### Walking and cycling

Walking is a major mode of travel in the city, especially for short distances, although many may not consider it transport. Walking in the city is frequently dangerous due to the lack of pavements, street lights and crossings, the poor quality of roads and the speed and behaviour of drivers. The same is true for cycling, although this is relatively uncommon. Bicycles are often used to transport goods but are less popular with passengers in hilly Kampala.

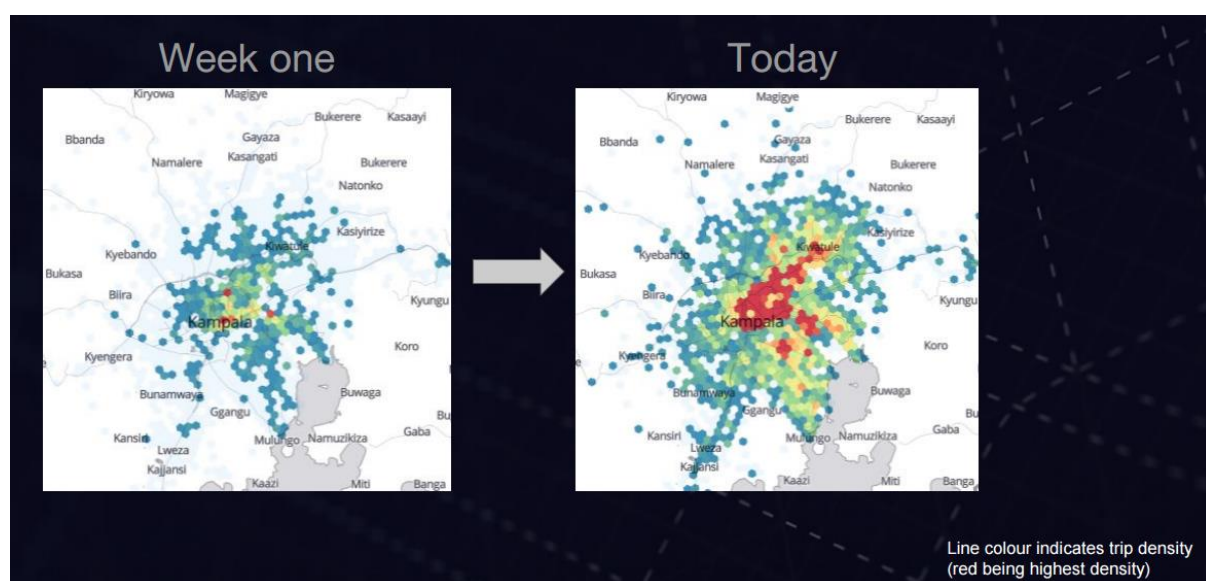
## On Demand in Kampala

Even before the arrival of Uber, there existed a high level of on-demand transport, albeit relatively low-tech and based on personal networks, as is found in many sub-Saharan African cities. These informal networks require passengers to have substantial social capital, as they need to solicit recommendations and driver feedback from connections. This raises challenges for those new to the city or without a social network, who may instead have to choose an unknown driver.

In technology and service provision, sub-Saharan Africa has, in many ways, leapfrogged the Global North, often due to inadequate centralised infrastructure or regulation. Mobile phone usage for communication is high across the continent<sup>6</sup>, with mobile money a major financial force in East Africa, allowing those lacking a formal bank account to make and receive payments. As a result, mobile apps and services are well-understood, particularly amongst the well-off and young people. Services making use of this technology are now common in Kampala, although many still also permit cash payments.

In Kampala, two major actors in the formal on-demand sector are Uber and SafeBoda. Uber is relatively new to Kampala, but has experienced significant usage growth since beginning operations in May 2016 (see Figure 1) and has already disrupted the East African on-demand market. Following Uber's launch in Kenya, a rival provider, Easy Taxi, folded when Goldman Sachs, which had invested in both companies, decided to back Uber. A new company, Little Cab, backed by mobile giant Safaricom, has since acquired most of Easy Taxi's cars and is now competing with Uber over the Kenyan market<sup>7</sup>. New entrants will likely follow Uber into Kampala after observing its initial success. Major manufacturer Volkswagen announced on 21 December 2016 that it plans to launch a ride-hailing service in Rwanda, where Uber does not operate, underlining global interest in African on-demand transport. Volkswagen also outlined its desire to use electric vehicles in Rwanda, which would set the company apart and help tackle some of the concerns about TNCs' impact on pollution.

**Figure 1: Growth of Uber usage, Kampala.** Received from Uber on 4 October 2016; week one: May 2016.



<sup>6</sup> Pew Research Center, 2015.

<sup>7</sup> The Guardian, September 2016.

SafeBoda began operations in 2014 and focuses exclusively on *boda-bodas*. Drivers who join SafeBoda undergo extensive driver and first aid training, and receive a SafeBoda vest (for identification) and passenger and driver helmets. By choosing a SafeBoda driver, either through the mobile app, calling a toll-free number, or by hailing a driver in the street, the passenger is assured that the driver is highly trained, which enables drivers to charge slightly higher fees, somewhat offsetting the costs of being part of SafeBoda.

## Data Collection and Analysis

### Data Collection Approach

To assess the current market for TNCs, specifically Uber, in Kampala, research was carried out in Kampala and London. Surveys were completed over ten days in November 2016, using SurveyMonkey, an online collection tool. Information was gathered on mode preferences, as well as why people choose the modes they do. The survey questions can be found in the Annex; they were broadly similar across the two geographic locations, with some adjustments for local variations in mode of transport, for example. The survey was carried out as a poll, not a sample, so there may be bias in the data, especially in London due to the low number of respondents.

In London, the survey was promoted via Facebook and LinkedIn, and within the London Borough of Hounslow, and was completed by 51 respondents. In Kampala, it was important to collect a diverse group of responses, particularly those of Ugandans as opposed to expats. To achieve this, a research team was hired through Peripheral Vision International, a boutique consulting firm that operates across East Africa and has significant experience in research and community engagement. Two researchers conducted surveys across Kampala at markets, malls and popular public places, using either English or local languages as required. A total of 111 responses were collected, the majority by Ugandans.

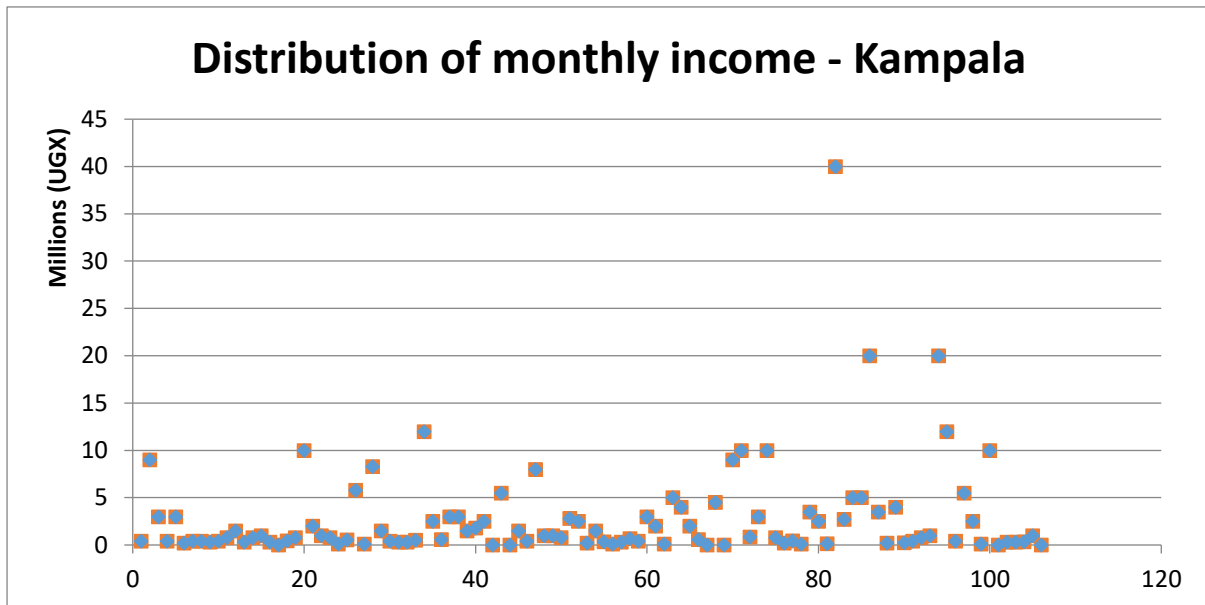
### Results and Analysis

The surveys provided considerable data, particularly on mode choice and why people chose particular mode. It must be mentioned again that these data were not collected from a formal sample but instead represent the results of a poll. However, the data has still provided interesting insights, particularly in Kampala. There were some outliers in both datasets, relating to monthly income, and it is likely that these results were due to an error in reading or understanding a question about monthly income.

Overall, Uber ranked relatively low in terms of work commute preferences in both Kampala and London, accounting for 3% of all top-three work mode preferences in Kampala and 0.7% in London. However, Uber is more popular as a mode of leisure transport, receiving 6% of the top three mode preferences in Kampala and 5.2% in London. In Kampala, 22% of respondents in Kampala had used Uber at least once in the previous month, compared to 65% of respondents in London. For both cities, the majority of trips appear to have been leisure. Most Uber-using poll respondents are repeat users, with the majority of those who had used Uber in the last month in London using it at least four times in that period. In Kampala, only a third of respondents who used Uber in the past month had used it four or more times, which likely reflects both the fact that the service is still relatively new in the city as well as the demographic and socio-economic profiles of the majority of the residents of Kampala.

Figure 2 (below) shows the monthly income distribution of the poll respondents in Kampala, including the outliers. The majority (two-thirds) of the respondents have a monthly income of less than 2,000,000UGX (approximately £400), and 51% earn less than 1,000,000UGX per monthly. Of the 111 respondents in Kampala, 92 were Ugandan and the rest a mixture of expats, mainly those from the US and UK.

**Figure 2: Distribution of monthly income – Kampala (UGX)**



Further demographic analysis shows that the age distribution for males and females was the same, with an average age of 33, female inter-quartile range of 26-38 and a male inter-quartile range of 27-38. However, monthly income did vary across gender, with females on average earning more per month (3,250,000UGX to 2,170,000UGX respectively). As no information was collected about employment or educational background, it is not possible from this data to ascertain why there is such a discrepancy in income for groups of a similar age.

### Mode Choice

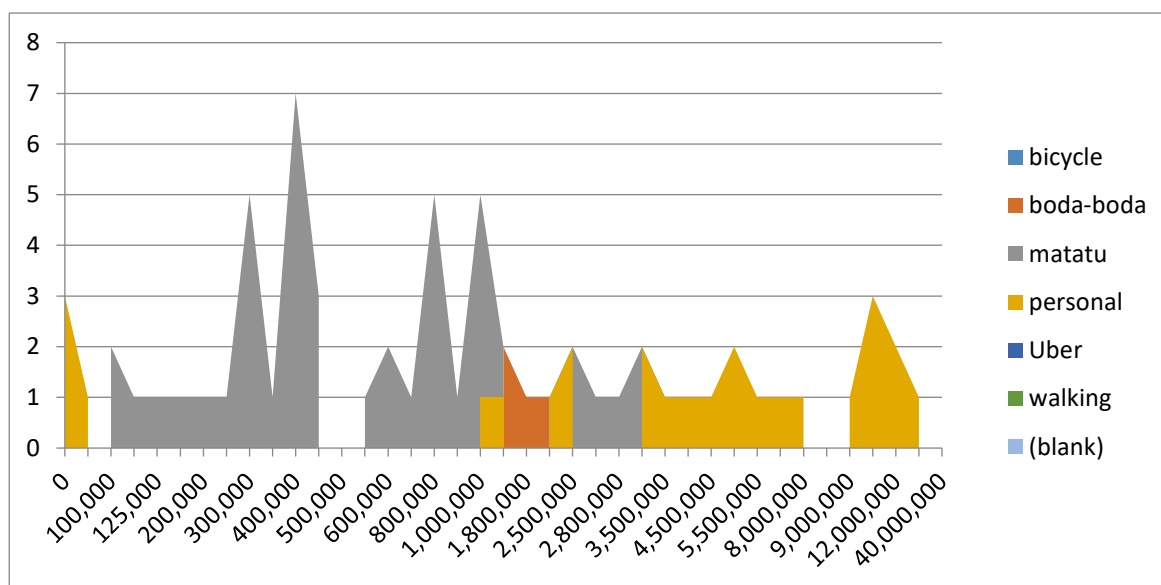
In Kampala, the data produced a clear result in terms of mode preferences for the work commute, with *matatu* the number one mode for work trips for 46.8% of those surveyed, and personal car the second most preferred at 24.3%. When the top three preferences were combined, *matatu* received 22.5%, and *boda-boda* the same amount, almost double the next most popular choice of walking (see Table 1 below). Gender made no difference to choice of mode across the preferences.

Further analysis shows that there is a clear association between monthly income and first preference of mode, as can be seen in Figure 3. Those on lower incomes (under 2,000,000 UGX) overwhelmingly favour the *matatu*, while those earning more than 2,000,000UGX over month choose to use a personal vehicle. This is not an unexpected result, as the *matatu* is by far the cheapest motorised mode of transport available in Kampala, while using a personal car is one of the most expensive.



1st			2nd			3rd			Combined		
Preference	N	%	Preference	N	%	Preference	N	%	Preferences	N	%
walking	8	7.2	walking	14	12.6	walking	19	17.1	walking	41	12.3
bicycle	1	0.9	bicycle	1	0.9	bicycle	1	0.9	bicycle	3	0.9
<i>boda-boda</i>	21	18.9	<i>boda-boda</i>	47	42.3	<i>boda-boda</i>	7	6.3	<i>boda-boda</i>	75	22.5
<i>matatu</i>	52	46.8	<i>matatu</i>	12	10.8	<i>matatu</i>	11	9.9	<i>matatu</i>	75	22.5
special	0	0.0	special	6	5.4	special	4	3.6	special	10	3.0
personal	27	24.3	personal	8	7.2	personal	3	2.7	personal	38	11.4
friend	0	0.0	friend	2	1.8	friend	2	1.8	friend	4	1.2
uber	1	0.9	uber	3	2.7	uber	6	5.4	uber	10	3.0
(blank)	1	0.9	(blank)	18	16.2	(blank)	58	52.3	(blank)	77	23.1

**Figure 3: First preference of work commute transport mode by monthly income, numbers**

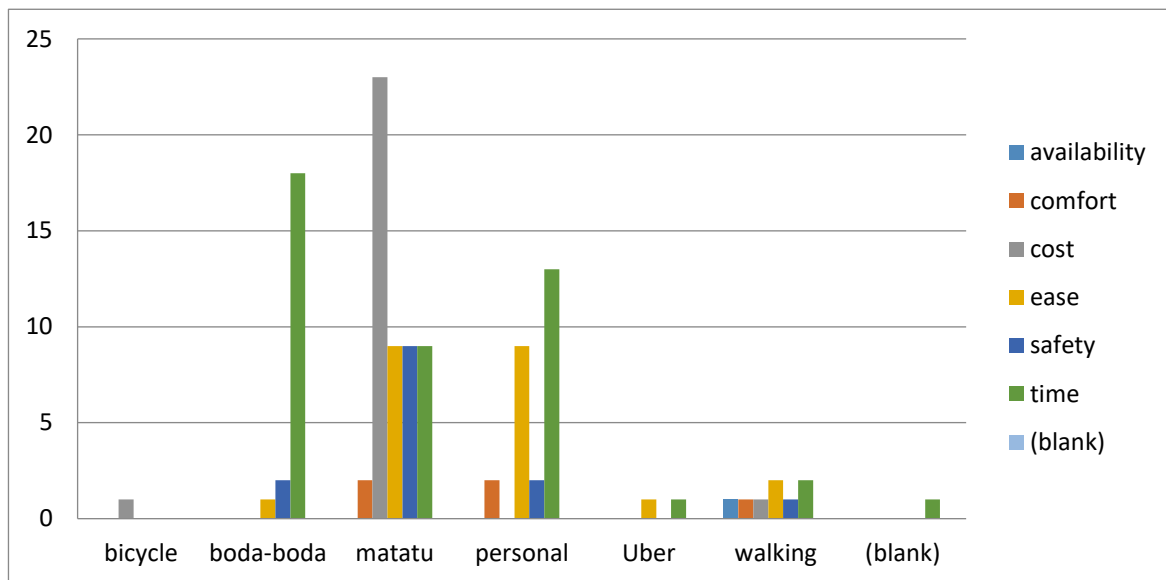


To look at the reasons for this breakdown, work mode choice was analysed by main influencing factor (see Figure 4, below). The results of this analysis show that the main reason people choose to travel by *matatu* is cost. When people choose a *boda-boda* or to use their personal car, however, the main reason they do so is time. This is almost always the case for *boda-bodas*, with ease also a major reason why people use a personal vehicle. This is an interesting finding, as *bodas* and personal cars are timesaving in different ways. Using a *boda* will significantly cut down on journey times across the city, particularly during peak times, due to its ability to weave between traffic. *Boda-boda* is the most frequent second choice mode of transport (see Table 1), which highlights the fact that an on-demand company that focuses on *boda-bodas* not cars, such as SafeBoda, has a much wider segment of society as a possible market for its services, especially as a back-up choice providing immediate service. Although a trip with SafeBoda is more

expensive than one with a normal *boda*, it is still cheaper than using a special hire or Uber, and avoids the problems of congestion faced when travelling by car. As such, powered two-wheelers are an area where the formalised on-demand transport market is likely to continue to grow.

A personal car would still get stuck in traffic, so the time element here must be in terms of a door-to-door service, not purely on journey time. This is an interesting finding in terms of the potential market for car-based on demand services. If total journey time is understood to be a major preference for those choosing personal cars, a reliable and timely on-demand service is likely to attract considerable interest from consumers. Using Uber could result in time-savings for those using it by removing the need to retrieve or park the car. Ease also features highly for those using a personal car and a well-run TNC could perform strongly on this indicator as well. However, Ube can do nothing to improve journey time reliability and may actually make it worse by leading to increased congestion at peak times. This can happen via its pricing model that multiplies prices at busy periods to entice more drivers into work.

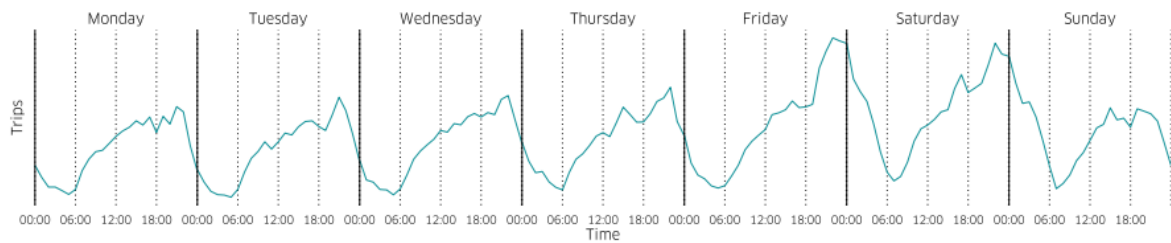
**Figure 4: First preference for work commute transport by main influence on choice, numbers**



The strong influence of cost, combined with data about mode choice and monthly income, shows that there is a large section of society that prioritise the price of a journey above all other influences. This indicates that these people are unlikely to choose to use Uber or SafeBoda even they are quicker or easier than other forms of transport, if the price is substantially higher than other, less convenient options. The introduction of lower cost on-demand services, such as UberPool, which is not currently available in Kampala, could be one way for TNCs to target this price elastic segment of society, sacrificing time to achieve a more affordable price.<sup>8</sup> However, people appear to be less concerned about price when they travel for leisure. For leisure journeys, the main reason respondents in Kampala gave for choosing their mode of transport was ease (36.9%), significantly ahead of time (18%), which probably explains why Uber is more popular for these trips. Uber trip timings also support the data in showing that it is mainly used as a leisure mode in Kampala, with peaks later at night and at weekends (see Figure 5).

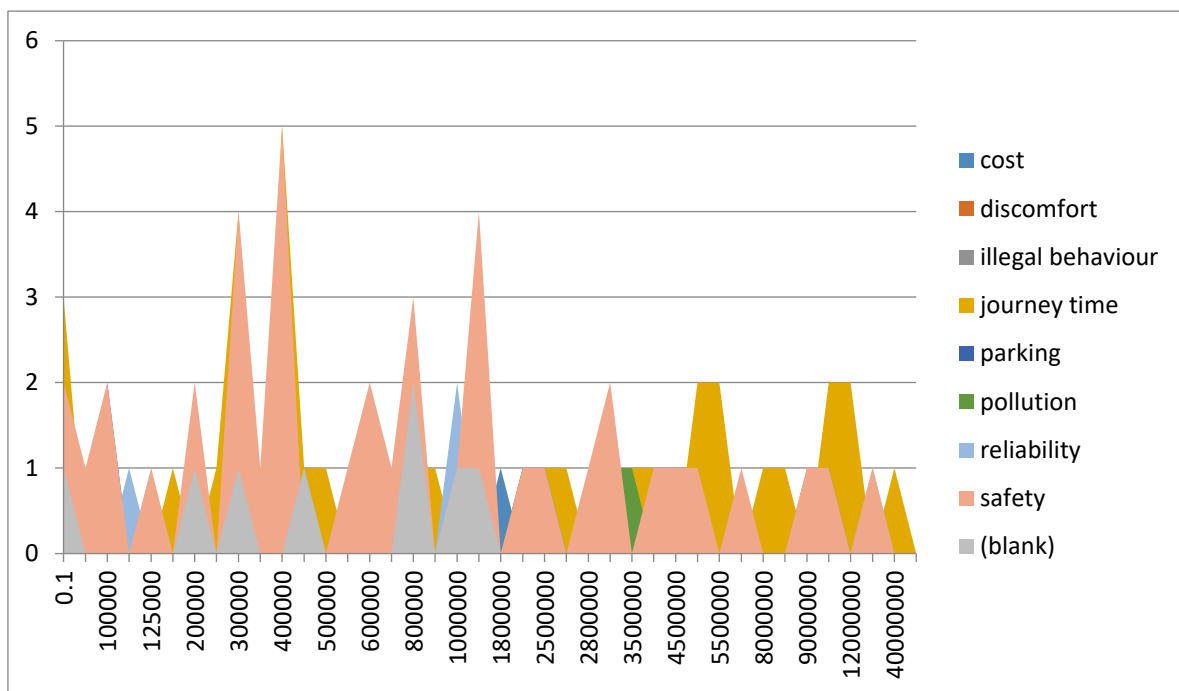
<sup>8</sup> The Guardian, June 2016.

**Figure 5: Uber trip timings data, Kampala. Received from Uber on 4 October 2016.**



The vast majority of respondents (95%) stated that there are problems with transport in Kampala. Of these, there was one overriding concern, with 88.6% selecting safety as their biggest concern. It is not clear if this is safety in terms of personal insecurity when travelling around the city, or if it is the high incidence of road traffic collisions that most concerns respondents. Either way, safety concerns were so significant as to make additional analysis of who was selecting it relatively obsolete.

**Figure 6: Second worst problem in Kampala by monthly income, numbers**



Therefore, for additional analysis of the selection of problems in Kampala, the second most reported problem was used. There is a clear correlation between choice of second-worst problem and income (see Figure 6 above). Although safety is a major concern across all income groups, it is seen as a much bigger problem for those earning less than 2,000,000UGX a month than for those earning above that. This is likely to be partly due to the modes of transport used by that income bracket (predominantly *matatu* and *boda-boda*), which are the motorised modes most likely to be involved in serious and fatal accidents. Additionally, those earning less are more likely to be involved in informal employment, which often has irregular hours and is likely to result in travel at night, for example, when risks are higher. Reliability is also an issue for those on lower incomes, further underlining that they are subject to the vagaries of *matatus*, which run to no fixed schedule and often involve substantial waiting.

For higher-earning individuals, journey time is more of a concern. Journey time in Kampala is often unduly long for trips that are short in terms of distance, with a lack of journey time reliability also a major problem. A significant time cushion often has to be built into time-critical journeys, which is an inefficient way to conduct business. This is likely to be due to the fact that those earning more than 2,000,000UGX per month could be expected to have more formal employment, with set hours, and the fact that the opportunity of waiting in a traffic jam is higher for them. However, as seen above, those in this income bracket are still likely to choose to use their personal car for work travel, even if this is likely to result in longer journey times than taking a *boda-boda*. Comfort and safety were indicated as having a minor impact on mode choice, so it is likely that there is an element of status involved in this choice.

While Uber will not be able to achieve more than a modest time-saving (as mentioned above), its model could have positive impacts on safety and perceptions of safety for passengers. No other services provide GPS tracking of routes, nor driver details, and the way that the ratings system works weeds out both poor drivers and unruly customers. Moreover, in the event of an accident or other incident, Uber is able to track who was driving and where at the time, improving accountability. This formalisation of driver information and route mapping would have a positive impact on transport services across the city if their expansion was supported by city authorities, not only in terms of safety outcomes but also in passenger perceptions.

## The Future of On-Demand Transport in Uganda

On-demand transport companies are well-placed to thrive in Uganda and across the continent, with the potential to partially fill the gap in transport provision. In many ways, TNCs formalise the informal networks of connections that permeate many societies in sub-Saharan Africa, removing the need to build up a personal network of drivers. However, as a transport mode for the majority, Uber is clearly not a solution. Uber is considerably more expensive than most other modes of transport, with low overall demand reflecting this. Among low-income Ugandans, the data shows that cost is the major factor in determining mode, meaning Uber is unlikely to become popular among that demographic. Additionally, for higher-income residents concerned about journey time, Uber can offer little to reduce congestion and improve journey reliability beyond removing the need to park, indicating a possibility of limited impact.

However, Uber requires a minimum standard level of driving and customer service, albeit one enforced more by its rating system than by internal safeguards. Across Kampala, both for TNCs and independent drivers, this is likely to result in improved service provision. By connecting drivers with a formal network, it also improves their opportunities as they are vetted and approved and able to prove an income. This has resulted in drivers elsewhere achieving better access to credit, for example, something which is likely to also happen in Kampala.<sup>9</sup>

Uber in Kampala is currently cheaper than a special hire, although fees may increase as it settles into the market. However, entry to the market by a viable competitor, such as Little Cab, could result in lower prices, as has happened in Kenya. Part of Uber's model is that fees are not fixed, but instead comprise a base fare (1,300UGX) plus 900UGX per km plus 200UGX per minute. As congestion can

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<sup>9</sup> The IGC, 2016.

frequently increase a 20 minute journey to over an hour, a trip with Uber can be considerably more expensive than anticipated. For a typical trip in central Kampala that would take 30 minutes to walk, approximate costs are 1,000UGX for *matatus*, 4,000UGX for *bodas* and 8,000UGX for Uber. Moreover, there is a minimum fare of 5,000UGX with Uber.<sup>10</sup> Data collected in the Kampala survey also showed that two-thirds of respondents earn less than 2,000,000UGX per month. One minimum spend trip could therefore equal 1% of weekly income, indicating that using Uber is priced far beyond most budgets. Uber is open about targeting higher-earning demographic groups, but in a city with widespread inequality, this effectively prevents the majority of the population from using its services, thus missing out on the mobility dividend.

Beyond Kampala, Uganda currently provides few expansion opportunities for Uber. Nowhere else in Uganda has sufficient numbers of high-income inhabitants or the population density to make it viable in its current form. Entebbe, where the international airport is located, is a possibility, but in some ways, it is now a suburb of Kampala. Conversely, SafeBoda is in a strong position to expand due to its lower cost and the prevalence of *boda-bodas* across the country. This is supported by its significant growth, with SafeBoda drivers taking approximately 20,000 trips per day in Kampala<sup>11</sup>.

## Policy Recommendations

Uber currently accounts for a small number of trips taken in Kampala, but has tapped into a desire for convenience and comfort among well-off residents and business travellers, and is likely to grow more popular. This indicates demand for reliable and safe public transport in the city, demand which is latent in low-income groups due to the cost of Uber. Efforts by the Government of Uganda (GoU) and KCCA to plug the gaps in transport provision would therefore be well-received. The gaps are currently inadequately and inequitably plugged by the private sector, and will remain so until mass transit arrives in the city. Appropriate regulations covering TNCs could help finance such infrastructure, with work on how to tax these companies also needed. GoU has an opportunity to capitalise on transport innovation coming to Kampala, with regulation needed before TNCs are embedded in order to make the most of the opportunity for change.

Uber is likely to bring benefits to Kampala beyond improved customer service. It collects considerable data on trip origins and destinations, lengths, times and passenger profiles, which could be of significant use to city authorities for urban planning. For these purposes, alongside discussions on regulation and taxation, GoU needs to emphasise the importance of open data. Data-sharing by Uber is less important somewhere like London, where Transport for London has an unrivalled level of (often freely-available) data, but in Uganda, little reliable transport data exists. Increased openness on behalf of Uber would likely result in a more positive relationship with city authorities.

Unlike elsewhere, the use of electric or hybrid vehicles (EVs) is not promoted by Uber, partially reflecting market realities. However, a change in policy would shift perceptions of Uber from a controversial TNC to a clean-tech leader in the developing world. Volkswagen's recent announcement concerning the provision of EV infrastructure in Rwanda indicates growing support for it in sub-Saharan Africa. However, due to its already-established networks across the region, Uber has the potential to achieve much greater impact. Promoting EVs and infrastructure would be in line both with

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<sup>10</sup> For reference, 3,000UGX buys a substantial traditional lunch.

<sup>11</sup> SafeBoda, 2016.

Uganda's experience with decentralised technology and Uber's innovation in combining technology with transport. An emphasis on creating a clean fleet would somewhat mitigate concerns surrounding Uber's role in increased congestion and air pollution. GoU is also well-placed to advocate for a clean Uber fleet in Kampala, and could promote change through subsidies or tax-breaks, for example.

Although it is undoubtedly necessary to formalise the private provision of transport in the city, Uber and other TNCs are unlikely to lead to equitable environmental, economic or social outcomes for Kampala. A credible alternative could be achieved by GoU support for existing small-scale taxi operators, through subsidies for training, GPS navigation and the introduction of mobile payment technology. Whilst the process of ordering taxis would remain unchanged, customer experience would improve, and the possibility of a nascent monopoly would be reduced. Additionally, a decision on Uber's employment model and improvements in employee protection could reduce risks in a city with already high levels of informal employment.

Longer-term, major investment in urban and transport planning, and political will for the introduction of a BRT or other mass transit system, are required. Without these, Kampala will be unable to capitalise on its potential, and will continue to depend on unreliable, unsafe and over-priced transport. High-quality planning is needed in relation to land and development policy as greater densification is required to support mass transit. This would need to be coupled with increased driving law and parking regulation enforcement, and improved trust in public officials, which require significant commitment from GoU and KCCA. Unfortunately, the political and financial viability of such transformation remains unclear under the current administration.

## Conclusion

The growth of Uber is an example of the private sector stepping in to fill gaps in public provision. Uber and TNCs in general are still relatively new players in transportation, with limited analysis undertaken on their long-term impact. In a city like Kampala, with significant income inequality, there are concerns about what Uber's growth may mean for the development of public transport. Moreover, controversy over its approach to drivers, evidence of racial discrimination, and allegations of inadequate background checks are all causes for concerns, especially considering Uganda's relatively lax regulatory landscape.

It is clear that on-demand services are already very popular in Kampala, with Uber use likely to increase among those who can afford it. Uber may have a positive impact on the currently unregulated network of drivers by guaranteeing some level of driving ability and insurance, ensuring GPS tracking and on-board navigation, and providing the option to go cash-free.

However, the transport network in Kampala remains wholly inadequate, with or without Uber. There is a real need for affordable, reliable and safe transport in the city and across the continent. Uber is not going to provide this on a large scale, and is not in a position to take into account social and environmental equity in the way that a government can. Therefore, without support from GoU – and international financial institutions – for improved urban and transport planning, the majority of Kampala will continue to experience a low mobility and accessibility. In their current form, TNCs in Kampala are unable to fix the broken transport system. Unfortunately, their arrival is no indicator of a wider push within the private or public sectors to improve provision and affordability for those who lack the means to use them.

## Annex

Please separate attachments.

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