

Less Regulations for a Better Commute

A Case Study on Taxi Aggregators in Kerala

May 2018

Abstract

In the age of app-based cabs operated on advanced technology platforms, traditional taxi services lag behind due to regulations by state and central governments in a changing market scenario. This report studies the Indian context of taxi regulations and laws with special reference to Kerala. It deals with the history of regulations and its impact on the sector in the contemporary context.

Abhishek Das Pooja Koppa Centre for Public Policy Research





Acknowledgment

Centre for Public Policy Research (CPPR) team is thankful to all those who contributed towards developing the ideas in the report. This study was conducted under the guidance of Dr D Dhanuraj (Chairman, CPPR). The authors specifically thank Janaki Nair (Research Intern, CPPR), Sherylene Shamina Rafeeque (Consultant Editor, CPPR) and friends of CPPR for their contributions to developing this report into its final form. We are thankful to the Atlas Economic Research Foundation, USA, for supporting the research project.



EXECUTIVE SUMMARY

Taxi businesses faced a major threat from online taxi aggregator companies in the recent past. Though different state governments follow varying policies towards taxi aggregators, they largely go by the Indian Motor Vehicles Act of 1988. In some countries, the federal government has given the local government the authority to regulate taxi services-with variations in the chain of command depending on the system of government. The appearance of cutting edge advances and changing economic situations require a reassessment of the state control of taxicabs. This paper particularly looks at the Indian context of taxi regulation and the laws with special reference to Kerala.

The objective of this research paper is to examine the regulatory barriers in taxi services which was until recently availed by the upper middle class and social elites. It studies the reasons for treating taxis as a public good from the perspective of Indian Motor Vehicle Act. The study looks into the various regulatory policies applicable to taxi regulations in India- quantity regulation, quality regulation, price aspect and market conduct regulation.

The quality aspect poses a direct barrier to the entry of players into the market, which is governed by a central act-Motor Vehicles Act of 1939. The act serves as an advisory to states in regulating motor transport. As per the act, vehicles can be registered as stage carriage, contract carriage, goods carriage and private service vehicle.

Quality regulation includes specifying standards relating to the vehicle, the driver and the operator to ensure safety and quality of taxi services. Motor Vehicles Act enables State Transport Authorities (STA)/Road Transport Authority (RTA) to prescribe conditions on issuance of taxi permits, number of passengers, maximum weight carried, etc. The MVA of 1988 allows the state government to fix maximum and minimum fares for all contract carriages. In Kerala, fare regulation is applicable for all contract carriages having an engine capacity less than 1500cc. Market conduct regulation aims at maintaining market order and preventing competition in the industry. The local taxi, radio taxi and cab aggregator's regulations differ in terms of ownership, mode of access, fares and services of operation.

As a case study, the author looks into the policy framework related to Kerala and how it evolved. Taxi regulation in India emerged from the Hackney Carriage Regulation passed in 1913. Motor cabs regulation started from 1940s through taxi permits and then gradually evolved over years. The government is motivated by the desire to serve the public by ensuring quality control and preventing undesirable market outcomes. However, the



Kerala government did not make it mandatory to exhibit fares in taxis till 1962 due to memorandums. The government was a mediator between trade unions and the public in fare regulation. Since the government started fixing the fare, it was obligated to ensure profit for the industry. The cab aggregators are able to charge less for the same ride as compared to government regulated taxis, which proved that there could be market driven systems that are outliers to the regulatory framework of government.

Regulation has led to stagnation in the quality of taxi services whereas the non-regulated market ensured competition which forced operators to improve their services. Last mile connectivity was also an issue as the existing (regulated) taxis were inaccessible, which was a major reason for people to shift to private vehicles in the past.

The study concludes that the century old regulations existing in the taxi industry failed to assure the optimal performance of the sector. Stakeholders need to lift regulations and reach out to other sectors to attain full potential. Government policy must enable innovation and restrict monopoly in the market.



Introduction

Governments across the globe are grappling with how best to integrate taxis into the public transport infrastructure. Taxi businesses in various countries thrive in a considerably regulated environment with the state exercising control over its operations. The sector has been in the public eye with numerous cities witnessing clashes between traditional taxi services and newer players in the market such as app-based cab aggregators. These technology companies like Ola, Uber etc. have been recognized as Transportation Network Companies (TNCs) as they connect passengers and taxi drivers through an online platform. A few Indian cities like Mumbai and Kochi have witnessed violent altercations between local taxi drivers and drivers working with TNCs. Many of these incidents are rooted in the fact that newer business models in the taxi industry are functioning outside the existing legal and regulatory framework. More often than not, the contretemps are based on fare offered by the aggregators which is lower than the fare fixed by the government as well as the territorial authority of taxis.

In most countries, the central government has given the authority to regulate taxi services to the local government with variations in the chain of command depending on the system of government followed by the country. The regulatory mechanisms followed around the world are largely similar and are categorised based on the aspect of taxi operation covered. Recent years have seen a rise in worldwide demand of taxi unions to restructure the regulatory systems that govern taxi services. The advent of advanced technologies and changing market conditions call for a re-evaluation of the state regulation of taxis. This paper tries to trace the origin of regulation of taxis by the state, how the regulatory regime has worked over the years, its impact on the taxi sector and the relevance of those regulations imposed by the government on the taxi industry today. The paper particularly looks at the Indian context of taxi regulation and laws with special reference to Kerala. However, the findings of the study are applicable to the economies across the world where the taxi industry is highly regulated and the prevalent regulation does not address the novel business models that are emerging in the sector.

Origin of taxi regulations in the world

The history of taxi regulation in the world can be traced back to the 17th century, when England tried to control the rapidly increasing for hire hackney coaches in London. In 1636, Charles I, concerned by the congestion in London city, issued a proclamation to restrict the number of hackney coaches to 50 and prevent them from carrying passengers less than three miles¹. On 23rd June 1654, an ordinance was passed for the regulation of



Hackney Coachmen in London and adjacent places limiting the total number of hackney coachmen and hackney coaches in London to 200 and 300 respectivelyⁱⁱ. Every person admitted to keep a hackney coach had to pay an admission fee of 40 shillings per carriageⁱⁱⁱ.

The first hackney carriage licenses were issued in London in 1662 to do away with fights over fares and undesirable coachmen who were likely to pose a risk to their passengers iv. When the number of coaches was regulated, the authorised carriages began to have higher demand resulting in increase in hire charges. Hence the authorities introduced fare regulation to prevent the coachmen from charging exorbitant fares.

The London Hackney Carriage Act of 1831 which repealed the previous statutes on taxis was a comprehensive legislation for regulating taxis in the Metropolis. Taxi regulation in the rest of the UK was addressed by Section 37 to 68 of Town Police Clauses Act of 1847^{vi}. This was followed by the Locomotive Acts of 1861, 1865 and 1878 which regulated the use of mechanically propelled vehicles in the UK. The Motor Car Act of 1903 in UK introduced motor vehicle registration and driver licensing. The Road traffic Act of 1930 repealed previous acts on cars and removed all speed limits on UK roads for motor cars. The speed limits were reintroduced by the Road Traffic Act of 1934 in the wake of an alarming number of accidents.

The British Empire expanded in the 18th and 19th centuries, its technologies and laws were passed on to its colonies. Thus, the Hackney Carriage Act was passed in India as well in the year 1879 along the lines of London Hackney Carriage Act of 1831. When motor vehicles increased in India, the Motor Vehicles Act was passed in 1914 which was later replaced by the Motor Vehicles Act of 1939. This Act was nullified when independent India's Motor Vehicles Act (MVA) came into force in 1988.



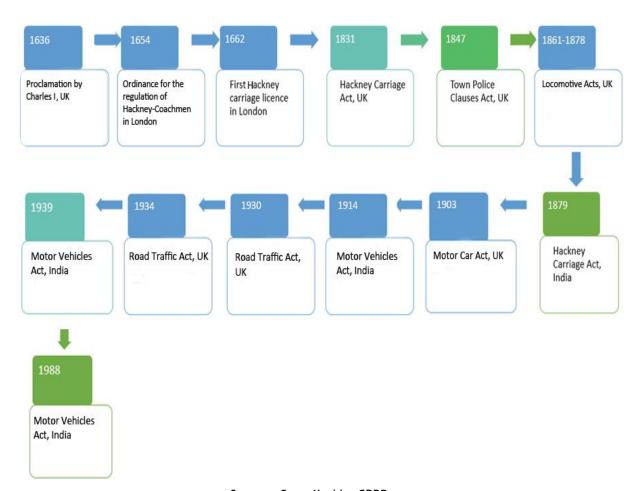


Figure 1: History of taxi regulations

Source: Compiled by CPPR

While British colonies followed the regulatory mechanisms laid down by the imperial government, countries like United States had different reasons for adopting taxi regulation. Taxi fare came to be regulated in the 1930s in US to have a check on the unreasonably high fares charged by the cab drivers during the Great Depression. During this period, it was observed that the taxis were growing in large numbers, especially the unlicensed ones, which affected the quality of the service. The Haas Act of 1937 passed in New York City introduced the medallion system to regulate taxi cabs plying in the city which continues to operate to date. Since the number of medallions issued remained relatively small and fixed, the value of the existing medallions skyrocketed and stands at more than a million USD today.



Taxi Regulation in India

In order to grasp the regulatory regime that governs taxi services in India it is important to understand the classification of taxi regulations and taxi services in India.

Classification of taxi regulations in India

Regulations can be classified based on what aspect of the taxi industry they govern. A broad classification of regulatory policies, which is applicable to most countries, is as follows:

(a) Quantity regulation:

It poses direct barrier to entry of players into the market, usually exercised by restricting the number of vehicles that can operate on the roads as taxis. In India, transport features in the State List of the Constitution. However, motor vehicles come under the purview of Concurrent List and hence the motor transport sector is governed by the Central Act, namely, Motor Vehicles Act (MVA), 1988 which was an improvement upon the Motor Vehicles Act of 1939 passed in British India.

The MVA of 1988 was brought into force considering the "changes in the road transport technology, pattern of passenger and freight movements, developments of the road network in the country and improved techniques in the motor vehicles management". The Act serves as a central advisory to the states in the regulation of motor transport. This Act stipulates that each state shall have a State or Regional Transport Authority (STA/RTA) which is responsible for the enforcement of MVA and is answerable to the Ministry for Road Transport and Highways. As per the Motor Vehicles Act of 1988 and Central Motor Vehicles Rules of 1989, a motor vehicle can be registered as:

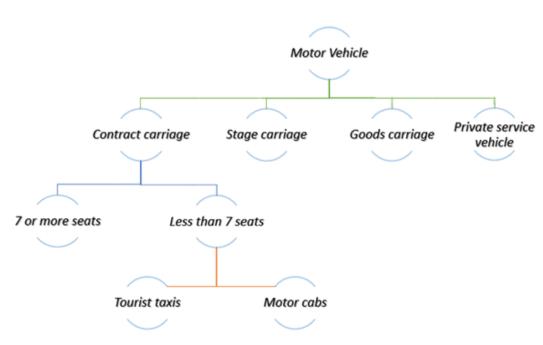
- a) Stage carriage
- b) Contract carriage
- c) Goods carriage
- d) Private Service vehicle

The for hire vehicles are registered as contract carriages in India. The MVA of 1988 defines a contract carriage as "a motor vehicle which carries a passenger or passengers for hire or reward and is engaged under a contract, whether expressed or implied, for the use of such vehicle as a whole for the carriage of passengers mentioned therein and entered into by a person with a holder of a permit in relation to such vehicle or any person authorized by him in this behalf on a fixed or an agreed rate or sum"vii. This may include vehicles



such as cars, jeeps, vans etc. A contract carriage of seating capacity less than seven can be registered either as a tourist vehicle or as a motor cab. The MVA allows the STA/RTA to make rules regarding the conditions upon which a vehicle may be used as a contract carriage.

Figure 2: Categorisation of motor vehicles by the Motor Vehicles Act of 1988



Source: Compiled by CPPR

The MVA empowers the STA/RTA to issue permits authorising the use of a motor vehicle as contract carriage and determine the area for which permit is given. viii The STA/RTA also has the right to fix the number of contract carriages in towns with a population of five lakh. These are quantitative restrictions as it directly poses entry barriers to the supplier of taxi services in the market.

(b) Quality regulation

This includes specifying of standards relating to the vehicle, the driver and the operator to ensure safety and quality of taxi services. The MVA enables the STA/RTA to prescribe conditions on issuance of taxi permits apart from deciding the maximum number of passengers, maximum weight of luggage that may be carried on the vehicle, standards of comfort and cleanliness maintained in the vehicle, etc. The Act also makes it mandatory to have third party insurance to drive a motor vehicle on the road. In different cities of India, there are various laws regarding the fuel to be used, the duration for which a vehicle can be used as a taxi etc. For example, in Maharashtra, Motor Vehicles



(Amendment) Rules, 2015^{ix} stipulates that the cabs are supposed to run on clean fuel (Petrol and CNG/LPG/Hybrid/Electrical). These are qualitative regulations meant to ensure that the taxi industry maintains certain standards for the benefit of all stakeholders in it.

(c) Price regulation:

It refers to fare regulation imposed by the government on the players in the taxi market. The MVA of 1988 allows the State Government to fix maximum and minimum fares for all contract carriages. Section 67 of MVA of 1988 mandates that specified fares or rate of fares shall be charged and a copy of the fare table shall be exhibited on the vehicle. Each and every state follows an individual system of fare regulation in India. For example, in Delhi, till 2015, there were two schemes for registering a motor cab^x. One was the Radio Taxi Scheme of 2006 with fare set at ₹ 23 per km and the other was the Economy Radio Taxi Scheme of 2010 which fixed fare at ₹ 12.5 per km. The City Taxi Scheme^{xi} framed in 2015 merged the aforementioned two schemes and thus the fare became uniform. Another example is that of Kerala where fare regulation is applicable for all contract carriages having an engine capacity less than 1500ccxii.

(d) Conduct regulation:

This involves regulations aimed at maintaining market order and preventing destructive competition in the taxi industry. For example, as per section 156 of Kerala Motor Vehicle Rules (KMVR), 1989^{xiii}, the contract carriages are to be stationed at the stand specified in the permit. There are rules in Section 203 of KMVR regarding the conduct of drivers in taxi stands.

According to the mode of operation, the taxi operators in India can be broadly classified as given in Table 1:

Table 1: Classification of Taxi services in India

	Local City Taxi Service	Radio Taxi / Call Taxi	Cab aggregators / TNCs
Cab Ownership	Mainly by individuals	Mainly by companies	By individuals
Established	Early 20 th century	From 1990s	2010
Mode of access	Street hail / pre- booking	Booking by call / pre-booking	Booking online via mobile application



Fare	Government notified fare based on distance travelled alone	Government notified fare and above, based on distance travelled	Fare set by TNC based on distance travelled and time of travel (Dynamic pricing)
Types of service	Cabs are usually of the same category	Different categories available (including tourist taxis, SUVs and luxury vehicles)	Different categories available (including tourist taxis, SUVs and luxury vehicles)
Area of operation	Usually within a city	Within city and outside	Usually within a city

Source: Compiled by CPPR

The regulations applicable to each type of taxi service are different while all of them are subjected to quantity, quality, fare and market conduct regulations. City taxis were the dominant type of taxis in India before the emergence of radio/call taxis. In the case of these taxis, the driver is the owner of the vehicle more often than not and they can be hired from taxi stands at particular points in the city. These taxis usually run within city limits and are bound by conditions of taxi permit prescribed by MVA of 1988 in terms of seating capacity, area for which permit is given, maximum number of passengers, maximum weight of luggage, comfort and cleanliness standards, use of taxi meter and fares fixed by the government.

The call/radio taxis are taxis services operated by companies who own a fleet of cabs which are usually available for hire within city limits as well as for long distances. These are availed by pre-booking through phone or website. When call taxi business got hold of a large share of the taxi market in the early 2000s, different state governments came up with schemes to regulate them as the MVA of 1988 did not address their business model.

Delhi Radio Taxi Scheme of 2006^{xiv} was the first of many such regulations aimed at call taxis. It required the radio taxi companies to have facilities such as call centres, parking lots and web portal in order to get a license. Not all vehicles could ply as call taxis as the scheme made it mandatory to have air conditioners, LCD display panel, GPS, printer, mobile radio etc. in the vehicle. The taxis were allowed to be used only for eight years according to this scheme. The seating capacity was limited to a maximum of seven including driver. A bank guarantee of ₹ 15 lakh was to be furnished by the company to get



a radio taxi license. It was also made compulsory to have at least 200 vehicles in the fleet. An induction schedule for the introduction of taxis was also mentioned in the scheme.

As cab aggregators entered the taxi market, their business models began functioning outside the prevailing regulatory regime. The aggregators claimed that they are agents who link the commuters to the taxi services. This gave them the freedom to operate without having a radio taxi license. These companies are registered as IT companies as they provide the online platform through which taxi services can be hired by the customers. They follow an operational structure that is different from what is followed by radio taxis and traditional taxis as they can supply cab services without owning even a single taxi.

The TNCs introduced dynamic pricing and chose not to follow fares set by the government. Instead, they charge the customers on the basis of distance covered, time taken to travel, demand for cabs at the time of travel as well as the type of car hired.

The initial response of different states to the emergence of cab aggregators was to bring them into the existing regulatory framework. The governments of Delhi (2015)^{xv}, Karnataka (2016)^{xvi}, Maharashtra (2015^{xvii} and 2016^{xviii}) etc. came up with regulations for the aggregators. All these regulations were quite similar in nature and gave emphasis to minimum and maximum fleet size, induction schedule and handsome amounts as security deposits and licensing fees, mandates regarding type of fuel to be used, vehicular profile and so on.

Let us take the example of the Maharashtra City Taxi Rules of 2016xix. According to this rule, the permit fee for a cab of engine capacity less than 1400cc is ₹ 25,000 and for a cab of engine capacity higher than 1400cc is ₹ 261,000. No such fee was charged for the traditional 'black and yellow' cabs even if they were attached to the aggregators. It also mentions that at least 50 per cent of the taxis have to be of engine capacity 1400cc or more. Apart from this, the applicant for a license also had to submit a bank guarantee of fifty lakhs per 1000 vehicles. So, for an aggregator to operate with 500 taxis in the city of Mumbai, the minimum amount required for security deposit and permit will be ₹7,65,00,000 (₹ 50,00,000 + 250 x ₹ 25,000 + 250 x ₹ 2,61,000). The rule also did not allow the aggregators to set fares on their own unless it's having an engine capacity of 2000cc or more.

Even though most states tried to bring restrictions on the aggregators, there were some rules that allowed TNCs to operate freely. One such directive was that of West Bengal government to regulate the operational activities of 'On Demand Transportation



Technologies Aggregators' (ODTTA)**This primarily focuses on the safety of passengers and freedom of operation for drivers. There is no requirement of hefty security deposits and permit fees in this scheme.

Taxi regulation in Kerala

Taxi regulation emerged in Kerala in the form of Hackney Carriage Regulation passed by the Maharaja of Travancore in December 1913. This was framed on the lines of the Hackney Carriage Act of 1879 in aspects like licensing, numbering of carriages, stands for hackney carriages, specifications of carriages, limit on number of passengers etc. A fare table, which was based only on the time taken to travel, was also included in this regulation. But the regulation allowed to charge lower than the fares set by the government and to ply the hackney carriage as a stage carriage. The regulation also mentioned minimum speed of carriage, maximum distance which the driver is bound to drive etc.

Motor cabs began to be regulated in Kerala from 1940s through taxi permits^{xxi}. Most regulations on hackney carriages were made applicable to motor vehicles by the enactment of the Motor Vehicles Act of 1939. Although there were different provisions in the 1939 Motor Vehicles Act to regulate the taxi industry in terms of number, mode of operation and so on, these provisions were not implemented initially. The regulations that we see today in the taxi industry in Kerala have all evolved gradually over the years.

As per the Motor Vehicles Act of 1939, only tax was collected from taxi owners who received the permit. Some cab owners did not register their vehicles as taxis to evade the tax and they operated taxis without permits. Taxis were less in number and fare regulation was not practiced. It was only in 1957, the topic of taxi fares and metering of taxi cabs was first discussed in the Kerala legislative assembly xxii. It was pointed out by a member of the legislative assembly that taxi metering system is followed in the city of Madras and can be made mandatory in Kerala as well. But this argument was turned down because taxi meters were not feasible in the industry during that time. Even though the Motor Vehicles Act of 1939 required a fare table to be displayed in taxis, it was not made obligatory in Kerala to exhibit any fare table until 1962xxiii. The fare regulation and exhibiting of fares were made mandatory only for a few cities in 1962 xxiv. In 1963 and 1965, more cities were added on to the list of regulated cities. Taxi meter was made compulsory for all district headquarters in the year 1973. Although meters continued to be unenforced in small cities as taxi operations were uneconomical in smaller towns, the



later years saw all taxis following the meters and the fare fixed by government which was periodically revised.

1940 1879 1939 Hackney Carriage **Hackney Carriage** Motor Vehicles Act, Taxi permits issued Act, India Regulation, India Travancore Cochin Hackney Carriage Act, Cochin 1973 Taxi meters made Fare table display First discussion in made mandatory mandatory in all Kerala Legislative Assembly regarding district headquarters taxi meters

Figure 3: History of taxi regulation in Kerala

Source: Compiled by CPPR

Analysis of Taxi Regulation

The study attempts to analyse how the regulation of taxi sector has played out, what impact it has left on the sector and the relevance of these regulations in the contemporary context. The MVA of 1988, the cornerstone of regulation of taxi industry, drew more or less a lot from the Hackney Carriage Act of 1879. This was a fundamental flaw of the Act which failed to recognise that motor vehicles operate differently from horse driven carriages. For example, the MVA prohibits the picking up or setting down of passengers at places other than notified stands or halting places^{xxv}. This has been taken from the 1879 Hackney Carriage Act^{xxvi} which appoints places as stands for the carriages and prohibits them from waiting for hire except at such places. The rationale behind the provision in the 1879 Act could have been that horses can be difficult to control and need to be fed at regular intervals for which stands are necessary. However, the same cannot be said about motor vehicles. The policymakers failed to see the differences inherent in the operational mechanism of hackney carriages and motor vehicles.



When taxi regulation first came into existence, hackney carriages were the only mode of public transport available. The government introduced regulation for it felt responsible to provide good quality taxi service to the people as well as maintain market decorum. This intervention of the state in taxi industry could be explained by the Public Interest Theory of regulation wherein the government is motivated by the desire to serve the public by ensuring quality control and preventing undesirable market outcomes.

The intention behind the regulation of the taxi sector was social justice rather than economic efficiency. However, one can learn that the attitude of the state has changed as time progressed. This can be inferred by looking at the example of Kerala. The Kerala government, for instance, did not make it mandatory to exhibit fare in taxis till 1962 because of the memorandums that were submitted against it to the government by the taxi operators. Hence, the regulated stakeholders in the industry got the opportunity to seek decisions from the government that are favourable to them. Also, the taxi fare in Kerala is revised arbitrarily by the government from time to time as per the demands of the taxi operators' association as found by the first scientific study on the periodic variation of cost of operation of taxis according to variation in input prices by National Transportation Planning and Research Centre (NATPAC) in 2010 xxviii. The taxi operators sought a fare hike whenever they felt there was a significant increase in the price of fuel or auto parts. The gazette notification published by the Kerala government in 2014 mentions the representations received by the government from the leaders of the trade unions seeking fare revision xxix. The government often acted as the mediator between the trade unions and the public in the negotiations on fare revision. The consumers who had no formal organisation were not appropriately represented in these meetings. These meetings would invariably end with the decision to raise the fare.

Here, the regulated entity earns the right to seek decisions advantageous for them from the government by claiming that the regulations are affecting them undesirably, while the government feels responsible for their state and steps in to support them. This action of the government can be explained by the Private Interest Theory of regulation which states that the regulator will eventually act in the interest of a private group rather than the public, and most likely, the regulator will tend to act in the interest of the regulated xxx.

The growth in the number of taxis in Kerala over the years indicates that the taxi industry is not a loss making industry. If the taxi service providers are making a profit, it is determined by the fare of the taxi. Since the government is fixing the fare, it then becomes an agent that ensures profit for the industry.



It is important to understand that the fare regulation is an undeniable consequence of the quantity regulation imposed by the government on the taxi sector. Here, it is evident that the ill effects brought by the regulatory mechanism were addressed by introducing more regulations into the system.

Another observation emanating from taxi regulation in Kerala is that the major concern of the government regarding taxis without permits was that they were evading tax and not that they deteriorate the quality of taxi services available to the people. The regulation was thus considered as a mechanism for collecting tax from taxi operators. In Kerala, there were instances of private cars running as taxis and the government took action against them by making them pay the tax for taxi permit. Hence, it is clear that the primary consideration of the government was not to manage traffic or enhance the quality of cab services or even make taxis cheaper for the public.

Market observation in Kerala reveals that people travelling in taxis were satisfied if they paid the amount fixed by the government and were dissatisfied only if taxi drivers demanded a fare above what was set by the state. It is clear that the people saw the fare notified by the government as legitimate and that it was the minimum that they had to pay to avail the taxi service. This belief is proven wrong by the advent of cab aggregators like Ola and Uber which began to charge customers less than what was fixed by the government. In fact, sections of society who hitherto did not avail taxi services started using them since the cab aggregators have come into the scene. This points towards the bigger picture that lower prices realised through newer technology brought forth by aggregators which function outside regulatory framework, has contributed to the growth of the industry by increasing the demand for taxi services. The customers who are swiftly switching from traditional taxis to cab aggregators reveal that the traditional taxi drivers have the tendency to overcharge them as they find the fare set by government infeasible while the cab aggregators charged only what was informed in advance according to the distance to be covered, time of travel, demand for the cabs at the time of booking and the type of car booked for the ride.

It is conspicuous that the regulatory system has led to the deterioration of the quality of taxi services. The guarantee of minimum fare to the taxi operators through fare regulation meant that the driver made no effort to provide better quality service. The government's action ensured a profit for all the taxis regardless of the service quality giving the taxi operators no incentive to improve the standards of the service. Hence, the drivers maintained only the bare minimum standards mentioned in the regulatory laws. In the regulated environment, constant supervision and inspections are required to make sure



that the taxis in operation meet minimum standards. In a non-regulated market, there will be effective competition between the taxi service providers which will force them to improve their service so as to retain their customers or to get new customers.

Last mile connectivity is one of the major criteria that guide people while making a choice between private vehicles and public transport. The existing regulations make taxis inaccessible to the people which could have been one of the reasons for the considerable increase in the number of private vehicles over the years. For example, in 1971, the percentage of taxis among total cars and jeeps in Kerala was 18.9xxxi. However, if we take the number of cars registered in the state in the year 2015-16, taxis contribute to only 5.5 per cent of it. It is interesting to note that, according to the Motor Vehicles Act of 1988, the number of taxis can be regulated within a city with population of more than five lakh, but there is no provision to regulate private vehicles. In an era in which we expect transition from private transport to public transport for optimal utilisation of diminishing resources, such laws limit the capability of public transit.

Total number in 1971 Registrations in 2015-16 Taxi cars Taxi cars 8848, 10743, 19% 5% Private Private cars/ cars/ jeeps jeeps 184971, 38122, 95% 81%

Figure 4: Percentage of taxis and private vehicles in Kerala

Source: Kerala Motor Vehicles Department

The emergence of improved technology has however enabled mobile applications to bring cabs to the doorsteps of the commuter. A few years ago, no one would have even imagined that accessing a taxi would become so easy. Now even people who can afford to buy a car are questioning the need of one, because there is one available at your fingertips all the time. Taking a taxi has become less expensive than owning and driving a car. Taxis that work 12 to 16 hours a day on an average are decreasing the idle time of vehicles considerably as the private cars run just one or two hours a day on an average.

The restriction imposed on the mobility of taxis through the prohibition on street hailing makes the business uneconomic for the traditional drivers while the app-based cab



services pick the customers from the location entered in the app, most often from their door step. This gives them the benefit of less or no dead mileage while the traditional taxis have to return to their stands after dropping the passenger in order to get the next trip. The traditional cab drivers consider the app-based cabs to be violating existing rules for picking up passengers from any spot they want. They would like the state to bring the cab aggregators under the ambit of prevailing regulation, often leading to friction between the competitors. The stakeholders of the taxi industry fail to see the need to remove regulations, rather than add more, in order to allow the sector to expand and attain its optimum potential.

Conclusion

The illogical use of regulation has restrained the taxi sector from achieving optimal performance. The century old regulations existing in the taxi industry are irrelevant in today's context and prevent the sector from reaching its full potential. Traditional taxi services are unable to compete in the market because of the regulations hovering over them while the newer players are finding it difficult to innovate and explore the untapped prospects due to regulations. The need of the hour is to liberalise the government restrictions on the taxi industry.

While the quality and safety regulations are in the interest of the public, other regulations on quantity, fare and mobility can be done away with. However, it would be prudent to review the effectiveness of the quality regulations that are in place today. A relaxed taxi regulatory regime will lead to increased market competition resulting in higher quality of services. Better taxi services will discourage the number of private vehicles on the road and in turn reduce congestion and pollution.

It is essential to dismantle the regulatory framework that deteriorated the quality of cab services and led to its inaccessibility. The distortions created in the market by the regulation should be addressed by a government policy that encourages innovation and competition while discouraging the emergence of monopoly in the industry. The state should also make sure its policy is relevant to the times and addresses newer practices in the taxi industry like ridesharing and carpooling which could lead to economically efficient use of motor vehicles and provide larger benefits to society including, but not limited to, reduced emissions and resultant outcomes.





05%2004/debates/16050465000002/TaxiLicensingRegulations?Highlight=hackney%20carriage%20act#contribution-3C5624A1-36DA-4B8F-B6EB-39D843F93FB7.

http://www.legislation.gov.uk/ukpga/1831/22/pdfs/ukpga_18310022_en.pdf

http://transport.karnataka.gov.in/uploads/notice/Aggreegator2 4 2016.pdf.

xviiHome Department, Maharastra, "Motot Vehicles Department, Maharashtra," 2015. [Online]. Available: http://mahatranscom.in/pdf/Aggregator%20Notification%209.9.15.pdf.

xviii Home Department, Maharastra, "Motor Vehicles Department, Maharashtra," 2016. [Online]. Available: http://mahatranscom.in/pdf/Aggregator%20Rules-15 10 2016.pdf. xixibid.

**Transport Department, Govt. of West Bengal, "Conduct of On Demand Transportation Technologies Aggregators," 2015. [Online]. Available: https://wbxpress.com/conduct-on-demand-transportationtechnologies-aggregators-odtta/.

xxi Questions and Answers, Library Archives, Kerala Legislative Assembly, Available: http://statelibrary.kerala.gov.in/gazette/index.php.

^{xxii} ibid.

^{xxiii} ibid.

xxiv Ibid.

ⁱ Fiona Poole (1998): Private Hire Vehicles (London) Bill (Bill 10 1997/98), House of Commons Library Research Paper

ii"June 1654: An Ordinance for the Regulation of Hackney-Coachmen in London and the places adjacent.," in Acts and Ordinances of the Interregnum, 1642-1660, ed. C H Firth and R S Rait (London: His Majesty's Stationery Office, 1911), 922-924. British History Online, accessed September 8, 2017, http://www.british-history.ac.uk/no-series/acts-ordinancesinterregnum/pp922-924

iii Ibid.,

iv https://hansard.parliament.uk/Commons/2016

vi J.P. Toner (1992): Regulation in the Taxi Industry, Institute of Transport Studies, University of Leeds. Working Paper 381,

Motor Vehicles Act (1988), Government of India

viii Motor Vehicles Act (1988), Government of India

^{ix}Home Department, Maharastra, "Motot Vehicles Department, Maharashtra," 2015. [Online]. Available: http://mahatranscom.in/pdf/Aggregator%20Notification%209.9.15.pdf.

^{*}Transport Department, Government of NCT of Delhi, "delhi.gov.in," [Online]. Available: http://delhi.gov.in/wps/wcm/connect/doit/Delhi+Govt/Delhi+Home/Acts+and+Rules.

xii Government of Kerala, "Kerala State Central Library," [Online]. Available: http://statelibrary.kerala.gov.in/gazette/index.php.

xiiiK. Motor Vehicles Department, Kerala Motor Vehicles Rules, 1989, Law Books Centre.

xiv Transport Department, Government of NCT of Delhi, "delhi.gov.in," [Online]. Available: http://delhi.gov.in/wps/wcm/connect/doit/Delhi+Govt/Delhi+Home/Acts+and+Rules. xv Ibid.

xvi Transport department, Government of Karnataka, "The Karnataka on- demand Transportation Technology Aggregators Rules, 2016," [Online]. Available:

xxv Motor Vehicles Act (1988), Government of India

xxvi Government of India, "I Kanoon," [Online]. Available: https://indiankanoon.org/doc/103056/.

xxvii J. d. Hertog, "General Theories of Regulation," Economic Institute/ CLAV, Utrecht University, 1999.

xxviiiNational Transportation Planning and Research Centre, "Price Index for Taxi Operation (PITO) in Kerala," [Online]. Available: http://www.natpac.kerala.gov.in/images/ar2010-11.pdf.

xxix Kerala Gazette, Notification issued under G.O.(P) No. 74/2014/Tran. dated 17th October 2014

xxx Government of India, "I Kanoon," [Online]. Available: https://indiankanoon.org/doc/103056/.

xxxi Questions and Answers, Library Archives, Kerala Legislative Assembly, Available: http://statelibrary.kerala.gov.in/gazette/index.php.