

## **Obstruction in Mobility of Urban Dwellers A Study on Vehicle Handling and Road Using Practices of Kathmandu**

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### **Abstract**

*This study deals with two questions: Why have vehicle handling and road practices created constraints in smooth mobility of people in Kathmandu? And, what are the social causes of mobility obstruction of people on road in Kathmandu? Obstruction in mobility is a socially created problem since it is closely related to vehicle handling practices (traffic rules breaking and social behaviors against handling system and road practice) in city area. The causes of an obstruction of people's mobility in roadside are not narrow road and over vehicles but rather our wrong vehicle handling and road using practices. Social practice is one of the significant indicators that reflects situation of development of any societies. Often every society considers either its practice is the best or expects to be the best. But some practices of particular society contribute to run society positively; some contribute to hinder the positive change. Although vehicle handling is a physical issue, it has been impacting in the mobility of people and their daily life activities which have converted it as a social issue. The very vehicle handling practices are conditioned by our historical and social structure. Based on the empirical observations of ongoing vehicle handling practices, this paper examines how these practices are creating problems in people's smooth move and hampering their daily routine-works. Finally it argues that the claim that the lack of infrastructure and weak intervention of concerned law are the causes of obstructions for smooth move and execution of daily routine-works are myths. The activities related to vehicle handling such as stopping in non-stop areas, lane disobeying, unnecessarily overtaking, parking violation, avoiding and abusing traffic police, ignoring zebra cross, over (unlimited) speed etc. are developed as mal-practices in vehicle handling sectors which have been creating obstructions in smooth mobility of people in Kathmandu because of the execution of flexible and unfixed laws, low amount of penalty or no penalty in some cases concerning to vehicle handling practices and lack of knowledge about smart and advance practices of urban lives.*

**Keywords :** intervention, mobility, obstruction, social practice, vehicle

### **Introduction**

Constitution has provisioned the freedom to move and reside in any part of Nepal; and freedom to engage in any occupation or be engaged in employment, establish and operate industry, trade and business in any part of Nepal (The Constitution of Nepal, 2072, p.12-13). Generally People move and do their business and occupations within this provision. As the mobility of people of the world has increased for work, study, business and excursion at present global context, Nepali people are not so far isolated from it. Because of situating as a land-locked country, land vehicles are the major means of mobility for urban dwellers in Nepal. But, especially in Kathmandu, unsophisticated mobility has

become almost impossible for the people. There are various factors that stand for the obstruction of smooth mobility. Therefore, this study concentrates to reveal people's existing vehicle handling practices merely as the causes of the obstructions in mobility of all urban dwellers. Knowledge is both temporal and territorial (Slattery, 2003, p.131-132), knowledge about driving, riding, conducting, parking, stopping, turning and overall vehicles handling are socially and locally constructed practices by which people today are either making their lives smoother or more hazardous in many urban areas. A vehicle is a mobile machine which makes people, cargo and other goods move from one place to another. Generally vehicles consist of wagons, bicycles, motor vehicles, railed vehicles, watercraft, aircrafts and spacecrafts. But this study focuses only on land vehicles and their handling practices that are more and more essentials to people's daily life especially in urban settings. In this study, vehicle handling is a description of the way in which land vehicles respond and react to the inputs of a controller (drivers/riders) as well as how it moves on the road from departures to arrivals.

History of vehicle is no longer than the history of development; when vehicles were invented, society began to transform towards urbanization. Today all of the urban societies as well as their dwellers are based on different types of vehicles. Most of the developed societies' dwellers run smoothly onto their vehicle facilities. New York, London, Paris, Tokyo, Singapore, Seoul, Hong Kong, etc are the seven most run cities in the world. Among them Hong Kong is highly connected city which has been connecting more than 150 international destinations though it has managed vehicles well for its smooth mobility (NHTSA, 2002, p. 3). But some cities from both underdeveloped as well as developing countries have been facing mobility obstructions due to their many local reasons i.e. local vehicle handling social practices. Those obstructions are standing as the hindrances of the development of their towns, cities, and overall countries as well. Kathmandu is one of the lifelines of our country from many development and business reasons. If the mobility of this federal capital city is obstructed, it explicitly and implicitly impacts in the whole lives of all people of this underdeveloped country. People especially in Kathmandu valley are running in a more complex traffic situation than ever before. Novice motorists are influenced by the complexities of this situation as well as the many other factors in their lives and occupations. New dwellers are also encouraged to buy vehicles for their daily move. Thus, this study refers only to the land motor vehicles that are used for day to day business and for mobility of people in their daily lives. Therefore, vehicle handling practices, in this article, rely on the activities which are related to handling the vehicles such as driving, riding, conducting, parking, stopping, overtaking, moving, turning as per wish etc.

### **Statement**

Today, mobility of people, in almost all societies, depends upon the availability and use of transportation facilities. In the early societies, vehicle handling practices might not be the social problems because numbers of vehicles were few and only very low number of people used it as their needs in their daily and practical life. But in today's society, vehicle has become a great social concern because it is almost indispensable sector for the city dwellers. Thus, vehicle handling practices have been developed as social issues because those practices directly or indirectly are being connected in daily lives of urban people. Right vehicle handlings have been assisting people greatly in urban life but wrong practices

are not only hampering and hindering their lives but also obstructing the further development and progression of urban societies. Its proper management has made people's lives easier and faster but its improper management and wrong practices have propelled their lives still in congestion and sophistication.

Vehicle handling practice is not very older than the history of urbanization and city development. Thus, vehicle handling practice and urban life are twin-born. Generally vehicle handling seems as a physical issue but its connection and impacts on daily lives of people in urban areas have converted it as a social one. In our country, first vehicle (Car) was introduced in 1958 BS, first license was issued in 1978 BS, vehicle registration system was introduced in 2003 BS, traffic police detachment was established in 2009 BS, transport act was formulated in 2020 BS, traffic light was introduced in Kathmandu in 2023 BS, one way system was enforced in 2041 (Bulletin of Metropolitan Traffic Police Division, 2019). In the one hand, as classical sociologist argues habits of thought are an outcome of habits of life, road expansion in Kathmandu was started in 2011 and it is still in execution in a number of areas but smooth mobility is still challenging for city dwellers in Kathmandu; it may be because of the habits of thought about vehicle handling. In the other hand, many people believe that social status can be earned and it can be shown by the exposure of consumption rather than the accumulation of wealth. Thus, new dwellers who generate high income usually buy vehicles for their high social status. Giddens's duality of structure is applied to assess the obstruction in mobility of urban dwellers regarding vehicle handling practices. As Giddens argues that a structure can be both constraining and enabling to the actions of people (Ritzer, 1992, p. 572), structure of vehicles and road using practices seem constraining the mobility of people. Structure is to be understood as the social rules, resources and systems as well which influence situational action. Thus, the system, rules and resources regarding to vehicle handling practice are influencing the whole mobility of urban dwellers in Kathmandu. A system is a recognizable; and reproduced pattern of relations between people which are organized as social practice (p. 572). Therefore, system of vehicle handling is reproduced again and again so that it could not have been managed over the long time.

Observation and interview techniques are applied to gather data and accidental as well as conventional sampling methods have been used for this study. Explanatory research design has been considered as applicable design for this study. Many of the secondary sources of data are attached to verify the informative situations raised in the analysis of primary data. To reveal the vehicle handling practices that have remained as obstructions in the mobility of people and to assess the local vehicle handling practices as social causes of mobility obstruction of people in Kathmandu are set as objectives of the study.

Weber's bureaucratization process argues that only in the modern western world can a rational-legal authority system develop, and only within that system does one find the full-scale development of modern bureaucracy (p. 27), thus, city dwellers of developed countries have developed their cities in a very systematic way that people can move easily without any mobility obstructions. As his further argument, the rest of the world remains dominated by traditional or charismatic authority

systems, which generally impede the development of a rational-legal authority system and modern bureaucracies (Ritzer, 1992, P. 27), most of the cities of underdeveloped countries like Kathmandu run in very disreputable situation. Finally, Kathmandu, the capital city of one of the least developed countries of the world, Nepal, is still in dilemma in the sectors of development. Especially the urban sectors which symbolize the modern and smart development are almost in quandary situation. Vehicle handling is very terribly being practiced in such locality. Motorists generally practice their traditional as well as charismatic authority that almost all of motorists ignore traffic rules. Handling vehicles on their own wish is the traditional authority that they have been utilizing since they started to ride/drive.

### **Theoretical blending**

Giddens's theoretical concept of structuration and Pereto's concept of elite theory of social change have been applied to reveal the causes of mobility obstruction of urban dwellers which is being caused by the vehicle handling practices of people who have been living in Kathmandu for many years. The structure which is both constraining and enabling to the actions of people (Giddens, 1984, p. 163), newly widened roads have been enabling the mobility of people but the handling practice is standing as a constraining factor of people's mobility in Kathmandu. As he says structure is to be understood as the social rules and resources which influence situational actions; and it is a property of social systems (Giddens, 1984, p. 163), traffic rules and other available traffic lights, overhead bridges, zebra crossings etc. are the resources that are implicitly influencing the overall mobility of people and their daily life activities. As Giddens says a system is a recognizable and reproduced pattern of relations between people which are organized as social practice, our vehicle handling social practices have been developing alike (Ritzer, 1992, p. 572-73) which would be very meaningful and remarkable.

Contrary to Marxian theory, in an elite theory of social change, Pereto argues that societies inevitably are dominated by small elites (p. 38-39) that are operated on the basis of enlightened self-interest. They rule over the masses of people, who are dominated by non-rational forces (p. 38). In our city, most of the people are dominated by the certain traffic rules breakers. Especially today's leaders who are known as small elites break the traffic rules especially when they reach in power. Similarly, small vehicle drivers/riders take over the other vehicles violating the line rules that has dominated the whole mobility of people in Kathmandu. Beside this, other drivers/riders take over the nearby vehicles as their revenge that ultimately creates the problem in whole mobility of people and hamper the daily routined lives. In this way, this study seeks to relate the social structure as a constraint of social mobility of people in Kathmandu. It is also supported by the theory of August Comte- Social Structure is a composition of social static and social dynamic where social dynamics are agents of social change (p. 38-39) which would be worth noticing.

### **Methods of the study**

Convenience sampling method was applied to collect data for this study. Simple survey was done to add some quantitative data to rectify the qualitative analysis for this study. Total 30 drivers/riders were taken as samples to understand the views about their vehicle handling related daily practices and activities across the roads. Other 10 different places (Kalimati, Sitapaila, Kalanki, Swoyambhu,

Banasthali, Koteswar, Maitighar, Tankeshwar, Machhapokhari, Lainchaur) in Kathmandu valley were observed deliberately for gathering data about daily practices regarding to vehicles' run. As described above, some information was also drawn through the accidental sampling (interviewing some pedestrians and observing surroundings) within these areas of Kathmandu to justify the scenario regarding the vehicle handling and road using practices.

### Analysis

According to Metropolitan Police Report (2076), more than 5000 accidents take place in Kathmandu per year. 80 percent accidents occur due to the negligence of drivers/riders among that of total. 5530 accidents took place in 2073/74 in Kathmandu valley. Among them, 5205 accidents were declared due to the cause of negligence of drivers/riders. According to Neeta Chimoria, only 10% drivers stop in Zebra crossings. Pedestrians only attempt to cross the road from zebra crossings when they gather at least 5 in main crowd area (Kantipur, 2075. Poursh- 28). In spite of being careful in zebra crossing, 40% pedestrians fall in accidents and get dead among the total deaths of vehicle accidents. In 2073/74, out of 182 accidental deaths, 79 deaths were of pedestrian. It was followed by 51 out of 149 in 2074/75. In 2074/75, 14231 drivers/riders were punished for their traffic law violation. Among them, 13330 were male and 901 were female. From 26 Ashwin 2071 to 28 Poush 2075, 279756 drivers and riders were fined/punished for their traffic rule violations. Among them, 266584 were males and 13272 were female. There are only around 365 zebra crossings in Kathmandu. But they are not strictly followed by both pedestrians and drivers/riders. Mainly people do not use overhead bridge to cross the road in Kathmandu. According to Transportation and Traffic Engineer, Ashish Gajurel, urban areas must have zebra crossings in each distance of 500-600 meters from one to another. It must be 50-60 meters far from the turnings. But, zebra crossings are neither sufficient nor made as scientifically as it should be. Especially in foreign countries, drivers/riders stop their vehicles just after seeing people attempting to cross the road. But in our country, drivers/riders and pedestrians both parties ignore the zebra crossing and its rules as well. According to SSP Bashanta Panta, it has become the practice of this city which is causing the more number of accidents in many contexts.

**Table No.-1**  
**Perception of drivers and riders toward parking**

Categories	No. of respondents	Percentage
Needs easy access	18	60%
Needs specific areas	7	23.3%
As per situation	5	16.7%
Total	30	100%

Field survey, 2020

Many drivers and riders thought that easy access was needed for parking because people were always in a hurry and busy in city. They needed parking in each sectors of their business. But there was not sufficient parking areas in Kathmandu; therefore, people parked in every place where they felt easy. They would also have to turn back and did so too; but it disturbed the other vehicles in their smooth

mobility. As Pereto argued that society inevitably is dominated by small elite, the vehicle handling is totally dominated by the elite of Kathmandu. People who had earned money in any ways spent it in their luxurious goods. Private vehicles had become the symbol of individual prosperity and luxurious lives in Kathmandu. Most of the vehicle owners were found from the broker or business sectors which had played vital roles in mobility obstruction. It seemed lack of common sense knowledge in the case of vehicle handling because they were generally punished but escaped in many cases threatening the rule implementers. As a result, who owned the vehicles themselves tried to make the rule of parking and turning. Sometimes they suggested police in their discussions. They threatened both rule implementers and police. This was the daily process which eventually obstructed the mobility of people in Kathmandu. They were the new and small elite of Kathmandu valley who had been dominating the overall mobility of city people. Out of the total 30 respondents, 60% people replied they needed easy access of vehicle from their business site. 23% of them advised to manage specific parking areas but did not demanded easy access of vehicle from their business site where as 16.6% people emphasized situation that they did according to the situation of the area. If there were no police and vehicle pressure, vehicles could be parked for few minutes; if not, they used to go to the parking side and said existing situation was not bad.

People who do not own vehicles either move on foot or use public vehicles. But, they would have to suffer from many aspects such as theft, crowd, blaming, unnecessary torture, standing position inside vehicles, yawning stop of vehicles etc.

**Table No.-2**

**Perception of drivers and riders toward stopping**

Categories	No. of respondents	Percentage
As per need	20	67%
Rule Basis	5	16.5%
Situational	5	16.5%
Total	30	100%

Field survey, 2020

67% of the vehicle handlers think their vehicles should be stopped as per their needs. It is difficult to return to the work place leaving their vehicles from the parking area. They think it is insufficient and unsafe, and very limited too. In some context, they would have to return back quickly because they are just to carry the goods off and sometime to fetch them. In such situation, it is almost impossible to stop the vehicles in the parking area.

Likewise, most of the passengers wait vehicles in front of their working area; they don't move to the vehicle stands. This situation obliges us to stop in the place of man-stand instead of vehicle stand. But generally those passengers have been missed in case of the presence of traffic police because traffic police are always in search of mistakes of the drivers. This fact helps to conclude that most of the drivers and riders are convinced to stop vehicles as per their need.

Other 16.5% of the riders and drivers think that vehicles should be stopped on the basis of traffic rules. Parking area and vehicles stands should be allocated and managed well according to the demand. But they believe that no more drivers and riders follow the traffic rules that is why roads seem rush most of the time in Kathmandu. They generally stop their vehicles in the allocated area but they are always back and late in their move. As Weber argues that only in the modern western world can a rational-legal authority system develop, and only within that system does one find the full-scale development of modern bureaucracy. The rest of the world remains dominated by traditional or charismatic authority systems, which generally impede the development of a rational-legal authority system and modern bureaucracies, the vehicle handling and road practices of Kathmandu have been obstructing the mobility as hindrances of city development.

**Table No.-3**  
**Types of vehicles that generally create obstruction in mobility**

Causes	Total study areas where studied mobility obstructions	Obstructions found in various study areas of Kathmandu in study period	Percentage
Manual traffic management	10	8	80%
Construction equipments and materials on road side	10	8	80%
Lack of bus stop	10	7	70%
Lack of sub-ways and overhead bridges	10	6	60%
Bus stops on cross-roads	10	6	60%
Street vending and goods stall on road side	10	10	100%

Field survey, 2020

Above data shows that passengers buses are the most obstructers in the mobility of people. They do not follow the rules for the stop. Passengers generally wish to get into the bus from where they stand. They don't like to go to the bus stop in many cases because it is available in their own location where drivers stop their buses by the hand raise of the passengers. According to data, 23% of the mobility of people is obstructed by those vehicles which are not stopped in the allocated stops. Their haphazard stop not only hinders the speed of other vehicles which are behind them but also causes the accidents in some extent. Haphazard crossing of the pedestrians without zebra crossing is another cause of vehicles' mobility obstruction. Scattered street shops and street vending not only obstruct the mobility of vehicles but also disturb the smooth walks of people. Sitapaila, Banasthali, Kalimati, Swoyambhu, Chahabil, Teku, thapathali, Maitighar, Chandol, Bhat-bhateni, Panipokharei, Maharajgunj, Sinamangal, Old

Baneshwar, Maitidevi, Dillibazar, Putalisadak, Bagbazar, Ratopul, Balkhu etc. places do not have the specific bus-stops. Other some bus-stops like Tripureshwar, Kalanki, Gwarko, Koteshwar, Tinkune, Sundhara, Naxal, Lainchaur, Sorakhutte, Machhapokhari, Gongabu, Sukedhara, Chakrapath, Singhadurbar (east north corner) etc. are very narrow and nominal. That's why, in most of the cases buses are stopped in front of cross roads that mostly obstruct the smooth mobility of people by hindering the vehicles' mobility. Likewise, second highest obstruction is created by school/college vehicles by picking up their students from where they stand. Data shows 20 % obstruction is generated by those vehicles because of unspecified place of picking up. No particular places for the stand of school/college vehicles found in any areas in Kathmandu during this study period. They themselves have chosen their vehicle stand according to the consent of parents as well as their students. Water tanker and mini-lorries, construction vehicles and garbage collectors, industrial goods carriers and private car and bikes are the third largest mobility obstructers in the mobility of people in Kathmandu because almost all of them are stopped as their needs. All of them create 10 % obstructions in the mobility of people. Water fetching vehicles generally park their vehicles to distribute water on the road side that have been obstructing the smooth mobility of people. Generally it takes 10 to 20 minutes to empty the tanker or distribute water that hinders the mobility of vehicles and sometimes pedestrians. They were found doing so thinking as their rights because they have the perception that it is one of the essential goods so that they would have rights to stand their vehicles for its distribution. Unnecessarily parked and VIP vehicles also create obstructions on the mobility of people in Kathmandu. Both create 6.5% obstructions in the mobility of people out of total obstruction in Kathmandu. Likewise, vegetables and fruits carriers also obstruct mobility especially in morning time. They obstruct 3.3% mobility of urban dwellers in Kathmandu.

**Table No.-4**  
**Other important causes of mobility obstructions**

Categories of Vehicles	Total Number of Obstructions Made by Vehicles	Percentage
Water Tanker and Mini-lorries	3	10%
Unnecessarily parked vehicles	2	6.5%
Vegetable/fruits carriers	1	3.30%
Construction and Garbage collecting vehicles	3	10%
Industrial Goods carriers	3	10%
Passenger buses	7	23.4%
School/college vehicles	6	20%
Private car and bikes	3	10%
VIP Vehicles	2	6.5%
Total	30	100%

Field Survey, 2020



Manual traffic management, storage of construction equipments and materials on the road side, lack of sufficient bus-stops, lack of sub-ways and overhead bridges in sufficient numbers, bus-stops on cross-roads, street vending and goods stall on road sides are found as other major factors of mobility obstructions in Kathmandu. Manual traffic management found police-men/women centric that vehicle mobility depended on their hand signals. In some places it found well managed but in most of the places, it depended on their interest and mood what they felt on the spot. Drivers and riders were found ignoring the manual hand-stop signs of the traffic police. In some cases, they discussed with traffic police. Pedestrians were also found unmanageable while facing the traffic jam on the road side that almost all did not want to stop for some seconds in front of zebra-crossings and other places. It found very problematic in the management of mobility obstruction in Kathmandu valley. Out of the total 10 study areas, 8 areas (80%) were found rush in this aspect.

It is the social consensus among the people in Kathmandu that people could store their construction materials and equipments on the road side because none came to complain there. Government also did not take any actions against those activities. Police were found facing problems in traffic management in such areas but could not find any action done against it. Out of the total 10 areas of study, 8 areas (80%) were found problematic in such aspects. Lack of allocated bus-stops and stops on cross roads were other major problems of smooth mobility in Kathmandu. Out of intended 10 areas of study, 7 areas were found without proper bus-stops and out of 10 areas, 6 areas (60%) were found bus-stops on cross roads that hindered mobility of people. Unnecessary parking and need based turns of vehicles in absence of traffic police were also the causes of obstruction in smooth mobility of people. Most of the crowded road sides without sub-ways and over-head bridges also faced the mobility obstruction because people crossed the roads as per their destination which obstructed the mobility of people. Out of 10 crowded road sides, 6 places (60%) were found without sub-ways and overhead bridges. This situation urged people to cross roads according to their interests that also caused the mobility obstruction. Street vending and goods stall in front of shops covering the most part of the pavement pushed pedestrians towards the roads which made mobility obstruct in most of the cases in Kathmandu.

Above data show the converse situation of social dynamics as described by August Comte because the situations of social dynamics have been remaining as the hindrances of social change in relation to other developed cities.

### **Conclusion**

As Giddens argues that structure which is both constraining and enabling to the actions of people, newly widened roads have somehow been enabling the mobility of urban dwellers but the vehicle handling practices are standing as a constraining factors for people's mobility in Kathmandu. As he says structure is to be understood as the social rules and resources which influence situational actions; and it is a property of social systems, traffic rules and other available traffic lights, overhead bridges, zebra crossings etc. are the resources that are implicitly influencing the overall mobility of urban dwellers and their daily life activities; but conversely the shop stalls and, haphazard and scattered

road crossing practices have affected the smooth mobility. On the other hand, Streets shops have been converted as road shops. Shop stalls and vending are not under the authority of traffic polices that has made them almost impossible to make people and their vehicle move smoothly. As Giddens says a system is a recognizable and reproduced pattern of relations between people which are organized as social practice, our vehicle handling and road crossing social practices are developing alike.

As similar as Pereto's explanation, in Kathmandu city, most of the people are dominated by the certain traffic rules breakers who are established as new and small elites. Especially small private and public vehicle (Micro Buses/Taxi) drivers/riders take the other vehicles over violating the line rules that has controlled the whole mobility of people in Kathmandu. Beside this, other drivers/riders take over the nearby vehicles as their revenge that ultimately has created the problem in whole mobility and has finally hampered the daily routined lives of people. Those types of vehicle handling and road practices have developed as social causes of smooth mobility obstruction of urban dwellers in Kathmandu. That's why; this study shows that handling practices of vehicles as well as illegally using pavement practices are socially constructed and have remained as the obstructions of smooth mobility of people in Kathmandu.

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### Abbreviations

TTE- Transportation Traffic Engineering

SSP- Senior Superintendent of Police

NHTSA- National Highway Traffic Safety Administration