

A Case Study on Hyderabad Traffic

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ABSTRACT

The traffic in Hyderabad is hastily increasing day by day because of population and migration of people from rural areas to city areas this results in the increase of traffic. Now Hyderabad has become a financial hub with commercial enterprise quarter, purchasing department shops, schools, hospitals etc. The Traffic congestion is viable for any mode of transportation particularly we centered on traffic congestion on roadways because of vehicles. Street networks is categorized primarily based on the following factors like lower velocity, long trips and queuing of the car for an extended duration. On this paper the causes for traffic congestion with illegal parking, traffic rules, seasonal factors, pavement failures, encroaching of footpath, passage of heavy goods vehicle on narrow roads, accidents and incorrect lane management are diagnosed and remedial measures to reduce the visitors congestion had been mentioned in brief at the study location of Hyderabad.

Keywords: Traffic congestion, encroaching of footpath, Pavement failures, Accidents, lane management, accidents

1. INTRODUCTION

Generally once capability of roads fails to produce peak demands, waiting and delays area unit caused particularly in road traffic giving rise to traffic jam. Congestion is that the delay obligatory by one vehicle on another for a given road if the traffic volume is high with larger delay then hold up is high hold up effects value on delay to passengers, will increase operation value of vehicle, high fuel and maintenance value etc. The explosive stop and go of car movement at signals leads high consumption of fuel thereby increasing the pollution level within the town by emitting varied unhealthful gases. If the traffic demand is high and interaction between vehicles slows down the speed of traffic stream it leads to hold up. If vehicles area unit absolutely halted for a extended period, then it's termed as a holdup or traffic jam. Because of this, the drivers get irritated and generally they conjointly result in the explanation for accidents hold up ends up in waste of valuable time and health of passengers and pedestrians. The fundamental quantity wasted by congestion ends up in loss of some productive work

2. ROOT CAUSE OF TRAFFIC JAM

There are several causes for traffic congestion in Hyderabad city which leads to loss of time, fuel etc.



Figure 1 Hyderabad Traffic Jam

2.1. No Parking Area

The primary driver of illicit stopping is inadequate parking spot accessible for stopping of vehicles. Unlawful stopping is one of the main problem in Hyderabad. Illicit stopping's are generally done before huge shopping centers, shopping complex and pathways and so on. Because of this activity stream is hindered and backs off the speed of vehicle until the point when the wrongly stopped vehicles are expelled.

2.2. Traffic rules

Another reason for traffic congestion is disobeying the traffic rules most of the two wheelers taxi and auto drivers don't obey the traffic rules to minimize their journey time. They choose shortcut and take wrong turns in prohibited areas which lead to traffic congestion. Sometimes they bypass via a slim gap provided in between medians which ends up in injuries.

2.3. Seasonal factors and Occasional congestion

Traffic congestion additionally relies upon seasonal elements there is large traffic congestion at some stage in wet season in comparison to every other seasons in Hyderabad. Throughout the wet cause most of the underground drainage systems are failed because of extra runoff of rain water which leads to obstruction in traffic drift and every now and then appealing seasonal gives supplied through shopping department stores leads to inadequate parking space, then excessive call for parking area is generated leads to illegal parking of automobiles on road side and footpath.

Every other motive for congestion is all through festival seasons due to utilization of roads & foot direction with the aid of providers to promote their merchandise which reasons site visitors jam and the traffic is diverted through slender roads and purpose visitors congestion.

2.4. Footpath

Although footpaths are to be had for pedestrians in Hyderabad pedestrians are unable to use them because they are occupied by way of street carriers which creates a variety of troubles to the pedestrians. In this technique pedestrians are shifting on to the road which slows down the site visitors drift results in congestion.

2.5. Accidents

A primary motive for traffic congestion is accidents, typically accidents are caused because of many reasons such as signal leap, over speed, drink and drive and many others., mostly 2-wheelers and pedestrians are injured on occasion observed dying in street injuries. Until the victims are moved from the spot visitors go with the flow is minimized and cause congestion.

3. PREVENTIVE MEASURES FOR TRAFFIC CONTROL

3.1. Penalty for Drivers

Huge amount of penalty or fine is to be imposed to the drivers if they don't follow the lane management system. Separate grades are to be provided based upon the vehicle type and classification to minimize the traffic jam.

3.2. Lane Management

Penalty is to be imposed to the vehicle drivers who parks their vehicle illegally on road and cause traffic congestion if they continue the same then have to be punished as per traffic law.

3.3. Local guide

Traffic congestion is minimized by proper suggestions collected from local people to minimize accident prone zones and make use of local streets and sub roads.

3.4. Junction improvement

Traffic congestion is minimized by proper planning of grade separators at junctions for 2, 3 and 4 wheelers. Make use of Free left, no signal points, U turns to avoid the traffic jam near the junctions.

3.5. Prohibition of heavy vehicles through narrow roads & usage of outer ring road

Based on the road width proper planning should be made for loading and unloading of materials mostly avoid the passage of heavy vehicles in narrow roads which don't take U-turn.

Traffic congestion is also caused due to passage of heavy vehicle through narrow road in most of the cases huge traffic is stuck for a longer duration. Generally this happens due to the diversion of traffic. Another major cause for traffic congestion is improper lane management drivers overtake the moving vehicles and they cross the lane some times which leads to road accidents and in some another cases mostly at railway crossing drivers don't follow the lane management system which leads to traffic congestion.

Not allowing the goods vehicles, heavy vehicles in the peak hours and make use of outer ring road improves the reduction of pollution, traffic jam and noise in city area. Safe stopping, sight distance and speed guns are introduced for the safety of travelers and vehicles.

3.6 Sensing Technologies

It is required to design and implement sensing technologies needed to handle those applications for traffic. We might build robust, low cost communication models to gather data from sensors. But unless we test our solutions in the field in medium to large scales, we will never come to know about practical issues.

3.7 Shifting of companies, pharma companies

To encourage industries located inside the Hyderabad city to move outside the Outer Ring Road limits, government planning to allow real estate development, construction of commercial complexes and housing projects on the land on which the industries are currently located.

The government has identified over 800 industries that need to be relocated to make the city pollution-free. Together they hold over 150 acres in core areas of the city that command huge real estate value.

4. CONCLUSION

It is every individual responsibility to be aware of traffic signals and to follow the traffic rules for free flow of traffic. GHMC authorizes are advised to take timely actions and corrective measures to avoid traffic congestion. Vending

zones at heavy traffic centers must be transferred to the outer ring road of the city. All the suggested remedial measures must be observed and followed to avoid traffic congestion on city roads.

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