

Have car must park! And with a default policy that favours high auto ownership and usage, there has to be parking provisions at home, work, school, business, leisure, etc. In the case of the home, parking may be one vehicle behind the other in a single-row car port, or with another on the lawn. During the daytime vehicles may be stored on the road or on the sidewalk so as to reduce the frustration of reversing one vehicle out in order to take out another. Vehicles on the roadway are usually staggered to be near the driveways of the owners with the result that traffic has to zig-zag through the roadway, or they may all line up on one side of the roadway, and one lane of through-traffic might be blocked and have to wait for the on-coming traffic to pass before continuing. Pedestrians, bicycles and other non-motorised vehicles, such as baby prams, are finding it very difficult to travel along roads in residential communities, and it is much worse for them in mixed residential/commercial areas.

At work and business, parking may be provided for company-owned trucks, vans, etc, employee and visitor, autos, and delivery vehicles. And at school, parking is provided for teachers, and might be considered for students, and parents pick-up and drop-off.

There are other categories of parking demands, such as (a) derelict vehicles, (b) taxi and maxi-taxi stands, (c) loading and unloading of commercial vehicles, and passenger drop-off / pick-up points along the route. Discarded vehicle shells and other large parts are becoming more and more common along the roadways, particularly in rural and some residential districts. All taxi stands and nearly all maxi-taxi stands are located on roads in the urban areas, thus reducing the already limited road space; the illegal PH cars also

ply on-street. The only maxi-taxi stands that are off-street is the Red-band at City Gate and the Yellow-Band just west of City Gate. Commercial vehicles still stop on the busy travelled lane to unload or load their goods. One of the attractive features of taxi and maxi-taxis to the commuter is that they stop at any location along a route for pick-up or drop-off, even if it is within an intersection itself.

Despite the above information being known to all road users, the emphasis in reducing traffic problems by the decision makers continues to be exclusively on how to increase the capacity of the highways. (That is, apart from the proposed introduction of the train in some years to come). It appears as though there is not enough appreciation of the significant impacts of parking on traffic. I think that that has to do with the perception that the main problems associated with driving are associated with congestion, volume of traffic and the behaviour of other motorists; parking might be viewed as a secondary problem.

A review of a number of US studies of journey to work by RW Willson and DC Shoup in 1990 concluded that (i) free parking greatly encourages solo driving; (ii) when subsidies are reduced or removed, a significant number of solo drivers switch to car pools or public transport (provided that there were subsidies on the cost of public transport); (iii) between 19 and 81 percent fewer employees drive alone to work when they have to pay for their own parking, leading to an overall drop in the number of cars driven to work between 15 and 38 percent. Another study done by Willson and Shoup in Ottawa showed that when car parking charges were increased for all employees, there was a reduction of 20 percent in the number of employees solo driving, but there

was no increase in car pooling as virtually all the trips transferred to public transport.

The time taken in searching for a park (called parking search time) is recognised to be an important issue in several respects, as studied by JW Polak and KW Axhausen in 1990. (i) It can be responsible for a significant proportion of traffic circulating in the city centre areas. Estimates for Central London, for example, range from 10 to 40 percent of the total vehicle kilometres on the road network. (ii) It is time wasting and may deter some drivers from visiting town centres and city centres. They estimated that drivers may spend between 5 and 25 percent of their total journey time looking for a parking space.

Another study done in 1989 by BP Feeney suggested that there are five main ways in which motorists can respond to the effect of parking charges and parking availability: (i) a change in parking location, (ii) a change in the starting time of the journey, (iii) a change in the mode used, (iv) a change in trip destination, and (v) abandonment of the trip.

Transport statistics in 1995 in Great Britain show that obstruction, waiting and parking offences account for 58 percent of all recorded motor vehicle offences. (Dangerous, careless, or drunken driving offences came in at 5 percent). Illegally parked vehicles represent a hazard to pedestrians and other road users. Also, research by the UK Department of Transport suggested that improved compliance with parking controls over the whole of London could produce economic benefits of between £100m and £200m a year with a 10 percent increase in journey speeds in the central area. Further, illegal parking causes difficulty of access to premises by

clients and delivery vehicles of businesses.

What should the off-street parking strategies and enforcement methods be to improve traffic flow? This is to be discussed.

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