

LONDON IS CHOKING TO A STANDSTILL

1. Introduction.

Historically, the movement of people has been key to human survival, the development of trade, society, scientific and cultural prosperity. Paths and roads are the evidence and legacy of our existence.

The history of road design reflects their development through to present conditions. We began with fords, then bridges and paving, and ultimately on to dual carriageways, traffic lights, underpasses, flyovers, motorways, jam-cams and so on. The earliest measures were born out of necessity and for our convenience, and they delivered the first lesson; they attracted and encouraged more traffic. Later measures were enforced responses to the increase, and when they were successful, they too encouraged yet more traffic, and so the cycle and pace of increasing traffic generation continues today.

Many see traffic as the number of vehicles on the road, but traffic is four dimensional and dynamic, and includes vehicle size, travel distance and journey time. When the product of the four exceeds the comfortable capacity of a road or junction, the result is insufficient dynamic capacity, or congestion.

Traffic management techniques include positive and negative measures. Congestion can be managed by expanding or improving the road network, or by reducing traffic numbers. It is complex territory, full of theories and mathematical models, with available measures sensitively linked to each other. There is little expert consensus, but all agree that congestion remains an intractable and complex problem. There is evidence and support for the supply and demand theory conclusion that congestion can never be eliminated. This has proven to be correct, somewhere and sometimes, which encourages widespread preference for the cheaper negative measures than the more expensive positive ones.

Recently, we have seen several changes or accelerations in our patterns of living, and in the way we relate to our environment, and particularly so in London.

The Congestion Charge Zone, on-line shopping, home deliveries, 24/7 shopping and entertainment, social media, mobile telecommunications, dynamic satellite navigation, cheaper taxis and all night tube services are just a few that spring to mind.

Some are adding pressure on to our roads, but many are reducing it. Those with an adverse impact are convenient excuses for our ongoing problems, or our mismanagement of them. But our congestion problems are older and more fundamental.

Traffic needs to flow, and like water it responds to the terrain over which it moves. Obstacles placed in its way will impede its natural course, eventually diverting it into less convenient channels. Too many obstacles will turn a smooth-running stream into a rough or raging torrent, or worse, it will create a stagnant pond.

Similarly, in response to our traffic problems, we introduce a measure here and there. It works for a while, it seems, until the flow adapts to the new restrictions and then moves somewhere else. We continue responding to the relocating problem with similar measures. Eventually, we are fighting a losing battle to contain the torrent or the flood, which we have unwittingly caused and then exacerbated.

Implementing solutions, even correct ones, requires caution and an understanding that every action will bring a reaction, a fundamental law of the physical world. Committing large sums of money to wrong solutions make course corrections impossible; they are embarrassing and expensive and never occur. Unlike the motor vehicle, there appears to be no reverse gear, or an extreme reluctance to use it to get back on to the right course.

So, we keep inching forward, hoping to find a route out of the jam that we have caused, oblivious that we may be on the wrong road.

2. Previous Strategies.

Many measures have been enthusiastically deployed with the aims of keeping traffic off the road, slowing it down, or sending it somewhere else. The favourite target has always been the detested private car, although since 2002 car ownership in London and the South East has remained constant.

The weapons have included scarce parking, yellow lines, double yellow lines, speed humps, speed tables, chicanes, pinch-gates, 20mph speed limits, pedestrian-phased traffic lights, no-turns, one-way streets, traffic gyratories, bus lanes, red routes, cycle lanes, cameras and more. They have been liberally discharged in the hope of reducing traffic. Many road users and residents alike have viewed them as unnecessary, inconvenient, ineffective or counter-productive; some see them as overkill, others see them as blanks.

A good example is the Congestion Charge Zone (CCZ).

It was introduced in 2003, and was a milestone in traffic management. Its advocates sold it on the premise and promise that it would deter traffic from the congested centre, result in freer movement, faster journey times, lower pollution, and it would turn the area into a better place in which to live and work. They were naïve and wrong, and the promise remains unfulfilled.

On the first day, there was a much trumpeted 25% drop in the number of vehicles entering the zone, from a typical 250,000 to 190,000. However, the launch date occurred during school holidays which favourably distorted the data, and that number was only one of the four dimensions of the traffic problem.

Since then, and despite the daily charge more than doubling, the number of vehicles entering the zone has returned to around 235,000, leaving us with a meagre 5% reduction, but still a reduction. However, as the other dimensions of traffic have taken their toll, after briefly rising to 10.9mph in 2003, average speed has fallen from 8.8mph in 2002 to 8.3mph today, indicative of the worsening congestion.

In a rare case of foresight and planning, dedicated bus lanes were installed on the roads skirting the CCZ. This was to allow public vehicles to escape the expected new congestion, now squeezed into two lanes rather than the three that had catered for the previous lower volume of traffic. The result is that introduction of the zone has created a new problem, a perimeter ring road that is constantly filled with traffic avoiding the entry toll. Euston Road and Marylebone Road and others are now filled with almost stationary private cars and commercial vehicles for much of the day and evening, imprisoning and poisoning us. And we still have the same congestion and same problems within the city walls.

Another ongoing measure is the Cycle Superhighway network.

Under the previous Mayor, there was heavy promotion of cycling in London. An enthusiastic cyclist himself, he rallied many lower rank politicians to his colours - bicycles for hire and a network of exclusive cycle lanes to encourage the modal switch.

His peddling put London into the grip of cycle-mania, resulting in vital road and traffic capacity being sucked out of the network and allocated to exclusive use by cyclists, compounding difficulties for everyone else including emergency services. The result has been more congestion and consequently more pollution for all, including the vulnerably exposed cyclists themselves.

Most London boroughs fell into line with the new orthodoxy, never questioning the wisdom or consequences of the unconditional surrender and annexation of the network.

However, Kensington and Chelsea were an exception, opting for 'quietways' instead. Their green policy avoided green tarmac, and steered cyclists away from busy roads and onto quiet, less hazardous routes where fewer conflicts with general traffic offered a more pleasant experience for them, and for other road users. Many cyclists in the borough have been won over.

Constrained by the existing urban fabric, K&C recognised that separation of cycles from other traffic was only partially achievable, inevitably merging again in the wider network, and of little overall benefit. So far, K&C's alternative strategy has worked well, although undoubtedly the pressure to join the herd will persist.

Most previous traffic management measures have missed their targets, but caused collateral damage - longer routes, longer journey times, more congestion, leading to inefficient speeds, higher fuel consumption, and most damaging of all, more pollution. They have not only failed to improve our situation but have unarguably exacerbated it.

3. The Current Condition.

London is an historic city, a huge conservation area, with many fine buildings, an urban fabric and road network that is tightly integrated. Enormous efforts have been undertaken by local authorities to protect it, although somewhat inconsistently. Our freedom to widen or reroute circulation through it, to increase road capacity, is almost non-existent.

Demands on London have continued to grow, with taller buildings, a rising work-force, more visitors, more servicing, and new residents, many of whom are forced to the suburbs and beyond, and all of which generate more traffic - trains, buses, taxis, cars, vans and bicycles.

An imagined option of decentralising from London, and reduce traffic, would require a national plan to overhaul links with the regions, but this would generate a different type of traffic without solving any of London's problems.

Nationally, the number of vehicles has continued to rise, from 30m in 2001 to 37m in 2016, including 5m extra cars. But this is irrelevant to London, as only around 5% of London's traffic is private cars, including those owned by its residents. The rest are buses, taxis, mini-cabs and commercial vehicles, all of which are inescapable aspects of metropolitan life today.

The current candidates or scapegoats for our continuing lack of success are numerous.

Booming construction, road works, Uber, Amazon, home deliveries, and cycle lanes have been cited amongst others. Some of these are valid or temporary, but many reduce overall traffic.

Today, we benefit from an extensive camera network that allows human intervention to ease our problems, with little success. Tomorrow it will be fully automated, and perhaps offer some improvement. Meanwhile, mobile phone apps that use the network have given us satellite navigation (satnav), so that we and any taxi or van driver can readily find the best routes to our destinations.

However, the dynamic feature of satnav also alerts drivers to traffic conditions ahead, and diverts us onto sometimes tortuous alternatives that even the residents never knew existed, generating even more traffic and more pollution to avoid the congestion ahead.

We enjoy the benefits, but we also suffer the unforeseen, self-inflicted consequences.

Despite all our efforts, the coordinated transport policies and the plethora of traffic restrictions, London is now the most congested city in Europe, and one of the most polluted.

This is where we currently sit, stationary in a jam of our own making, being slowly poisoned on one-way roads into the cemetery of failures.

4. The Way out of the Jam.

A fresh examination of our failures and an overhaul of thinking may reveal that they and their advocates are the obstacles to our solving the problems.

London's authorities have responsibly tried to alleviate traffic congestion, by investing in public transport infrastructure and discouraging unnecessary use of private cars. Unfortunately, the compact size of bicycles and the health and pollution benefits they seemingly offer as a green way forward has distracted their focus. It may be a utopian vision for the impecunious, young and able-bodied, but it is impractical for the everyday needs of the majority, and for taxi companies, Parcellforce, Amazon et al.

The CCZ has cut the number of vehicles in the zone to a minimum. The commercial nature of remaining traffic makes its volume irreducible, and raising the congestion charge will simply raise the cost of living and working in London yet again. There is no scope for further reduction, without damaging London's economy, and that of the UK.

That leaves travel distance and journey time as the overlooked targets for improvement, which means removing obstacles to make routes shorter and therefore quicker is essential and inescapable.

Soon, all traffic will be guided by satnav, allowing it to be its own self-regulating answer to congestion, not necessarily eliminating it altogether, but relieving localised pressures over a wider area, and so improving dynamic capacity at the worst bottlenecks.

Traffic engineers, those with imagination and a vision of the changing landscape, know this but they need to step forward and tell the emperor the truth, to reverse the naïve and expensive errors still emerging from reigning political orthodoxy and which are condemning us to choke in our misery.

These include several imminent London traffic projects that are promised to bring improvement, but will fail yet again. They will impose yet more restrictions on traffic, taxis and buses in some cases, and their diversions will undoubtedly increase and expand congestion and pollution well beyond their project borders.

The Kings Cross gyratory was a mistake and is destined for the scrapheap. Camden's hasty, ill-considered Tavistock Place trial, wreaking havoc throughout Bloomsbury from day one, is the current failure. The West End and Oxford Street projects will be next, followed by the cycle superhighways, doomed to their own rush hour congestion but otherwise deserted, and destined to be the next detested absurdity.

We appear to be chained to the long route around the same old obstacle course of a network, but one that has been further reduced in both its static and dynamic capacities. Our measures keep failing to solve the problems, so we devise and add some more, rather like taxes, law and government.

The unrecognised problem is that we are lost, heading in the wrong direction, and our tank of ideas is empty.

There is a solution but it is unpalatable, not for the timid, and requires thinking the unthinkable:

- Broken-down vehicles are removed from the highway to keep traffic moving, and failed traffic management schemes need to join them too.
- Politicians need to consult independent professionals, sit back, and without promoting others or their own agendas, leave them to direct all of us onto the right route again.

If open roads and fresh air are to be achieved, fresh and open minds are needed.

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