Government
Office for Science

Foresight Future of Mobility project

MaaS Roundtable

17 August 2017, 1530 to 1645, 1 Victoria Street
Chaired by Chris Witty (Deputy Government Chief Scientific Adviser)

This is an abridged summary of the roundtable, and in the spirit of free and open discussion, comments have not been attributed to specific attendees.

The roundtable was structured around three main questions regarding Mobility as a Service (MaaS):

- What are the opportunities offered by future developments in the technology?
- What are the barriers to wide scale implementation of MaaS?
- Of these barriers to adoption, which can government do something about?

Key points
- An ideal implementation of MaaS would be no more expensive than the current transport system, fully inclusive for all travellers, meet obligations on air pollution and carbon emissions, and reduce vehicle ownership.
- There will be a trade-off between maximal individual freedom to travel and the efficient operation of the transport system, and MaaS will be an opportunity for government to encourage behavioural change in transport.
- A fully integrated ticketing system across all modes of travel will be essential to enabling MaaS in the transport system of the future, though who would be responsible for this system was open to debate.
- The question of liability for tickets, providing minimum levels of service, supporting infrastructure, and lack of coordination across local authorities were seen as barriers to fully integrating MaaS into the transport system.

Understanding MaaS
A basic definition of the desired characteristics of a MaaS system was given:

- It should be no more expensive in the aggregate than currently, though who pays is a policy choice;
- It should not systematically exclude anyone from travelling;
- It should fit with obligations on air pollution and carbon targets; and
- It should enable people to get from A to B without using their own vehicle, though it would not preclude people from owning vehicles.

There is a trade-off between providing maximal individual choice and flexibility in transport options, against the challenge of providing for efficient network optimisation of limited transport resources

- Conventional wisdom is that there will be population growth and increased urbanisation into large cities, increasing demand for transport.
- Rationing of transport assets is most economically efficient, but not optimal for transport operators – the balance between rationing and a free market.
- Policy decisions must balance rationing of transport infrastructure between cars, vans, bikes, cyclists and freight/logistics vehicles.
- For the end user, a private car is an attractive proposition, being effectively free at the point of use – how does MaaS make itself as attractive?

Opportunities of MaaS
MaaS is seen as an opportunity for government to institute behavioural change in transport use

- Use flexible pricing to encourage policy objectives, such as increasing self-powered travel, or spreading out demand.
- Government should leverage the best of the private transport sector, include them in the public transport offering, and incentivise people to use alternatives to car ownership.
- However, it should avoid pricing households out of transport options (thus creating "the MaaS and the Maas-nots"), or encouraging transport use when people would have otherwise undertaken self-powered journeys.
- Parking was also raised as an important lever for local authorities to influence mobility choices, with Autonomous Vehicles (AV) likely to seek out areas with the cheapest parking rates, if they park at all, which may lead to a loss of revenue.

Fully integrated ticketing systems were seen as a key underpinning feature of future transport systems incorporating MaaS

- Ticketing should be trusted and reliable, avoid wasting capacity and resources, and incorporate all travel options (including MaaS).
- This was considered unambitious, as some route planning services already incorporate multi-modal options in route planning.
- There was debate over whether the government or private industry should run such a system, with the accountability of government being seen as a positive, whilst its track record in IT development was seen as a negative.
- Transport for London (TfL) was considered as an outlier in this respect, both within the UK and internationally, and implementations of MaaS and integrated ticketing outside of London are at a completely different level.
- A unified ticketing and data platform was not seen as a barrier to local authorities to make pricing or incentivising decisions within their region

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(providing discounted travel to people under 18 years of age, for example), with the national platform being scaled to suit the specific local case.

- Peer to Peer (P2P) data sharing apps are also in development, which remove the need for central control of the data, and may be considered as a third way.

Barriers to adoption of MaaS
Liability and data access were raised as important issues for future transport systems incorporating MaaS

- Barriers exist around reselling tickets, and the openness of Application Programming Interfaces (API) undergirds services.
- Who is the customer buying the service from, and who is liable if it goes wrong? What passenger data needs to be shared to determine liability?
- A framework is required for MaaS aggregators to clearly pick up the liability or not, and to be clear what data should be passed on.
- There is a role for government in determining the use of data, and in compelling operators to share data, such as in the Bus Services Act 2017.

A lack of coordination and split responsibilities between local and supra-local areas was seen as a barrier to implementation of future transport systems incorporating MaaS

- A lack of overarching strategy from local authorities means that it is difficult to provide a consistent service at the city level, which is required for it to be an attractive proposition.
- Similarly, certain technologies (such as electric vehicles) will require infrastructure rollout at a local level, but the infrastructure needs to be available over a wide area (regional or national) for it to be practical.
- How do we practically roll out new infrastructure in old cities such as London?

Summary
Barriers to the future deployment of MaaS were summarised:

- If we have a single ticketing platform, who owns it?
- Is it owned by government, or made publically accountable in some way?
- The split of responsibilities for transport between local and supralocal areas – useful transport happens at the higher level.
- Who retains liability for transport services, and the truism that ways around regulation will be found.

Three potential futures MaaS futures were outlined:

- An incremental improvement on the current situation, with better ticketing for integrated travel across all current public transport modes;

- A more radical development of the public transport system, closely integrating MaaS providers; and
- A transformed public transport system, incorporating full AVs.

We would like to thank the following organisations for participating:

Atkins, the Centre for Connected and Automated Vehicles, the Department for Transport, CPT UK, EY, Go-Ahead Group, Her Majesty's Treasury, the Institution of Engineering and Technology, MaaS Global, PTV, Sn-ap, Stagecoach, Systra, TSC, Zipcar and Uber

The views and opinions expressed during this discussion do not reflect official or company policy, or the position of Government.