

FUTURE MOBILITY CHALLENGE

17 October 2018, London

Are you a start-up or an SME with cutting-edge solutions to some of the problems that impede the seamless and efficient movement of people and goods? Do you have innovative ideas that can help us redefine the future of mobility and the automotive industry?

If you believe you have positive answers to the above questions you have come to the right place.

The Future Mobility Challenge is a new initiative from SMMT to make innovative ideas and solutions discoverable with a view to creating new partnerships, investments and acquisitions between the world's leading automotive brands and innovative technology start-ups and SMEs.

Five of the world's biggest automotive brands, BMW, Jaguar Land Rover, Bosch, Ford and Toyota, have partnered with SMMT to challenge ambitious start-ups and SMEs to devise innovative solutions to seven key mobility challenges. Technology innovators are encouraged to submit leading-edge ideas that address these challenges.



Those with the best solutions will be invited to pitch at the Future Mobility Challenge event in October and, if successful, will be able to negotiate a range of partnership propositions, from mentoring, ideas incubation and investment, to piloting, routes to market or acquisition.

Leading technology bodies and membership organisations are partnering with SMMT on the Future Mobility Challenge, encouraging start-ups and technology innovators to participate.

Presented in partnership with



About SMMT

The Society of Motor Manufacturers and Traders (SMMT) is one of the largest and most influential trade associations in the UK. It supports the interests of the UK automotive industry at home and abroad, promoting a united position to government, stakeholders and the media.

THE CHALLENGES

1. Harnessing the potential of mobility data

Mobility data – whether they are derived from private vehicles, users' journeys and preferences, or urban transport systems and city infrastructure – can potentially yield insights that spawn innovative customer propositions and monetisation opportunities. We're looking for solutions that can help unlock that potential. For example:

- How can on-board and off-board **vehicle data** be combined with **users' data** (e.g. from smartphones) and other data sets/sources to create value for the customer?
- How can different mobility data be combined to create **integrated and multi-modal** customer propositions for different market segments (e.g. mass market and premium)?
- How can we leverage various data sets/sources to offer **first and last mile services** using a fleet of vehicles?
- What personalised and integrated **insurance solutions** can cover all of the customer's mobility needs?
- How can we make **payment** (e.g. at fuel forecourts or chargepoints, for multi-modal services) seamless and painless for customers?

2. Intelligent solutions for intelligent fleets

Intelligently managing and optimising fleets will be crucial to the success of mobility service providers of the future, as is supporting client fleet operators and drivers with value-added services. We're looking for solutions that will not only accurately predict where and when a customer needs a vehicle, but also enable the delivery of the desired vehicle when needed and offer users enhanced, personalised services. For example:

- What infrastructure/technology **components and service layers** can help mobility service providers build an intelligent fleet and increase vehicle utilisation?
- Beyond existing fleet telematics offerings, what **new data solutions** can add value by integrating mobile service personnel and vehicles more effectively with central operations to optimise total business objectives?
- In the context of commercial fleets, how can fleet operators monitor and support **drivers' wellbeing** in a manner most likely to gain acceptance?
- How can we reduce the **environmental footprint** of fleets without necessarily switching to electric vehicles?

3. Urban mobility solutions for future cities

The challenges cities face are well known, from congestion and poor air quality to spatial constraints and poor public transport connectivity. We're looking for solutions that will make cities more attractive places to live, work and play through creating affordable and deliverable urban mobility solutions. For example:

- How can we provide more **affordable** and commercially **viable** transport services for people living in areas where existing transport links do not provide sufficient **coverage**?
- How can smarter data solutions create new service propositions and help us play a role in tackling **congestion**, solving the **parking** challenge and improving **air quality**?
- How can we create scalable propositions for **active mobility** (e.g. cycles, scooters) to promote healthy lifestyles, bring together local communities, reduce congestion and as part of multi-modal journeys?
- What are some innovative urban **electro-mobility** solutions that can help us solve existing charging infrastructure problems (e.g. chargepoint network interoperability, adequacy and cluttering) and potential energy network constraints?

4. Innovative shared and on-demand mobility models

While some customers will continue to own cars in the traditional way, others may wish explore new models of ownership or opt for access to a flexible service. There are yet others who prefer car-sharing, ride-sharing or ride-hailing services. We believe mobility is for everyone, the customer's way. We're therefore looking for solutions that can help us become a single platform for existing and prospective customers' mobility needs. For example:

- What are some innovative **Car-as-a-Service or Mobility-as-a-Service** business models that are different to those already in the market?
- How can we create a platform, complete with an app and payment mechanism, for a **flexible multi-car subscription** model?
- What are some new and potentially scalable **fractional vehicle ownership** or rental/leasing propositions?

5. Creating new and superior customer experiences in the age of hyperconvenience

Often the difference between winning or retaining and losing a customer boils down to customer experiences. We want to go out of our way to make communication with customers clear and transparent, choices plentiful and flexible, the sales process and aftersales care superior, and the experience with our products or services outstanding and perhaps even unexpectedly delightful. We're looking for solutions that will enable us to create new and superior customer experiences that are underpinned by efficient business processes and go far beyond just the vehicle. For example:

- How can we provide a seamless and delightful **experience** to customers at **all stages** (pre-sales/use of service, in-car/while using service, aftersales/post-use, additional services)?
- What does the **in-car premium experience** need to be like in order to delight customers?
- Beyond the car, what are some **premium mobility or lifestyle propositions** that can help differentiate our offerings?
- How can **augmented/virtual reality** and remote services help us create new customer experiences?
- How can **industrial IoT** solutions and **blockchain** genuinely contribute to driving backend operational efficiency and security so that we can deliver superior customer experiences?

6. New connected car services

The majority of new cars sold today are 'connected' in some form. It wouldn't be a stretch to say that the market is quite saturated with connected car apps and services of various types, serving various purposes. We're looking for something new, ideally something out of the box, something that may surprise even ourselves. They may include the following, but **should not** be an offering already in the market:

- Location-based services
- Infotainment and content services
- Real-time traffic information
- Journey management
- In-car productivity tools
- On-demand mobility services integration
- Remote services including one time access, diagnostics and predictive maintenance
- Monetisable telematics services

Additionally, we're interested in how the car can be integrated into the **IoT or smart home** ecosystem.

7. Future vehicle technologies

While new mobility services will shape how people move around in the future, we have not forgotten an integral piece of the future mobility jigsaw – the physical asset itself. Fair to say, without vehicles there is no mobility. Some vehicles will be privately owned, others will operate in shared fleets. They are likely to include increasing levels of automation and electrification. We're looking for technology solutions in the following areas that are new or innovative, and **not already** in the market:

- Artificial intelligence and machine learning
- Cyber security and quantum computing
- Automated driving technologies (e.g. ADAS, cameras, Lidar, radar, sensors, sensor fusion computing platforms)
- Vehicle electrical systems
- Domain controllers, electronic controllers and vehicle access systems (with applications for driving dynamics, fuel, comfort, security and safety)
- Head units, control units and operating systems
- System-on-a-Chip (SoC), graphics and storage
- Innovative display and glass technologies
- Head-up display technology and optics
- Audio technology (e.g. speakers, receivers, boosters)
- Low-voltage energy storage and management components
- Battery management systems

WHAT'S IN IT FOR YOU?

A successful partnership is based on a **bespoke arrangement** that all partners are comfortable with. Your needs may vary depending on the maturity of your ideas, solutions and business.

Here's how you can benefit from partnering with the five automotive brands.

Route to market

Many start-ups are looking for a first customer, or in the case of SMEs maybe a first major customer. The brands involved in this initiative are major global businesses with a large pool of existing and prospective customers across multiple business segments. Your solutions may have more than one application in a given segment, or could be extended to become viable propositions in adjacent businesses. The depth of experience and vast scale and reach of these brands mean they can also help develop and nurture your business to quickly scale and tap into their global markets.

Incubation, acceleration, piloting

Not every business is ready to go to market just yet. Your ideas may need further incubation to become viable propositions. Or, your solutions may need to be piloted or tested in live customer environments to accelerate their commercial readiness.

This initiative can offer successful start-ups and SMEs access to first-class mentorship, profound market and consumer insights from leading experts, data, R&D capabilities, and technical and marketing resources via UK-based incubators, innovation labs and accelerators that have extensive global reach. You will also benefit from opportunities to pilot a product or service through live sandboxes and testbeds.

Investment

You may be looking for funding to catapult your idea to the next stage, be it proof-of-concept, prototyping or delivering a minimum viable product. Or you may be ready to commercialise your solutions, or even grow your fledgling business. Subject to the right terms and conditions, the automotive companies are ready to invest stage-agnostic, though the majority of investments are expected to fall within Series A or B.

Exit path/acquisition

There may be a possibility that your business has reached considerable maturity such that you are looking for someone else to take it to the next stage. Or you may just want to simply cash in and pursue other interests. Subject to the right terms and conditions, the automotive companies are open to acquiring a majority stake or the business outright.

HOW TO APPLY

Participation in the SMMT Future Mobility Challenge is free of charge.

However, there is just one application principle: you must be a **start-up or a small-or-medium enterprise (SME)**. This means your business must employ no more than **250 people** and have an annual turnover not exceeding **£50 million**. If you meet this criterion, please read on to find out about the application process.

A step by step guide to the application process



General guidelines to completing the online application form

The [online application form](#) consists of three sections:

- Section 1 asks you about your business and your contact details.
- Section 2 asks you about how your ideas or solutions could address one or more of the seven defined challenges.
- Section 3 asks if you would like to register for inclusion in our Automotive Supplier Finder database.

You must complete Sections 1 and 2 of the form. Section 3 is optional; registering for our Automotive Supplier Finder enables us to match your business and its offerings with suitable opportunities in the future.

The form cannot be saved, so we suggest you complete the application form in one sitting. To help you prepare your answers for completion in one sitting, you may wish to review the questions in advance:

- **Which of the following challenge(s) does your solution seek to address?**
You will be asked to select as many as applicable from the seven defined challenges.
- **What is your main idea or solution to address the selected challenge(s)?**
This could be the concept, technology or service you are seeking to pitch. (420 characters)
- **What specific problem(s) does it solve?**
How your solution can address the articulated challenge(s). Be as specific as possible. (1,200 characters)
- **Why is your idea or solution deemed innovative?**
What sets it apart from competitors' solutions or available alternatives in the market. (1,200 characters)
- **How mature is your idea or solution?**
How ready you are for commercialisation. Whether it is just a concept, a prototype, a minimum viable product or already on the market. (1,200 characters)
- **Where do you think you are headed and what is your ambition?**
Your current levels of funding and where you expect to be in 3 years' time. (1,200 characters)
- **What are you looking for from the automotive brands?**
This could be a route to market, additional investment, mentoring/coaching assistance (e.g. incubator, accelerator), or other specific desirables based on your needs. (950 characters)

[Click here](#) for our online application form. Application deadline is 30 June.

If you encounter technical difficulties when completing the form, please contact futuremobility@smmmt.co.uk

FREQUENTLY ASKED QUESTIONS

Is my business right for this event?

This initiative is open to start-ups and SMEs from any sector that can help the five automotive brands redefine the future of mobility through ideas and solutions that address the seven defined mobility challenges. It doesn't matter where you are in your journey or how mature your business is. You may have only an idea or be seeking to deliver a proof-of-concept. Or you may have a prototype, or a minimum viable product. You may even have an early stage product or service already in the market. If you feel you have something to offer and could benefit from partnering with the five brands, then we want to hear from you.

Why can only start-ups and SMEs can apply?

The automotive brands involved in this initiative would like to discover more hidden gems from among the start-up and SME community. If you are a large business, chances are you are relatively more discoverable than start-ups and SMEs, and your offerings are already known to the automotive industry.

Can I apply even if my business is not based in the UK?

This initiative is open internationally, so it doesn't matter where your business is based. However, if you are shortlisted for live pitching on 17 October, you will need to ensure you are able to travel to London and be responsible for your own visa arrangements. It is not possible to pitch via video conference.

Is this another start-up competition?

No. This event is intended to spawn new partnerships between start-ups/SMEs and the five individual automotive brands. It is an opportunity to discover ideas and, if there is mutual interest, discuss a potential bespoke partnership.

How will my idea or IP be protected?

You are free to negotiate bespoke IP ownership arrangements with the individual automotive brands. In terms of the live pitching, all the sessions are confidential. Each start-up or SME will be pitching to an automotive brand one at a time, so there will not be anyone else in the room apart from you and the automotive brand you are pitching to.

Will applying online mean I am guaranteed a place to pitch on 17 October?

There will be a screening and shortlisting process where the information you provide on the online application form will be used to match your ideas or solutions to what each of the five automotive brands is looking for. Shortlisted applicants will be invited to pitch their ideas or solutions live on 17 October 2018.

Can I choose which of the five automotive brands I want to pitch to?

No. You can choose which of the seven defined mobility challenges your ideas or solutions can potentially address. Each of the seven challenges is owned by more than one of the five automotive brands, so there is a likelihood you may end up pitching to more than one brand.

Can I pitch to all five automotive brands?

It depends on which or how many challenges your ideas or solutions can address. Each of the seven challenges is owned by more than one of the five automotive brands, so there is a likelihood you may end up pitching to more than one brand, or indeed all five brands.

How will I know who I will be pitching to?

If you are shortlisted you will receive a formal invitation to pitch along with information on which brands you will be pitching to.

I have more than one idea or solution. Do I need to make separate applications?

It depends whether each of your ideas or solutions address the same or different challenges. For example, if you have separate solutions that can actually solve the same problem, put them in one application. If, however your solutions are aimed at solving different problems, put them in separate applications.

What is the pitching format?

If you are shortlisted to pitch, you will receive pitching guidelines that will help you prepare your pitch(es). As a hint, the format is likely to be similar to the questions you are asked in Section 2 of the application form. You will be given more time than a standard 120-second elevator pitch. The exact amount of time will depend on the number of pitches scheduled for the day. All these will be clearly set out in the pitching guidelines.

If I'm shortlisted, how many people from my business can attend?

Attendees will be limited to two representatives per company. However, if you wish to take up the option to exhibit, you are welcome to bring an additional colleague to look after your exhibition stand.

Who should I contact if I have further questions?

Please email your questions to futuremobility@smt.co.uk.