Personal Signal Assistant® FAQ

June 28, 2018

Q: Who is TTS?
Traffic Technology Services, Inc. (TTS) is a _technology company_ and _information provider_ for connected vehicle applications. TTS is headquartered in Beaverton, Oregon, in the Portland metro area.

Q: What is the product?
The product, _Personal Signal Assistant®_, is a service of predictive _information_ and _data products_ which follow an industry standard to communicate the changes of traffic signals to vehicles. The key value of the service is the ability to predict changes up to several minutes; existing hardware technology does not do this.

Q: How does it work?
TTS utilizes existing public infrastructure to communicate to the traffic signals, such as fiber and wireless networks, already deployed by the government agencies. TTS connects with existing _central computer systems or ATMS_ (Advanced Transportation Management Systems) to deliver data packets about the current status to TTS servers. TTS interprets the data, monitors performance, and _predicts_ the future switch times of traffic signals for three states (for example: time remaining in green, red time, green time).

Q: What is involved to get the system working in a community?
Agencies can either provide open data portals or enter into a _data authorization agreement_ with TTS. Once an agreement is executed, data can begin flowing to vehicles _as soon as two months_ after data feeds are established. This is a type of public-private partnership, where data is exchanged.

Q: Where is service currently active?
Southern Nevada area (Las Vegas), Dallas area (_Frisco TX_), San Francisco area (_Palo Alto CA, Walnut Creek CA_), Houston area (_Sugar Land TX_), Denver area (_Lakewood CO), Portland OR_ area, _Washington DC_, _Phoenix AZ_ area, and Kansas City area (_Olathe KS_). More agencies are coming online soon this summer throughout the country, including major areas _Detroit, MI, Chattanooga TN, Gainesville FL, Seattle, WA, Tampa FL_.

Q: Who are TTS' customers?
The customers of this service are any transportation service providers or OEM (Original Equipment Manufacturer). Any user of the transportation system is a potential end user of the service either directly (after-market or subscription) or indirectly (OEM integrated feature). _Audi of America_ is the first OEM or automotive manufacturer to introduce connected vehicle applications to the market with _Traffic Light Information_, a feature included in _Audi connect® Prime_.

Q: What is TTS' role with Audi?
TTS is the supplier for the Audi connect® Traffic Light Information feature.

Q: What is the benefit to the end user?
The benefits of connected vehicle applications range based on the applications. Some applications, such as recommended speeds (less than the speed limit) to avoid stopping can provide direct end user benefits as much as _15% reduction in fuel consumption_. Other applications, such as integration into start/stop systems, provide benefits in the range _of 5-10% reduction_ in fuel consumption

Q: What is the benefit to the government agencies?
In addition to indirect safety benefits, such as increased driver awareness, other benefits to the government agencies include increased capacity and reduced start-up lost times with relevant applications.

Q: Is the system using DSRC (Dedicated Short Range Communications)?
No, all information is passed through the internet and _cellular communications_. TTS' product follows the same protocol used by DSRC, SAE J2735. In other words, the same data that is transmitted by wireless DSRC is sent over internet and cellular communications.

Q: Does TTS develop the connected vehicle applications?
No, TTS works with customers to help implement the data product but does not create connected vehicle applications.

Q: Who to contact at TTS?
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