

Telia Journey Information

Real-time traffic data and driver support

Journey data onboard with real-time IoT-edge updates based on quality GPS and sensor inputs. Making sure the true real-time data is available for the passengers.

Real-time information for public transport

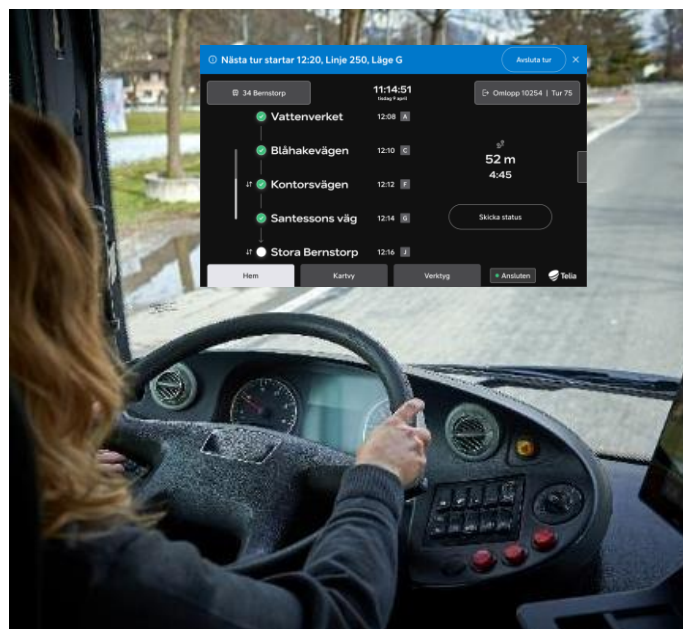
Telia Journey Information acts as a hub collecting data to and from the vehicle and external public transport systems to enable public transport authorities and operators the insights to deliver a more proactive, flexible and event-driven public transport operation.

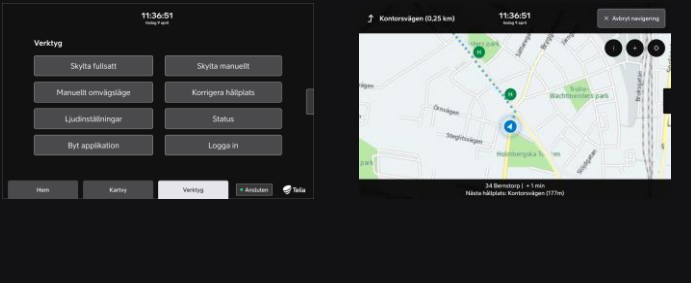
This enables the data to see to that:

- the **passengers** always are updated in real-time on their journey for a more predictable commute. The information can be delivered via travel apps, information screens and speakers at stops or stations. Or on transport operators' websites, text message alert services or on third-party applications.
- the **drivers** to better plan their drive according to set schedule and act on potential real-time changes due to different unpredictable disturbances, such as a changed stop point or re-routing due to accidents or road works etc.
- the **Public Transport Authorities and Public Transport Operators** to get real-time data to be able to have a full overview of traffic situation to plan and optimize the operations. This data enables them to make the right decisions in real-time and keep timetables to increase customer satisfaction, keep KPI's and secure revenue.

Key benefits

- Increased passenger satisfaction with real-time journey information
- Driver support tools to simplify
- Enable value added services with real-time journey progress data.
- Data for better overview of traffic flow.
- Enable data integrations for a comprehensive overview of how public transport is performing.





Driver support user interface and functions optimized in field studies and in cooperation with drivers.

Telia supported standards:

NeTEx, SIRI, NOPTIS (Nordics) customer integration data ingest interfaces for planned traffic and real-time updates.

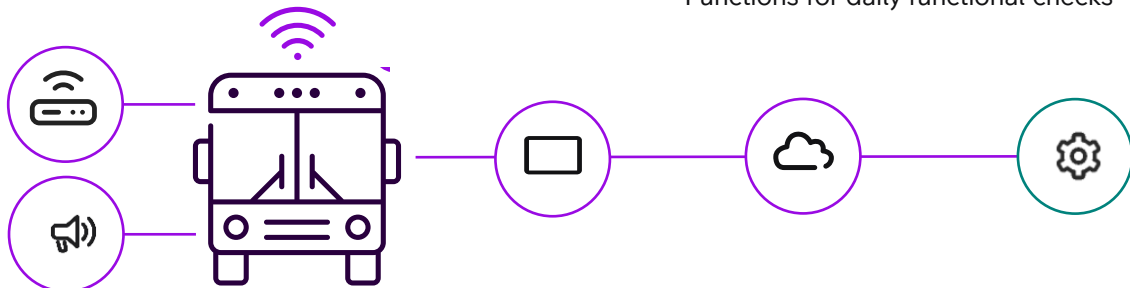
Onboard MQTT-Broker (ITxPT 0.9.3 (tobs)) for connecting real-time clients such as Signs, Announcement speakers, Infotainment screens, Driver Screen.

Message relay to hosted central backend MQTT-Broker for backend subscriptions of Journey data.

Driver support application for Journey sign-on, journey progress, manual signage, vehicle audio configuration.

Driver support features

- Manual or auto log-in/out of block and journey
- Automatic pause and drive mode between trips on a block
- Planned departure time
- Manual or automatic signage
- External signage
- Presentation of all stops of the journey with stop location and stop status
- Off route / Detour mode
- Correction of stop
- Distance to the next stop
- Time deviation from timetable
- Presentation of traffic control action information
- Presentation of disturbance information
- Changed route
- System status
- Volume settings for announcements (inside/outside)
- Functions for daily functional checks



Onboard:
 – Telia IoT Edge
 – Signs & speakers

Onboard:
 – Telia Android screen

Telia Smart Public Transport
 portal and ecosystem

Customer backend systems

End-to-end security, reliability & support

Consolidate your IT systems to one open platform

Telia IoT Edge is a powerful onboard computer and edge processor and communication gateway - and the heart of Telia's Smart Public Transport solution ecosystem. It is retrofittable and connects onboard systems and devices to the cloud. This makes it possible to download vehicle data, control, survey, update and configure IT-systems in the vehicle remotely. Telia IoT Edge combines robust, maintenance-free design with reliable and open software and application.

With an open platform, APIs and standards; you can easily integrate your own services – or add third party applications. So you can make the most of whatever the future brings.