TrustedIoTAlliance

SMART E-MOBILITY CHALLENGE

MACHINE WITNESS: KICKSTARTING A LIVE DATA ECONOMY

IMPROVING ROAD SAFETY AND CONGESTION BY UNLOCKING THE VALUE OF REAL-TIME CAR DATA, BLOCKCHAIN, AI AND DECENTRALISED DATA DELIVERY

PROBLEM BEING SOLVED

Despite millions of cars driving on road networks, information about road events is limited and rarely available in real-time. Google, for example, provides vehicle data by utilising information from mobile phones but a major opportunity lies in publishing data directly from connected vehicles.

What if councils and companies responsible for maintaining road networks could make better decisions on routing, speed limits and safety by having access to more and better data? What if drivers could be better informed to reduce journey times and avoid accidents?

SOLUTION BEING PROVIDED

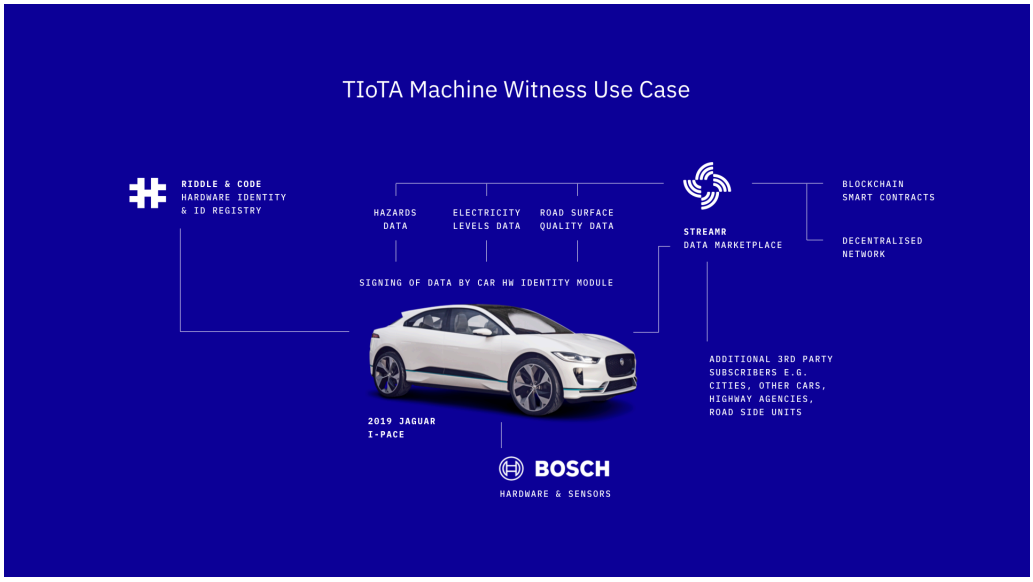
In this project Bosch, Streamr and Riddle&Code demonstrate how data can be unlocked and delivered in more efficient ways than ever before.

TECHNOLOGY COMPONENTS

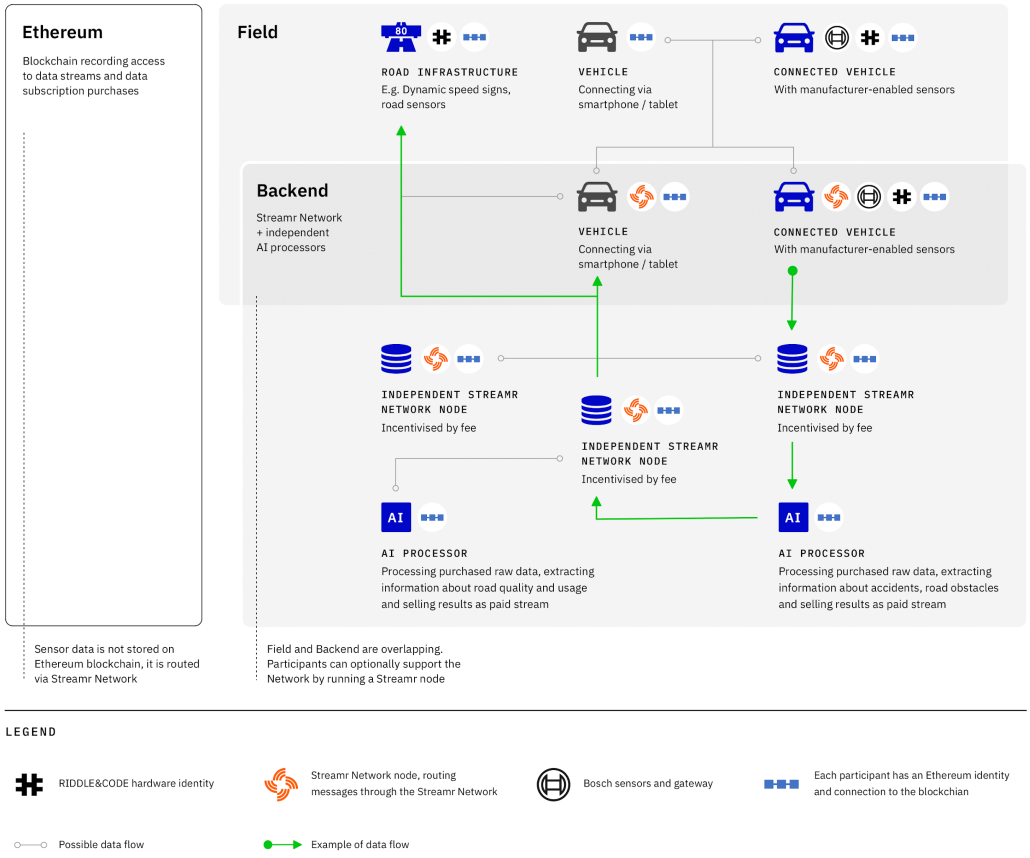
Bosch sensors and gateway enable easy to access car data via an API. Riddle&Code's hardware wallet establish the car as a trusted & tamper-proof source for data. Streamr's decentralized peer-to-peer Network enables scale for data delivery and low latency; critical when managing road incidents as they happen. Streamr's Data Marketplace and crowdselling functionality enable monetisation at the level of the individual driver incentivising the sharing of data and increased trust-based collaboration between companies. AI processors create consensus mechanism analysing aggregated data to filter useful signals that can be subscribed to. These include accidents, traffic flow, electricity levels, potholes and obstacles on the road.

BUSINESS VALUE

The ability to have a range of companies collaborating is realised by the stimulation of a data economy. Improved and greater access to information can lead to improved traffic management, reduced congestion and increased safety. For example improved data for highways agencies can lead to better incident response and faster deployment of emergency services. Better informed road users can avoid congested areas. Decisions can be made faster and based on better quality machine witnessed data backed by a consensus of multiple cars.



Data from car. Processed feed subscribed to by those running the road network.
Car as verified trusted data source.



Crowdsourced car data is purchased by independent AI entities that aggregate and refine the data.
The result is a higher level intelligence offered to other cars and road side units.

For more information: Contact@Streamr.Com