

Ficosa DSRC On-Board Unit (OBU)

Datasheet

Features

FITAX3.5 On-Board Unit (OBU) enables vehicle communication DSRC technology, with Human Main Interface and LTE CAT4 connectivity.

- 802.11p
- SAE J2945
- V2X Stack & Apps included
- GNSS High precision (Dead-Reckoning)
- Security capable (Test Certificates)
- 3 CAN + 1 J1939 + 4 GPIO
- LTE Cat4 + WiFi + BLE
- User Domain (Android OS) + Video/Audio Interfaces
- Security capable (Pilot Certificates) (*3) (*4)

(*4) SCMS is done through LTE only.

Key Technical Data

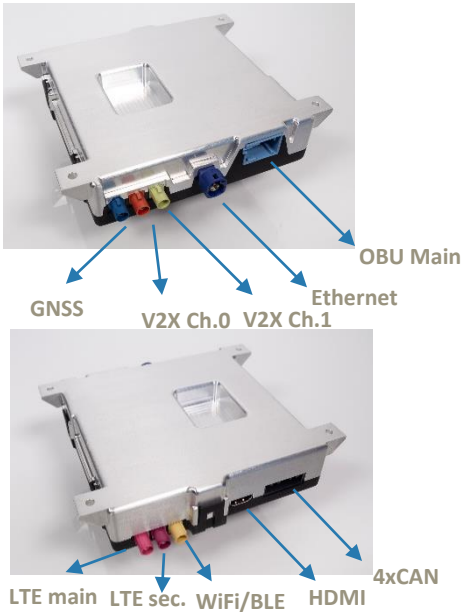
Feature	Specification
Operational Temp.	-40°C to +70°C
Power	9-18VDC
Power Consumption	<813 mA (ON V2X); < 179 mA (BOOT A) < 780 mA (BOOT B); < 3.4 mA (OFF)
HMI Interface Options (*1)	HDMI, USB, WiFi/Bluetooth
Additional External Connections (*1)	3 x CAN 1 x J1939 4 x GPIO
Over-the-Air Update Capable	V2X Processor, Vehicle CPU Interface and HMI
Positioning	GNSS (GPS, GLONASS, Galileo, BeiDou) <1.2m CEP 65% (*2)
V2X Chipset	Two channels
AutoTalks Craton2/Pluton2:	Tx/Rx Diversity or Independent Compensator ready
SAE J2735 Message Support	BSM, TIM, SRM, SSM, MAP, SPAT, WSA, RTCM, PDM
V2X Application Support	EEBL, FCW, BSW, LCW, DNPW, IMA, LTA, CSW
Security Credential Management System	Green Hills Integrity (*3)(*4)

DSRC Specifications

- Compliant with SAE J2945/1
- Compliant with SAE J2735
- Compliant with 802.11p
- Compliant to IEEE 1609.2, .3, .4, .12:2016
- Global navigation satellite services (GNSS) time sync
- GNSS module integrate with Dead-Reckoning
- Output power: 20 dBm (max)
- Sensitivity: -92 dBm (typ) @6Mbps
- Vehicle CAN I/F is required for nominal operation (e.g Lat/Long, Long Acceleration and Elevation)

Concept

Dual Board



(*1) Feature include on if HMI option is selected. (*2) GPS L1 + SBAS (*3) Optional

Overall dimensions

