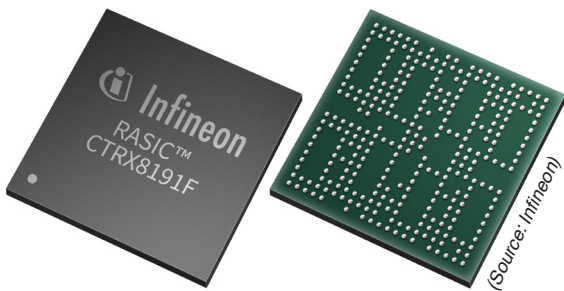


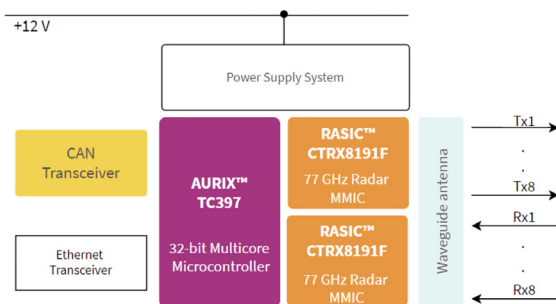


News in this regular column came in, close to the editorial deadline. Nevertheless, they have been doublechecked on accuracy and correctness.

CES 2025: 77-GHz radar prototyping module



Infineon (Germany) presented in Las Vegas the Xensiv CarKit 2C3 module based on the company's CTRX8191F radar MMIC (monolithic microwave integrated circuit). The kit can be used for prototyping of front, corner, and rear radar ECUs (electronic control units) to be applied for adaptive cruise control (ACC) and automatic emergency brake (AEB) systems respectively for automated lane change assist (ALCA) applications. Via the on-chip CAN FD controller, the product can be connected to in-vehicle networks.



Block diagram of the Xensiv CarKit 2C3 module (Source: Infineon)

The CTRX8191F chip can detect objects in distances up to 380 m. It provides up to eight transmitters and up to eight receivers for four-dimensional (4D) front radar configurations, for example. The IC is cascadable. The integrated digital PLL (phase-locked loop) circuitry features a flyback time of less than 1 μ s. The kit comes with software examples and graphical user interface (GUI), enabling rapid prototyping. hz

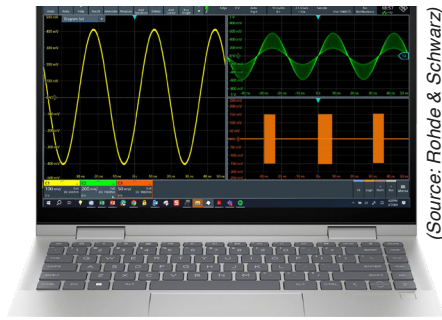
CES 2025: 79-GHz radar module with CAN FD port



Novelic (Serbia) has shown at the CES technology trade show in Las Vegas the Asper200 short-range radar module, featuring a 180° field of view (FOV). It is intended for use in passenger cars, commercial vehicles, motorcycles, transportation, and construction vehicles. The product can replace multiple ultrasonic sensors in park-assist applications. It detects and classifies objects up to 100 m. A radar-based park-assist sensor can be integrated seamlessly behind or above the bumper. A single hardware module outperforms ultrasonic sensors, with a minimum distance of less than 5 cm and detection of low-lying objects.

Using the same hardware, OEMs (original equipment manufacturers) can realize additional functionality such as power-door protection, tailgate protection, and gesture control. The implementation of edge computing allows an integration into in-vehicle networks or body application networks such as ISO 25200 (formerly DIN 4630), using a CAN FD interface. Other application options include rear-and-front collision warning, 360° surround awareness, urban blind spot detection (BSD), rear cross-traffic alert (RCTA), and rear automatic emergency braking (R-AEB). hz

PC-based oscilloscope solution



(Source: Rohde & Schwarz)

Rohde & Schwarz launched the R&S Scopestudio Application that brings the functionality of the MXO oscilloscope series to a PC. This solution allows engineers to visualize, analyze, document, and share oscilloscope measurements away from the oscilloscope hardware. Users can import oscilloscope waveforms or entire sessions. The subsequent measurements and analysis capabilities mirror what a user would experience on their MXO oscilloscope.

Since users can view and analyze previously acquired data away from the instrument, it leaves the oscilloscope free for others to use. Engineers can use PC tools to more efficiently document designs, as well as improve the quality of images and annotations. Additionally, research and development teams can share measurement results with remote locations, partners, suppliers, and customers. Protocol decoding support for CAN CC, CAN FD, and CAN XL will be available soon. The PC application software for the R&S MXO 4, R&S MXO 5, and R&S MXO 5C oscilloscopes is now available from the company. *of*

+++ Elmos (DE) has launched the cascadable E522.96 OLED driver IC for exterior vehicle lighting, featuring CAN FD connectivity; it can control up to 48 OLED segments. +++ Microcontrol has published its CAN-related [seminar schedule](#) for 2025. +++ The MC 3602 B and MC 3606 B motion controllers by Faulhaber comply with the CiA 402 profile specification series, providing a CANopen interface. +++ Rafi has developed the configurable 3L joystick for Fendt tractors; it is IP5K4-rated and provides an Isobus interface. +++ New CiA member Macome (JP) offers linear encoders and inclinometers with CAN interfaces. +++ CiA member Ematic (IT) develops CANopen products for lift control systems; one reference application is the Olympic stadium in Rome. +++ NXP has started to sample its i.MX 94 system-on-chip (SoC) series featuring CAN FD interfaces; the chips are intended for programmable logic controllers (PLCs) and industrial gateway units. +++ Chipmaker Rohm and Denso automotive Tier-1 supplier have agreed to establish a strategic partnership, which also covers CAN-related products. +++ Miunsk produces a CAN-connectable multi-sound module intended for vehicle applications; it can play back acoustic signals and voice messages by the vehicle operator (up to 50 messages). +++ New CiA members in 2025 are Altinay Robot Technologies (TR), Basicmicro (U.S.A.), Bever Car Products (NL), Copeland (U.S.A.), Emoco Labs (SE), Growy Group (NL), Hawe Hydraulic (DE), Hydrotechnik (DE), Jiangsu Fulling Motor Technology (CN), Macome (JP), Metron Automation (GR), MGB-Tech (BE), Micropower Group (SE), Naviq (CH), Optex (JP), Rolls-Royce Solutions (DE), Safety Systems (UK), and Specialized Europe (CH). +++ The PE1102N, PE1101N, and PE1100N IoT-edge computer by Asus (TW) powered by Nvidia's AI (artificial intelligence) processors provide CAN interfaces accessible by a 9-pin Dsub connector. +++ *hz*

Embedded World ticker

+++ [Forlinx Embedded](#) launched the FET-MX95xx-C system-on-module featuring five independent CAN FD ports to be mounted on an evaluation board providing the CAN transceiver chips. +++ The miriac SBC-S32G274A single-board computer by [Microsys](#) powered by an NXP processor is equipped with 16 CAN CC (classic) and two CAN FD interfaces. +++ [HMS](#) exhibits the Ixxat CAN-IB500 and CAN IB600 interface boards in PCIe format, supporting one respectively two CAN FD channels. +++ [Qiyang Technology](#) presents the IAC-IMX8MP-Kit coming with two CAN FD channels and multiple other interfaces. +++ The owa5X wireless embedded computer by [Owasys](#) intended for off-road and rail vehicles provides four CAN FD interfaces with CAN SIC transceivers. +++ The EAC-50N3 box computer by [Everfocus](#) is powered by a Jetson Orin processor (Nvidia) and has one CAN FD interface. +++ Based on a Jetson Orin processor, the EAC-30N3 computer module exhibited by [Acrosser](#) offers one CAN FD port. +++ The IBOX-650P-M12X-IP66 fanless computer based on a Jetson Orin processor by [Sintrones](#) features two CAN FD ports for integration into in-vehicle networks. +++ [Syslogic](#) introduced the RSA4NA rugged computer based on the Jetson Orin processor, which comes with one CAN FD interface. +++ *hz*



CAN in Automation

The nonprofit CiA organization promotes CAN. CiA and its members shape the future of CAN-based networking, by developing and maintaining specifications and recommendations for CAN CC (classic), CAN FD, and CAN XL.

Join the community!

- ▶ Access to all CiA specifications, already in work draft status
- ▶ Get CANopen vendor-IDs free-of-charge
- ▶ Develop partnerships with other CiA members
- ▶ Participate in plugfests and workshops
- ▶ Initiate and influence CiA specifications
- ▶ Get credits on CiA training and education events
- ▶ Get credits on CiA publications
- ▶ Get the CANopen CC (classic) conformance test tool
- ▶ Participate in joint marketing activities
- ▶ Get credits on CiA testing services

*For more details please contact CiA
office at headquarters@can-cia.org*

www.can-cia.org