



Dual DSI3 Leader Transceiver for Automotive Applications

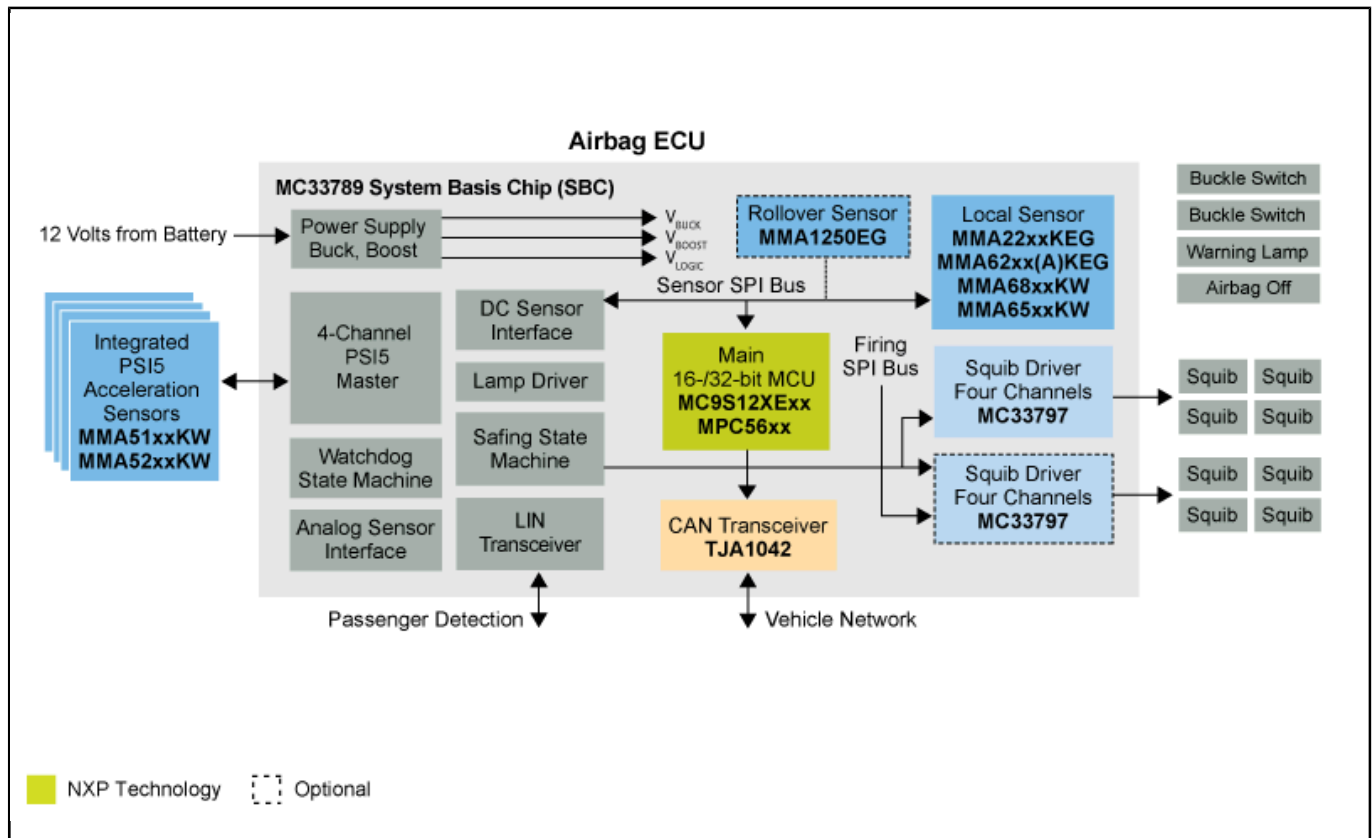
SA0528

Last Updated: Dec 15, 2024

The SA0528 dual DSI leader transceiver enables reliable, high-speed leader to follower communication for safety critical applications. Several topologies are addressed, supporting point-to-point, both daisy-chained and parallel buses, only requiring a two wire implementation per channel, meaning a much more cost-efficient alternative as compared to other three or four wires protocols. The SA0528 has been designed with safety compliancy from the grounds up, making it an ideal solution for automotive and industrial mission critical applications.

DSI3 implemented features include Command and Response Mode for leader to single follower bidirectional communication, Periodic Data Collection Mode for high-speed multiple follower data collection, and Discovery Mode for followers auto-addressing and self-programming.

SA0528 Airbag System PSI5 Protocol Block Diagram



View additional information for [Dual DSI3 Leader Transceiver for Automotive Applications](#).

Note: The information on this document is subject to change without notice.

www.nxp.com

NXP and the NXP logo are trademarks of NXP B.V. All other product or service names are the property of their respective owners. The related technology may be protected by any or all of patents, copyrights, designs and trade secrets. All rights reserved. © 2025 NXP B.V.