

Category Award

PCIe Gen4 x4 Automotive SSD
Controller



Silicon Motion, Inc.
慧榮科技股份有限公司

[Company Website](#)

Winning Reason

The SM2264XT-AT is a PCIe Gen4 NVMe SSD controller chip specifically designed for automotive applications, providing outstanding performance and reliability for next-gen centralized computing and ADAS/autonomous driving systems. It comes with a quad core ARM R8 CPU, four PCIe 16Gb/s databuses, and built-in SR-IOV capability, supporting up to eight virtual machines (VM). Together these features make this chip optimal for vehicular electronics systems requiring centralized storage.

Product Feature

- PCIe Gen4 x4 interface.
- 8 NAND channels up to 1,600 MT/s for fast data transfer.
- Built-in SR-IOV Capability for Automotive Storage: Supports up to 8 virtual functions for enhanced software functionality and resource utilization.
- Self-encrypting drive with AES 128/256 and TCG Opal for data security.
- Data retention extension with 7th generation.
- NANDXtend.
- AEC-Q100 Grades 2/3 compliance.
- Compliance with the ISO26262 ASIL-B functional safety standards.
- ISO21434 Cyber Security compliance.