



## WM32 Automotive-Grade Main Control Chip

WM32 integrates cutting-edge heterogeneous multi-core NPU V3 architecture, offering unparalleled performance and efficiency. It supports low-bitwidth mixed precision and features high-performance tensor cores specifically optimized for Convolutional Neural Networks (CNNs), as well as accelerated computation for Transformer and BEV applications. With flexible vector cores that are designed to enhance Transformer networks, the WM32 delivers outstanding performance, supported by SDMA and seamless multi-core hardware coordination.

### Key Features

- 8-Core High-Performance CPU for robust processing power.
- Dual-Core Vision DSPs designed for advanced visual data processing.
- Support for VSLAM (Visual Simultaneous Localization and Mapping) and radar data processing for enhanced sensor fusion.
- Comprehensive CV Operators for pre- and post-processing, boosting perception capabilities for smarter, more responsive systems.
- Optimized Memory Bandwidth and AI Computation to handle multiple high-resolution video streams simultaneously, enabling real-time video access and processing.

WM32 is also the **only passive cooling domain control platform** in the industry for driving and parking systems, providing reduced system costs and power consumption. It supports a range of innovative solutions, including high-speed NOA (Navigation on Autopilot), urban ICA (Intelligent Cruise Assist), automated parking, and memory parking. Its passive cooling design enhances reliability and lowers the overall cost of ownership.

### Future Prospects

WM32 is the next-generation automotive main control chip, offering powerful sensing, computation, and data processing capabilities that meet the diverse demands of modern smart driving applications. With industry-leading performance in both BEV and Transformer models, as well as the unique advantage of passive cooling for full-time driving and parking systems, WM32 is poised to revolutionize the automotive sector. This promising chip will drive innovation and shape the future of domestic automotive chip development, powering smarter, safer, and more efficient vehicles.