

RZ Ecosystem Partner Solution

IMDT V2H & V2N SOM



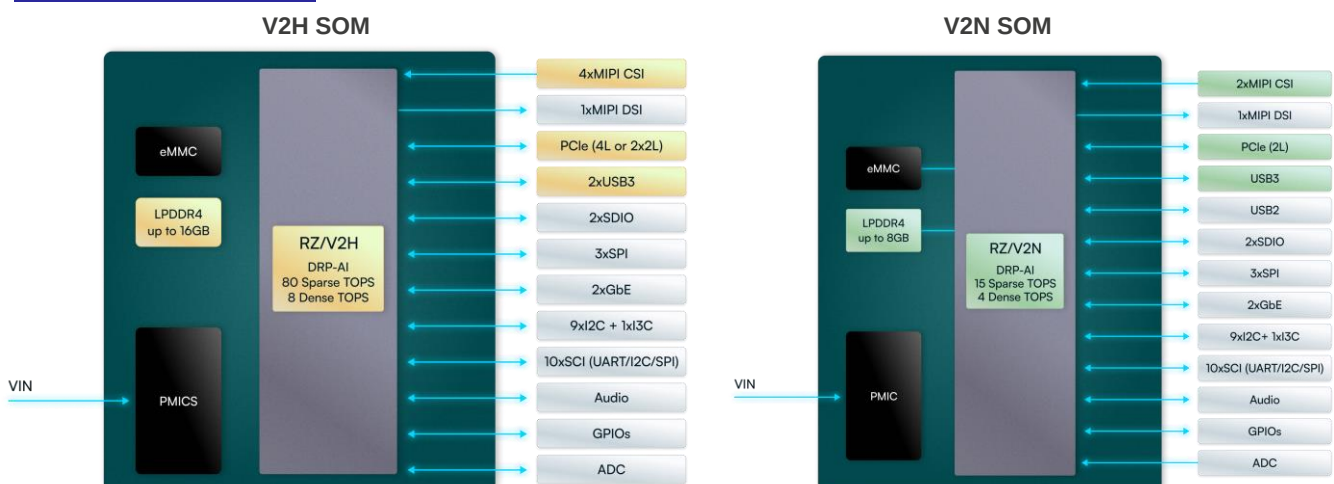
Solution Summary

The IMDT SOMs (System on Module) powered by Renesas [RZ/V2H](#) and [RZ/V2N](#) MPUs deliver an optimal balance of performance, efficiency, and cost, making it ideal for AI-driven vision applications. IMDT V2H SOM and V2N SOM are scalable lineups with the same board size, providing customers more options for their development. Both SOMs are equipped with an Arm® Quad Cortex®-A55 (1.8GHz) CPU, an integrated AI accelerator, and a 4K encoder/decoder. With multiple 4-lane MIPI CSI-2, configurable memory and storage, these SOMs deliver efficient, scalable, and affordable AI vision capabilities.

Features/Benefits

- The scalable SOM lineups enable users to deploy their product variants with less efforts
- Choose RZ/V2H or RZ/V2N based on required performance and cost (RZ/V2H: 80 Sparse TOPS and RZ/V2N: 15 Sparse TOPS)
- Small Form Factor by (WxLxH): 58x36x6mm
- Complete solution including HW such as evaluation kit & SW integrated into V2H SBC & V2N SBC
- Flexible & modular platform, providing customizable carrier board and the associated SW services
- Edge-AI realized by SOMs reduces potential data breaches of cloud-based system

Diagrams/Graphics



Target Markets and Applications

- Robotics and drones
- IoT applications
- Surveillance cameras
- Industrial applications
- Smart retail
- Smart home
- Smart city

www.imd-tec.com/product-category/renesas

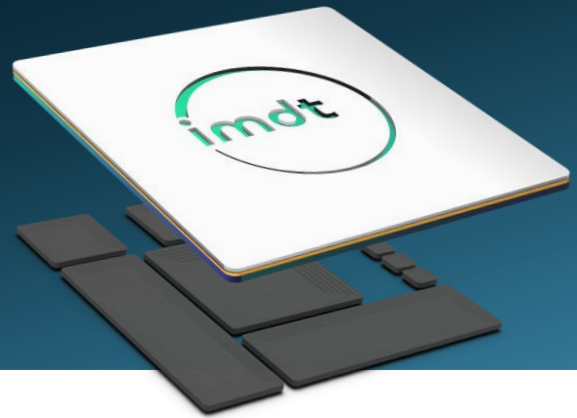
2025.03



IMDT Solutions

Take your innovations to design, development & manufacturing

we tailor end-to-end solutions that transform technology aspirations into cutting-edge applications



Design



Development



Manufacturing

IMDT IPs:



3D Measuring System

Calibration algorithm
Depth algorithm

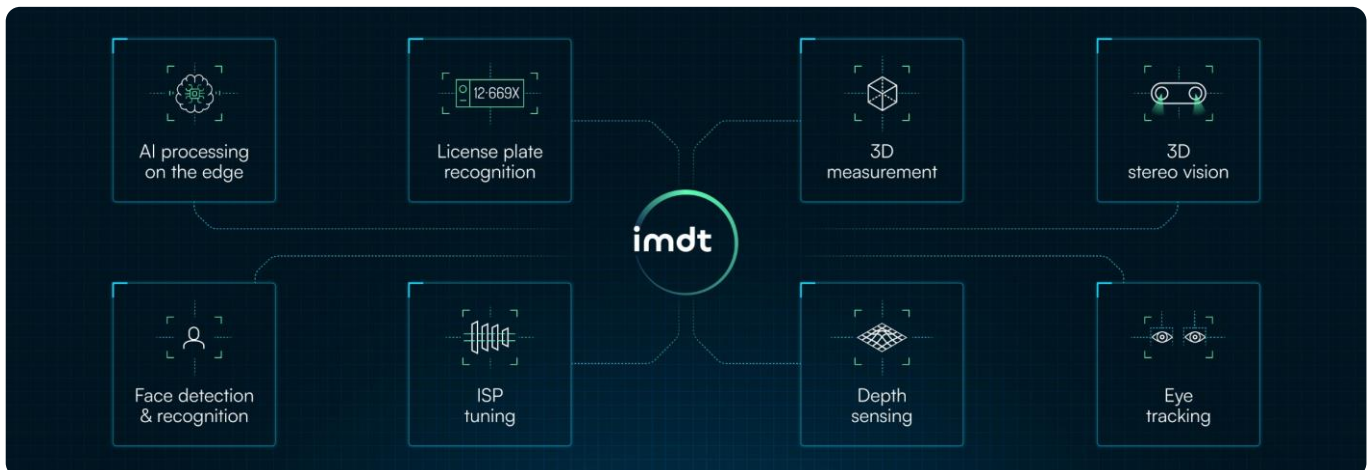


Face recognition

ML customizable design

- Accelerate product time-to-market
- Reduced cost of development and manufacture
- Simplified production
- Optimized performance
- Seamless customization of algorithms, devices and systems
- On the platform of your choice

IMDT Solutions Overview



About IMDT

IMDT Technologies, with headquarters in the UK and Israel, specializes in creating advanced vision and AI-powered products and systems. Leveraging extensive engineering experience in real-time applications, including vision and AI on edge hardware and software, IMDT has excelled in design, development, and manufacturing since its inception in 2017. The company globally addresses complex vision and AI challenges, focusing on partnerships with leading chip manufacturers and delivering turnkey projects in medical, robotics, smart cities, smart homes, and industrial IoT. For more information contact: sales@imd-tec.com