

# VROC™ by Graid Technology Inc.

Next-Generation CPU-Based NVMe RAID for Intel® Xeon® 6 and Beyond



**VROC™ by Graid Technology Inc. is the next-generation CPU-based software NVMe RAID solution for Intel® Xeon® platforms. Built on the trusted VROC foundation and developed by Graid Technology, this is where we deliver new platform support, features, and innovation. Intel® VROC continues to be maintained for existing deployments. VROC™ by Graid Technology Inc. is where the roadmap goes from here.**

## Performance

**Up to 45% Higher IOPS:** Delivers up to ~29 GB/s throughput and ~6M read IOPS with 31% lower latency vs. legacy HBA RAID, by integrating control directly into the CPU via Intel® VMD and UEFI, with no add-in card required.

## Resilience

**Comprehensive RAID Levels:** Supports RAID 0, 1, 5, and 10 across Windows, Linux, and (on roadmap) VMware ESXi RAID 1/5, with bootable RAID and SED hot-plug support.

**SupremeRAID™ Coexistence:** Run CPU-based VROC and GPU-accelerated SupremeRAID™ on the same platform, match the right RAID tier to each workload without architectural compromise.

## ROI

**No-Cost Migration Path:** Customers running Intel® VROC on Xeon® 6-based platforms (Scalable, Xeon® D, Xeon® W) can move to VROC™ by Graid at no additional cost, preserving existing investment while gaining access to the active roadmap.

**Modernized Licensing:** New deployments use UEFI-based licensing, simpler procurement, cleaner lifecycle management. Existing hardware keys remain supported on Xeon® 6 to protect in-flight deployments.

## VROC™ by Graid Technology Inc.

### Ideal For:

Intel® Xeon®-based enterprise servers requiring boot-capable NVMe RAID

Tier 1 OEM platforms from ecosystem partners

Workstations and client systems with native Intel platform RAID

Mixed environments running VROC™ and SupremeRAID™ side by side

**“For two years, VROC customers have been asking what’s next. Under Graid Technology Inc., VROC has a real roadmap, an owner who is actively investing in it, and OEM partners who helped shape where it’s going.”**

— Jacek Wysoczynski  
Vice President, VROC Business Unit, Graid Technology Inc.

# Detailed Technical Specifications

For questions about VROC™ by Graid Technology Inc., email [info@graidtech.com](mailto:info@graidtech.com)



<b>Architecture</b>	CPU-based software RAID via Intel® VMD
<b>Supported RAID Levels</b>	RAID 0/1/5/10 (ESXi RAID 1/5 on roadmap)
<b>Boot Support</b>	Bootable RAID via UEFI
<b>Licensing</b>	UEFI-based (default); existing hardware-key licensing supported on Xeon® 6 platforms only
<b>Supported Platforms</b>	Intel® Xeon® 6 (Scalable, Xeon® D, Xeon® W); Birch Stream, Granite Rapids WS, Kaseyville; future Intel® Oak Stream (DMR) platforms
<b>Supported OS</b>	Windows, Linux (RHEL, SLES, KylinOS); VMware ESXi (roadmap)
<b>Coexistence</b>	Operates alongside SupremeRAID™ on the same platform; match CPU-based RAID to boot/OS volumes and GPU-accelerated RAID to performance-critical data tiers
<b>Management</b>	HII, RCFG, CLI, BMC/OOB
<b>OEM Support</b>	Lenovo, Supermicro, ASRockRack, and additional Tier 1 server partners
<b>Roadmap Features</b>	GPUDirect Storage (GDS), OpenBMC, PLDM5 firmware updates via OOB, SED hot-plug, NVMe HDD support, PCIe Gen 6
<b>Migration Path</b>	No-cost migration from Intel® VROC for customers on Xeon® 6 platforms
<b>Relationship to Intel® VROC</b>	Separate, coexisting product lines. Intel® VROC remains in maintenance for existing deployments; all new features, platform support, and innovation are delivered exclusively in VROC™ by Graid Technology, Inc.

**Active Roadmap**  
24-month roadmap delivers new platforms, features, and OEM-driven innovation

**OEM-Backed**  
Endorsed by Tier 1 OEMs and additional partners

**Simplified Licensing**  
UEFI-based licensing for new deployments; existing hardware keys honored on Xeon® 6

**Future-Ready**  
Long-term solution for Intel® Xeon® 6, Oak Stream (DMR), and beyond

**Migration Support**  
Graid and OEM support for no-cost customer migrations from existing Intel® VROC deployments