Rugged CG2500 server for demanding naval applications

⚓ NEEDS AND CHALLENGES

❯ **Dense data processing:** Naval operators needed an efficient way to process and analyze massive amounts of data from various cameras, radar systems and communication channels.

❯ **High CPU performance:** Support for multiple, simultaneous applications such as navigation, surveillance and weapon control in naval environments where computations must be local.

❯ **Removable storage:** A simplified way to physically secure sensitive data.

❯ **Secure system management:** Needed the system to remain secure and uncompromised, maintaining optimal performance for executing critical applications.

❯ **Support for extreme conditions:** A computing system robust enough to process data and operate reliably on vessels, submarines, trucks, and other complex environments where shock, vibration, and temperature fluctuations are common.

❯ **High MTBF output:** A reliable system with a high Mean-Time-Between-Failures (MTBF), resulting in fewer equipment problems throughout its lifetime.

❯ **Long-life support:** Server with extended life and manufacturing availability of at least 7 to 10 years.

◎ BENEFITS OF THE CG2500

❯ **High-performance data processing:** Advanced processors and increased memory capacity allow for rapid processing of data from multiple sources in a dynamic environment, improving situational awareness and operation response times.

❯ **High-density processing server:** Highly dense, short-depth platform delivers exceptional processing power with up to 64 cores, allowing for the simultaneous execution of multiple CPU threads. This capability supports numerous concurrent applications, significantly enhancing operational efficiency and responsiveness.

❯ **Modular system design:** Storage drive designed for easy removal, to store mission-critical data in secure locations.

❯ **Advanced cybersecurity measures:** Features such as secure boot, TPM, bootguard and encryption capabilities protect information during booting process, ensuring system remains in a genuine state.

❯ **Designed for harsh environments:** Wide operating temperatures of -5ºC to 55ºC (41º F to 131º F), support for shock and vibrations, in a confined enclosure designed to meet NEBS and MIL-STD 810/167/461, guarantee reliable operations.

❯ **High reliability:** MTBF of 300,000 hours, for high intensive applications to run reliably, and minimize downtime.

❯ **Extended server life:** Manufacturing availability of at least 7 to 10 years, ensuring sustained performance reducing need for frequent replacements or upgrades.

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