USE CASE

SERVER-BASED VIDEO ANALYTICS IN HARSH CONDITIONS AT THE EDGE

Background

Video analytic companies have developed sophisticated software and technology delivering an increasingly wide variety of functions, including object detection classification, vehicle detection and recognition, people and face recognition, behaviour analysis and business intelligence. The analysis of all this data in a centralized location requires software to have high bandwidth connectivity which is both expensive and difficult for legacy infrastructure to support. Enterprises are now looking to run video analytics at the edge and are seeking solutions to optimize connectivity, reduce cost, and lower latency.

Business Challenges

Enterprises looking to deploy video analytics at the edge face considerable challenges beyond requiring powerful server class processors to run the software. The solution must scale up and support a large number of video analytics streams while keeping costs reasonable. Often, locations at the edge are remote which means the server must withstand harsh conditions with no loss in performance and run continuously with no down time or onsite skilled resources for maintenance and deployment. With limited connectivity, the solution must be able to run analytics close to the capture of video, execute analytics at the edge, and host the reference database for the analytics.

Solution

HarshPro™ Servers are rugged IP-rated server class machines built on the processing power of Intel® Xeon® processors with high capacity, high speed NVMe SSDs. The HarshPro server’s memory and SSD can be expanded easily with multiple configuration options, supporting reference database hosting, hardware acceleration and multiple streams, making it easy to scale as the business requires. Built to last and work in harsh IP66 conditions, the servers have no moving parts, ideal for 24/7 operations and can operate continuously at full performance in IP66 conditions at -20°C to +50°C with no airflow. Moreover, the servers can be 100% remotely managed, removing the need for onsite servicing and maintenance.

Benefits

HarshPro Servers enable enterprises to achieve economies of scale by hosting video and reference databases on the same machine. The rugged build of the servers allows the video analytics software to run with no loss of performance even in harsh conditions, while remote management reduces the cost of deploying personnel at the edge for maintenance; HarshPro Servers improve operational safety and productivity for enterprises.