ROBOFLOWOS ON NVIDIA JETSON

RF-AGX64

High-throughput industrial edge AI appliance for multi-camera and line-scan inspection



4+ camera streams | Line scan | Dual 10GbE

RF-AGX64 is Roboflow's highest-performance Orin-based edge appliance. Built around the NVIDIA Jetson AGX Orin 64GB module in an industrial chassis with a passive heat sink, it runs Roboflow OS to deploy and manage computer vision models and Workflows directly on the production line. Dual 10GbE ports support high-bandwidth cameras such as line-scan systems, while integrated PoE ports power area-scan cameras over a single cable.

System specifications

Compute module	**NVIDIA Jetson AGX Orin 64GB**
Enclosure	**Industrial chassis with passive heat sink**
Storage	**256 GB NVMe SSD**
Networking	**2× 10GbE (actively cooled)** **4× 1GbE PoE**
Operating system	**Roboflow OS**
Runtime	**NVIDIA JetPack 6.2**
Recommended workload	**4+ concurrent camera streams, including line scan**

Compute module

Per NVIDIA published module specifications

AI performance	**Up to 275 TOPS (INT8)**
GPU	**NVIDIA Ampere, 2048 CUDA cores, 64 Tensor Cores**
CPU	**12-core Arm Cortex-A78AE v8.2 64-bit**
Memory	**64 GB 256-bit LPDDR5, 204.8 GB/s**
Accelerators	**2× NVDLA v2.0**
Module power	**15 W – 60 W**

Network interfaces

Port	Qty	Typical use
10GbE	**2**	Uplink to plant network; high-bandwidth cameras
1GbE PoE	**4**	PoE-powered GigE Vision cameras

Software roadmap: NVIDIA JetPack 7.2 is being finalized for RF-AGX64 and will be delivered as an over-the-air update through Roboflow OS.

Questions? **enterprise@roboflow.com**