

GAP-251F - G7 Series 2U RUGGED WORKSTATION



Intel® Xeon® E-2200/2100, Intel® 8th/9th Gen. Core™ i3 - Coffee Lake
Front I/O - Front Power Supply



GAP is a line of rugged servers and workstations with aluminum construction, designed for applications that require a robust and qualified MIL-GRADE device, suitable for operating in critical environments.

GAP-251F G7 series workstations feature single socket Intel® Xeon® E-2200/2100 or Intel® 8th/9th Gen. Core i3 (Coffee Lake) processors supporting up to 8 Cores (16 thread with Hyper-Threading), 16MB Smart Cache, up to 128GB DDR4 memory with or without ECC and up to 16 PCIe 3.0 lanes. The integrated IPMI services support monitoring, control, and management functions and provides for alarm notifications in case of critical events.

GAP-251F is designed for 19" rackmounting and has a 2U chassis with 510mm depth.

The front I/O and rear power supply layout includes three removable SSD, three internal SSD and an optional slim DVD.

GAP-251F rugged workstation can host one low profile PCIe cards and two PCIe cards.

The additional boards are equipped with dedicated fixing systems to ensure optimal operation even in the presence of shock and vibration or during transport.

GAP workstations are qualified according to MIL-STD-810G for temperature, shock and vibration and can optionally conform to MIL-STD-461 for EMI /EMC. Upon request, the integrated devices, complete with I / O cards, can be subjected to specific profiles of thermal or mechanical stress. Versions with MIL grade connectors on I/O ports and power input are available.

All units are delivered with their inventory list to ensure configuration control and reproducibility over time.

FEATURES

- 2U Rugged Workstation - 510mm depth
- Single Intel® Xeon® E-2200/2100 processor
- Single Intel® 8^a/9^a Gen. Core™ i3
- Front I/O connectors
- Rear Power Input
- Redundant AC or DC Power Supply
- Up to 3 removable 2.5" SSD + 3 x internal 2.5" SSD
- Optional DVD
- Up to 3 PCIe boards
- Optional Conformal Coating
- MIL-STD-810G
- Optional MIL-STD-461

Technical Specifications

System

Processor	Intel® Xeon® E-2200/2100, Intel® 8th/9th Gen. Core™ i3 (up to 95W TDP) – single socket H4 (LGA 1151)
Memory	Up to 128GB ECC UDIMM, DDR4-2600MHz
Chipset	Intel® C246
Network	2 x RJ45 Gigabit Ethernet 1 x RJ45 dedicata IPMI
Storage	2.5" SATA Disk - RAID 0, 1, 5, 10
SATA	6 SATA3 ports (6Gbps); RAID 0, 1, 5, 10
TPM	1 TPM Header
Motherboard I/O	Available on the front: 1 x VGA, 2 x USB 2.0, 2 x USB 3.1, 1 x COM, 2 x LAN, 1 x IPMI
Expansion slots	2x PCIe - Bracket Full Height 1x PCIe - Low Profile
Operative Systems	Windows® Server 2012 R2; Windows® Server 2016; Windows® Server 2019; Ubuntu 18.04 LTS; CentOS 7.5; Windows® 10 64bit
IPMI	IPMI2.0, SPM, Watchdog; SNMP and e-mail alarms and notifications
Monitoring	Monitoring, control, and management functions (fan speed, temperature, voltage, redundant power failure, power consumption, disk health, raid health, and memory health)

Power Supply

Power Supply	100/240 Redundant VAC 18-36 Single or Redundant VDC 36-72 Single or Redundant VDC
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Mechanical

Dimensions	483 x 88 x 510 mm
Construction	Aluminum with surface passivation treatment
Colour	Silver
Mounting	2U 19" rackmount chassis Telescopic slides optional
Configuration	Front I/O and Rear Power Supply
Front Panel	Led: Led Power ON and HDD/SSD functionality; Switch: Power ON / OFF and System Reset
Drive Bay	1 x slim 5.25"; 1 x 3.5" bay + 1 x internal bay x 3 ODD 2.5"

Environmental - (Design to meet)

Operative Temperature	Standard: 0°C / +50°C Extended: -20°C / +60°C (depending on the configurations)
Operative Humidity	8% to 95% non-condensed (depending on the configurations)
Storage Temperature	-40°C / +70°C
Vibrations	MIL-STD-810G, Method 514.7, Cat 4 - Proc. I - 2.24 Grms, 5-500 Hz 60 min/axis for 3 axes
Operative Shock	MIL-STD-810G Proc. I Method 516.7 - 15g / 11ms – half sine
Transport shock	MIL-STD-810G Proc. II Method 516.7 - 30g / 9ms sawtooth
Certifications	Directive 2014/35/UE-LVD / Directive 2014/30/UE-EMC Directive 2011/65/UE - RoHS / Regulation (EC) No 1907/2006 - REACH

GAP servers and workstations are designed in accordance with the environmental specifications indicated. Some parameters depend on the configuration. Equipment may be subjected to dedicated test profiles.