



PSC-18

DUAL DISPLAY 18.5" PORTABLE GPU SERVER



- Dual 18.5" FULL HD 1920 X 1080 Portable GPU Server
- Optional for UFD 3840 x 2160
- MIL-STD-810 Thermal, Shock, Vibration, Humidity / EMI / EMC Resistance
- Intel® Xeon® 6700P, 6500P, and 6700E Processors
- NVIDIA Quadro RTX A4000 GPU (6,144 CUDA Cores)
- 3 x PCIe Expansion Slots
- Redundant AC 100~240V Input
- MIL-STD-461 18V~36V DC-Input (optional)
- Extreme Temperature: -20°C to +55°C

INTRODUCTION

Engineered for mission-critical operations, this 18.5" dual-display tactical system delivers powerful computing and superior situational awareness in harsh environments. Powered by Intel® Xeon® 6700P-series, 6500P-series, and 6700E-series processors with up to 8 DDR5 RDIMM/MRDIMM slots, it ensures high-performance data processing for real-time decision-making. Integrated with NVIDIA RTX A4000 GPU (6,144 CUDA cores), the platform enables advanced AI inference, video analytics, and multi-source data visualization.

The IP65-rated dual 1000-nit sunlight-readable multi-touch displays provide clear visibility in extreme outdoor conditions, enhancing operational efficiency. Designed for rugged deployments, it complies with MIL-STD-810 standards for shock, vibration, and temperature, and supports extended operating ranges from -20°C to +55°C. With redundant AC 100–240V power input, the system ensures reliable and continuous operation in demanding tactical scenarios.

SPECIFICATIONS

SYSTEM

CPU	Intel® Xeon® 6700P-Series, 6500P-Series, and 6700E-Series Processors, LGA 4710, CPU TDP up to 350W
Memory	8 x DDR5 6400MHz RDIMM up to 1TB
GPU	NVIDIA RTX A4000, Ampere GPU architecture 6,144 CUDA Cores, 192 Tensor Cores 16GB GDDR6 Memory with ECC, up to 448 GB/s Memory Bandwidth Max; Power Consumption: 140 W

DISPLAY

Display	Dual 18.5" TFT LCD FHD (1920 x 1080), 1,000 Nits Brightness Display Sunlight Readable, P-capacitive Multi-touch Screen
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STORAGE

Storage	4 x Swappable 2.5" SATAIII SSD
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ETHERNET

Ethernet	Intel® E610-XAT2
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FRONT I/O

Front I/O	2 x USB3.2 1 x Power Button w / Indicator LED 10 x OSD Buttons
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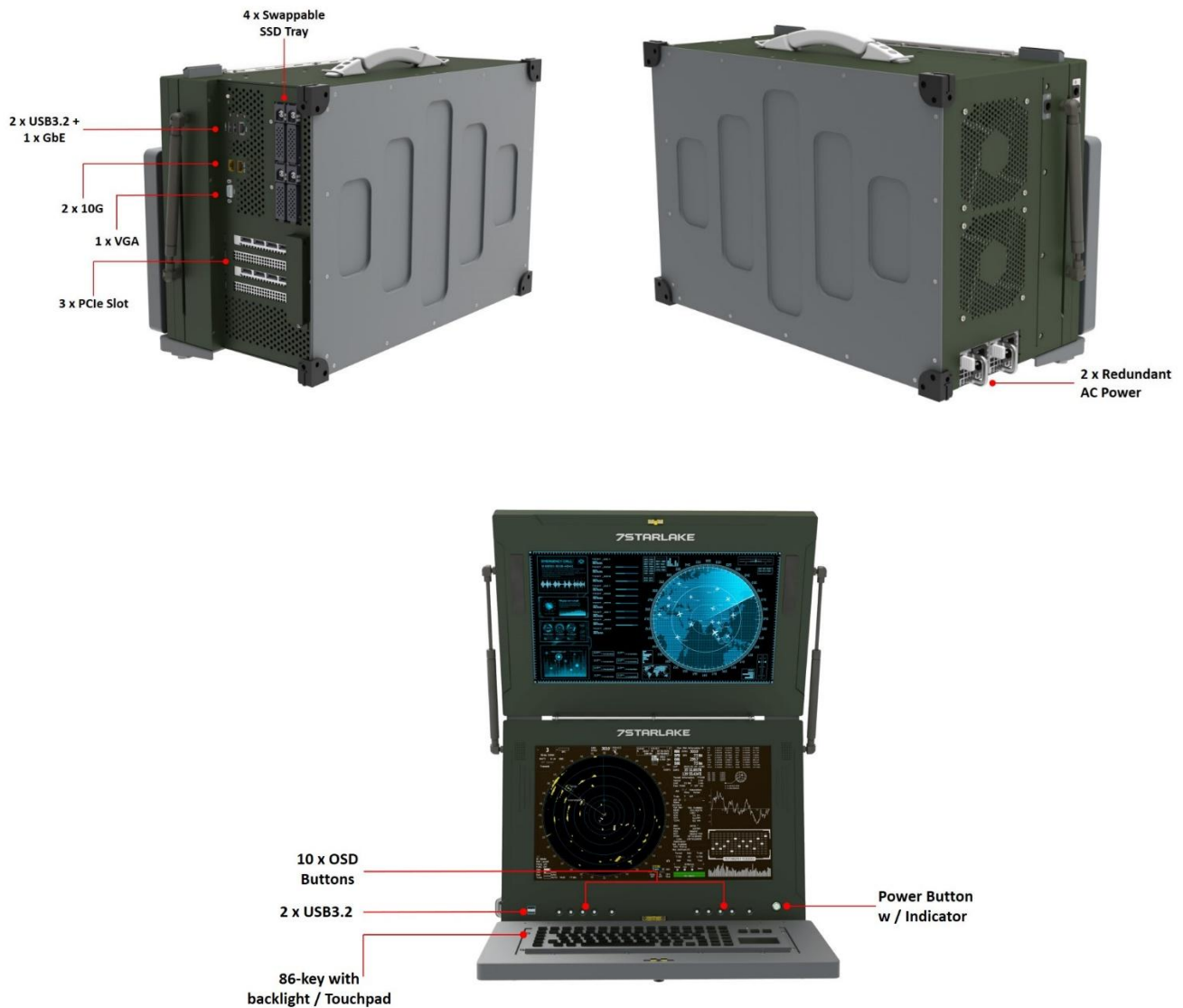
RIGHT I/O

Left I/O	1 x IPMI LAN
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	2 x 10GbE RJ45 LAN 2 x USB3.2 1 x VGA 2 x Swappable SSD Tray 3 x PCIe Expansion Slot
LEFT I/O	
Left I/O	2 x AC Power Plug
KEYBOARD	
Keyboard	86-key with Backlight / Touchpad
OPERATING SYSTEM	
OS Support	Windows® Server 2022 64bit Windows® Server 2025 64bit Linux by request
PHYSICAL	
Dimension(W x D x H)	TBD
Weight	13KG
Chassis	SECC
Heatsink	Heatsink Aluminum Alloy with Fan
ENVIRONMENT	
Operating Temp.	-20°C to +50°C
Storage Temp.	-40°C to +85°C
POWER	
Power	1300W AC100~240V 1+1 Redundant
MIL-STD-810 ENVIRONMENT TESTING STANDARDS	
Method 501, Operational Temperature, high	Procedure II: +50°C, two-hour dwell, four cycles
Method 501, Storage Temperature, high	Procedure I: +75°C, two-hour dwell, four cycles
Method 502, Operational Temperature, low	Procedure II: -20°C, two-hour dwell, four cycles
Method 502, Storage Temperature, low	Procedure I: -40°C, two-hour dwell, four cycles
Method 514, Vibration	Category 24/Non-Operating (Category 20 & 24, Vibration)
Method 514, Vibration	Category 20/Operating (Category 20 & 24, Vibration)
Method 516, Shock	Procedure V Non-Operating (Mechanical Shock)

Method 516, Shock	Procedure I Operating (Mechanical Shock)
Method 507, Humidity	Procedure II: exposure to 10 cycles of 95% relative humidity at temperatures of 30 °C to 60 °C with conformal coating (optional)
Method 500, Altitude (Low Pressure)	15,000 feet transport, -200÷2500[m] ground operation and exposed to +55°C and -20°C operation (optional)
Method 510, Sand-Dust	Procedure I: Blasting dust, 12 hours (optional)

Appearance



ORDER INFORMATION

PS2-18

Rugged Dual 18.5" Portable GPU Server: Featuring high-brightness sunlight-readable displays, powered by Intel® Xeon® processors and NVIDIA RTX A4000 GPU. Equipped with a 1300W AC 1+1 redundant power supply and engineered for mission-critical operations across an extreme operational temperature range from -20°C to +50°C.

This datasheet is for marketing purposes only and does not constitute a warranty. All specifications, dimensions, and data are subject to change without notice. For the latest specifications and updates, please contact your 7STARLAKE representatives.