

# Rx220-3i

Provides performance and versatility to address your most demanding applications

The Exatron Rx220-3i HPC Server, a Class - 1 Make in India product, delivers High-Performance Computing in a compact 2U, Two-Socket Standard Rack design. Designed for computationally intensive tasks, it excels in supporting Scientific Research, Simulations and Complex Data Analytics, Ensuring Reliability and Scalability for High-demand environments like HPC clusters.

## Exatron Rx220-3i

The Exatron Rx220-3i HPC Server Series delivers powerful, secure, and versatile performance in a streamlined form factor, making it an ideal choice for businesses seeking a balance between performance and security.

### Ideal for

- High-Performance Computing (HPC) Workloads
- AI/ML Applications
- Complex Data Analytics

## Max Performance

- Supports 3rd Gen Intel® Xeon® Scalable Processors (Ice Lake) with up to 270W TDP.
- 16 DDR4 DIMM slots across 8 memory channels, supporting up to 4TB DDR4 (with RDIMM 3DS) at 3200 MHz speeds.
- PCIe Gen4 support, with 3 x PCIe x16 and 2 x PCIe x8 slots for maximum expandability.

## Air cooled at peak performance

- Optimized airflow through 4 x 60x56mm easy-swap fans for peak performance under air-cooled conditions.
- Support for up to 12x 3.5" drives with flexible configurations.

## Enhanced Versatility

- Multiple storage options, including 2x rear 2.5" drives, 2x M.2 Gen3 slots, and optional NVMe PCIe 4.0 configurations.
- Advanced modular design with interchangeable riser configurations for future scalability.

Front view



Rear view



## Cyber-Resilient Architecture

- Built-in security with TPM 2.0, Silicon Root of Trust, and Secure Boot support.
- Firmware resilience via AMI UEFI BIOS with advanced features like iSCSI boot and SRIOV.

## Embedded Management

- Comprehensive remote monitoring via IPMI 2.0, KVM over IP, and SNMP support.
- Efficient management with Intel NM, temperature/fan/voltage monitoring, and remote power controls.

## Rest easier with Exatron Services

- Maximize your Enterprise servers with comprehensive services from Exatron including 4-hour support and triage, consulting, deployment assistance and more



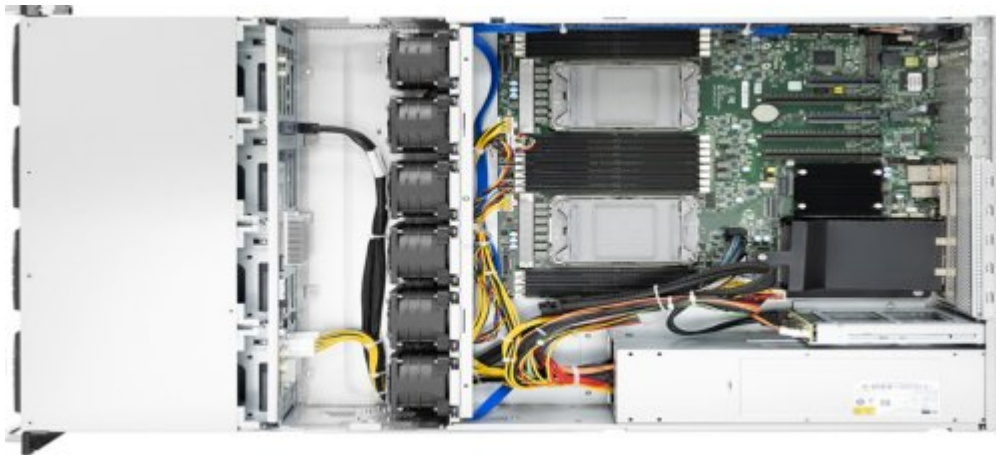
Feature	Technical Specifications
Model	Rx220-3i HPC Server Series
SKU	Rx220-3i16-12SN,Rx220-3i16-12SE,Rx220-3i16-24N,Rx220-3i16-24SE
Dimensions (WxDxH)	<ul style="list-style-type: none"> <li>mm : 438 x 800 x 87.5</li> <li>inches : 17.2 x 33.5 x 3.5</li> </ul>
Form Factor	2U Rack Server
Processor	<ul style="list-style-type: none"> <li>3rd Gen Intel® Xeon® Scalable Processors (Ice Lake)</li> <li>Supports CPU TDP up to 270W</li> </ul> <p>**Use over 165W CPU, Please contact Exatron Technical Support for more info/details about optimized CPUs and specialized system.</p> <ul style="list-style-type: none"> <li>CPU Interconnection: QPI Speeds 11.2 GT/s</li> <li>Socket Type : Socket P+ (LGA-4189)</li> </ul>
Memory	<ul style="list-style-type: none"> <li>8 x memory channels per CPU (1DPC)</li> <li>16 x DIMM slots support:</li> </ul> <p>DDR4 3200/2933MHz RDIMM/LRDIMM</p> <ul style="list-style-type: none"> <li>up to 512GB RDIMM SRx4 (16Gb)</li> <li>up to 1024GB RDIMM DRx4 (16Gb)</li> <li>up to 4096GB RDIMM 3DS 8Rx4 (16Gb)</li> <li>up to 2048GB LRDIMM QRx4 (16Gb)</li> <li>up to 4096GB LRDIMM 3DS 8Rx4 (16Gb)</li> </ul> <p>Intel® Optane™ DC Persistent Memory (Barlow Pass) support</p>
Storage	<p><b>External :</b></p> <ul style="list-style-type: none"> <li>2U 12x3.5" SAS /SATA/NVMe, &amp; Up to 24 x 2.5" hot swap (5x PCIe Gen4 Slimline connectors)</li> <li>2 x 2.5" hot swap (SATA, 15mm, rear)</li> </ul> <p><b>Internal :</b></p> <ul style="list-style-type: none"> <li>2 x M.2/M-Key/22110/2280 (PCIe Gen3)</li> </ul>
Drive Bays	<ul style="list-style-type: none"> <li>12 bay 3.5"/2.5" 8 to 24 x 2.5" hot swap (5x PCIe Gen4 Slimline connectors)</li> <li>2 x 2.5" hot swap (SATA, 15mm, rear)</li> </ul>
GPU Options	NA
PCIe	<ul style="list-style-type: none"> <li>3 x PCIe X16 slots (HHHL) + 1 x OCP 3.0</li> <li>2 x PCIe X8 slots (HHHL)</li> </ul>
Embedded NIC	1 x GbE RJ45 dedicated BMC management
Network options	1x x16 OCP v3.0 (PCIe Gen4)
NIC Ports	NA
Power Supplies	1200W /1600W/2000W CRP N+1 Supports
Cooling Options	Air Cooled
Fans	4 x 60x56mm easy swap fans ABS material plastic air-duct (clear)

Software add-ons	NA
Bezel options	Optional
on Board	<p><b>SATA :</b> Lewisburg-R PCH on-chip solution supports 10 x SATA 6.0 Gb/s</p> <ul style="list-style-type: none"> <li>• 2 x SATA 7pin</li> <li>• 8 x SATA by slimline</li> </ul> <p>(supports both SATA/PCIe by PCH HSIO)</p> <p><b>Network Controller :</b></p> <ul style="list-style-type: none"> <li>• Realtek RTL8211E GbE for BMC dedicated management port (NCSI shared NIC - reserved for OCP &amp; I210 by jumper setting)</li> <li>• Intel I210 GbE for BMC shared NIC management port by onboard connector (NCSI shared NIC - reserved for OCP V3.0)</li> </ul> <p><b>Graphics :</b> Aspeed AST2500 Advanced PCIe Graphics &amp; Remote Management Processor</p> <ul style="list-style-type: none"> <li>• PCIe VGA/2D Controller</li> <li>• <u>1920x1200@60Hz</u> 32bpp</li> </ul>
Rear I/O	<p><b>LAN:</b></p> <ul style="list-style-type: none"> <li>• 1 x GbE RJ45</li> <li>• 1 x GbE RJ45 dedicated to BMC management</li> </ul> <p><b>USB:</b></p> <ul style="list-style-type: none"> <li>• 2 x USB 3.0 Type A</li> <li>• Video Output:</li> <li>• 1 x external DB-15 VGA port</li> <li>• Serial Port:</li> <li>• 1 x external COM port phone jack</li> </ul>
Front I/O	<ul style="list-style-type: none"> <li>• Power Button</li> <li>• Reset button</li> <li>• UID</li> <li>• 2 x USB 3.2 Gen1</li> <li>• Power status, Drive activity, LAN activity, System alert, System ID</li> </ul>
OEM Integrations (add-on)	NA
Embedded Management	<p>IPMI 2.0</p> <ul style="list-style-type: none"> <li>• KVM over IP</li> <li>• Media redirection</li> <li>• Temperature, fan, voltage, PSU sensor monitor</li> <li>• System temperature</li> <li>• System ID / System fail indicator</li> <li>• Remote power on/off/reset</li> <li>• SEL message alarm through mail</li> <li>• SNMP support</li> <li>• Intel NM</li> </ul>
BIOS	<p><b>BIOS Type :</b> AMI UEFI BIOS</p> <p>SPI (Serial Peripheral Interface) FLASH Interface</p> <p>BIOS Features :</p> <ul style="list-style-type: none"> <li>• ACPI</li> <li>• PXE</li> <li>• WOL</li> <li>• AC loss recovery</li> <li>• BIOS recovery</li> <li>• IPMI 2.0 KCS interface</li> </ul> <ul style="list-style-type: none"> <li>• SMBIOS</li> <li>• Serial console redirection</li> <li>• BIOS Boot</li> <li>• BIOS Recovery Mode</li> <li>• SRIOV</li> <li>• iSCSI</li> <li>• TPM</li> <li>• PCIe NTB</li> </ul>

Security options	TPM2.0
Operating System and Hypervisors	Microsoft Windows Server 2019/2022, Redhat Linux 9.2,8.8.8.7, ubuntu 20.04LTS,22.04LTS
OEM-ready version available	From bezel to BIOS to packaging, your servers can look and feel as if they were designed and built by you. For more information, visit <a href="https://exatron.in/">https://exatron.in/</a>
Operating conditions	<ul style="list-style-type: none"> <li>Storage temperature : -10°C(14°F) ~ 60°C(140°F)</li> <li>Operating temperature : 0°C(32°F) ~ 35°C(95°F)</li> <li>Storage operating humidity : 5%~95% non-condensing</li> </ul>
Regulation and compliance	BIS, WEEE, ECC, ISO9001 Complied

- Note:**
- SAS cards are required for SAS devices support.
  - If only 1 CPU is installed, some PCIe or memory functions might be unavailable.

### Open Box View



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