H3C UniServer R4900 G7 Server
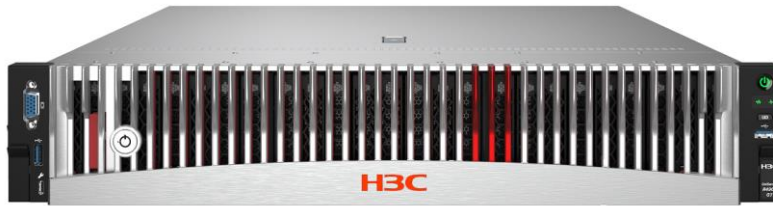
Flagship Standard Compute

Product overview

H3C UniServer R4900 G7 server is a 2U 2-Socket Rack Server independently developed by H3C Group based on Intel's new generation Birch Stream platform. This server can be widely used in general computing scenarios. At the same time, it focuses on optimizing scenarios such as high-performance computing, artificial intelligence, and cloud desktops. It is suitable for typical applications in various industries such as the Internet, operators, enterprises, and governments. It has the characteristics of high computing performance, large storage capacity, low power consumption, strong scalability, high reliability, and easy management and deployment.

As a mainstream 2U 2-Socket Rack Server independently developed, H3C UniServer R4900 G7 is based on the latest Intel® Xeon® 6 Processors, supports HBM technology, and cooperates with 8-channel 8000MT/s MRDIMM memory technology to bring a 33% increase in memory bandwidth. The new generation of server I/O can achieve a bandwidth rate of PCIe 5.0, which can achieve a 100% increase in data bandwidth compared with the previous generation. Excellent expansion capabilities are achieved through local storage support of up to 14 standard PCIe slots* and up to 29 hard disk slots. 96% power efficiency and 5℃-45℃ standard operating temperature design provide users with higher energy efficiency returns.

H3C UniServer R4900 G7 server can also be used as a workload for green data centers, supporting cold plate liquid cooling modules, which can greatly improve heat dissipation capabilities. Based on the use of liquid cooling kits, there is an optimization effect of cooling and energy saving for both CPU and memory. It greatly reduces the power consumption and equipment noise of the whole machine and improves the working environment of the data center.

Views

H3C UniServer R4900 G7 Server

Features and highlights

Highly efficient standard compute

– Up to 288 CPU cores

– Up to 4 Dual-slot GPU

– Up to 12 Single-slot GPU*

– XPU

Ultra I/O structure

– 32 DDR5 Memory slots

– 8000MT/s data rate

– 24 U.2 NVME SSD

– 36 E3.S SSD

– 14 PCI-E standard slots*

– 2 onboard OCP3.0 slots

Multi-tier protection

– Chassis intrusion detection

– PFR 3.0

– SGX 2.0

– TPM 2.0

Application scenarios

- Virtualization - Run multiple workloads on a single R4900 G7 to save floor space

- Big data - Manage the exponential growth of data volume, including structured, unstructured and semi-structured data

- Storage-centric applications - Eliminate I/O bottlenecks and improve performance

- Data warehouse/analysis - Find the information you need on demand to make smarter business decisions

- Customer relationship management (CRM) - Get a 360-degree view of your data to improve customer satisfaction and loyalty

- Enterprise resource planning (ERP) - Trust the H3C UniServer R4900 G7 to help you run your business in near real time

- Virtual Desktop Infrastructure (VDI) - Deploy remote desktop services to give your employees the flexibility they need to work from anywhere, anytime, using virtually any device

- High-performance computing and deep learning - Power machine learning and artificial intelligence applications by providing up to 4 Dual-slot GPU or 12 Single-slot GPU* cards in 2U space

- H3C UniServer R4900 G7 server supports Microsoft® Windows® and Linux operating systems, as well as VMware and H3C CAS virtualization software.

Technical specifications

CPU	1 or 2 Intel® Xeon® 6 Processors
Memory	32 DDR5 RDIMM Slots, 6400 MT/s Data Rate, 8TB on 2 CPU Configuration 16 DDR5 MRDIMM Slots, 8000MT/s Data Rate Additional Expansion of 24 Memory Slots via CXL*
RAID controller	Support RAID 0/1/5/6/10/50/60, etc., 8GB cache, support Supercapacitor Protection
Storage	29 SAS/SATA Drives Front 12 LFF bays, Rear 4 LFF bays Front 25 SFF bays, Rear 4 SFF bays 24 U.2 NVMe Drives, 36 E3.S (1T) or 24 E3.S(2T) SSDs SATA/NVMe M.2 Kit, DSD Model (2×SD card kit)
Network	1 Onboard 1 Gbps Management Network Port 2 Onboard OCP 3.0 NICs, support Hot Swap and PCIe 5.0 PCIe Standard Slots for Ethernet/IB Adapter
Expansion slots	14 PCIe5.0 Standard Slots*, 2 Onboard OCP 3.0 Slots and 1 Dedicated Mezz Slot, support CXL 2.0 Supports Full-OCP architecture and can support up to 8 OCP3.0 slots*
Ports	Standard: 1 Rear VGA Port, 4 USB Ports (1 Front, 2 Rear, 1 Internal) Optional: Mounting Bracket Kit with 1 front Serial port, 1 VGA port, 1 USB Port; 1 Front Management Port*

GPU	4 Dual-Slot or 12 Single-Slot* GPU Modules
Optical drive	External Optical Disk Drive, Optional
Management	H3C HDM Standard License, iFIST (embedded), H3C Advanced Feature Package License (optional, requires licenses), H3C UniSystem (requires download) Support LCD Touchable Intelligent Management Module
Security	Intelligent Front Security Bezel Chassis Intrusion Detection TPM 2.0 Intel SGX2.0 & PFR3.0
Power supplies	1+1 Redundancy Power Supply Titanium 1600W/3200W Platinum 800W/1300W/1600W/2000W/2700W DC Power Supply Hot Swappable Redundant Fans
Standards	CE, UL etc.
Operating temperature	5°C to 45°C (41°F to 113°F)
Dimensions (H×W×D)	2U Regular Chassis: 87.5×445.4×800mm (3.44×17.54×31.5 in) (Without a security bezel) 87.5×445.4×828mm (3.44×17.54×32.6 in) (With a security bezel) 2U Extended Chassis*: 87.5×445.4×900mm (3.44×17.54×35.4 in) (Without a security bezel) 87.5×445.4×928mm (3.44×17.54×36.5 in) (With a security bezel)

- The options may be different depending on the specific requirement. Restrictions and limitations may apply. To confirm availability, refer to related user guide or visit H3C website https://www.h3c.com/en/home/htb/.

https://www.h3c.com