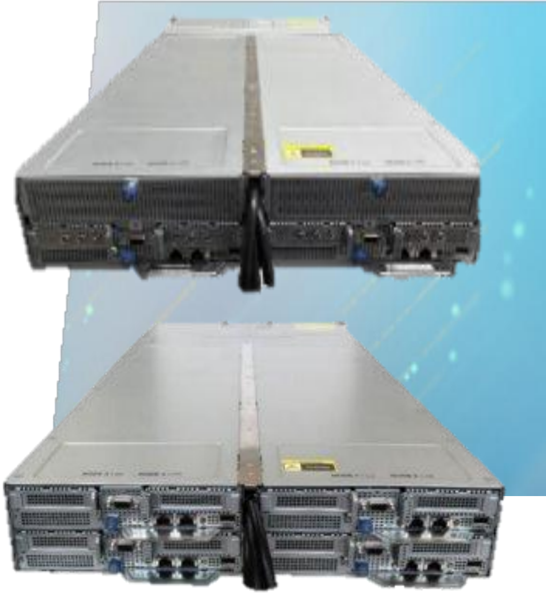
Inventec Data Center Solutions



K905G6/G6P

2U4N8P/2U2N4P
AMD EPYC™ 9005 Series Processor-based System

Highlights

- **Best Virtualization Solution with Optimal TCO and Enhanced Security**
- **Increased Core count to enhance overall system performance**
- **Scalability Unleashed by Latest Technologies such as faster DDR5 memory, PCIe Gen5 and OCP 3.0 to provide robust performance for a wide range of workloads, from edge to data center**
- **Excellent Serviceability and Flexibility Brought by Modular Design**

Virtualization
Hyperconverged Storage
Cloud Computing
High End Enterprise Server

K905G6/G6P is a high-performance 2U server system based on dual socket 3nm AMD EPYC™ 9005 series processor. It is perfect for various applications including virtualization, cloud computing and high density computing. K905G6/G6P also features impressive TCO reduction benefited from the industry leading core density, improved performance, and energy efficiency. In addition to the highly serviceable 2U enclosure, dual processors provide 128 lanes PCIe Gen5 (with x4 xGMI links) and 8 bonus lanes PCIe Gen3 on the MLB for scalability and flexibility. The serviceable hybrid flash array module supports NVMe with storage capacity by the optional advanced next generation SSDs.

Doubled link speeds, Increasing Performance

The 5th Generation AMD EPYC 9005™ series processor is capable of up to 160 cores, 24 DDR5 memory slots and 1DPC supporting 6400MT/s memory. It is equipped with high speed PCIe Gen5 interconnect linking the processor and I/O subsystem with bandwidth, Gigatransfer and frequency that doubled compared to prior generations. These faster speed transfers are suited for machine learning, artificial intelligence and data uses.

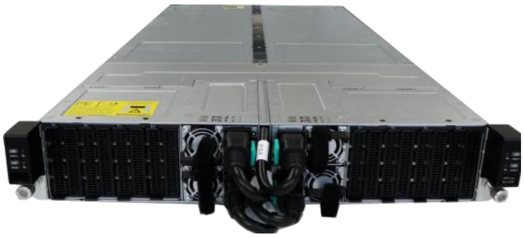
Overview

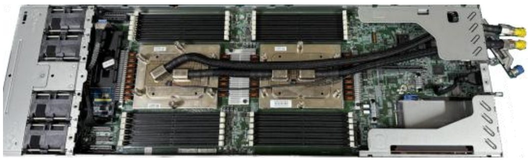
K905G6/G6P is powered by the 5th generation dual socket AMD EPYC 9005™ platform series and is optimized for supporting the high processor TDPs for its class. It is equipped with up to 24 DDR5 DIMM @ 1DPC and up to 4x xGMI3 links per processor (32GT/s per xGMI) ideal for data center and processor intensive workload environments. The chassis is adaptable and equipped with modular drive bays that supports up to 2 x U.2 NVMe SSDs per Node. It is designed not only to reduce TCO but also to accelerate a broad spectrum of workloads – from general purpose to cloud native and big data applications.

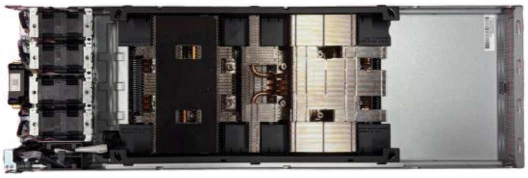
K905G6/G6P | AMD EPYC™ Server

Reliability Availability Serviceability (RAS) and Flexibility

K905G6/G6P processor is equipped with extensive enterprise server class RAS capabilities. Memory Data is protected with advanced ECC in addition to the standard DDR5 RAS features. The silicon root of trust is a dedicated security processor embedded in the AMD EPYC system on chip (SoC) manages secure boot, secure virtualization secure memory encryption to minimize potential attack surfaces and enable better protection of software and data. To enhance availability, K905G6/G6P provides highly modular design, supporting tool-less operations of serviceable parts, as well as redundancy for both power and cooling fans. It also provides increased computing density, energy efficiency and security features designed for modern software- defined infrastructure, and robust solution for future generation workloads







Positioning	High Density Compute (AC/DLC)
Form Factor	G6:2U4N8P / 2U2N4P ; G6P: 2U2N4P W x H x D: 448 x 87.5 x 916 mm (17.63 x 3.44 x 38.43 inch)
Processor	AMD SP5 Dual Socket (LGA 6096) 5th EPYC Turin, up to 160Core up to 400W TDP xGMI up to 32GT/s
CPU Process Tech	TSMC 3nm
Memory Slot	24 Channels DDR5 up to 3TB per Node @ 6400MT/s (1DPC) 2U4N8P up to 12TB ; 2U2N4P up to 6TB
PCIe Lanes	64(w/4-link XGMI) lanes PCIe5, plus 8 bonus lanes PCIe3 per Processor
Expansion Slot	2 x PCIe Gen5 x16 FHFL GPU slot-L40S (Only G6 2U2N) 2 x PCIe Gen5 x16 LP slot (DLC only 1x LP) 1 x PCIe Gen5 x16 MCIO cable slot (Option) 1 x PCIe Gen3 x4 M.2 Mezz
System I/O	Rear (Per node) • 1 x USB3.0 port • 1 x VGA output port • 1 x Power button with LED • 1 x UID button with LED • 1 x RJ45 management port • 1 x RJ45 1G port • 1 x Health LED
Network Controller	Intel I210 1Gb single port 1x PCIe Gen5 x16 OCP 3.0 slot
Storage Controller	Support up to 2 x U.2 NVMe SSDs per 1U Node Support up to 4 x U.2 NVMe SSDs per 2U Node Support M.2 22110 Support RAID Card
System Management	Aspeed AST2600 BMC • 1GB DDR4 • Support 1 management LAN port • VGA
TPM	Embedded TPM2.0
VGA	VGA Video integrated into BMC
Power Supply	4x 2400W CRPS PSU (Titanium), 200-240Vac Support N+1 Redundant
Cooling	G6 2U4N / 2U2N: Air cool support CPU TDP up to 240W Liquid cool support CPU TDP up to 400W G6P 2U2N: Air cool support CPU TDP up to 400W
Fan	4x 4056 Fans per 1U node 8x 4056 Fans per 2U node

About Inventec Data Center Solutions (Inventec EBG)

Inventec Data Center Solutions (Inventec EBG) was established in 1998 and has been focusing on the design and manufacturing of server systems in Inventec Corporation. Over decades, Inventec EBG has been the key server system supplier of the global branding clients.

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