

“AI is less about ‘big data’ and more about ‘good data’.

Less about super-large CPU clusters and more about smaller clusters of GPU supercomputers.

Why would we expect storage designed for the world of big data, HPC or enterprise workloads to work perfectly for the new world of AI?”

Mark Klarzynski, CEO & Founder ”

PEAK:AIO

THE AI DATA SERVER

Storage reinvented for the AI generation

Keeping funds focused on innovation and not consumed by legacy storage

AI projects mostly evolve into small-mid scale GPU server clusters and not the super-clusters found in HPC environments. However, to gain the performance needed to keep the GPUs busy and fed with data, users often feel the need to choose between feature-rich enterprise-class storage and parallel filesystems designed for HPC.

Both options are expensive to implement, complex to maintain and simply not designed for AI scale solutions.

PEAK:AIO's success stems from understanding the real-life values of AI projects - making ambitious AI goals significantly more achievable within constrained budgets while delivering the perfect mix of the performance of a parallel filesystem with the simplicity of a simple NAS, all within a single 2U server.



Software - Convert a standard NVMe server into an ultra-fast AI Data Server



Break through the cost/performance barrier - no compromising GPU budget



Blisteringly fast performance - keeping GPUs busy



Plug-n-play - Focus on project innovation and not storage administration

Request a demo

sales@peakaio.com

Keeping GPUs busy around the globe

<https://www.peakaio.com>

**PEAK
AIO**

Proven and relied upon by a long list of world leading research and healthcare institutions as well as global organisations - all driving AI forward with PEAK:AIO

Features@Glance			
Capacity / Drives / Protection	30TB - 700TB RAW (Per typical 2U)	7.69TB/15.3TB/ 30TB Drives	PEAK:PROTECT, 0, 10, 5, 6 N+2
Performance (Bandwidth - additional details available on request)	80GB/sec Based on 2xCX-7 40GB/sec with CX-6s	120GBsec max per 2U (scales per 2U)	Performance achieved with single host
Protocols (Ethernet or InfiniBand)	NFS3/4 (RDMA / TCP)	NVMe-oF (RDMA/TCP)	NVIDIA GPUDirect®
Interface QSFP6/112 (NVIDIA ConnectX-6/7)	200Gb/400Gb (IB/ETH) (per CX-6/7)	Recommended 2 x CX-X Supports up to 6	CX-7 Ready (400Gb per port)

Key Benefits

- **Proven Solution:** PEAK:AIO's Data Server is at the core of a long list of world leading AI projects, meaning you can confidently deploy a solution which is also backed by hardware support from global server vendors.
- **Control costs and growth:** PEAK:AIO starts as small as your project needs, and scales as you need. Removing the traditional requirement to over invest in storage at the onset.
- **Faster AI insights:** PEAK:AIO's Data Server delivers blisteringly fast performance at less cost, leaving more budget for additional GPUs, resulting in much faster and better-balanced solutions.
- **Full Linux Compatibility:** A longstanding complication within high performance storage has been the need for proprietary drivers which can cause significant disruption and worse within typical AI projects when OS or GPU tools are updated. PEAK:AIO is fully compatible with modern Linux kernels, requiring no proprietary drivers.

Convert off-the-shelf servers into a ultra-low latency NVMe storage solution with plug-n-play simplicity

Dell Validated Design for AI

Dell Validated Designs for AI - built in collaboration with PEAK:AIO and NVIDIA, deliver an AI Data Server designed for mainstream AI projects, providing realistic capacity levels and ultra-fast performance, in a single 2U solution at a price that enables more investment in project and GPU resources.

The Dell based AI Data Server is a joint solution which includes PEAK:AIO and NVIDIA® GPUDirect® deployed on Dell PowerEdge servers to create a central shareable pool of ultra-low latency NVMe resource designed and tuned to speed AI performance while simplifying data shareability.



Dr Jorge Cardoso
Kings College London

"PEAK:AIO simply allowed KCL and the NHS trials to invest more funds in GPU servers, where they provide for the best outcome."

Server agnostic choose your server!

As a server vendor-agnostic software solution, PEAK:AIO is not tied to any specific vendor or brand of server hardware.

Instead, it is designed to work with a wide range of server hardware from different vendors, allowing it to be used with a variety of different environments which may maintain specific vendor relationships.

However, PEAK:AIO is designed for maximum performance and so there is a range of expectations which are common within today's server technologies.

We have worked extensively with the **Supermicro and Gigabyte** range to ensure compatibility and performance, with a particular focus on the PCIe5 solutions.

Contact PEAK:AIO for the latest hardware comparability guide or discuss options with your reseller.

contact: sales@peakaio.com