**QCT Demonstrates the Full Performance Benefits of PCIe 4.0 on its AMD 2nd Gen EPYC Powered Servers in Concert with Ecosystem Partners**

**San Jose, Calif**., November 19, 2019 - Quanta Cloud Technology (QCT), a global data center solutions provider, today announced the validation of PCI Express 4.0 performance with AMD, Broadcom, KIOXIA, Mellanox and Samsung. This validation is the world-first of this kind to pave the way for data centers to pursue higher performance with the latest PCI Express technologies and products. Performance factor becomes more and more important with the rise of 5G and AI applications across almost all verticals.

[QCT announced its support of AMD 2nd Generation EPYC Processors in early August](https://www.qct.io/Press-Releases/index/PR/Server/QCT-Now-Offering-AMD-EPYC-7002-Series-Processor-Based-Systems-to-Customers-Who-Want-to-Transform-Their-Data-Centers/1/0). In two tests, facilitated by QCT, the data transfer rate and storage of 1TB of data on 2nd Gen AMD EPYC powered servers and data farms used for cloud storage, services, and software were doubled when compared with PCIe 3.0[[1]](#footnote-1). The result was a 200 Gb/sec transfer that took half the time it would have taken a PCIe 3.0 adapter. The second test with the same 2nd Gen AMD EPYC powered servers compared PCIe 3.0 and 4.0 adapters for storage using VM Fleet, and the result was 2x faster storage. This performance validation further demonstrated a close partnership and a strong commitment to transforming the data center industry with mutual efforts. With the apparent performance improvements, customer investments on performance-driven next generation CPUs are more justified.

**Supporting Quotes:**

“QCT understands performance enhancement is an ever-lasting effort for our data center customers, and it becomes more prominent when it comes to modern workloads which require higher computing power and much more network bandwidth as a requirement. With this in mind, we always take a leading role in the industry to strive for performance gains,” said Mike Yang, President of QCT. “PCIe 4.0 is a major breakthrough in peripheral connectivity, that’s why we validated Broadcom, KIOXIA, Mellanox, and Samsung PCIe 4.0 commodities on our latest AMD EPYC servers so the market can enjoy this next generation performance at its earliest with confidence.”

“AMD has a history of bringing innovations to the industry. AMD 2nd Gen EPYC processors set a new standard for the modern data center with first 7nm x86 server processors, embedded security features, and the world’s first x86 architecture to support PCIe 4.0,” said Raghu Nambiar, corporate vice president, Datacenter Ecosystems and Application Engineering at AMD. “We have been working with QCT to bring the full performance benefits of PCIe 4.0 on their AMD 2nd Gen EPYC powered servers, in concert with our ecosystem partners”

“Designed for today’s enterprise and cloud-scale environments, Broadcom’s NetXtreme® E-Series Thor is the market's leading PCIe 4.0 Ethernet controller. Broadcom offers a complete portfolio of Thor-based Ethernet network adapters with 25G, 50G, 100G and 200G Ethernet and PCI-SIG certified PCIe 4.0 connectivity options,” said Dan Harding, VP of Marketing for the Compute and Connectivity Division at Broadcom. “We are excited to work with AMD and QCT to increase server-to-server traffic and CPU loads for the most demanding networking tasks.”

“The cloud has fully embraced NVMe SSDs and PCIe 4.0 brings new levels of performance to the data center,” said Kazuki Watanabe, president, KIOXIA Taiwan Corporation. “KIOXIA is committed to delivering cutting edge flash solutions for these cloud applications and is excited to be the first to publicly demonstrate PCIe 4.0 SSDs with QCT’s AMD platform.”

“We are pleased to work with QCT and AMD to enable these new industry-leading platforms. The combination of ConnectX smart adapters and PCI Express 4.0 support in the second-generation AMD EPYC processor on QCT servers, provides high-performance computing, artificial intelligence, cloud, and enterprise data centers with high data bandwidth needed for the most demanding compute and storage applications,” said Kevin Deierling, senior vice president marketing, Mellanox Technologies. “Our intelligent offloads and hardware accelerators for virtualization, storage and security, facilitate our partners’ delivery of breakthrough performance and efficiency that is ideal for the most demanding customer workloads.”

"We have worked closely with our partners to integrate Samsung's most cutting-edge memory and storage solutions with the latest PCIe 4.0 platform,” said Jinman Han, senior vice president of Memory Product Planning & Application Engineering Team at Samsung Electronics. “We are delighted to see that AMD and QCT are providing customers with PCIe 4.0 NVMe SSD (PM1733) that delivers doubled SSD throughout capabilities and enables maximized storage performance in today's data centers."

**About Quanta Cloud Technology (QCT)**

Quanta Cloud Technology (QCT) is a global data center solution provider. We combine the efficiency of hyperscale hardware with infrastructure software from a diversity of industry leaders to solve next-generation data center design and operation challenges. QCT serves cloud service providers, telecoms and enterprises running public, hybrid and private clouds.

Product lines include hyperconverged and software-defined data center solutions as well as servers, storage, switches and integrated racks with a diverse ecosystem of hardware component and software partners. QCT designs, manufactures, integrates and services cutting-edge offerings via its own global network. The parent of QCT is Quanta Computer, Inc., a Fortune Global 500 corporation. For more information, visit the QCT website at [www.QCT.io](http://www.qct.io/).

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1. The current validation was completed for Microsoft Windows Server 2019 and announced in the recent Microsoft Ignite event <https://myignite.techcommunity.microsoft.com/sessions/81949>. Moving forward, QCT will perform validation for Azure Stack HCI in Q1, 2020 with the same set of commodities and test criteria. [↑](#footnote-ref-1)