



NVIDIA cuQuantum DGX Appliance

Researching the computer of tomorrow
on the most powerful system today.



Quantum computing is the newest frontier of scientific computing, with researchers and enterprises around the globe exploring how to tap into its capabilities to build the algorithms and applications that can supercharge science. From predicting the weather to drug discovery, the promise of quantum computing is vast, but it requires a platform that can make exploration possible for every researcher.

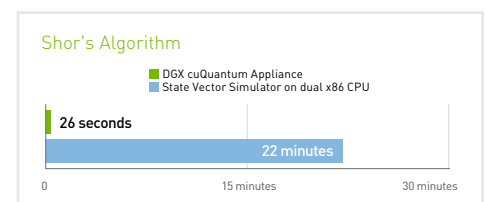
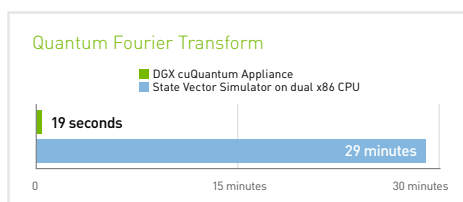
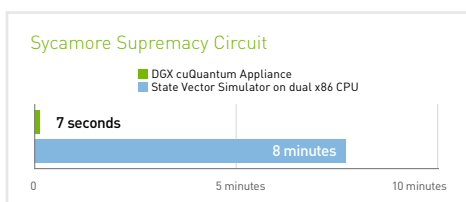
Quantum researchers need to be able to test and validate hypotheses, develop algorithms, and simulate application outcomes that are out of reach of today's quantum processors. They need an appliance that puts the potential of quantum exploration within arm's reach, enabling them to build ready-to-run applications that are future-proofed and will execute without rework.

Quantum Computing Exploration for Application Development

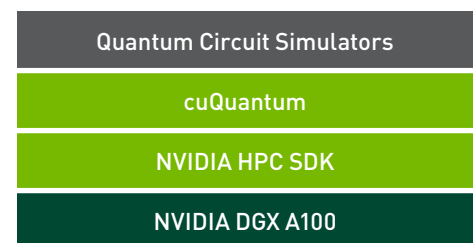
The NVIDIA cuQuantum DGX appliance is a complete quantum simulation solution in a box, allowing you to get up and running quickly. It is built on the world's most popular AI supercomputer—NVIDIA DGX™ A100—and powered by NVIDIA's containerized cuQuantum software stack.

For researchers, the appliance is a breakthrough solution that puts quantum exploration within arm's reach of developers and researchers around the world. For enterprises, the appliance enables them to derisk future application development with a ready-to-run platform that bypasses the constraint of on-boarding quantum infrastructure. With direct access and collaboration with NVIDIA's own quantum computing scientists and researchers, the appliance is more than a pairing of NVIDIA-optimized hardware and software: It's a partnership in scientific exploration, powered by the platform that can deliver quantum insights today instead of decades from now.

NVIDIA CuQuantum on DGX A100 speeds up simulation of key quantum circuits by a factor of 50-90x over CPU-based solutions



CPU: State vector simulator on dual AMD EPYC 7742 | DGX A100: 8x A100 80GB GPUs | All circuits are 36 qubits, supremacy depth m=14



GPU-Accelerated Quantum Simulations

Get Started Today with the NVIDIA cuQuantum DGX Appliance

It includes:

NVIDIA DGX A100

NVIDIA cuQuantum software stack

Three years of NVIDIA Enterprise Support

The solution starts at \$6,600 a month.*

Additional Resources

[NVIDIA cuQuantum](#)

[NVIDIA DGX A100](#)

*The indicative Lease Rate Factors are for general discussion purposes, are non-binding, and do not create, evidence, or imply any contract or other legal relationship between the parties. Either party may withdraw from the negotiations at any time without liability, and the terms provided herein remain subject to final credit and regulatory approvals of Lessor. The rates provided are for USD transactions in the U.S. market. Specific rates for other markets and currencies are available by request.

[Learn more](#)

To learn more about NVIDIA cuQuantum, visit developer.nvidia.com/cuquantum-sdk

To learn more about NVIDIA DGX A100, visit www.nvidia.com/dgx-a100

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