

# Nvidia's New 9.4-petaflop Supercomputer Goals To Help Prepare Self-driving Vehicles

Certain, it'd let you run all of the Minecraft shaders you possibly can presumably install, however supercomputers tend to seek out themselves concerned in precise helpful work, like molecular modeling or weather prediction. Or, within the case of Nvidia's latest monolithic machine, it can be utilized to further self-driving-car expertise.

Nvidia on Monday unveiled the DGX SuperPOD. Now the 22nd-quickest supercomputer on the planet, it is meant to train the algorithms and neural networks tucked away inside autonomous improvement vehicles, improving the software for better on-road outcomes. Pessoa points out that a single vehicle amassing AV knowledge could generate 1 terabyte per hour -- multiply that out by a whole fleet of cars, and you'll see why crunching crazy amounts of information is necessary for one thing like this.

The DGX SuperPOD took simply three weeks to assemble. Utilizing 96 Nvidia DGX-2H supercomputers, comprised of 1,536 interconnected V100 Tensor Core GPUs, the entire shebang produces 9.4 petaflops of processing power. As an example for the way beefy this system is, Nvidia pointed out that operating a selected AI coaching model used to take 25 days when the mannequin first came out, but the DGX SuperPOD can do it in under two minutes. Yet, it's not a terribly massive system -- Nvidia says its total footprint is about four hundred occasions smaller than related choices, which could possibly be built from thousands of particular person servers.

A supercomputer is however one half of a bigger ecosystem -- in spite of everything, it wants a data center that may truly handle this kind of throughput. Nvidia says that corporations who need to make use of a solution like this, but lack the data-heart infrastructure to take action, can rely on plenty of partners that may lend their area to others.

Whereas DGX SuperPOD is new, Nvidia's DGX supercomputers are already in use with numerous manufacturers and companies who want that type of crunching energy. Nvidia mentioned in its weblog post that BMW, Continental and Ford are all utilizing DGX techniques for various functions. As autonomous growth continues to develop in scope, having this kind of processing energy is going to prove all but mandatory.