

NVIDIA QUADRO
AUTHORIZED PARTNER

PNY®



nVIDIA®

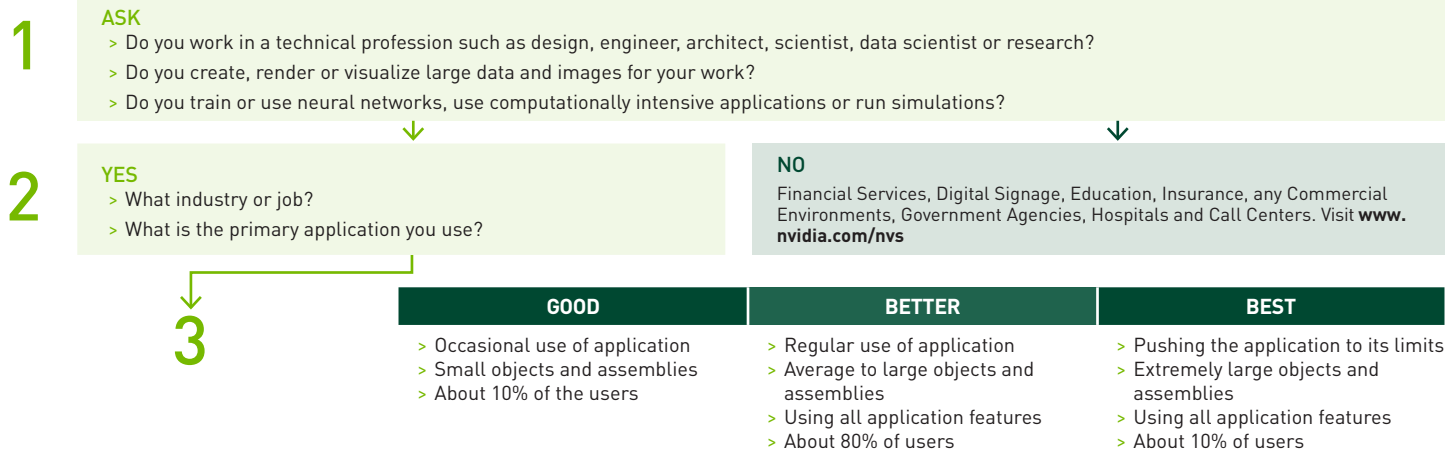


THE RIGHT TOOLS FOR
PROFESSIONALS
NVIDIA WORKSTATION GPUs

NVIDIA PROFESSIONAL SOLUTION GUIDE

The best solution for customers on their use case.

The current Quadro lineup includes Maxwell, Pascal and Volta architectures. **Please request that your customer contact their software provider for the latest information on application certifications and support.**



DESIGN/ENGINEERING/MANUFACTURING

| | | | | |
|--|---------|-------------------------|-------------------------|--------------------------------|
| Altair® HyperWorks® | Desktop | NVIDIA Quadro® RTX 4000 | NVIDIA Quadro® RTX 5000 | NVIDIA Quadro® RTX 6000 |
| | Mobile | Quadro® RTX 3000 | Quadro® RTX 4000 | Quadro® RTX 5000 |
| ANSYS® Discovery Live | Desktop | Quadro RTX 4000 | Quadro RTX 5000 | Quadro RTX 6000 / Quadro GV100 |
| | Mobile | Quadro RTX 3000 | Quadro RTX 4000 | Quadro RTX 5000 |
| ANSYS Workbench™, ANSYS AIM and ANSYS EnSight | Desktop | Quadro RTX 4000 | Quadro RTX 5000 | Quadro RTX 6000 |
| | Mobile | Quadro RTX 3000 | Quadro RTX 4000 | Quadro RTX 5000 |
| ANSYS Mechanical, ANSYS Fluent and ANSYS HFSS | Desktop | Quadro GP100 | Quadro GV100 | 2x Quadro GV100 |
| | Mobile¹ | Quadro RTX 4000 | Quadro RTX 5000 | Quadro RTX 5000 |
| ANSYS SPEOS | Desktop | Quadro RTX 4000 | Quadro RTX 5000 | Quadro RTX 6000 |
| | Mobile | Quadro RTX 4000 | Quadro RTX 5000 | Quadro RTX 5000 |
| Autodesk® 3ds Max® | Desktop | Quadro RTX 4000 | Quadro RTX 5000 | Quadro RTX 6000 |
| | Mobile | Quadro RTX 3000 | Quadro RTX 4000 | Quadro RTX 5000 |
| Autodesk AutoCAD® | Desktop | Quadro P620 | Quadro RTX 3000 | Quadro RTX 4000 |
| | Mobile | Quadro RTX 3000 | Quadro RTX 4000 | Quadro RTX 5000 |
| Autodesk Fusion 360 | Desktop | Quadro RTX 4000 | Quadro RTX 5000 | Quadro RTX 6000 |
| | Mobile | Quadro RTX 4000 | Quadro RTX 5000 | Quadro RTX 6000 |
| Autodesk Netfabb 2018 | Desktop | Quadro P620 | Quadro RTX 3000 | Quadro RTX 4000 |
| | Mobile | Quadro RTX 3000 | Quadro RTX 4000 | Quadro RTX 5000 |
| Autodesk Inventor® | Desktop | Quadro P620 | Quadro RTX 3000 | Quadro RTX 4000 |
| | Mobile | Quadro RTX 3000 | Quadro RTX 4000 | Quadro RTX 5000 |
| Autodesk VRED | Desktop | Quadro RTX 4000 | Quadro RTX 5000 | Quadro RTX 8000 |
| | Mobile | Quadro RTX 3000 | Quadro RTX 4000 | Quadro RTX 5000 |
| Beta CAE ANSA, META | Desktop | Quadro RTX 4000 | Quadro RTX 5000 | Quadro RTX 6000 |
| | Mobile | Quadro RTX 3000 | Quadro RTX 4000 | Quadro RTX 5000 |
| COMSOL | Desktop | Quadro P2200 | Quadro RTX 4000 | Quadro RTX 5000 |
| | Mobile | Quadro T1000 | Quadro T2000 | Quadro RTX 4000 |
| Dassault Systèmes 3DEXCITE DELTAGEN / DELTAVIEW | Desktop | Quadro RTX 5000 | Quadro RTX 6000 | Quadro RTX 8000 |
| | Mobile | Quadro RTX 3000 | Quadro RTX 4000 | Quadro RTX 5000 |
| Dassault Systèmes CATIA V5-6 and 3DEXPERIENCE | Desktop | Quadro P2200 | Quadro RTX 4000 | Quadro RTX 6000 |
| | Mobile | Quadro T2000 | Quadro RTX 4000 | Quadro RTX 5000 |
| Dassault Systèmes CATIA Live Rendering | Desktop | Quadro RTX 5000 | Quadro RTX 6000 | Quadro RTX 8000 |
| | Mobile | Quadro RTX 3000 | Quadro RTX 4000 | Quadro RTX 5000 |
| Dassault Systèmes SIMULIA Abaqus and SIMULIA CST STUDIO | Desktop | Quadro GP100 | Quadro GV100 | 2x Quadro GV100 |
| | Mobile¹ | Quadro RTX 4000 | Quadro RTX 5000 | Quadro RTX 5000 |
| Dassault Systèmes SOLIDWORKS | Desktop | Quadro P2200 | Quadro RTX 4000 | Quadro RTX 5000 |
| | Mobile | Quadro T2000 | Quadro RTX 4000 | Quadro RTX 5000 |
| Dassault Systèmes SOLIDWORKS Visualize² | Desktop | Quadro RTX 4000 | 2x Quadro RTX 4000 | 2x Quadro RTX 6000 |
| | Mobile | Quadro RTX 4000 | Quadro RTX 5000 | Quadro RTX 5000 |
| ESI Group IC.IDO | Desktop | Quadro RTX 5000 | 2x Quadro RTX 5000 | 2x Quadro RTX 6000 |
| | Mobile | Quadro RTX 4000 | Quadro RTX 5000 | Quadro RTX 5000 |
| EXA PowerViz | Desktop | Quadro RTX 4000 | Quadro RTX 5000 | Quadro RTX 6000 |
| | Mobile | Quadro RTX 3000 | Quadro RTX 4000 | Quadro RTX 5000 |
| LS-PrePost | Desktop | Quadro RTX 4000 | Quadro RTX 5000 | Quadro RTX 6000 |
| | Mobile | Quadro RTX 3000 | Quadro RTX 4000 | Quadro RTX 5000 |
| Lumiscaphe P3D Design | Desktop | Quadro RTX 5000 | Quadro RTX 6000 | Quadro RTX 8000 |
| | Mobile | Quadro RTX 4000 | Quadro RTX 5000 | Quadro RTX 5000 |
| MathWorks MATLAB | Desktop | Quadro GV100 | Quadro GV100 | 2x Quadro GV100 |
| | Mobile | Quadro RTX 5000 | Quadro RTX 5000 | Quadro RTX 5000 |

DESIGN/ENGINEERING/ MANUFACTURING cont.

| | | GOOD | BETTER | BEST |
|--|---------|-----------------|-----------------|--------------------------------|
| MSC Nastran | Desktop | Quadro GP100 | Quadro GV100 | 2x Quadro GV100 |
| | Mobile | Not Applicable | Not Applicable | Not Applicable |
| MSC Patran, Apex, ADAMS | Desktop | Quadro P2200 | Quadro RTX 4000 | Quadro RTX 5000 |
| | Mobile | Quadro T1000 | Quadro T2000 | Quadro RTX 4000 |
| PTC Creo | Desktop | Quadro P2200 | Quadro RTX 4000 | Quadro RTX 5000 |
| | Mobile | Quadro T2000 | Quadro RTX 4000 | Quadro RTX 5000 |
| PTC Creo Simulation Live | Desktop | Quadro RTX 4000 | Quadro RTX 5000 | Quadro RTX 6000 / Quadro GV100 |
| | Mobile | Quadro RTX 3000 | Quadro RTX 4000 | Quadro RTX 5000 |
| Siemens Simcenter STAR-CCM+ | Desktop | Quadro P2200 | Quadro RTX 4000 | Quadro RTX 5000 |
| | Mobile | Quadro RTX 3000 | Quadro RTX 4000 | Quadro RTX 5000 |
| Siemens NX, SimCenter, NX CAE and FEMAP | Desktop | Quadro P2200 | Quadro RTX 4000 | Quadro RTX 5000 |
| | Mobile | Quadro RTX 3000 | Quadro RTX 4000 | Quadro RTX 5000 |
| Siemens NX + Ray Traced Studio (Iray) | Desktop | Quadro RTX 5000 | Quadro RTX 6000 | Quadro RTX 8000 |
| | Mobile | Quadro RTX 3000 | Quadro RTX 4000 | Quadro RTX 5000 |
| Siemens PLM Solid Edge | Desktop | Quadro P2200 | Quadro RTX 4000 | Quadro RTX 5000 |
| | Mobile | Quadro P1000 | Quadro P2200 | Quadro RTX 3000 |
| Siemens NX Nastran | Desktop | Quadro GP100 | Quadro GV100 | 2x Quadro GV100 |
| | Mobile | Not Applicable | Not Applicable | Not Applicable |

VIRTUAL REALITY VIEWER (VR VIEWER)

| | | | | |
|---|---------|-----------------|-----------------|--------------------------|
| ANSYS VRXPERIENCE | Desktop | Quadro RTX 4000 | Quadro RTX 5000 | up to 3x Quadro RTX 6000 |
| | Mobile | Quadro RTX 4000 | Quadro RTX 5000 | Quadro RTX 5000 |
| Autodesk Live | Desktop | Quadro RTX 4000 | Quadro RTX 5000 | Quadro RTX 6000 |
| | Mobile | Quadro RTX 3000 | Quadro RTX 4000 | Quadro RTX 5000 |
| Siemens NX VR, Plant Simulations VR, TeamCenter VR | Desktop | Quadro RTX 4000 | Quadro RTX 5000 | Quadro RTX 6000 |
| | Mobile | Quadro RTX 3000 | Quadro RTX 4000 | Quadro RTX 5000 |
| Siemens Simcenter STAR-CCM+ VR | Desktop | Quadro RTX 4000 | Quadro RTX 5000 | Quadro RTX 6000 |
| | Mobile | Quadro RTX 4000 | Quadro RTX 5000 | Quadro RTX 5000 |

ARCHITECTURE / ENGINEERING / CONSTRUCTION

| | | | | |
|-----------------------------------|---------|-----------------|-----------------|--------------------------|
| Autodesk 3ds Max® | Desktop | Quadro RTX 4000 | Quadro RTX 5000 | up to 3x Quadro RTX 6000 |
| | Mobile | Quadro RTX 3000 | Quadro RTX 4000 | Quadro RTX 5000 |
| Autodesk ReCap 360 | Desktop | Quadro RTX 4000 | Quadro RTX 5000 | Quadro RTX 6000 |
| | Mobile | Quadro RTX 4000 | Quadro RTX 5000 | Quadro RTX 6000 |
| Autodesk Revit® | Desktop | Quadro RTX 4000 | Quadro RTX 5000 | Quadro RTX 6000 |
| | Mobile | Quadro RTX 3000 | Quadro RTX 4000 | Quadro RTX 5000 |
| Enscape Enscape3d | Desktop | Quadro RTX 4000 | Quadro RTX 5000 | up to 3x Quadro RTX 6000 |
| | Mobile | Quadro RTX 3000 | Quadro RTX 4000 | Quadro RTX 5000 |
| Nemetschek Allplan | Desktop | Quadro RTX 4000 | Quadro RTX 5000 | Quadro RTX 6000 |
| | Mobile | Quadro RTX 3000 | Quadro RTX 4000 | Quadro RTX 5000 |
| Nemetschek Graphisoft ArchiCAD | Desktop | Quadro RTX 4000 | Quadro RTX 5000 | Quadro RTX 6000 |
| | Mobile | Quadro RTX 3000 | Quadro RTX 4000 | Quadro RTX 5000 |
| Nemetschek Vectorworks | Desktop | Quadro P620 | Quadro P2200 | Quadro RTX 4000 |
| | Mobile | Quadro P620 | Quadro T2000 | Quadro RTX 4000 |

MODELING/ANIMATION /VISUALIZATION/EFFECTS

| | | | | |
|-------------------------------------|---------|-----------------|--------------------|--------------------------|
| Adobe After Effects CC ³ | Desktop | Quadro RTX 4000 | Quadro RTX 5000 | Quadro RTX 6000 |
| | Mobile | Quadro RTX 3000 | Quadro RTX 4000 | Quadro RTX 5000 |
| Autodesk 3ds Max | Desktop | Quadro RTX 4000 | Quadro RTX 5000 | Quadro RTX 6000 |
| | Mobile | Quadro RTX 3000 | Quadro RTX 4000 | Quadro RTX 5000 |
| Autodesk Arnold | Desktop | Quadro RTX 5000 | Quadro RTX 6000 | 2x Quadro RTX 8000 |
| | Mobile | Quadro RTX 4000 | Quadro RTX 5000 | Quadro RTX 5000 |
| Autodesk Maya® | Desktop | Quadro RTX 4000 | Quadro RTX 5000 | Quadro RTX 6000 |
| | Mobile | Quadro RTX 3000 | Quadro RTX 4000 | Quadro RTX 5000 |
| Chaos V-Ray GPU | Desktop | Quadro RTX 4000 | Quadro RTX 6000 | multiple Quadro RTX 8000 |
| | Mobile | Quadro RTX 3000 | Quadro RTX 4000 | Quadro RTX 5000 |
| Maxon CINEMA 4D | Desktop | Quadro P2200 | Quadro RTX 4000 | Quadro RTX 6000 |
| | Mobile | Quadro T2000 | Quadro RTX 4000 | Quadro RTX 5000 |
| Otoy Octane | Desktop | Quadro RTX 4000 | Quadro RTX 6000 | Quadro RTX 8000 |
| | Mobile | Quadro RTX 3000 | Quadro RTX 4000 | Quadro RTX 5000 |
| NewTek Lightwave™ | Desktop | Quadro P2200 | Quadro RTX 4000 | Quadro RTX 5000 |
| | Mobile | Quadro T2000 | Quadro RTX 4000 | Quadro RTX 5000 |
| Redshift Renderer | Desktop | Quadro RTX 4000 | Quadro RTX 6000 | Quadro RTX 8000 |
| | Mobile | Quadro RTX 3000 | Quadro RTX 4000 | Quadro RTX 5000 |
| SideFX Houdini | Desktop | Quadro RTX 6000 | 2x Quadro RTX 6000 | 2x Quadro RTX 8000 |
| | Mobile | Quadro RTX 4000 | Quadro RTX 5000 | Quadro RTX 5000 |

VIDEO EDITING

| | | | | |
|---------------------|---------|-----------------|-----------------|--------------------|
| Adobe Media Encoder | Desktop | Quadro P2200 | Quadro RTX 5000 | Quadro RTX 6000 |
| | Mobile | Quadro T2000 | Quadro RTX 4000 | Quadro RTX 5000 |
| Adobe Premiere Pro | Desktop | Quadro P2200 | Quadro RTX 5000 | Quadro RTX 6000 |
| | Mobile | Quadro T2000 | Quadro RTX 4000 | Quadro RTX 5000 |
| Autodesk Flame | Desktop | Quadro RTX 5000 | Quadro RTX 6000 | 2x Quadro RTX 6000 |
| | Mobile | Quadro RTX 4000 | Quadro RTX 5000 | Quadro RTX 5000 |



Please visit www.gpugenius.com to find
 > Online sales and product training modules
 > Easy to share customer-ready presentations, solution sheets and videos

| VIDEO EDITING cont. | | GOOD | BETTER | BEST |
|---|---------|-----------------|-----------------|--------------------------|
| Avid® Media Composer® | Desktop | Quadro P2200 | Quadro RTX 4000 | Quadro RTX 5000 |
| | Mobile | Quadro T2000 | Quadro RTX 4000 | Quadro RTX 5000 |
| Blackmagic Design DaVinci Resolve | Desktop | Quadro RTX 5000 | Quadro RTX 6000 | multiple Quadro RTX 6000 |
| | Mobile | Quadro RTX 4000 | Quadro RTX 5000 | Quadro RTX 5000 |
| ColorFront Transkoder & On-Set Dailies | Desktop | Quadro RTX 5000 | Quadro RTX 6000 | multiple Quadro RTX 6000 |
| | Mobile | Quadro RTX 4000 | Quadro RTX 5000 | Quadro RTX 5000 |
| FilmLight Baselight | Desktop | Quadro RTX 5000 | Quadro RTX 6000 | 2x Quadro RTX 6000 |
| | Mobile | Quadro RTX 4000 | Quadro RTX 5000 | Quadro RTX 5000 |
| Grass Valley Edius® | Desktop | Quadro P620 | Quadro P2200 | Quadro RTX 4000 |
| | Mobile | Quadro T1000 | Quadro T2000 | Quadro RTX 4000 |
| Magix Vegas Pro™ | Desktop | Quadro P620 | Quadro P2200 | Quadro RTX 4000 |
| | Mobile | Quadro T1000 | Quadro T2000 | Quadro RTX 4000 |
| RED Digital Cinema REDCINE-X PRO | Desktop | Quadro RTX 5000 | Quadro RTX 6000 | 2x Quadro RTX 6000 |
| | Mobile | Quadro RTX 4000 | Quadro RTX 5000 | Quadro RTX 5000 |

IMAGE EDITING / ARTISTIC DESIGN

| | | | | |
|---|---------|-----------------|--------------------|-----------------|
| Adobe® Photoshop® | Desktop | Quadro P620 | Quadro P2200 | Quadro RTX 4000 |
| | Mobile | Quadro P620 | Quadro T1000 | Quadro RTX 3000 |
| Adobe® Illustrator® | Desktop | Quadro P620 | Quadro P2200 | Quadro RTX 4000 |
| | Mobile | Quadro P620 | Quadro T1000 | Quadro RTX 3000 |
| Allegorithmic Substance Designer | Desktop | Quadro P2200 | Quadro RTX 4000 | Quadro RTX 5000 |
| | Mobile | Quadro T2000 | Quadro RTX 4000 | Quadro RTX 5000 |
| Allegorithmic Substance Painter | Desktop | Quadro RTX 4000 | 2x Quadro RTX 4000 | Quadro RTX 6000 |
| | Mobile | Quadro RTX 4000 | Quadro RTX 5000 | Quadro RTX 5000 |

1 Mobile GPUs are for ANSYS HFSS and CST STUDIO only | 2 SOLIDWORKS Visualize users may require more powerful and/or multiple GPUs for improved rendering performance, depending on rendering frequency and scene complexity.
3 NVIDIA OptiX | Please request that your customer contact their software provider for the latest information on application certifications and support.

PROFESSIONAL GRAPHICS VS CONSUMER GRAPHICS

NVIDIA makes industry-leading graphics cards for a variety of uses.

When you come across a customer who is using gaming cards for professional applications, make sure they are aware of the unique benefits that NVIDIA Quadro graphics cards offer.

BENEFITS OF PROFESSIONAL GRAPHICS OVER CONSUMER GRAPHICS

Quadro hardware is built for years of non-stop use

- > Quadro cards are built for use 24 hours a day, 7 days a week
- > Extended availability and support is offered on all professional cards, including bug fixes for professional applications

Quadro boards are built for workplace environments

- > Quadro cards have more memory, smaller footprints and consume less power
- > Deployment can be for tens or hundreds of PCs in offices
- > **Application certified:** Quadro cards and drivers are tested to work flawlessly on 100% of certified professional software applications

Quadro provides enterprise support tools for remote administration and deployment as well as professional features such as:

- > **NVIDIA® nView®** for desktop management, allowing users to create grids and snap applications to them
- > **NVIDIA Mosaic** for combining multiple displays into one large display seamlessly without tearing
- > **Advanced 3D stereo** supports stereoscopic 3D display on HDMI 3D TVs, projectors and displays allowing for viewing images and ultrasounds in 3D

PERFORMANCE

| | QUADRO | GAMING | INTEGRATED |
|---|--------|--------|------------|
| Professional application specific feature development and tuning | • | | |
| Driver optimizations to maximize professional application performance | • | | |
| Unique features to support professional workflows | • | | |
| IT tools for easy deployment & management | • | | |
| Gaming Profile* | • | | |
| Extreme performance scaling with Multi-GPU | • | | |

RELIABILITY

| | | | |
|--|---|--|--|
| Professional application specific testing by NVIDIA | • | | |
| 100+ professional application certifications by ISVs | • | | |
| Certified across workstation platforms by leading OEMs | • | | |
| Unified rock-solid driver with deterministic release schedule | • | | |
| Tested and certified by NVIDIA and OEM partners to run 24/7 with reliability & stability | • | | |
| Extended availability | • | | |

SUPPORT

| | | | |
|---|---|--|--|
| Deep workflow experience across vertical industries | • | | |
| Long-Life Cycle availability and support | • | | |
| Bulk availability for large Enterprises | • | | |
| Global technical pre-sales and post-sales support | • | | |
| Online end-user forums for fast support from SMEs | • | | |

* Most games will run fine on Quadro graphics cards. Enable Game Development profile if any unexpected results occur while gaming.