

## How To Plan For A SOLIDWORKS 2023 Upgrade

TITLE:	How To Plan For A SOLIDWORKS 2023 Upgrade
DATE:	September 2022
SUBJECT:	SOLIDWORKS Upgrade
ABSTRACT:	Comprehensive guide on planning an upgrade for SOLIDWORKS 2023



This document is meant to give a general overview of the installation process and provide a simple checklist for system administrators getting ready to deploy SOLIDWORKS and PDM software. Detailed information for installation is available through the [Hawk Ridge support portal](#).

When implementing any new version, compatibility is a significant concern. Network-based licensing requires that the license server is updated first to the new version. Without an updated license server, clients will be unable to check out the new version license. In PDM Standard and Professional PDM environments, clients must have the same major version as their target vault server.

Before loading any software, you should always log in with full administrative permissions and disable any anti-virus and anti-spyware programs. Be sure your operating system has been updated with Windows Updates recently to avoid any compatibility issues with the installer.

This is not a troubleshooting guide. If you have any technical issues with SOLIDWORKS, please contact [Hawk Ridge Systems technical support](#).

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# SOLIDWORKS Standalone Installation

SOLIDWORKS standalone licensing is activation-based, meaning that each stand-alone license can only be activated on **one** machine at a time.

- Compatibility

### Operating Systems

	SOLIDWORKS 2021 (EDU 2021-2022)	SOLIDWORKS 2022 (EDU 2022-2023)	SOLIDWORKS 2023 (EDU 2023-2024)
<b>Client Products</b> (e.g. SOLIDWORKS)			
Windows 11, 64-bit	✗	✓ (SW2022 SP2)	✓
Windows 10, 64-bit	✓	✓	✓
<b>MS Office</b>			
Microsoft Excel and Word	2016, 2019	2016, 2019, 2021 (SW2022 SP2)	2016 (End of Life: SW 2023), 2019 (End of Life: SW 2023), 2021



## Hardware and Hypervisors

	SOLIDWORKS 2021	SOLIDWORKS 2022	SOLIDWORKS 2023
<b>Hardware</b>			
Processor	64-bit; Intel or AMD		
RAM	16 GB or more PDM Contributor/Viewer or Electrical Schematic: 8 GB or more		
Graphics	<a href="#">Certified cards and drivers</a>		
Drives	SSD drives recommended for optimal performance		
<b>Hypervisors (Virtual Environments)</b>			
VMware vSphere ESXi	6.7 U3	7.0 U3c	To be announced
VMware Workstation	15.5	16.2.3	To be announced
Microsoft Hyper-V	2019	2019	To be announced
Parallels Desktop, Mac	16.0	17.1.2	To be announced
Citrix XenServer	8.2	8.2 CU1	To be announced
<ul style="list-style-type: none"> <li>SOLIDWORKS and eDrawings require a GPU for optimal performance in a virtualized environment. SOLIDWORKS has tested and certified graphics cards for virtualized environments. For a complete listing, check <a href="#">Certified Cards and Drivers</a>.</li> <li>Check <a href="#">Hardware Benchmarks</a> for applications and references that can be used to help determine hardware performance.</li> <li>SOLIDWORKS Composer is not supported in virtualized environments.</li> </ul>			

For more information on hardware recommendations for SOLIDWORKS, see our guides here:

[2023 Recommended Hardware](#)

[2023 Comprehensive Hardware Guide](#)

SOLIDWORKS requires a video card with a certified driver. It's best to update your video driver to the certified version found here before installation:

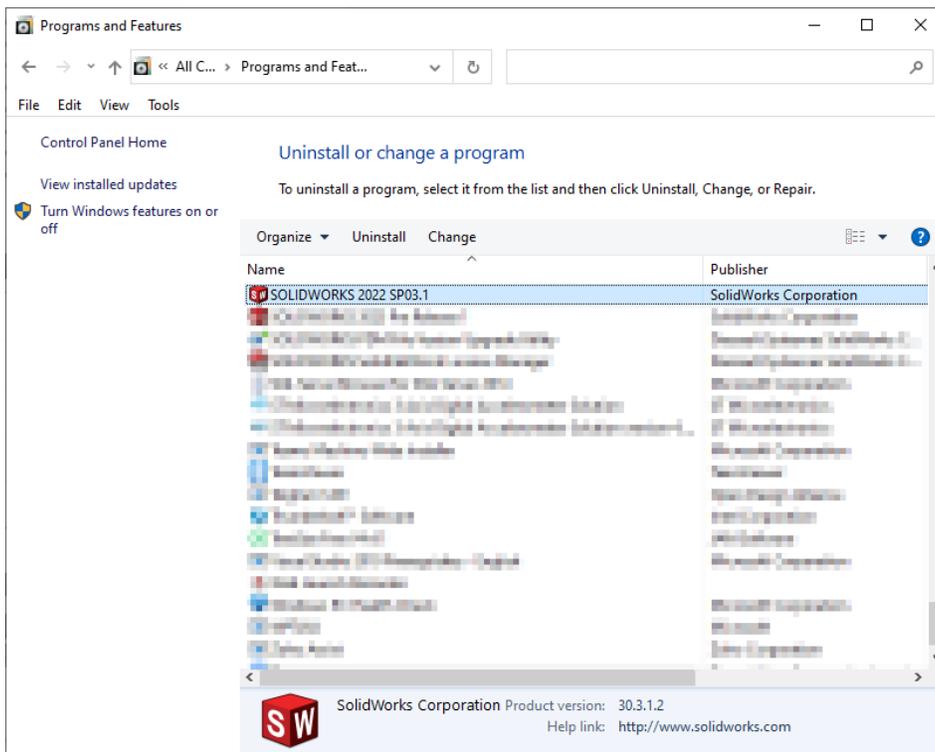
- Licensing**  
 Each stand-alone license can only be active on **one** machine at a time. If you are planning to upgrade one computer from a previous version, the activation will carry over. However, if you need to switch machines or install on a new machine, you will first need to transfer the license from your old machine.

To transfer your license: open SOLIDWORKS then use the Help > Deactivate Licenses feature. This feature deactivates the product on your current machine so it can be reactivated on the new machine. You then go to the new computer, install SOLIDWORKS, and Activate the license.



If you recently purchased a new license or your serial number changed, you will need to update the serial number that was used to install SOLIDWORKS. For example, if you purchased a new license of SOLIDWORKS Premium and wanted to switch from a SOLIDWORKS Standard license.

To change the serial number of your SOLIDWORKS license: go to the windows control panel and select 'Programs and Features.' Find SOLIDWORKS in the list of programs highlight it and select **Change:**



This will launch the SOLIDWORKS installation manager. Select the option to 'modify' your current installation then input your new serial number. REMEMBER, if you currently have SOLIDWORKS active on your machine, you will need to deactivate this license first.

- Access SOLIDWORKS installation requires the use of an unrestricted administrator account. Turning off "Windows user account controls" (UAC), and any anti-virus software is recommended during installation.
- Copy Settings Wizard  
The copy settings Wizard can be used to copy all the configuration of one version of



SOLIDWORKS to the next. Making it possible to backup and restore SOLIDWORKS configuration across the version.

- **Upgrading Hole Wizard/Toolbox**  
The Hole Wizard/toolbox is a critical component of SOLIDWORKS. To avoid data loss, be sure to back up your Toolbox folder – usually found at C:\SOLIDWORKS Data. For more information, please see our [comprehensive toolbox guide](#).

**Commented [KC1]:** Do we have a newer article we can use?

## SOLIDWORKS Network Licensed Setup

The first step in a SOLIDWORKS upgrade is to upgrade the license server. License servers are backward compatible but not forwards compatible. Therefore, if you plan to use SOLIDWORKS 2023, you must have an updated 2023 license server. For more a more detailed guide, please see our [2023 Network Server License Manager Installation Guide](#).

- **Network server version** Before starting the upgrade process, review the operating system compatibility here:

	SOLIDWORKS 2021 (EDU 2021-2022)	SOLIDWORKS 2022 (EDU 2022-2023)	SOLIDWORKS 2023 (EDU 2023-2024)
<b>MS SQL</b>			
SQL 2019	✓ SQL 2019 CU4 required	✓ SQL 2019 CU4 required	✓ SQL 2019 CU4 required
SQL 2017	✓	✓	✓ (End of Life: SW 2024)
SQL 2016	✓	✓	✓ (End of Life: SW 2023)
SQL 2014	✓ SQL 2014 SP3 required	✗	✗
<b>Server Products (e.g. SOLIDWORKS PDM, SNL Manager)</b>			
Windows Server 2022	✗	✓ (SW2022 SP4)	✓
Windows Server 2019	✓	✓	✓
Windows Server 2016	✓	✓	✓ (End of Life: SW 2023)

- **Support for virtual machines**  
Currently only the following virtual machine platforms will allow activation of a license server: VMWare, Microsoft Hyper-V, Parallels, and Citrix Xen.
- [Client Installation](#)  
SOLIDWORKS network client installation is the same as a stand-alone installation. The network



license key is used to install SOLIDWORKS, and no activation is required. All clients must be able to freely communicate with the license server on ports 25734 and 25735.

- [Migration from standalone](#)
  - i When switching workstations to use a network license, the first step will be to designate and install the SNL (SolidNetwork License) manager on the new license server.
  - ii To remove the previous activations. Client installations will need to be modified to use the network serial number and receive their licenses from the license server. Follow the procedure to switch the licenses using the windows control panel -> Programs and Features -> highlight SOLIDWORKS and select 'change.' This will give the option to change the installed serial number and add the client's license manager.
- [Admin image deployment](#)

Creating an admin image for deployment provides a method to create a single image to be pushed out to each client machine. Images can be customized per machine to change installation modules for specific workstations.
- PDM Version

Before updating your clients and license server, it is essential to consider if you have an active PDM system as this system will need to be upgraded as well. With SOLIDWORKS Professional, Standard or Workgroup PDM clients, if you wish to use a newer version of SOLIDWORKS your PDM vault and client software will need to be upgraded as well. A newer client will be unable to connect to an older vault.
- License Troubleshooting

The most common error associated with a network license is the Windows firewall blocking access to the license server. Make sure that the ports 25734 and 25735 are open on all clients and inbound on the license server.

## PDM Professional Installation

PDM Professional consists of three modules: Archive server, Database server, and clients. Each of these must be updated to work together. **Before upgrading, be sure to have a backup of your SQL database and vault data.** Once you have current backups, to complete the installation, you will need to have logins to the SQL SA user account and Vault Admin account.

- Change in licensing method

2015 added activation-based licensing for PDM using the SolidNetwork license manager. Licenses for PDM are now managed through the SNL with FlexLM, giving administrators real-time information on license usage.
- SQL Server installation
- PDM does not include a copy of the SQL Server. Either a current installation will need to be used or a new install created. Hawk Ridge Systems can provide installation media for SQL server 2014. PDM Professional 2023 is only compatible with SQL Server 2016 and newer.
- Vault and Client Version

All clients must be running the same year version of the PDM software as the vault.



## Client Compatibility – CAD Editor

### Operating Systems

	SOLIDWORKS 2021 (EDU 2021-2022)	SOLIDWORKS 2022 (EDU 2022-2023)	SOLIDWORKS 2023 (EDU 2023-2024)
<b>Client Products</b> (e.g. SOLIDWORKS)			
Windows 11, 64-bit	✗	✓ (SW2022 SP2)	✓
Windows 10, 64-bit	✓	✓	✓

### Hardware and Hypervisors

	SOLIDWORKS 2021	SOLIDWORKS 2022	SOLIDWORKS 2023
<b>Hardware</b>			
Processor	64-bit; Intel or AMD		
RAM	16 GB or more PDM Contributor/Viewer or Electrical Schematic: 8 GB or more		
Graphics	<a href="#">Certified cards and drivers</a>		
Drives	SSD drives recommended for optimal performance		
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VMware Workstation	15.5	16.2.3	To be announced
Microsoft Hyper-V	2019	2019	To be announced
Parallels Desktop, Mac	16.0	17.1.2	To be announced
Citrix XenServer	8.2	8.2 CU1	To be announced
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### Archive Server Compatibility

Server Products (e.g. SOLIDWORKS PDM, SNL Manager)			
Windows Server 2022	✗	✓ (SW2022 SP4)	✓
Windows Server 2019	✓	✓	✓
Windows Server 2016	✓	✓	✓ (End of Life: SW 2023)
	SOLIDWORKS 2021 (EDU 2021-2022)	SOLIDWORKS 2022 (EDU 2022-2023)	SOLIDWORKS 2023 (EDU 2023-2024)
MS SQL			
SQL 2019	✓ SQL 2019 CU4 required	✓ SQL 2019 CU4 required	✓ SQL 2019 CU4 required
SQL 2017	✓	✓	✓ (End of Life: SW 2024)
SQL 2016	✓	✓	✓ (End of Life: SW 2023)
SQL 2014	✓ SQL 2014 SP3 required	✗	✗



**Database and Archive Server Compatibility**  
 Microsoft/Apple Products Support Lifecycle (SOLIDWORKS 2021 - 2023)

Products	Start of Support	End of Support <sup>1</sup>
Windows 11, 64-bit	SW 2022 SP2	Active
Windows 10, 64-bit	SW 2015 SP5	Active
Windows Server 2022	SW 2022 SP4	SW 2028 SP5
Windows Server 2019	SW 2019 SP3	SW 2025 SP5
Windows Server 2016	SW 2017 SP2	SW 2023 SP5
SQL Server 2019	SW 2020 SP0	SW 2026 SP5
SQL Server 2017	SW 2018 SP0	SW 2024 SP5
SQL Server 2016	SW 2017 SP0	SW 2023 SP5
SQL Server 2014	SW 2015 SP0	SW 2021 SP5
Excel, Word 2021 (64-bit recommended)	SW 2022 SP2	Active
Excel, Word 2019 (64-bit recommended)	SW 2019 SP2	SW 2023 SP5
Excel, Word 2016 (64-bit recommended)	SW 2016 SP3	SW 2023 SP5
macOS Monterey (12.0)	eDrawings 2022	eDrawings 2024
macOS Big Sur (11.0)	eDrawings 2021	eDrawings 2023
macOS Catalina (10.15)	eDrawings 2020	eDrawings 2022
macOS Mojave (10.14)	eDrawings 2019	eDrawings 2021

For further assistance, please contact our support team at [support@hawkridgesys.com](mailto:support@hawkridgesys.com), or 877-266-4469 (US) or 866-587-6803 (Canada).