

**3ds max**™ **VERSION FIVE**  
*www.discreet.com*

**5**

**INSTALLATION GUIDE**

**12808-010000-5010A**

**July 2002**

**discreet**™

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# install

## 3ds max 5 Installation Guide

### Introduction

This guide provides information for installing and starting **3ds max™ 5**. In addition to describing steps to install the program quickly, it includes information about system requirements and troubleshooting. It also tells you how to set up network environments, as well as how to uninstall the program.

See “Frequently Asked Questions” on page 17 to address many common questions about, and issues with, the installation and use of **3ds max**.

**Important:** This guide covers only installation of **3ds max** for single users (standalone licenses). For information about installation and registration or authorization of network-licensed versions of the software, see the *Discreet Network Administrator's Guide*. To view this file, go to the program CD, navigate to `3dsmax\netsetup\support\adlm\docs\`, and open *discreet\_netguide.chm*. You can also view this file by starting the Network Setup Wizard from the Choose Setup Program dialog, and then clicking View The Network Administrator Guide.

### System Requirements

Before you begin the install process, make sure your system meets the minimum operating requirements for **3ds max**.

- **Computer**—AMD™ or Intel®-compatible processor, running at 300 megahertz or better. **3ds max** takes advantage of additional processors, if present.
- **RAM**—Minimum 256 megabytes (MB) and 300MB swap file size. Recommended is 1 GB and 2 GB swap file size. The complexity of your scene impacts the amount of RAM you will need to maintain performance.
- **Display**—Graphics card supporting a minimum resolution of 1024 x 768 x 16-bit color. Recommended resolution is 1280 x 1024 x 24-bit color. (256-color mode is not supported.)
- **OpenGL®** and **Direct3D®** hardware acceleration is supported with graphics cards having a minimum of 32 MB of memory.
- **Operating system**—Microsoft® Windows® 2000 (Service Pack 2 recommended) or Windows XP Professional.

Note: **3ds max 5** will operate on Microsoft Windows 98, Windows Millenium Edition, and Windows NT® 4, however not all features are supported.

You must have administrative permissions to install the **3ds max** software.

- **Free hard disk space**—Typically 400 MB of free hard disk space for installation. This varies according to the custom components you choose to install.

**Important:** The Windows swap file size should be a minimum of 300 MB. Recommended swap file size is *three* times the amount of physical RAM on your computer. Depending on scene complexity, more Windows swap space might be desirable.

- **CD-ROM**—Required for loading software, and needed for access to tutorial and sample files.
- **Sound card and speakers**—Required for listening to sound tracks.
- **Pointing device**—Microsoft-compatible pointing device. **3ds max 5** has special optimizations for a three-button mouse or Microsoft Intellimouse®.

**Important:** Make sure you are using the most current driver for your pointing device. The best method to obtain the most current driver for any peripheral you are using is to go to the manufacturer's Web site and download it from there.

- **Network (Optional)**—A TCP/IP-configured network for use in network rendering. Network rendering is not available on Windows 98 or Windows ME systems.

Note: To use network licensing, a network must be present.

- **Other**—To authorize **3ds max 5** and to view the online help systems, you must have Internet Explorer® 5.5 (or later) already present. Internet Explorer 6 is provided on the program CD.

You also need QuickTime® 4.1.2 (or later) to run the QuickTime plug-in.

QuickTime 5 is on the program CD.

See "QuickTime 5" on page 10 for more information.

## Installing 3ds max 5

### Before You Begin

When you install **3ds max 5**, you will choose from three different installation options (Typical, Compact, and Custom) that determine which components are installed. The components are stored as compressed files on the program CD, so you must run the Setup program to install **3ds max**.

What You Need to Proceed with Installation

- Serial Number
- CD Key

Note: The Serial Number and CD Key are found on the product packaging.

Administrative permissions are required for the following operations:

- Installing the **3ds max 5** package, including the *User Reference* and *Tutorials*, and the *MAXScript Reference* (online help files).
- Loading and registering files that let you view FLC, FLI™, and CEL files.

- Installing network-rendering services.
- Modifying, repairing, or removing **3ds max 5**.
- Importing and exporting your **3ds max 5** license with the Portable License Utility.

#### To install 3ds max 5:

1. Ensure that you have sufficient free space on your c: drive for the **3ds max 5** temporary installation files (approximately 400 MB for a Typical install).
2. Close all programs before running the Setup program.
3. Insert the **3ds max 5** CD into the CD-ROM drive.
4. If Autorun does not start the Setup program, open the Windows taskbar, choose Start, then Run. Enter the CD-ROM drive letter, followed by `:\\setup` (for example: `d:\\setup`), and then press ENTER.

You can also run the Setup program from My Computer or Windows Explorer by navigating to the **3ds max 5** CD-ROM drive and double-clicking *setup.exe*.

### Choose Setup Program

When you run the Setup program, you see the Choose Setup Program dialog, which lets you choose the program you want to install.

You are given these choices: **3ds max 5** (including **character studio® 3.4**); QuickTime; DirectX® 8.1; Internet Explorer 6; and Turbo Squid. Network administrators also have the option to start the Network Setup Wizard or install the Autodesk® License Manager tools and documentation.




Choose an option and then click its button to begin installation. For more information on installing programs other than **3ds max** and associated software, see “Installing Additional Programs” on page 10.

**Important:** This guide covers only installation of **3ds max** for single users (standalone licenses). For information about the options for installation of network-licensed versions of the software, found in the Choose Setup Program dialog under “For network license administrators only,” see the *Discreet Network Administrator’s Guide*. To view this file, go to the program CD-ROM, navigate to `3dsmax\\netsetup\\support\\adlm\\docs\\`, and open *discreet\_netguide.chm*. You can also view this file by starting the Network Setup Wizard from the Choose Setup Program dialog, and then clicking View The Network Administrator Guide.

Note: You must have Internet Explorer 5.5 (or later) on your system to authorize your software and to read the online documentation. If you don’t have IE 5.5 (or later) already installed, you should install it

now, before you install **3ds max**. Click the Internet Explorer button in the Choose Setup Program dialog to install IE 6.

1.  To install **3ds max**, click the **3ds max 5** button.

Note: If the Windows installer is not installed on your system, it will be automatically installed and you will be prompted to restart.

2. Follow the on-screen instructions.
3. A Welcome dialog is displayed reminding you to exit all other Windows programs, and giving you options to cancel the installation or view the *Readme* file. Click Next to continue.

If you want to view the *Readme* file later, you can open it from the program group where **3ds max** is installed. If you don't read it at this time, be sure to read it later.

4. In the Software License Agreement dialog, read and accept the License Agreement, and then click Next to continue the installation process.
5. When the Serial Number dialog appears, enter the Serial Number and CD Key found on the **3ds max** product packaging. The CD Key is not case-sensitive. If you get an error message, make sure you have entered the Serial Number and CD Key correctly. Click Next to continue.

Note: You can enter 000-00000000 as a Serial Number (with no CD Key) to run in trial mode. Trial mode lets you use **3ds max 5** and **character studio** for up to 30 days.

6. In the User Information dialog, enter the appropriate information to personalize your installation.

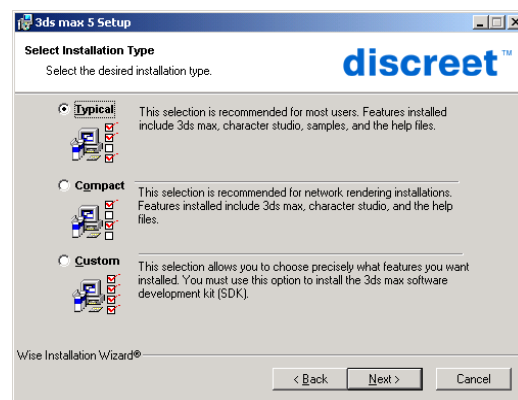
If you are running **3ds max** with Windows 2000, you can install the software so that anyone who uses the computer can run **3ds max**, or you can set it so that only you can use the program, using the radio buttons at the bottom of this dialog.

7. Be sure to note the destination directory and the file path on the Destination Folder dialog. If you want to specify another directory or folder destination, click Browse and enter a new drive or path. The Setup program creates a new directory for you, if needed.

**Important:** If you're upgrading from a previous version of **3ds max**, you must install **3ds max 5** into a new directory. **Do not install over a previous release.**

## Setup Type

The Setup Type dialog gives you three types of installation for **3ds max**: Typical, Compact, and Custom. When prompted, choose the setup type you want to run.





Note: Each setup type provides a recommended set of features to install, depending on your use of the product. If you choose Custom, you have the option to customize the specific features installed. For this reason, a Custom install is the only way to install the **3ds max 5** SDK.

### Typical Install

A Typical setup installs all **3ds max** and **character studio** program files, the help system files, all tutorials (including *some* of the **3ds max** tutorial *.max* files; all of these files are located on the Learning and Training CD), most sample files, and the software license manager, by default.

- Choose Typical if you want to install the most common options. This is recommended for most users.

### Compact Install

A Compact setup installs all **3ds max** and **character studio** program files, the help system files, and the software license manager, by default.

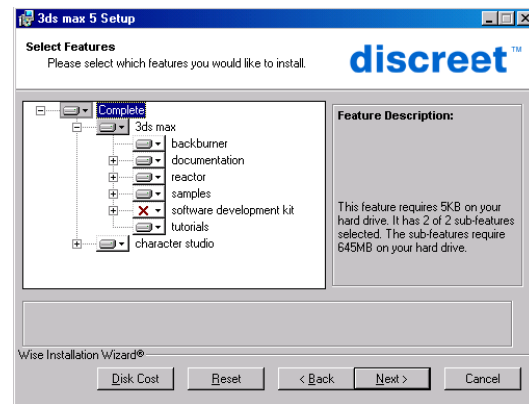
- Choose Compact to install **3ds max** on dedicated render stations, for network-rendering purposes, or if you don't want to install other components that take up disk space. "Compact" installs only the minimum required options. This is recommended for network rendering.

### Custom Install

A Custom setup installs all **3ds max** and **character studio** program files, the help system files, all tutorials, all sample files, and the software license manager, by default.

**Important:** The **3ds max 5** SDK is not included in the Custom setup by default. If you want to install the SDK, you must choose it manually from the Select Features dialog.

### Select Features Dialog



Choosing a Custom setup type opens the Select Features dialog, which allows you to see the features to be installed on your system. Click Next to install the defaults, or customize your installation by adding or removing selected features.

The following features are available in the Select Features dialog:

- **3ds max**—**3ds max 5** program files. You can install the **3ds max** and MAXScript documentation, the **reactor™ 1.4** program files and documentation, sample files, the **backburner™** program files, and the **3ds max 5** SDK individually.
- **character studio**—**character studio** for **3ds max 5**. You can install the *character studio Online Reference* and application files individually.

**To modify the installation of a feature:**

1. Click the button next to the feature.
2. In the menu that appears, choose how the feature should be installed:
  - **Will be installed on local hard drive:**  
Installs the selected feature only.
  - **Entire feature will be installed on local hard drive:** Installs the selected feature, and all subfeatures.
  - When all the subfeatures within a feature are selected to be installed, the button next to the feature will have a white background.
  - If any of the subfeatures within a feature are not selected to be installed, the button next to the feature will have a gray background.
  - **Entire feature will be unavailable:**  
Selected feature (and all subfeatures) will not be installed (or removed, if previously installed).

You can display the total disk space required for all the features to be installed by clicking Disk Cost.

**Ready to Begin Install**

1. Click Next to start copying files. You can click Back to go back and change any option.
2. After all files are copied to your hard disk, you will be prompted to restart your system.

**Important:** Before you run **3ds max** for the first time after installation, you must reboot your system. This ensures that new system information is written to disk before you start **3ds max 5**.

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**Starting 3ds max 5****To start 3ds max for the first time:**

1. If you did not reboot your system following installation, do so now.
2. Start **3ds max** from Start > Programs > discreet > 3ds max 5 or from a shortcut on your desktop. You can also start the program by navigating to the install folder with My Computer or Windows Explorer and then double-clicking *3dsmax.exe*.

The first time you start **3ds max** (and until you have authorized the software), the Authorization Wizard is displayed. This dialog allows you to either proceed with your authorization, purchase the software (or upgrade your existing license), or start using **3ds max**.

If you don't want to register at this point, you can choose Run 3ds max 5. You are given a 30-day grace period to register and authorize **3ds max**. The grace period starts from the time you first start the program. During this period, you can use the software; however, you cannot export the license to another system.

**Authorizing 3ds max**

For your convenience, **3ds max** provides the Authorization Wizard for electronic registration and quick access to your authorization code. The Authorization Wizard appears after you install **3ds max** and run it for the first time. It steps you through all the information needed for registering your product and for providing you with an authorization code.

You can obtain your authorization code directly on the Web, by fax, email, or postal mail. You can also immediately enter your authorization code if you already have one.

**To obtain an authorization code using the Authorization Wizard:**

**1. Start 3ds max.**

If you have not authorized your copy of **3ds max** yet, the Authorization Wizard appears.

- 2. Choose Authorize 3ds max 5, and click Next.**
- 3. Choose Register And Authorize, and click Next.**

If you already have an authorization code, choose Enter Authorization Code, and click Next.

- 4. Enter the requested registration information, and click Next.**
- 5. Enter your personal information, and click Next.**
- 6. Confirm your personal information, and click Next.**
- 7. Select a registration method.** You can choose Directly Via The Web, Fax Request, Email Request, or Mail Request to register and obtain your authorization code.

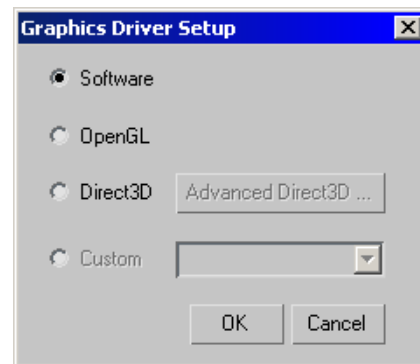
Each registration method walks you through the procedure for authorizing **3ds max**, depending on your geographic location. Refer to the *Read This First* card included in your **3ds max** product box for additional registration and authorization information.

Until you properly authorize the program, the Authorization Wizard appears each time you start **3ds max**.

After you finish using the Authorization Wizard, the Graphics Driver Setup dialog appears.

## Configuring Display Drivers

The first time you start **3ds max**, the Graphics Driver Setup dialog is displayed. Some options in the dialog are unavailable if the appropriate hardware and drivers are not installed. Choose Software, the default driver, unless you want to use a different option supported by your video card.



**Software**—This is the default driver. It works with any graphics card meeting the minimum requirements.

**OpenGL**—Uses the current Windows OpenGL driver. Note that OpenGL will be slower than Software unless you have a graphics card capable of hardware acceleration, and have installed the manufacturer's OpenGL driver for use by Windows.

**Direct3D**—Uses a driver from the hardware manufacturer designed to work with hardware accelerators. This works only if DirectX 8.1 is installed and the display driver for your card supports it. In addition, this option works only with cards having at least 32 MB of memory.

Note: Clicking the Advanced Direct3D button opens the Direct3D Driver Setup dialog, where you can choose the Direct3D Version and Device. To exit this dialog and revert from using the Direct3D drive, click Revert From Direct3D.

**Important:** You must have DirectX 8.1 installed to use the Direct3D display driver. DirectX 8.1 is included on the program CD.

**Custom**—Uses a driver that has been supplied by the graphics card manufacturer. The file must first be copied into the `\drivers` subdirectory under `\3dsmax5`.

Note: If you're not sure which option to use, choose Software. If you choose an option that prevents **3ds max** from starting correctly and gives you an "Interactive 3D Renderer Failed" message, you can access this setup dialog in **3ds max** by clicking Customize menu > Preferences > Viewports tab > Display Drivers group > Choose Driver. You can also change the Display Driver by clicking the Windows Start button > Programs > discreet > 3ds max and choosing Change Graphics Mode.

After you choose the display driver, **3ds max** starts and is ready to use.

---

## Your 3ds max 5 License

When you authorize **3ds max**, only the computer you authorized it on is licensed to run that copy of the program. The licensing software uses the following components of the computer to identify the license rights:

- Primary boot disk
- Files in the license folder
- System date and time

Making changes to any of these components can cause a license error that requires you to reauthorize your copy of **3ds max**. Several recommendations to avoid breaking your license are listed below.

For additional information, see "Frequently Asked Questions" on page 17.

### License Folder

When you install **3ds max**, the Setup program installs a hidden license folder named `c:\c_dilla`.

**Warning:** DO NOT tamper with the license folder or any files within the folder.

### System Date and Time

The **3ds max** license allows for time changes within *two days* of the current time on your system clock. If you set the system clock back more than two days, the next time you start **3ds max**, you receive a message that gives you the option of correcting the system clock. If you do not correct the system clock, you receive a license error and must reauthorize the software.

Note: For security reasons, you can only set your clock back twice, at which point you will need to reauthorize your copy of the software.

### Updating Components on Your System

If you make changes to your computer, or if you install a new computer, you need to take steps to ensure that you do not receive license errors.

Before you make any changes to your system, you should use the Portable License Utility (described below) to export the license from your system. After you have made the necessary changes to the system, you can import the license back to your modified system.

### Restoring from a Disk Backup

In a lab or training environment, it is common to install software on a master PC, create an image, and then copy that image to multiple PCs. After each class or test session, this image is used to restore the PCs to a known state so that no modified files are carried forward into the new session.

Note: Create the master image *before* running and authorizing **3ds max**, so that all deployed versions can later be authorized individually. Authorization is based on a specific computer, so that trying to use an authorization for the master PC will not work for a deployed copy.

To avoid reauthorizing each lab machine after this process, using **3ds max** in this environment requires a small exception to the rule about modified files.

Before the PC master image is restored, the *c:\c\_dilla* folder must be backed up and restored *after* the master image is restored.

### Uninstalling/Reinstalling 3ds max

The license information is not removed when you uninstall the software. If you reinstall on the same system, the **3ds max** license information is still valid. You do not have to reauthorize.

### License Errors

If you do receive a license error, you will need to reauthorize your copy of **3ds max**. You can use the Authorization Wizard to complete your request. You will have seven days, from the time of your license error, before you must reauthorize the product. After the seven-day grace period, you will not be able to use the software again, until you have entered a new authorization code.

### Portable License Utility (PLU)

Your **3ds max** license is valid on only one computer at a time. With the Portable License Utility, you can transfer the license to another computer or transfer it back to the original computer.

You must have administrative permissions to use the PLU.

Note: If you export your license, and are unable to import it immediately, there is a 24-hour emergency grace period during which you can run **3ds max** without a license. After 24 hours, you will be unable to run **3ds max** until you have reimported your license. This emergency grace period is available only once every seven days.

**To use the Portable License Utility:**

- In the Start menu, run the *Portable License Utility* from the Windows Start menu > Programs > discreet > 3ds max 5 folder.

For more information about using the PLU, click Help in the PLU dialog.


Note: When you use the PLU to export your license, you must export it to a *separate computer* before you can import it back to your system. You cannot “undo” an export.

**Installing Additional Programs**

When you run the Setup program, you see the Choose Setup Program dialog, which lets you choose the program you want to install. You are given five choices: **3ds max 5** and associated programs, QuickTime, DirectX 8.1, Internet Explorer 6, and Turbo Squid.


The two additional buttons are for installing network-licensed versions of **3ds max**, and should be used only by network administrators.

**QuickTime 5**


 QuickTime 5.x is required to run the **3ds max** QuickTime plug-in. **3ds max 5** has the ability to read and write QuickTime MOV files only if Apple's QuickTime 4.x software is installed on your computer. Choose this option to install QuickTime support.

If you want to run the QuickTime 5 setup program later directly from the **3ds max 5** CD, go to the \qtme subdirectory and run *quicktimeinstaller.exe* from there.

**DirectX 8.1**

 If you want to use the Direct3D display driver, DirectX 8.1 must be installed on your system. If you do not have DirectX 8.1, you should install it before you can choose Direct3D from the Driver Setup dialog.

**Microsoft Internet Explorer**

 The Internet Explorer 6 setup runs separately from the **3ds max 5** Setup program. This allows you control of customization for Internet Explorer.

Internet Explorer 5.5 (or later) is required for authorizing **3ds max**. In addition, the files installed for the *3ds max User Reference*, *3ds max Tutorials*, and *MAXScript Reference* require the HTML Help Viewer in Internet Explorer 5.5 (or later) for you to view them. Therefore, we've provided an option to install Internet Explorer 6.

To obtain more information about Internet Explorer, visit the Microsoft Web site at <http://www.microsoft.com>.

## Turbo Squid



Turbo Squid is free software used to buy and sell digital assets. It provides access to a growing library of more than 70,000 models, movies, maps, and sounds.

For more information, see the Turbo Squid Web site at <http://www.turbosquid.com>.

## reactor 1.4 for 3ds max 5

A complete, licensed version of **reactor 1.4**, formerly an additional product, is included in **3ds max 5**. **reactor 1.4** is automatically installed with **3ds max**. Its components are listed under the **3ds max** Custom install options.

## character studio

A complete version of the **character studio** software for **3ds max 5** is included on the product CD. **character studio 3.4** is not available from the Choose Setup Program dialog; however, it is automatically installed during a Typical, Compact, or Custom installation. You can select whether it is installed from the Select Features dialog during a Custom installation of **3ds max**.

Note: You can use **character studio** during the **3ds max** 30-day trial mode. However, once **3ds max** is authorized, **character studio** requires its own purchase and authorization.

If you intend to use the **character studio** software, be sure to install and consult the associated documentation. This documentation is available from the **3ds max** Help menu, under Additional Help.

If you plan to use **3ds max** network rendering, you must update all network-rendering systems with **character studio 3.4** to ensure identical rendering results. This does not require authorization.

If you intend to use **character studio** on a **3ds max** network floating license, you must purchase or transfer your single-user license to the **character studio** network version.

If you have a registered copy of **character studio 3**, you will need to obtain a new authorization code for it to work with your new **3ds max 5** license.

In some versions of **3ds max**, such as term licenses, **character studio** is included as part of **3ds max** without additional authorization. In these cases, you will not be prompted for an additional character studio authorization code.

## backburner

**backburner™** is the **3ds max 5** network-rendering management software. It is automatically installed in the root directory during all installations.

For more information on **backburner**, see the Network Rendering topics in the *3ds max 5 User Reference*.

## Upgrading from a Previous Version

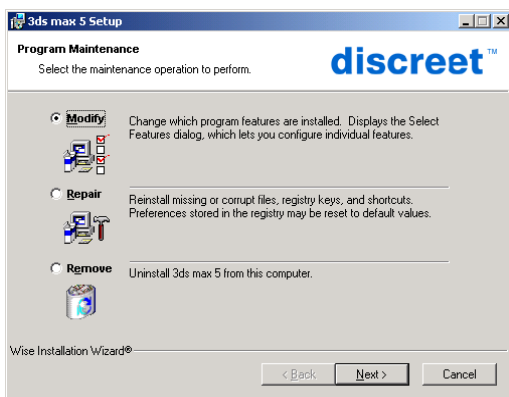
To find out about what's new for this release, refer to the *3ds max 5 New Features Guide*, included in the box, or see the "What's New in 3ds max 5" topics in the online *User Reference*, or in the printed *3ds max 5 User Reference, Volume I (optionally available)*.

Note: If you are installing an upgrade, you do not have to have your previous version of **3ds max** installed on your system to upgrade. However, you will need your previous serial number to obtain a new authorization code.

## Application Maintenance

Once you have installed **3ds max 5** on your system, you cannot install a second copy.

If you run Setup from the program CD, you see the Application Maintenance dialog. This dialog lets you modify, repair, or remove your installation of **3ds max**.



## Modifying 3ds max 5

*Modify* lets you configure which **3ds max** features are installed. The Select Features dialog lets you add or delete features from your system.

**Important:** If you deselect a feature in the Select Features dialog during modification, the associated feature will be removed from your system.

## Repairing 3ds max

*Repair* reinstalls **3ds max** (based on your current installation configuration), in order to replace any files, registry keys, or shortcuts that might have been corrupted.

If an existing file is newer than a file normally used to repair it, the existing file isn't changed. In other words, if you've applied a patch, a repair will *not* restore the system to an earlier state.

Note: Preferences stored in the registry might be reset to default values.

## Removing 3ds max

*Remove* uninstalls **3ds max** from your system, removing most files and Windows registry entries from your hard drive. If you simply delete the **3ds max** folders, you will not remove all program components.

The software license manager will not be removed during an uninstall. If you want to uninstall it, you will need to uninstall the C-Dilla Software License Manager from the Add/Remove Programs dialog in your Windows Control Panel.

Note: If you remove **3ds max** from your system and reinstall it later, you will not have to reauthorize it, unless you also removed the software license manager.



## 3ds max 5 Online Documentation

The online documentation can be accessed from within **3ds max** using commands on the Help menu. If, for some reason, you want to view the online documentation from outside the program, you can run the files from Windows Start > Programs > discreet group. Internet Explorer 5.5 (or later) is needed to view the files. However, an Internet connection is not required.

These files are installed for all setup types, and have a *.chm* file-name extension. The online documentation is located in the *\help* subdirectory under *\3dsmax5*.

### User Reference

The *3ds max 5 User Reference* documents the program. Once you have the program running, choose Help menu > User Reference.

### Tutorials

To view the *3ds max 5 Tutorials* online while you are using **3ds max 5**, choose Help menu > Tutorials.

Tutorial sample files are located on the Learning and Training CD in the *\tutorials* subdirectory. Some of these files are installed on your machine during a Typical or Custom installation. Copy the files to your hard disk and delete them when you have finished the tutorials. Suggested location: *\3dsmax5\tutorials*.

For your convenience, the *Tutorials* are also provided in a single printed volume that you can read offline. Be aware, however, that the online version might contain more up-to-date information on certain topics. See the *Readme* file for a list of these topics.

### MAXScript Reference

To see complete information about MAXScript, choose Help menu > MAXScript Reference. The *MAXScript Reference* is provided online only, as a compiled HTML Help file.

## The Learning and Training CD

The second CD included in the product box is the Learning and Training CD. It contains Adobe Acrobat Reader software, all of the tutorial sample files, as well as additional scene, image, map, sound, and MAXScript files for you to use while learning and experimenting with **3ds max**.

To use any of the files on this CD, simply copy or drag them to your own computer. Files from the Learning and Training CD are not installed when you run Setup.

When you want to run the tutorials, we recommend creating a *\tutorials* subdirectory under *\3dsmax5* on your system and copying the related Tutorial files into that directory. You can delete these files from your system after you've used them, to free up disk space. You also can access these files any time directly from the CD.

## Adobe Acrobat Reader

You will need to install the Adobe Acrobat Reader software to view the printable (PDF) version of the *reactor Reference and Tutorials*.

To install Adobe Acrobat Reader, run *ar405eng.exe* from the `\adobe_acrobat` directory on the Learning and Training CD.

## Samples

The samples include scene, image, map, sound, animation, material library, user interface, and MAXScript files. A Typical setup copies a limited set of sample files to your hard drive. This is because the total collection of files is quite large.

## Tutorial Sample Files

The tutorial sample files are for use with specific tutorials provided in the documentation set. Included are scene, map, material libraries, and sound files to use while you follow the lessons.

When you are ready to go through the tutorials, copy these files from the `\tutorials` directory on the Learning and Training CD. They can be copied to your hard disk to a directory that you create, such as `\3dsmax5\tutorials`.

Note: Some of the tutorial sample files are installed during a Typical or Custom installation.

These files can be deleted when you no longer need them.

## What's in the Box

The regular and upgrade units of **3ds max 5** typically contain the components listed in this section. If you believe any items are missing, please contact your Autodesk reseller immediately. This list is subject to change without notice, and collateral material might be different.

- **3ds max 5 CD**
- Learning and Training CD
- *3ds max 5 Installation Guide* (this document)
- *3ds max 5 New Features Guide*
- *3ds max 5 Tutorials*
- *3ds max 5 Quick Reference Card*
- *reactor Reference and Tutorials*
- *gmax Developers Guide*
- *Discreet Resource Guide* and CD
- combustion Demo CD

For your convenience, printed versions of the extensive online Help system are available as the *3ds max User Reference* three-volume set.

This additional Documentation Pack is available for a nominal fee from your Discreet Reseller or the Discreet E-Store at <http://www.discreet.com/purchase/>.

## Troubleshooting

### Adding a Command-Line Switch to the Executable Line

To add a command-line switch to the executable line for a program:

1. From within Explorer, My Computer, or the Desktop, right-click the icon for **3ds max 5** or its shortcut.  
A shortcut menu appears.
2. Choose Properties.
3. The Properties dialog appears.
4. In the Target text box, add the command-line switch after the program path and executable file name.  
For example: `c:\3dsmax5\3dsmax.exe -h`
5. Click OK.  
The command-line switch takes effect the next time you run the program from the shortcut.

To see more options for starting **3ds max 5** from the command line, refer to the *User Reference*.

### Calculating the Appropriate Swap-File Setting

A good rule of thumb for configuring your Windows swap file is three times the amount of physical memory (RAM) on your system. When you output to high-resolution film or print work, the demands will be much higher than for video resolutions. This is especially true when using Image Motion Blur.

Many users dedicate entire hard drives or partitions as swap files. Setting swap files in this manner avoids any fragmentation of the swap file.

It is very important that you have sufficient swap space set aside. A common cause of system instability is an improperly sized swap file.

### Possible Error Messages at Startup

Error: "Interactive 3D Renderer initialization failed. Please check your device settings by using the `-H` command line option."

This error indicates that the video setting is incorrect. To fix this, do one of the following:

- Go to Windows Start > Programs > discreet > 3ds max and choose Change Video Mode.
- Go to Windows Start > Run > Browse and choose `\3dsmax5\3dsmax.exe`. In the Run dialog, add `-h` to change the command to `\3dsmax5\3dsmax.exe -h`, and click OK to start the program. Choose Software when prompted. Also see "To add a command-line switch to the executable line for a program:" on page 15.
- Use Windows Explorer to locate `\3dsmax5\3dsmax.ini` and delete this file. Restart **3ds max 5** normally, and choose Software as the display driver.
- Further troubleshooting documentation is available in "Diagnosing the Interactive 3D Renderer initialization failed error" at <http://www.discreet.com/support/max>. Search the knowledgebase for "454" (without the quotation marks; this is the number of that document).

Error: "TCP/IP error or Transport error – The network protocol TCP/IP is not configured properly."

This error indicates an issue with your computer's network configuration. Refer to the "Setting Up TCP/IP" topic in the *User Reference* for help, or <http://www.discreet.com/support/max>. Search the knowledgebase for "470" (without the quotation marks; this is the number of that document).

For more problems, see "Frequently Asked Questions" on page 17.

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## Support

### World Wide Authorized Discreet Resellers

Your local Authorized Discreet Reseller is an excellent source for support and information about **3ds max 5**, as well as training and assistance on related hardware and software.

To locate an Authorized Discreet Reseller near you, please visit the reseller look-up on the Discreet website at:

<http://www.discreet.com/resellers/>.

You may also call 1-800-869-3504 (toll-free number for most international locations) or 1-514-393-1616, or send a FAX to 1-514-954-7399.

### Online Support over the World Wide Web

The Discreet Web site at <http://www.discreet.com> gives you access to a wide range of product information and support resources such as the

knowledgebase, FAQs, tutorials, download center, or visual troubleshooter. To visit the **3ds max** Web pages from within **3ds max**, choose Help menu > **3ds max** on the Web.

Information and assistance are available on our peer-to-peer **3ds max** Online Discussion Forum. To visit the **3ds max** Forum, go to <http://support.discreet.com> or, from within **3ds max**, choose Help menu > **3ds max** on the Web.

### Technical Support

To receive support, you are first required to register your product at <http://www.autodesk.com/register> using your 11-digit serial number.

As a registered client of the full retail version of **3ds max**, you can receive telephone support for installation, configuration, and troubleshooting. For support options and offerings in your region, telephone numbers, hours of operation and to locate a Technical Assistance Center near you, please visit our web site at:

<http://www.discreet.com/support>.

### 3ds max 5 Software Development Kit

Information on the **3ds max 5** Software Development Kit (SDK) is available on our peer-to-peer SDK Forum on the World Wide Web. To visit the SDK Forum, use the Discreet Online Forum Web site at <http://support.discreet.com/>.

Dedicated SDK marketing and development support for third-party developers is available from the Discreet Sparks program Web site at <http://sparks.discreet.com>.

## Discreet Official Training Centers

Whether you are an advanced user and work in the industry or a beginner and want to learn the basics of Discreet software, our Discreet Training Centers (DTCs) have a class designed especially for you. Classes offered at DTCs are short, intensive, and geared toward getting you the best training possible.

To search for a DTC near you, check our Web site at <http://www.discreet.com/training/index.html>.

## Discreet Official Training Courseware

Discreet now produces a series of Fundamental and Advanced Level Courseware for its award-winning products. Whether you want to teach **3ds max**, **character studio**, or **combustion**, Discreet has courseware for you. For the most updated information please visit us at [www.discreet.com/courseware](http://www.discreet.com/courseware).

## Frequently Asked Questions

### General Questions

Q. Does an uninstall/reinstall require a new authorization code?

No. The license rights to the application are contained in locations that are not removed in a standard uninstall process. When reinstallation happens, the previous license rights to the application are restored.

Q. Will 3ds max 5 work without authorization, when first installed?

Yes, however, the product will only work without authorization during the initial grace period, which is 30 days from when you first started the program.

Q. Will I have to reauthorize my third-party applications whenever I reauthorize 3ds max 5?

No. Once authorized, third-party applications shouldn't need re-authorization. If, for some reason, you need to reauthorize your license of **3ds max 5**.

Q. Will a re-install of the product provide a new 30-day grace period?

No.

Q. What if I need to get authorization for my product during non-business hours?

**3ds max** includes an electronic registration and authorization feature that allows users (in some geographic locations) to obtain an authorization code at any time.

Q. In case I need to reauthorize my copy of 3ds max 5, can I use the original authorization code?

No. The authorization code is unique in every instance and cannot be used more than once.

## Software Licensing Questions

Q. What is software licensing technology?

In the past, individual **3ds max** licenses had been secured by a hardware lock; a physical “dongle” that attaches to a computer's parallel port. Beginning with **3ds max 4**, Discreet used a software mechanism to secure individual licenses of **3ds max** to a particular machine, though the license can be exported to other machines using the Portable License Utility.

Q. What products and countries are affected?

All versions of **3ds max** worldwide contain software licensing.

Q. How do I move my license from one machine to another?

The Portable License Utility facilitates this. (If you are familiar with the old hardware lock, you can think of this as moving the hardware lock from one machine to another.) Run the Portable License Utility. To get a feel for the PLU, you can export to your own PC, and import it back! Follow these steps:

1. Start PLU, go to the Import page, highlight the Machine Identification Code (MIC) of your PC, right-click, and copy it to the clipboard.
2. On the Pool page, click Add, enter a name for your PC, then in the MIC field, right-click and paste in your MIC.
3. On the Export page, expand the “+” sign under your license, highlight your PC's name, and click Export (you're forced to use the file method the first time).

4. Now, try to run **3ds max**, and see the message you get.

5. Run PLU, and on the Import page, import the file you just created.

Q. I export back and forth from home all the time, and I'm tired of writing floppy disks all the time. Is there another way?

Yes. The first time you've exported to a PC, you have to write the file (and it can be anywhere, on a floppy, or shared network drive). But after that, you can use the “Transfer Code” instead. Export normally, but instead of typing a file name, on the Export Type Selection dialog, choose the Transfer Code option. Write down the code and click Transfer. On the other PC, choose Transfer Code again on the Import page, and enter the code.

Note: Codes can't be reused; you'll get a new one each time.

Q. I exported my license, writing the file on a floppy disk, and now I lost the floppy disk (or it's unreadable), and I can't run on either PC.

On the PC where you last worked, run PLU and export the license again, and make a new floppy. This works because it remembers which PC you exported it to, and you can only re-export to the same PC.

Q. I exported my license by mistake to a PC that no longer exists, or to a PC that was lost or stolen, and can't run. My computer had a serious hard-disk or BIOS failure. What should I do?

Contact the Autodesk registration center directly via phone, fax, email, or online. We will help you reinitiate your **3ds max** license.

Q. Importing a license file, I get error 1291, "The supplied import data is now obsolete. A more up-to-date version probably exists.". What do I do?

The license file is continuously updated, every time it's exported, imported, or the product is run. You have to be using the very latest version of the license file at all times.

Let's say on PC1 you export to a floppy. Now the floppy has the latest version. When you import that on PC2, the license on PC2 is now the latest version. If you tried to import that same floppy again, you'd get a 1291 error, because it's now obsolete. Otherwise, you could export to PC3, and then reimport from this floppy again: trying to make two licenses where you only have one.

Q. On import, I get error 1290, "The supplied data is not destined for this machine. Please check that the file has been transferred to the correct machine.".

Here's how this can happen. On PC1, you select PC2 and export to it, creating a floppy. You take that floppy to PC3 and try to import. Sorry: it wasn't intended to go to PC3. This restriction is necessary for security reasons. If you want the license on PC3, you'll have to import on PC2, and then export it, selecting PC3 as the destination.

Q. I'm going to make a major hardware modification to my PC, such as changing the main hard disk, the motherboard, or upgrading the BIOS. (Making a more serious change than just adding memory or changing the video card, which doesn't require re-authorization). How can I avoid breaking my license and having to reauthorize it?

You can save a support call by "parking" your license on another PC temporarily. Export your license to another PC, and then make your modifications. Before importing the license back, run the PLU on your modified PC, and on the Import page, double-check the MIC. If a drastic enough change has been made, the MIC might have been changed. If so, you'll have to update the new MIC in the pool entry for this PC on the machine where the license was parked, before exporting back.

Q. Does the PLU work with third-party applications?

If you use the PLU to transfer your **3ds max** license, the ability to run the plug-ins is also transferred. This means that if the plug-ins are installed on the transferred machine, they can be made functional by using the same plug-in authorization as the original machine.

