Lastar Lasergene Installation Guide

DNASTAR, Inc. 2021

Table of Contents

Simple guide to installation	. 2
Detailed guide to installation	. 5
License server installation for Windows	. 6
License server installation for Macintosh	. 9
Troubleshoot license server installation	11
Handle a firewall on the license server machine	12
Troubleshoot license server authorization	13
Install on a machine with an existing SentinelLM network	18
Verify the Lasergene version number	19
Standalone and network client installation for Windows	20
Standalone and network client installation for Macintosh	23
Troubleshoot standalone and network client installation	26
Run command prompt versions of DNASTAR software	27
Troubleshoot client software authorization	28
Troubleshoot the error "A different version is running"	29
Troubleshoot failure to launch SeqMan NGen or ArrayStar	30
Special types of installation	31
Install Lasergene quickly on multiple client machines	32
Install and uninstall from the command prompt or Terminal	33
Install the license server on Windows	34
Install the license server on Macintosh	35
Install and uninstall the client & standalone software on Windows	36
Install and uninstall the client & standalone software on Macintosh	38
Authorize silently on Windows	40
Authorize silently on Macintosh	41
Install Lasergene on KeyServer systems	42
Install ArrayStar on a Macintosh machine	44
Move Lasergene to another computer	46
Network license server administration	47
Restart, stop and uninstall the license server	48
Verify license server status	49
Monitor how many licenses are checked out to whom	50
Troubleshoot client access to the license server	52
Error message: "All licenses are in use"	53
Error message: "Cannot connect to License Server"	54
License server's IP address has changed	55
Obtain an audit report of Lasergene usage	56
Purchase additional uses or license additional applications	57
Access additional administrative tools for managing the network	58

nstalled Lasergene file locations	59
Types of Lasergene licenses	61
Accessing and using the Lasergene free trial	63
STEP 1: Request a free trial	64
STEP 2 (OPTION A): Try Lasergene online	66
Find and use the tools	69
Work with data files	70
Open files in a Lasergene application	71
Save Lasergene application results	72
Use the cloud file explorer	73
Create a folder in the cloud	74
Upload files to the cloud	75
Delete files from the cloud	76
Download a cloud file to your local computer	77
End a free trial session	79
Return to the free trial	80
Keyboard shortcuts for Mac users	82
Print from a Lasergene application on the cloud	83
STEP 2 (OPTION B): Install Lasergene on your computer	84

Simple guide to installation

To install Lasergene as a standalone product:

 Log in to your DNASTAR account and go to the <u>My Licenses</u> page. Press the appropriate button (Lasergene for Windows, Lasergene for Mac OS X) to download the standalone installer. Leave this page open, as you will need the product key in the next step.



 Run the installer, following the instructions on each screen. If prompted to authorize, choose Standalone and enter your 17- or 36-character product key, available on the <u>My Licenses</u> page.

To install Lasergene on a network:

Network installation involves two stages: installing the license server on host computer, and installing Lasergene on the client computers. Installing a Lasergene network for the first time or upgrading from an older version both take just a few simple steps.

If you have previously installed the license server on one host computer and need to move it to a different computer, please <u>contact our support staff</u> for help facilitating the transfer.

Part A: License server installation:

On the computer designated to run the Lasergene license server:

 Log in to your DNASTAR account and go to the <u>My Licenses</u> page. In the **Installers** column, download the license server by clicking the Network Server button corresponding to the operating system for the license server machine (**Server for Mac OS**, **Server for Windows**). Leave this page open, as you will need the product key in the next step.



2. Run the installer, following the instructions on each screen. If the server machine uses a firewall, follow the instructions in <u>Handle a firewall on the license server machine</u>. After the installation

finishes, you will be asked to enter a product key for authorization. The key is available on the <u>My</u> <u>Licenses</u> page.

INASTAR License Server Authorization	×
Enter a product key to enable clients of the DNASTAR License Server to run Lasergene 17 software. DNASTAR License Server allows concurrent usage based on the number of network licenses you purchased. Client authorization will require the IP address of this machine.	
License Server Product Key: Find Authorize Back Cancel	

Note: If authorization seems to finish but the popup above is still open, locate the following popup—which may be hidden beneath other windows—and click **OK**.

💷 Licensed Appl	ications	×
You have successfully authorized.		
	ОК	

- 3. Once authorized, a new *LasergeneClient'x'* folder (where 'x' is the version number) will be placed on your server's desktop. This folder contains:
 - A file named *IP Address [x.x.x.x].txt* Make a note of this IP address as it will be needed to activate Lasergene on the client computers.
 - Several *. Ishost files Needed for advanced installations.
 - An HTML file Instructions for client installation.

Part B: Client installation:

On each of the client machines that will be running Lasergene:

1. <u>Log in</u> to your DNASTAR account and go to the <u>My Licenses</u> page. Press the appropriate button to download the client installer (Lasergene for Windows, Lasergene for Mac OS X).



2. Place the downloaded installer into the *LasergeneClient'x'* folder (see above: Part A, step 3). This folder contains the files *LG'x'*.*Ishost*, *NG'x'*.*Ishost*, *AS'x'*.*Ishost*. Then copy the entire folder to the client machine.

If you are using MacOS 10.14 or earlier, the folder can be placed anywhere, such as the client desktop. If you are using MacOS 10.15 and later the *LasergeneClient'x'* directory should be placed at the top level of the user directory or the shared user directory, i.e. */Users/USERNAME/LasergeneClient* or */Users/Shared/LasergeneClient*.

- IMPORTANT: If you are using Mac OS 10.15 or later and instead run the installer from ~/Desktop, ~/Documents, or ~/Downloads, the .lshost or .keyhost files will not be properly copied to the Licenses directory.
- 3. On each client computer on which you wish to install Lasergene, launch the installer from within the *LasergeneClient'x'* folder. This automatically causes the local access point to be directed to the correct license server computer. Follow the instructions in the installation wizard.
- 4. When prompted, choose **Network**, and type in the IP address for the license server machine (see above: Part A, step 3).

DNASTAR Lasergene Authorization	×
Enter a network license server (hostname or IP address) to enable use of Lasergene 17 software	£.
DNASTAR License Type: O Standalone Network O Unsure Network License Server: Type server IP address here Find Authorize Back Cancel	

For in-depth information on standalone and network/client installation, see <u>Detailed guide to installation</u>. For detailed information on network maintenance and troubleshooting, see <u>Network license server</u> <u>administration</u>.

Detailed guide to installation

Though most users will only need our <u>Simple guide to installation</u>, the following topics offer a more detailed walk-through of the installation process:

- Network license server installation for Windows and Macintosh (troubleshooting)
- Standalone and network client installation for Windows and Macintosh (troubleshooting)
- Special types of installation:
 - Installing Lasergene quickly on multiple client machines
 - Installing and uninstalling from the command prompt or Terminal
 - Installing Lasergene on KeyServer systems
 - Installing ArrayStar on a Macintosh machine

License server installation for Windows

The license server machine can be either a Macintosh or Windows computer and can serve any combination of Macintosh and Window client machines up to your license limit. Choose a machine that will always be turned on, accessible from your network, and which has a static IP address. Administrator privileges are required to perform license server installation.

This section explains in detail how to install and authorize the DNASTAR network license server software for on a Windows computer. If your server is a Macintosh computer, follow <u>these instructions</u> instead. If you will be performing a standalone installation rather than a network one, proceed to <u>this topic</u> instead.

To install the License server on a Windows computer:

1. <u>Log in</u> to your DNASTAR account and go to the <u>My Account</u> page. Click the Network Server button **Server for Windows** to download the installer.



- 1. Double-click on the DNASTAR License Server Win Installer executable (*.*exe*) file to initiate installation.
- 2. In the Welcome dialog, read the instructions, and then click **Next**.
- 3. In the License Agreement dialog, read the agreement and choose **I accept the agreement** if you accept (required for installation). Press **Next**.
- 4. In the Installation Directory dialog, click Next to install in the default location (*C:\Program Files (x86)\DNASTAR-LicenseServer*). Otherwise, you may click the browse (folder) icon to install in a custom location. If you are upgrading from a previous Lasergene Network license server, the new version must be installed in the same directory as the previous version. Once the new version of the license server is installed, you will still be able to run previous network client versions during your client upgrade process. After choosing a location, click Continue. Then click Next.

1 DNASTAR License Server Installer	– 🗆 X
Installation Directory	
Please specify the directory where DNASTAR License Server wi	ill be installed.
Installation Directory iles (x86)\DNASTAR-LicenseServer	2
InstallBuilder	
	< Back Next > Cancel

5. In the Select Components dialog, you can highlight a component to display information about it in the area to the right. Leave both **Components** boxes checked and click **Next**.

DNASTAR License Server Installer	– 🗆 X	
Select Components		
Select the components you want to install; clear the components you do not want to install. Click Next when you are ready to continue.		
 DNASTAR License Server Administration Tools 	Click on a component to get a detailed description	
InstallBuilder		
	< Back Next > Cancel	

- 6. In the Important Notes dialog, read the information and press Next.
- 7. In the Ready to Install dialog, click **Next** to initiate installation.
- 8. If a license for the current version of the License Server is not detected, the License Server Authorization dialog will open.

INASTAR License Server Authorization	(
Enter a product key to enable clients of the DNASTAR License Server to run Lasergene 17 software.		
DNASTAR License Server allows concurrent usage based on the number of network licenses you purchased. Client authorization will require the IP address of this machine.		
License Server Product Key:		
Find Authorize Back Cancel		

Enter your alphanumeric product key into the **License** field, and then click **Authorize**. Your license key is shown in the <u>My Account</u> page of the DNASTAR website.

9. A progress bar will be displayed. When you receive a message that authorization was successful, click **OK**.

After authorizing the software, the following events will occur:

- A new folder named *LasergeneClient'x'* (where 'x' is the version number) will appear on the desktop. The detected IP Address of the server computer, required for network client installation, can be found in this folder as a file named *IP Address* [x.x.x.x].txt.
- A browser window entitled **Installing Lasergene Software on Client Computers** will open. This page provides information and links for installing the DNASTAR Lasergene network client. The page can be re-opened later from the *LasergeneClient'x'* directory by double-clicking on *Lasergene Installation.html*.

Having issues with this procedure? Check out these troubleshooting topics:

- Handle a firewall on the license server machine
- Troubleshoot license server authorization
- Install on a machine with an existing SentinelLM network
- <u>Verify the Lasergene version number</u>

Otherwise, proceed to Standalone and network client installation for Windows or Macintosh.

License server installation for Macintosh

The license server machine can be either a Macintosh or Windows computer and can serve any combination of Macintosh and Window client machines up to your license limit. Choose a machine that will always be turned on, accessible from your network, and which has a static IP address. Administrator privileges are required to perform license server installation.

This section explains in detail how to install and authorize the DNASTAR network license server software for on a Macintosh computer. If your server is a Windows computer, follow <u>these instructions</u> instead. If you will be performing a standalone installation rather than a network one, proceed to <u>this topic</u> instead.

To install the License server on a Macintosh computer:

1. <u>Log in</u> to your DNASTAR account and go to the <u>My Account</u> page. Click the Network Server button **Server for Mac OS X** to download the installer.



- 2. Double-click on *the Lasergene 'x' License Server Mac Install* disk image (*.dmg*) to open a window containing the application (*.app*).Then double-click on *.app* file to launch the installer.
- 3. In the Welcome dialog, read the instructions, and then click **Next**.
- 4. In the License Agreement dialog, read the agreement and choose **I accept the agreement** if you accept (required for installation). Press **Next.**
- 5. In the Important Notes dialog, follow the on-screen instructions and click Next.
- 6. In the Ready to Install dialog, press Next.
- If a license for the current version of the License Server is not detected, the License Server Authorization dialog will open. Enter your alphanumeric product key into the License Server Product Key field, and then click Authorize to initiate installation.

	DNASTAR License Server Authorization
Enter a product key to enable clients of the DNASTAR License Server to run Lasergene 17 software.	
DNASTAR License Server allows concurrent usage based on the number of network licenses you purchased. Client authorization will require the IP address of this machine.	
License Server Product Key:	
	Quit Back Find Authorize

8. A progress bar will be displayed. When you see a notification that installation has completed successfully, click **Close**.

After authorizing the software, the following events will occur:

- A new folder named *LasergeneClient'x'* (where 'x' is the version number) will appear on the desktop. The detected IP Address of the server computer, required for network client installation, can be found in this folder as a file named *IP Address* [x.x.x.x].txt.
- A browser window entitled **Installing Lasergene Software on Client Computers** will open. This page provides information and links for installing the DNASTAR Lasergene network client. The page can be re-opened later from the *LasergeneClient'x'* directory by double-clicking on *Lasergene Installation.html*.

Having issues with this procedure? Check out these troubleshooting topics:

- Handle a firewall on the license server machine
- <u>Troubleshoot license server authorization</u>
- Install on a machine with an existing SentinelLM network
- Verify the Lasergene version number

Otherwise, proceed to Standalone and network client installation for Windows or Macintosh.

Troubleshoot license server installation

- Handle a firewall on the license server machine
- <u>Troubleshoot license server authorization</u>
- Install on a machine with an existing SentinelLM network
- <u>Verify the Lasergene version number</u>

Handle a firewall on the license server machine

If the server computer's firewall is "on," you will need to allow an exception for the DNASTAR *Iserv* (Macintosh) or *Iservnt.exe* (Windows) file. In most cases, this exception is set up automatically during installation.

To set up the exception manually:

On Windows:

- 1. Determine whether a firewall is present by navigating to the **Control Panel** and searching for **Windows Firewall**. Note whether the firewall is **On** or **Off**.
- If the firewall is On, check whether there is an exception for Sentinel RMS Development Kit License Manager (the name of the license manager software used by DNASTAR).
- 3. If no exception is listed, follow <u>Microsoft's instructions for adding a program to the firewall</u>. When prompted to choose a program path, use the **Browse** button to navigate to *C:\Program Files* (*x86*)*DNASTAR-LicenseServer\Server\Iservnt.exe*.
- 4. In the "allowed programs" dialog, check all of the boxes (**Domain**, **Private**, and **Public**) corresponding to **Sentinel RMS Development Kit License Manager**.
- 5. Click **OK** to save your changes and exit.

On Macintosh:

- Determine whether a firewall is present by navigating to System Preferences > Security and Privacy and clicking on the Firewall tab. Note whether the firewall is On or Off.
- 2. If the firewall is **On**, check whether there is an exception for **Iserv**, located at ~/*Library/ DNASTARLicenseServer/Iserv*.
- If no exception is listed, click the Firewall Options button and follow <u>Apple's instructions for adding a</u> program to the firewall. The "allowed programs" dialog should now say that lserv is set to Allow all incoming connections.
- 4. Click **OK** to save your changes and exit.

Troubleshoot license server authorization

After <u>Network License Server Installation</u>, this dialog will prompt you to authorize the license server software.

INASTAR License Server Authorization	\times	
Enter a product key to enable clients of the DNASTAR License Server to run Lasergene 17 software.		
DNASTAR License Server allows concurrent usage based on the number of network licenses you purchased. Client authorization will require the IP address of this machine.		
License Server Product Key:		
Find Authorize Back Cancel		

If you enter unrecognized information and click **Authorize**, you may receive one of the error messages in the table below.

If you received this error message	try this solution:
Please enter a valid product key.	
Invalid Product Key X Please enter a valid product key. The key should be similar to either: Od595a86-6f73-08cb-1516-5ec92358e291 or A2C3E-F4H7J-M8P9R OK The key you entered is for a network license and	Check that you have entered the product key correctly, and that it is the appropriate key and type (Standalone/Client vs. Network) for the Lasergene application and version that you are installing.
cannot be used to authorize a standalone client.	
There appear to be no keys currently authorized	 If authorizing the <u>license server</u>, ensure you are using the license server License Manager located in the C:\Program Files (x86)\DNASTAR- LicenseServer\Server folder.
for the product key, product, or version number provided. If you feel that this is in error, please contact DNASTAR.	 If authorizing the <u>Client</u>, verify that you are using the Client License Manager available through the Navigator or in the C<i>Files (x86)\DNASTAR\</i> <i>License Manager</i> directory.
	If you have both Macintosh and Windows product

keys, verify the key matches the platform on which you are authorizing.
 If you have had previous versions of the software, verify that you are using the product key for the current version of the software.

To address the issue, click the **OK** button in the error message. This returns you to an enhanced version of the original authorization dialog.

DNASTAR License Server Authorization		
Enter a product key to enable clients of the DNASTAR License Server to run Lasergene 17 software.		
DNASTAR License Server allows concurrent usage based on the number of network licenses you purchased. Client authorization will require the IP address of this machine.		
If you are having problems authorizing, please click Manual to authorize using your web browser.		
License Server Product Key: w-rong-k-ey		
Manual Find Authorize Back Cancel		

Note: You can also launch this version by entering either an asterisk (*) or xxxx-xxxxxxxx in place of the product key. Or, on Windows, press Ctrl+Alt+[Back button]; on Macintosh, press Option+Cmd+[Back button].

Correct your earlier entry using the solution in the table above, then click **Authorize**. If you receive the error message again, you may wish to perform a manual authorization as detailed below.

Performing a manual authorization:

Manual authorization is only for the license server and standalone versions of Lasergene, and does not apply to client installations.

- 1. In the enhanced version of the License Server Authorization dialog, click the **Manual** button.
- 2. In the "Step 1 of 4" dialog, click the **Copy Computer ID** button to copy the unique ID number to your computer's clipboard. Then click **Next**.

Manual DNASTAR License Server Authorization	n X
Step 1 of 4: Copy Computer ID	
Click Copy Computer ID to make a copy of your	unique computer ID in the clipboard.
Your Computer ID: 10-* VJN	
	Copy Computer ID
Cancel	< Back Next >

3. In the "Step 2 of 4" dialog, click the **Launch Browser** button.

Manual DNASTAR License Server Authorization	Х
Step 2 of 4: Get License Text	
Click Launch Browser to open the DNASTAR Lasergene Authorization web page. If you are unable to connect to the internet from this computer, open this URL on another comput https://license1.dnastar.com/.	er:
Follow the directions in the DNASTAR Lasergene Authorization web page to generate the license text.	
Launch Browse	r
< Back Next > Cancel	

The browser opens to the DNASTAR License Server Authorization web page.



DNASTAR Manual Authorization allows you to authorize any of the products on your license.

Enter your Computer ID, copied from the Manual Software Authorization window, and your DNASTAR Product Key into the spaces provided below, then click Submit.

Computer IDs look like 4-*1ZQQNALC2PCW8P9 or 100-A64D2.

To locate your product key, please log in to the DNASTAR website.

Computer ID:	
Product Key:	

For assistance, please contact DNASTAR at support@dnastar.com.

Submit

- Insert the cursor in the Your Computer ID field. To insert the ID that was stored in your clipboard, use Ctrl/Cmd+V, or right-click and choose Paste.
- Open the DNASTAR <u>My Licenses</u> page. Copy your Product Key, then return to the Manual Authorization page and paste it into the **Product Key** field.
- 4. Click **Submit**. An additional section appears on the Manual Authorization page. Checkmarks denote the applications that will be installed.

Select the products you want to authorize from the list below, and then click Activate to generate the license text.



For assistance, please contact DNASTAR at support@dnastar.com.

Note: If nothing is checked and the Submit and Activate buttons are disabled, you may have used up your available licenses. To check on your license status or release a license that was used in error, please contact support@dnastar.com.

- 5. (optional) If you do not want to install a particular application, remove the checkmark next to its name.
- 6. Press Activate. If activation was successful, a block of License Text will appear.
- 7. Highlight all the text under License Text: and above the line For assistance. Copy the text into your clipboard using Ctrl/Cmd+C, or by right-clicking and choosing Copy.
- 8. Go back to the Manual DNASTAR License Server Authorization dialog and click **Next**.

🐲 Manual DN	ASTAR License Server Authorization	×
Step 3 of 4: Pa	aste License Text	
Click Paste Lic Authorization and follow the	ense Text to paste the license text copied from the DNASTAR Laserger web page. If you do not have the license text, go back to step 1 directions given.	ne
License Text:		^
		~
	Paste License Text	t
	< Back Finish Cancel	

- 9. Click **Paste License Text** to paste the copied text into the License Text field.
- 10. Click **Finish**. If authorization was successful, you will receive a message. This message is considered the **Step 4 of 4**. Click **OK** to finish the manual authorization.

Licensed Applications	×
You have successfully authorize	d.
OK	
OK	

Install on a machine with an existing SentineILM network

You can run a DNASTAR network if you already have a SentinelLM network running for another program. If you already have a SentinelLM network running on the same server where you want to install the DNASTAR license server, you will simply need to combine the license files for both programs.

Verify the Lasergene version number

This topic applies only to network installations.

In order to allow companies to run previous network client versions during the client upgrade process, we retained the original license server feature names of Lasergene 6, SeqBuilder 6, SeqMan 6, etc. As a result, you will always see "Lasergene 6" in the feature list on the server. A quick way to verify you have installed the most recent version of Lasergene is to open the LasergeneClient'x' folder (where 'x' is a number) and look at the version numbers of the *.lshost* files.

Standalone and network client installation for Windows

This section explains how to install DNASTAR Lasergene as a network client working in tandem with a DNASTAR license server. These instructions apply to all locally-installed DNASTAR applications. Administrator privileges are required to perform this installation. If you will be installing on Macintosh, use these instructions instead.

Before starting the steps below, be sure to:

- Close all existing DNASTAR software.
- (Network client installation only) Follow all steps for the <u>Network license server Installation on</u> <u>Windows</u> or <u>Macintosh</u>.

To perform standalone or network client installation on Windows:

1. <u>Log in</u> to your DNASTAR account and go to the <u>My Account</u> page. Press **Lasergene for Windows** to download the standalone installer (top image) or network client installer (bottom image).



- 2. Double-click on the DNASTAR Lasergene Installer executable (*.exe) file to initiate installation.
- 3. Follow the instructions in the DNASTAR Lasergene Installer screen, and then click **Next**.
- 4. Read the agreement in the License Agreement screen. If you agree with the terms (required for installation), select the **I accept the agreement** button, and then click **Next**.
- 5. In the Installation Directory screen, click **Next** to install in the default location (recommended). Otherwise, click on the folder icon to select a non-default location for the installation.

E DNASTAR Lasergene Installer	_	
Installation Directory		
Please specify the directory where DNASTAR Lasergene will be insta	illed.	
Installation Directory C:\Program Files (x86)\DNASTAR		
VMware InstallBuilder		
< Back N	lext >	Cancel

6. In the Ready to Install screen, click **Next**. You will see a progress bar showing the progress of the installation.

Note: If you cancel an installation in progress, you will be asked to confirm the cancellation. If you respond Yes, a second popup will ask if you would like to file a technical support request to get help with the installation. Clicking Yes in this dialog will take you to the DNASTAR website's <u>Technical Support Request page</u>.

7. If a license for the current version of Lasergene is not detected, the Lasergene Authorization dialog will open.

🐲 DNASTAR Lasergene Author	rization	\times
Enter a product key or network license server (hostname or IP address) to enable use of Lasergene 17 software.		
DNASTAR License Type: 🔿 Standalone 🔿 Network 💿 Unsure		
Product Key or License Server:		
	Find Authorize Back Ca	incel

If you are performing a *standalone* installation, select **Standalone** and enter your **Product Key**.
 Your Product Key can be found on your <u>My Licenses</u> page of the DNASTAR website. (If you cannot find the key there, please <u>contact us</u>). Press the **Authorize** button. If you authorized the

software using a recognized key, you will receive the following message. Press **OK**.

at Licensed Appl	lications	×
You have succes	sfully authoriz	zed.
	ОК	

If you are installing client software as part of a *network* installation, and the correct *.*Ishost* files are in the same directory as the installer executable, you will not be prompted to license the software. Otherwise, select **Network** and enter the License Server's **Hostname** or **IP address** in the text box. The IP Address can be found in the *LasergeneClient'x'* folder created on the host computer's desktop during License Server installation. Click the **Authorize** button. If you authorized the software using a recognized key, you will receive the following message. Press **OK**.

1 Co	nfigured networ	licensing X	
1	License server	will be used for DNASTAR Lasergene software.	
		ОК	

• If you do not wish to authorize at this time, press **Cancel** and open the authorization dialog at a later time by launching Navigator and choosing **License Manager** from the Utilities section.

If you receive an **Unable to authorize** message when installing a network client, see <u>Troubleshoot license server authorization</u>.

8. When installation is complete, press **Finish**. The DNASTAR Navigator will launch automatically.

The installed Lasergene applications can now be accessed via the DNASTAR Navigator or the *DNASTAR Lasergene 'x'* folder in the Start menu.

Standalone and network client installation for Macintosh

This section explains how to install DNASTAR Lasergene as a network client working in tandem with a DNASTAR license server. These instructions apply to all locally-installed DNASTAR applications. Administrator privileges are required to perform this installation. If you will be installing on Windows, use these instructions instead.

Before starting the steps below, be sure to:

- Close all existing DNASTAR software.
- (Network client installation only) Follow all steps for the <u>Network license server Installation on</u> <u>Windows</u> or <u>Macintosh</u>.

To perform standalone or network client installation on Macintosh:

1. <u>Log in</u> to your DNASTAR account and go to the <u>My Account</u> page. Press **Lasergene for Mac OS X** to download the standalone installer (top image) or network client installer (bottom image).



- 2. Double-click on the disk image (.*dmg*) to open a window containing the installer app (.*app*).
- 3. Move the standalone/client installer file (.app) into the LasergeneClient'x' folder that was created during License Server installation. This folder contains the files LG'x'.lshost, NG'x'.lshost, AS'x'.lshost. Then copy the entire folder to the client machine. If you are using MacOS 10.14 or earlier, the folder can be placed anywhere, such as the client desktop. If you are using MacOS 10.15 and later the LasergeneClient'x' directory should be placed at the top level of the user directory or the shared user directory, i.e. /Users/USERNAME/LasergeneClient or /Users/Shared/LasergeneClient.

WARNING: If you are using Mac OS 10.15 or later and instead run the installer from

~/Desktop, ~/Documents, or ~/Downloads, the .lshost or .keyhost files will not be properly copied to the *Licenses* directory.

- 4. Double-click on the installer app to launch the installer.
- 5. Follow the instructions in the DNASTAR Lasergene Installer screen, and then click Next.
- 6. In the License Agreement dialog, read the agreement. If you agree to the terms (required for installation), select **I accept the agreement** and then press **Next**.
- 7. In the Installation Directory screen, click **Next** to install in the default location (recommended). Otherwise, click on the folder icon to select a non-default location.

	DNASTAR Lasergene Installer	
Installation Director	у	
Please specify the dired	ctory where DNASTAR Lasergene will be i	nstalled.
Installation Directory	/Applications/DNASTAR	12
VMware InstallBuilder 🗂		
	Cancel < Back	Next >

- 8. In the Ready to Install screen, click **Next**. You will see a progress bar showing the progress of the installation.
- Note: If you cancel an installation in progress, you will be asked to confirm the cancellation. If you respond Yes, a second popup will ask if you would like to file a technical support request to get help with the installation. Clicking Yes in this dialog will take you to the DNASTAR website's <u>Technical Support Request page</u>.
- 9. If a license for the current version of Lasergene is not detected, the Lasergene Authorization dialog will open.

	DNASTAR Lasergene Authorization	
Enter a product key or network license server (hostname or IP address) to enable use of Lasergene 17 software.		
DNASTAR License Type: 🔵 Standalone 💿 Network 💿 Unsure		
Product Key or License Server:		
	Quit Back Find Authorize	

- If you are performing a *standalone* installation, select **Standalone** and enter your **Product Key**.
 Your Product Key can be found on your <u>My Licenses</u> page of the DNASTAR website. (If you cannot find the key there, please <u>contact us</u>). Press the **Authorize** button.
- If you are installing client software as part of a *network* installation, and the correct *.*Ishost* files are in the same directory as the installer app, you will not be prompted to license the software. Otherwise, select **Network** and enter the License Server's **Hostname** or **IP address** in the text box. The IP Address can be found in the *LasergeneClient'x'* folder created on the host computer's desktop during License Server installation. Click the **Authorize** button.
- If you do not wish to authorize at this time Press **Cancel** and open the authorization dialog at a later time by launching Navigator and choosing **License Manager** from the Utilities section.

If you used a recognized key, you will receive a message containing an **OK** button Press **OK** to continue the installation.

If you receive an **Unable to authorize** message when installing a network client, see <u>Troubleshoot license server authorization</u>.

10. When installation is complete, press **Finish**. The DNASTAR Navigator will launch automatically.

The installed Lasergene applications can now be accessed via the DNASTAR Navigator or the */Applications/DNASTAR* folder.

Troubleshoot standalone and network client installation

- Run command prompt versions of DNASTAR software
- <u>Troubleshoot client software authorization</u>
- <u>Troubleshoot the error</u>

Run command prompt versions of DNASTAR software

After installing and licensing SeqNinja (sometimes called DNA^{*}) and/or SeqMan NGen, they can be run immediately from the Navigator, or from the *DNASTAR Lasergene 'x'* folder in the Start menu (Win) or the Applications folder (Mac), without restarting the client machine.

For Windows users only: If you want to run the **xng**, **sng**, **qng** or **seqninja** applications through the command prompt *and* the path to these items is not present (i.e., from an earlier installation), you may first need to log off and log back in again on the standalone or client machine.

Troubleshoot client software authorization

This topic applies only to network installations.

The authorization key for Lasergene network client software is the IP address of the license server computer. If you are the end user, please contact your system administrator for this information.

If you are the system administrator, you can find the license server's IP address by opening the *LasergeneClient'x'* folder (where 'x' is the version number) located on the desktop. The number in the file name *IP Address [x.x.x.x].txt* is the authorization key for the network clients.

To allow uninterrupted communication between the client software and the License Server, you must install the DNASTAR License Server on a computer with a static IP address. If the License Serve's IP address does change after installation, see <u>License server's IP address has changed</u>.

Troubleshoot the error "A different version is running"

If you receive the error "A different version of Lasergene is running" when you try to launch a Lasergene application, but another version of Lasergene actually isn't running, there may be a lingering *.state* file from another version that needs to be deleted.

The solution is to locate and delete files named *STARDM*.state*, ...where '*' represents the version number. These files may exist in the following directories:

Windows:

- C:\Users\username\AppData\Local\DNASTAR\DataManager
- C:\ProgramData\DNASTAR\DataManager

Macintosh:

- Hard Drive:Library:Preferences:DNASTAR:DataManager
- Hard Drive:Users:username:Library:Preferences:DNASTAR:DataManager

If you find any of the *.state* files listed above, delete them. Once the files are deleted, the error should no longer appear.

Troubleshoot failure to launch SeqMan NGen or ArrayStar

In order to launch SeqMan NGen and ArrayStar on Windows, the following must be installed on the same Windows machine.

- Windows 7 with Service Pack 1 / or Windows 8.1 / or Windows 10
- NET Framework 4.7 or higher

If you receive an error message and the application fails to launch, perform these steps:

- 1. Use Windows Update to ensure the latest important updates to Windows are installed.
- 2. Install any .NET updates still listed in Windows Update.
- 3. Reinstall Lasergene.

Special types of installation

The following topics deal with special types of installation:

- Install Lasergene quickly on multiple client machines
- Install and uninstall from the command prompt or Terminal
- Install Lasergene on KeyServer systems
- Install ArrayStar on a Macintosh machine

Install Lasergene quickly on multiple client machines

This topic applies only to network installations. Normal network client installation requires following the steps in the Standalone and network client installation (<u>Windows</u> / <u>Macintosh</u>) for each client machine.

Advanced installation lets you distribute a folder containing a preconfigured Lasergene installation to computers on your network, allowing quick installation on multiple machines.

- 1. (Macintosh only) Double-click on the disk image (.*dmg*) to open a window containing the installer app (.*app*).
- For both Macintosh and Windows, move the executable file (.exe) or installer app (.app) to the LasergeneClient'x' folder, adjacent to these three files: LG'x'.lshost, NG'x'.lshost, AS'x'.lshost. If you are using MacOS 10.15 and later the LasergeneClient'x' directory should be placed at the top level of the user directory or the shared user directory, i.e. /Users/USERNAME/LasergeneClient or /Users/ Shared/LasergeneClient.

WARNING: If you are using Mac OS 10.15 or later and instead run the installer from ~/Desktop, ~/Documents, or ~/Downloads, the .lshost or .keyhost files will not be properly copied to the *Licenses* directory.

- 3. Copy the entire *LasergeneClient'x'* folder to a USB drive or a shared network drive that can be accessed by each client.
- 4. You may now run the DNASTAR Lasergene Installer for Macintosh or Windows on each of the client machines. Be sure to run the installer from the *LasergeneClient'x'* folder to ensure that the **.lshost* files are automatically recognized by the installer.

Install and uninstall from the command prompt or Terminal

Instead of performing a traditional installation, you may optionally install and/or uninstall DNASTAR software from the command prompt (Win) or Terminal (Mac). This type of "silent" installation/uninstallation does not require user interaction. Installation runs in the background, without any dialogs or notifications.

- Win: Instructions for installing the <u>License Server</u> and <u>standalone/client software</u>. If you do not authorize at the time of installation, you may <u>authorize silently</u> at a later time.
- **Mac:** Instructions for installing the <u>License Server</u> and <u>standalone/client software</u>. If you do not authorize at the time of installation, you may <u>authorize silently</u> at a later time.

Install the license server on Windows

As an alternative to <u>traditional License Server installation</u>, you may also install the DNASTAR License Server from the Windows command prompt:

- 1. Download the network installer executable *DNASTAR'x'LicenseServerWinInstaller.exe* (where 'x' denotes the version number).
- 2. On the network host machine, open a command prompt.
- 3. Drag the installer executable into the command prompt to add the path. After the path, type a space and the following text:

In place of the "x's," use the alphanumeric string from the <u>My Licenses</u> page of the DNASTAR website.

Example of the final command:

4. Press **Enter**. If a security warning appears, choose **Yes**.

A folder named *LasergeneClient'x'* will appear on the desktop. This folder contains the *.lshost* files you will need to set up the clients.
Install the license server on Macintosh

As an alternative to <u>traditional License Server installation</u>, you may also install the DNASTAR License Server from the Macintosh Terminal:

- 1. Download the network installer executable *DNASTAR'x'LicenseServerMacInstaller.dmg* (where 'x' denotes the version number).
- 2. Double-click on the disk image (.*dmg*) to open a window containing the installer app (.*app*).
- 3. On the network host machine, open the Terminal.
- 4. Right-click on the installer app and choose **Show Package Contents**. Open the **Contents** directory and then the **MacOS** directory. Drag the file *installbuilder.sh* into the Terminal to add the path. After the path, type a space and the following text:

In place of the "x's," use the alphanumeric string from the <u>My Licenses</u> page of the DNASTAR website.

Example of the final command:

/Volumes/DNASTAR\ License\ Server/DNASTAR\ 15.0.0\ License\ Server\ Mac\ Installer.app/ Contents/MacOS/installbuilder.sh --mode unattended --dnastarProductKey xxxxxxxxxxxx xxxx-xxxx-xxxxxxxxxxx

5. Press **Enter**. If a security warning appears, choose **Yes**.

A folder named *LasergeneClient'x'* will appear on the desktop. This folder contains the *.lshost* files you will need to set up the clients.

Install and uninstall the client & standalone software on Windows

<u>To install:</u>

As an alternative to the <u>traditional method of installing standalone or network client software</u>, you can use the Windows command prompt to perform the installation "silently":

- 1. Download the standalone/client installer *DNASTARLasergene'x'WinInstaller.exe* (where 'x' represents the version number).
- (network installation only) Move the standalone/client installer into the _LasergeneClient'x'_folder that
 was created during <u>License Server installation</u>. Then copy the entire folder to the desktop of the client
 machine.
- 3. On the machine where the standalone/client software will be installed, open a command prompt.
- 4. Drag the installer executable into the command prompt to add the path. After the path, type a space, then add this text:

If you are using a standalone key, add:

In place of the "x's," use the alphanumeric string from the <u>My Licenses</u> page of the DNASTAR website.

If you are using an IP address, add:

--mode unattended --dnastarServerIP xx.xx.x.xxx

In place of the "x's," use the IP address specified in the _LasergeneClient'x'_folder.

Example of the final command:

C:\Users\<username>\Desktop\DNASTARLasergene150aWinInstaller.exe --mode unattended -dnastarServerIP 55.55.5.555

5. Press Enter. If a security warning appears, choose Yes.

To uninstall:

Open a command prompt and run the following command:

"C:\Program Files (x86)\DNASTAR\Uninstall Lasergene 'x'.exe" --mode unattended

... where 'x' represents the version number.

Install and uninstall the client & standalone software on Macintosh

<u>To install:</u>

As an alternative to the <u>traditional method of installing standalone or network client software</u>, you can use the Macintosh Terminal to perform the installation "silently":

- 1. Download the standalone/client installer *DNASTARLasergene'x'MacInstaller.dmg* (where 'x' represents the version number). Double-click on the disk image (.*dmg*) to open a window containing the installer app (.*app*).
- 2. (Network installation only) Move the standalone/client installer file (.app) into the LasergeneClient'x' folder that was created during License Server installation. This folder contains the files LG'x'.lshost, NG'x'.lshost, AS'x'.lshost. Then copy the entire folder to the client machine. If you are using MacOS 10.14 or earlier, the folder can be placed anywhere, such as the client desktop. If you are using MacOS 10.15 and later the LasergeneClient'x' directory should be placed at the top level of the user directory or the shared user directory, i.e. /Users/USERNAME/LasergeneClient or /Users/Shared/LasergeneClient.
 - **WARNING:** If you are using Mac OS 10.15 or later and instead run the installer from ~/Desktop, ~/Documents, or ~/Downloads, the .lshost or .keyhost files will not be properly copied to the *Licenses* directory.
- 3. Open the *LasergeneClient'x'* folder, right-click on the *.app* file and choose **Show Package Contents**. Navigate to **Contents/MacOS**. You should see a file named *installbuilder.sh*.
- 4. On the machine where the standalone/client software will be installed, open the Terminal. Drag the *installbuilder.sh* file and drop it into the Terminal to provide the path. After the path, type a space, then add this text:

If you are using a standalone key, add:

In place of the "x's," use the alphanumeric string from the <u>My Licenses</u> page of the DNASTAR website.

If you are using an IP address, add:

--mode unattended --dnastarServerIP xx.xx.xxxx

In place of the "x's," use the IP address specified in the _LasergeneClient'x'_folder.

Example of the final command:

/Volumes/DNASTAR\ Lasergene\ 15/DNASTAR\ Lasergene\ Installer.app/Contents/MacOS/ installbuilder.sh --mode unattended --dnastarServerIP 55.55.555

5. Press **Enter**. If a security warning appears, choose **Yes**.

To uninstall:

Open the Terminal and run the following command:

"/Applications/DNASTAR/Uninstall Lasergene 'x'.app/Contents/MacOS/installbuilder.sh" --mode unattended

Authorize silently on Windows

If you did not authorize a client or standalone installation at the time of installation, you can do so at any time by launching the Navigator and clicking on **License Manager**, located in the Utilities Section.

To instead authorize the Lasergene software silently, follow these instructions:

- 1. On the machine where the standalone/client software was installed, open a command prompt.
- 2. Drag the installer executable into the command prompt to add the path. After the path, type a space, then add this text:

If you are using a standalone key, add:

In place of the "x's," use the alphanumeric string from the <u>My Licenses</u> page of the DNASTAR website.

If you are using an IP address, add:

-q -l xx.xx.x.xxx

In place of the "x's," use the IP address specified in the *LasergeneClient'x'* folder.

Example of the final command:

"C:\Program Files (x86)\DNASTAR\Lasergene 15\DNASTARLicenseManager.exe" -q -I 55.55.5.555

Authorize silently on Macintosh

If you did not authorize a client or standalone installation at the time of installation, you can do so at any time by launching the Navigator and clicking on **License Manager**, located in the Utilities Section.

To instead authorize the Lasergene software silently, follow these instructions:

- 1. On the machine where the standalone/client software was installed, open the Terminal.
- 2. Drag the installer app into the Terminal to add the path. After the path, type a space, then add this text:

If you are using a standalone key, add:

In place of the "x's," use the alphanumeric string from the <u>My Licenses</u> page of the DNASTAR website.

If you are using an IP address, add:

-q -l xx.xx.x.xxx

In place of the "x's," use the IP address specified in the *LasergeneClient'x'* folder.

Example of the final command:

/Applications/DNASTAR/Lasergene\ 15/DNASTARLicenseManager.app/Contents/MacOS/ LicenseManager -q -I 55.55.5.5

Install Lasergene on KeyServer systems

This topic applies only to network installations.

Lasergene 16.0 and higher versions support KeyServer 7.5 and 7.6. The following instructions explain how to set up the Lasergene license server and client for KeyServer. This installation requires the following files, which you should have received in an email from DNASTAR: *Lasergene.lic*, *ArrayStar.lic* and *NGen.lic*; *LG'x'.keyhost*, *AS'x'.keyhost* and *NG'x'.keyhost*, where 'x' represents the version number.

On the KeyServer host machine:

- 1. Copy all of the .lic files you received to the following folder:
 - Windows: C:\Program Files\Sassafras K2\Server\KeyServer Data
 - Mac: Applications/Sassafras K2/Server/KeyServer Data
- 2. Restart the KeyServer service as described in your KeyServer instructions.
- 3. Create a folder (e.g., *LasergeneClient'x'*) and place it at the top level of the user directory or the shared user directory, i.e. /*Users/USERNAME/LasergeneClient* or /*Users/Shared/LasergeneClient*.
- 4. Copy all of the .keyhost files you received into the new folder.
- 5. <u>Log in</u> to your DNASTAR account and go to the <u>My Account</u> page. Press the appropriate button to download the client installer (**Client for Mac OS X**, **Client for Windows**).



- 6. (Macintosh only) Double-click on the disk image (*.dmg*) to open a window containing the installer app (*.app*).
- 7. (all platforms) Move the executable file (*.exe*) or installer app (*.app*) into the new folder with the copies of the *.keyhost* files.
- 8. Move a copy of the folder to each of the client machines and place it at the top level of the user directory or the shared user directory, i.e. /Users/USERNAME/LasergeneClient or /Users/Shared/ LasergeneClient.

 WARNING: If you are using Mac OS 10.15 or later and instead place the folder in ~/Desktop, ~/Documents, or ~/Downloads, the .keyhost files will not be properly copied to the Licenses directory.

On each of the client machines:

Install the Lasergene client software as described in <u>Simple guide to installation</u> or <u>Detailed guide to</u> <u>installation</u>.

Troubleshooting:

Issue	Resolution
When attempting to launch a DNASTAR application on the KeyServer network, the error "Debug String" appears	A "Debug String" error can occur when you or an administrator uses Sassafras KeyConfigure to key or patch a DNASTAR application. DNASTAR applications require a vendor-generated license and may not launch successfully after being modified in this way. To prevent this problem, please use only the license file provided by DNASTAR for running DNASTAR applications on a KeyServer network.
KeyConfigure does not display the latest installed version of DNASTAR Lasergene after upgrading from a previous version	 After updating from a previous version of Lasergene, KeyConfigure may continue to display the previous version number. To correct this issue: 1. From the KeyConfigure Products Window, double-click on a DNASTAR application to display its Product Details window. 2. Change the version field to the correct version. 3. Close the Product Details window. Repeat steps 1-3 for each of the other affected DNASTAR applications. For more information, see the KeyConfigure online help.

Install ArrayStar on a Macintosh machine

The ArrayStar application is part of Lasergene, but can only be installed on the Windows operating system. It is omitted in standalone or client installations to Macintosh machines. However, if the Macintosh is running Windows on Parallels Desktop, you can perform a Windows installation of Lasergene, allowing the Macintosh user to access ArrayStar. The following topics describe the steps that must be taken prior to the Lasergene client installation.

Step 1: Download and install Parallels Desktop

If you have not already installed a supported version of Parallels Desktop:

- 1. Go to the <u>Parallels Desktop website</u> and follow the on-screen instructions to complete the purchase and download of **Parallels Desktop**.
- 2. After the download is complete, double-click on the Parallels Desktop disk image (.*dmg*) to open a window containing the installer app.
- 3. To launch the installer, double-click **Install**. Follow the on-screen instructions until the Installer notifies you that you successfully installed Parallels Desktop. Click **Close** to complete installation.
- 4. To start Parallels Desktop, open **Applications** and double-click **Parallels Desktop**.
- 5. Activate Parallels Desktop. The activation key will be in your email.

For more information, see: Parallels Desktop / Installing Parallels Desktop

Step 2: Download and install Windows

If you have not already installed a supported version of Microsoft Windows:

- 1. Go to the Microsoft website.
- 2. Download of the Full version, not the Upgrade version, of the current edition of Windows. We recommend choosing the Windows Professional edition.
- 3. Follow the on-screen instructions to complete purchase of the software.
- 4. Start the Download Manager and download will begin.
- Wait until the status of the download is "finished" before exiting. For users with average download speeds, this download may take several hours to complete.

- 5. Open Parallels Desktop and select **New Windows Installation**.
- Follow the on-screen instructions to install a supported version of Windows on your Parallels Desktop. The Virtual OS will reboot several times during this process. This will not affect the Mac operating system.
- 7. After Windows is successfully installed, the Parallels Desktop icon will appear in the Mac dock. When you open Parallels Desktop for the first time, you will be in the "Extended Coherence" mode. You may change this mode using the **Mac Menu** bar in the Parallels Desktop's **View Menu**.

Microsoft recommends that you always run antivirus software and keep it up to date.

Step 3: Configure Parallels Desktop

Configure Parallels Desktop as follows:

- 1. Go to the Parallels menu bar on the Mac machine and select **Virtual Machine > Shut Down**.
- 2. Go back to the Parallels menu bar and select **Virtual Machine > Configure**.
- 3. Click on the **General Tab**.
- 4. Change the number of CPUs allocated to your Parallels Desktop to half the total that your Mac computer has. For example if your Mac has 8 cores available, choose 4 cores.
- 5. Change the **Memory** to 8GB by typing **8000** in the text box or sliding the arrow to the right.
- 6. Click on the Hardware tab.
- 7. Select Hard disk in the menu of the left side.
- 8. Click the Edit button and then change the hard disk size to at least 100GB.
- 9. Select **Network** in the list on the left.
- 10. Change type to **Default Adaptor** in the drop down menu under Bridged Network.
- 11. Click **OK**, then **Windows 'x' Click here to start** on your Parallels Desktop (where 'x' is the version number).

Step 4: Install DNASTAR Lasergene

Follow the steps in Standalone and network client installation for Windows.

Move Lasergene to another computer

If you move your licensed copy of Lasergene to another computer, you will need to uninstall the copy on the original computer. Before initiating the "uninstall" procedure, you must manually move any user-generated files from SeqBuilder Pro to the new computer or they will be lost.

The list below shows the files you need to copy and their locations. Be sure to move the files to the same location (file path) on the new computer. If you have never added to the Feature Library or Cloning Vector Catalog, you do not need to move these files.

Note: Depending on your computer's operating system, some of these files may be hidden by default. Instructions for revealing hidden files can easily be found online.

Item	Windows location	Mac location
User-generated feature libraries	C:\Users\‹username>\AppData\Local\ DNASTAR\UserFeatures.library	/Library/Preferences/ DNASTAR/ UserFeatures.library
Vector catalogs with user-added vectors	C:\Users\Public\Documents\ DNASTAR\Lasergene 'x' Data\ CloningVectors.sbp	/Applications/DNASTAR/ Lasergene 'x' Data/ CloningVectors.sbp
User-modified enzyme (<i>Enzymes.ezd</i>) and selector (<i>EnzymeSelectors.sel</i>) files	C:\ProgramData\DNASTAR\ DataManager\1.0	/Library/Preferences/ DNASTAR/DataManager/1.0
User-modified SeqBuilder layout templates	C:\Users\‹username>\AppData\Local\ DNASTAR\UserDefault.lyt	/Library/Preferences/ DNASTAR/UserDefault.lyt

In the above file paths, 'x' represents the Lasergene version number.

Network license server administration

The topics in this section are designed to help an IT department (or similar) to administer the DNASTAR network license server.

- Restart, stop and uninstall the license server
- Verify license server status
- Monitor how many licenses are checked out to whom
- <u>Troubleshoot client access to the license server</u>
- Obtain an audit report of Lasergene usage
- Purchase additional uses or license additional applications
- <u>Access additional administrative tools for managing the network</u>

Restart, stop and uninstall the license server

Task	Windows	Macintosh
Restart	Navigate to Control Panel > Administrative Tools > Services . On the list, right-click on DNASTARLicenseServer and choose Restart . After restarting, check WImAdmin to confirm the server is running with the correct number of modules and licenses.	Double-click on /Library/ DNASTARLicenseServer/ start_ls.command
Stop	Navigate to Control Panel > Administrative Tools > Services . On the list, right-click on DNASTARLicenseServer and choose Stop .	Double-click on /Library/ DNASTARLicenseServer/ stop_ls.command
Uninstall	Use the uninstall utility located in Control Panel > Programs > Uninstall a Program .	Double-click on /Library/ DNASTARLicenseServer/ uninstall_Is.command

Verify license server status

On Windows:

- 1. Launch *WImAdmin.exe* from *C*:*Program Files* (x86)*DNASTAR-LicenseServer**Admin*\.
- 2. Choose **Edit>Defined Server List**, add the IP address of your Server, and click **OK**. Then click the plus sign (+) next to **Defined servers**.
- 3. In the ensuing list, click the plus sign (+) next to your server.
- 4. Click on any of the modules listed, then look on the right side of the dialog to find the **Feature Information** section (under **Statistics**).
- 5. Confirm that the "Total" column contains the correct number of uses. Confirm this with all the modules, including Lasergene 6.
- * "6" is part of the feature name, which is the same for all versions, and does not reflect what version you are running. For example, versions 9 and later clients can be run from a version 6 server.
- 6. Navigate to **Control Panel > Administrative Tools > Services**.
- 7. Find "DNASTARLicenseServer" on the list and make sure it is **Started**.

On Macintosh:

- Open the Terminal and enter: /Library/DNASTARLicenseServer/Ismon x.x.x.x, where x.x.x.x is the IP address. A string of text will appear, broken into sections based on the total number of modules plus one. Lasergene will be one of these sections. Each section will list the module and the "Max concurrent user(s)."
- 2. Verify that all the correct modules and correct number of uses appear on the list.
- Navigate to Applications > Utilities > Activity Monitor. Look at "All Processes" to verify that Iserv is running.

Monitor how many licenses are checked out to whom

You can use the server to get a snapshot of who is currently using the licenses and how many are checked out.

From the Windows Start menu, find and select **All Programs > DNASTAR License Server > Administer License Server**. Find your server in the list on the left side. The right side of the window will provide information about your license and who is using the software at that instant. Use **View > Refresh** to get updated information.

S WImAdmin	
File Edit View Tools Help	
Defined Servers	Server information
	Name: dnastar.dnastar.com Version: 8.5.3.0035
	IP address: XX-XX-XX-XXXX
	Feature information
	Name: ArrayStar Version:
	Statistics
	Total users:
	Reserved: 0 0
	Commuter: 0 2
	Capacity: 0 0
⊡	Redundant: No Number of servers: 1 Majority: No
HurrayStar	Detailed information
GeneQuest 6	Feature Info
GenVision 6	Lissue has Nomellicence Cist Jate. The Aug 13 (0:00:00 2015
	Commuter license: Yes Fod date: The Aug 13 00:00:00 2013
⊕ 🔄 MegAlignPro 6	
	Allowed on VM. Yes
	Criteria Value
Protean 6 Protean 6	Combining Property Exclusive license
	Commuter maximum checkout days 180 Grace allowed No
🕀 🗖 SeqBuilder 6	Hold time 0 secs
E	Key lifetime 7200 secs
Ready	NUM

On Macintosh, the utilities are located in */Library/DNASTARLicenseServer*. The utility *Ismon* provides similar information to *WImAdmin.exe*. On Macintosh, drag and drop *Ismon* into Terminal (usually located in */Applications/Utilities*), enter a space, then type **localhost** to find all of the information about the server. Or enter the following command:

sudo /Library/DNASTARLicenseServer/Ismon localhost

Note that for Lasergene, each application will appear followed by the number 6 (e.g. GeneQuest 6), however this does not reflect the version of Lasergene you are running. For additional information, see <u>Verify license server status</u>.

Troubleshoot client access to the license server

Troubleshooting topics that deal with client access to the license server are:

- Error message 'All licenses are in use'
- Error message 'Cannot connect to License Server'
- License Server's IP address has changed

Error message: "All licenses are in use"

Clients may receive the message "All licenses are in use" even though some licenses are available. This is because licenses may not be released if a client shuts down or reboots their computer without closing a DNASTAR application. There is a two hour timeout period before these 'inactive' licenses are released by the server. For more information, contact support@dnastar.com.

Error message: "Cannot connect to License Server"

If clients get the message "Cannot connect to license server" it is likely being caused by one of the following:

- The client machine is no longer connected to the network. To verify, try launching a web browser and connect to an external website or use a different application to open a file that is on your network.
- The license server machine is down or the service is not working. To remedy, restart the license server machine.
- A new security patch or firewall prevents the machine from locating the license server. For information on allowing clients to access the server through a firewall, see <u>Handle a firewall on the license server</u> <u>machine</u>.
- The license server machine does not have the same IP address or name. If the IP address or name has changed, this information will need to be changed in the *Ishost* file for every client machine. *Ishost* is a text file that can be opened and modified with a text editor like Notepad or TextEdit. For Lasergene clients, the filenames are *LGx.Ishost*, *ASx.Ishost*, and *NG'x'.Ishost*, respectively. See Installed Lasergene file locations for the locations of the .Ishost files.

License server's IP address has changed

If you have performed a network installation and the IP address of the license server changes, you will need to update the IP address on the client machines. Launch DNASTAR Navigator and click on the **License Manager** application. Enter your server's new **IP Address** or **Hostname** and click **Authorize**.

Obtain an audit report of Lasergene usage

A +usage log file +is automatically created by the DNASTAR network license server installer. By default, the maximum size of the usage log file is 1 megabyte. Also by default, once the maximum size of the file is reached, the license server will create a backup log file. The maximum number of backup files is 99. To display the information into a readable table:

On Windows:

The log file dnals.log can be found at *C:\Program Files* (*x86*)*Common Files\DNASTAR-LicenseServer*. Open a command window by going to the Start Menu, typing **cmd** in the Search field and then clicking **Enter**. Enter the following command:

- C:\Program Files (x86)\DNASTAR-LicenseServer\Admin\lsusage.exe I
- C:\Program Files (x86)\Common Files\DNASTAR-LicenseServer\dnals.log

C:\Program Files (x86)\DNASTAR-LicenseServer contains a shortcut (named log) that leads to the *dnals.log* file_._

On Macintosh:

The log file *DNASTARLicenseServer.log* is located in */Library/Logs*. Open the Terminal, usually found at */Applications/Utilities*, and then enter the following command: sudo /Library/DNASTARLicenseServer/ lsusage -I /Library/Logs/DNASTARLicenseServer.log

The Usage Summary report can be limited using other variables such as a date range. See the file *documentation.html* installed with your license server for more information.

On Windows:

Open C:\Program Files (x86)\DNASTAR-LicenseServer\Documentation\documentation.html. Select the topic **About the Sentinel RMS Utilities>Isusage**.

On Macintosh:

Open /Library/DNASTARLicenseServer/documentation.html. Select the topic Administrator Commands>Isusage-Display the Sentinel RMS Development Kit Usage Log File.

Purchase additional uses or license additional applications

After contacting your DNASTAR representative and placing the order, you will need to reauthorize the server. (No changes will be required for the client machines). To reauthorize the server, launch the **LicenseManager** application from the following directory:

- Windows: C:\Program Files (x86)\DNASTAR-LicenseServer\Server
- Macintosh: /Library/DNASTARLicenseServer

Enter the Product Key provided by your DNASTAR representative. After successful authorization, restart the service to ensure the changes are in effect.

Access additional administrative tools for managing the network

For existing KeyServer customers, DNASTAR offers a KeyServer-compatible version of Lasergene. For details, please <u>contact DNASTAR</u>.

Once you have received a KeyServer authorization email from DNASTAR, proceed to <u>Install Lasergene on</u> <u>KeyServer systems</u>.

Installed Lasergene file locations

The following file names use 'x' to represent the version number.

File Category	Application	Path
	ArrayStar (Win)	Windows: C:\Program Files (x86)\DNASTAR\Lasergene x\ArrayStar
	SeqNinja (command line; Win)	Windows: C:\Program Files (x86)\DNASTAR\Lasergene x\SeqNinjaCL
Application	Navigator (Win)	Windows: C:\Program Files (x86)\DNASTAR\Lasergene x\Navigator
	All others (Win) and all Macintosh	Windows: C:\Program Files (x86)\DNASTAR\Lasergene x
		Macintosh: /Applications/ DNASTAR/Lasergene x
Data Manager (<i>DMx, DMx.exe</i>)	SeqBuilder Pro, Protean 3D, GeneQuest_MegAlian	Windows: C:\Program Files (x86) \DNASTAR\Lasergene x
	Pro	Macintosh: /Applications/ DNASTAR/Lasergene x
		Windows: C:\Program Data\ DNASTAR\DataManager
Data Manager State File	SeqBuilder Pro, Protean 3D, GeneQuest, MegAlign Pro	Macintosh: /Library/ Application Support/ DNASTAR/DataManager,
		/Library/Preferences/ DNASTAR/DataManager
License Manager	All	Windows: C:\Program Files (x86)\DNASTAR\License Manager

		Macintosh: /Applications/ DNASTAR/License Manager
Server License File (<i>Iservrc</i>), Server License Manager (<i>DNASTARServerLicenseManagerx</i>), Server Executables (<i>Iserv, Iservnt.exe</i>)	All	Windows: C:\Program Files (x86)\DNASTAR- LicenseServer\Server Macintosh: /Library/ DNASTARLicenseServer
Standalone & Trial Licenses (*. <i>license</i>), License Server Client License (*. <i>lshost</i>), Key Server Client License (*. <i>keyhost</i>)	All	Windows: C:\Program Data\ DNASTAR\Licenses Macintosh: /Library/ Application Support/ DNASTAR/Licenses
	Protean 3D, Navigator, SeqNinja (DNA*), GenVision Pro	Windows: C:\Users\ <user>\DNASTAR Macintosh: /Library/ DNASTAR</user>
Preferences	ArrayStar	Windows: C:\Users\ <user>\AppData\ Roaming\DNASTAR\ ArrayStar</user>
	All others	Windows: C:\Users\ <user>\AppData\ Local\DNASTAR\</user>
		Macintosh: /Library/ Preferences

AppData is a hidden folder in Windows. To unhide the folder, go to **Organize > Folder** and **Search Options > View > Show Hidden files and folders**.

Types of Lasergene licenses

A Lasergene license is based on the installation type, number of users and on the type of anticipated usage (e.g., a standalone license for research use only, a site license for professional use, etc.).

By usage type:

License Type	Description
Commercial/ Research	Applies to commercial users that are involved in research.
Commercial Services	Applies to commercial users that provide sequencing or diagnostic services for outside clients.
Academic/ Non-Profit	Applies to most academic, governmental, and non-profit users.
Educational	Available on a per-semester basis to those <u>teaching Lasergene software usage</u> to students in a classroom setting.
Free Trial	Results obtained with this type of temporary license may not be used in publications.
Added Value	Includes access to the following databases: Variant Annotation Database (ArrayStar), Transcription Factor Database (GeneQuest), Transcript Annotation Database (SeqMan NGen / SeqMan Pro).

By installation type and/or number of licenses:

License Type	Description
Standalone	Allows installation of Lasergene on a single computer with full-time access to the programs.
Network	Allows you to install a license server on any Macintosh or Windows computer. The license server limits the number of simultaneous uses to the number of systems you purchased. Therefore, you can install the client software on an unlimited number of Macintosh or Windows on the same network as the license server. This computer must be running constantly so that all client machines will always have access to the client software. Also, the server computer must have a static IP address, manually configured in the TCP/IP settings of the network card on that server. In addition, if one computer is running two or more applications this computer would count for only one simultaneous use. Therefore, if you had a 3 system network, you would have 2 more uses left.
KeyServer	Allows you to run Lasergene on an existing KeyServer network.

Site	Via a negotiated agreement, organizations can request a large number or an unlimited amount of Lasergene licenses.
Cloud	All DNASTAR software can be licensed to run on the <u>DNASTAR Cloud</u> , a service offered through Amazon Web Services' <u>Amazon Cloud</u> that allows you to access DNASTAR Lasergene software online from anywhere in the world. Flexible term licenses for the Cloud are available to meet your specific needs. Alternatively, you may set up your own account with AWS and create an access key to use the DNASTAR Cloud. Click <u>here</u> for information on the DNASTAR Cloud Desktop, DNASTAR Cloud Assemblies and DNASTAR Cloud Data Drive.

Accessing and using the Lasergene free trial

We at DNASTAR welcome you to try a fully-functional version of Lasergene: the most cited commercial software of its class, with 72,000 citations and counting!

Requesting and using the Lasergene free trial involves two simple steps:

- <u>Step 1: Request a free trial</u>
- <u>Step 2 (option A): Try a subset of the Lasergene applications online;</u> no need to download or install anything!
- Step 2 (option B): Install the complete Lasergene package on your computer

We want your free trial experience to be an easy and enjoyable one. If you have questions or issues that are not covered by this guide, please do not hesitate to <u>email our friendly support staff</u>.

STEP 1: Request a free trial

If you plan to use the instant free trial on the cloud and want the best user experience, **we strongly recommend using the Google Chrome browser** (<u>download here for free</u>). However, the free trial supports all major browsers, including Mozilla Firefox, Safari, Internet Explorer, Microsoft Edge.

Go to the DNASTAR Free Trial Request page and fill out the form (gray background) on the right of the page.



Download today and discover the DNASTAR difference

Supported Lasergene Wor	ay Free Trial of the Lasergene software tools for lar Biology, Structural Biology and ics. kflows:	First Name: *
 Molecular Cloning Primer Design Sequence Alignment and Assembly SNP Detection and Analysis <i>De Novo</i> Genome Assembly Gene Expression Analysis Protein Sequence and Structure Analysis and many more! 		Email: * University/Company Name: * Phone Number: * Country: * None
	Find out why users worldwide recognize DNASTAR as a leading software solution for life scientists.	Operating System: * Macintosh Windows Meep Me Updated: Notify me of product updates and DNASTAR news via e-mail Access My Free Trial ** agree to not publish any context produced while using my DNASTAR 14-Day Free Trial. I understand this is a violation of the user license and accept all trial license <u>Terms and Conditions</u> *

Click the blue button: Access My Free Trial. Decide which type of free trial best suits your needs.

OPTION A: Instantly try SeqBuilder Pro, Protean 3D, MegAlign Pro and SeqMan Pro online if:

- You want to explore just the most popular Lasergene applications ... OR...
- You don't want to download a 500 MB file ... OR ...
- You are not authorized to install software on your computer.

OPTION B: Download and install the complete Lasergene suite on your computer if:

- You need trial access to the complete Lasergene suite... AND...
- Your Internet speeds allow you to easily download a 500 MB file.

STEP 2 (OPTION A): Try Lasergene online

After completing the <u>free trial request</u>, you are asked to choose between installing the software or trying it online. If you decide to try Lasergene online, the application process continues with the step below.

Press the Start Instant Trial button on the left.

Access Your Trial Online 🛈
Try the tools in the Lasergene Molecular Biology and Lasergene Protein packages. *Does not include Lasergene Genomics.
<u>Start Instant Trial</u>
By accessing the Instant Trial, you agree to the terms of the license agreement.
Suggested Browser: Google Chrome

You will be taken to a new browser window called **DNASTAR on AppStream**. The Lasergene free trial is provided through Amazon's AppStream, a cloud service that allows users to try software without needing to install it on a local computer. You will also receive an e-mail from DNASTAR describing how to log back into your free trial once you leave it. If you do not receive the e-mail, please check your spam folder.

A progress wheel counts down the time to prepare your session—usually about 2 minutes.

16%
Your session is being prepared. The session should be available in less than 01.4°

While waiting for the session to load, you may wish to click on the original browser tab (**DNASTAR – Software for Molecular Biology**) to watch a video on using Lasergene in the cloud.

A specialized version of the DNASTAR Navigator appears:

🚱 File	Window Help	DNASTA	R Navigator
N	/hat do you want to do?		💬 <u>Suggest a workflow</u>
	Get Started		Upload data to AppStream
	Molecular Biology		Welcome to DNASTAR Lasergene on AppStream! Use the link above to
	Genomics		learn how to upload data, then use the tabs on this screen to launch DNASTAR applications. For assistance, use the links below:
	Transcriptomics	i	Getting started guide
	Protein Analysis and Modeling	1	DNASTAR technical support
	Utilities		
	DNASTAR Software for Life Scientists		

- Use the blue tabs on the left to choose a general topic of interest (e.g., "Molecular Biology," "Transcriptomics"). The workflows for that topic are displayed on the right. The **Get Started** tab links directly to this help document.
- To launch a workflow in Lasergene, click on its name.
- To see a tooltip about a workflow, hover over the name of the workflow.
- To read detailed information or see a video about a workflow, click its "info" button.

See the following topics to learn how to:

- Find and use tools for launching applications, switching windows and more
- <u>Work with data files</u> to learn how to upload your data to the cloud and download cloud results to your computer
- End a free trial session
- Return to the free trial from the same or another computer

Or click the play button below to see the same information in video format:

Find and use the tools

Near the top of the browser window is a light gray toolbar containing AppStream tools. When using your Lasergene free trial, you may find many of these tools very useful.

Tool name	lcon	Description
Launch app		Lets you choose from a list of workflows. If you choose a workflow pertaining to an already-open application, nothing will happen. If you choose a workflow pertaining to a different application, the new application will open. The original application(s) will continue to be available.
Switch windows	[[]]	If multiple applications are open, this tool toggles between displaying multiple application windows as overlapping or side-by-side.
My files		Opens the My Files folder containing all of your cloud files. For more information, see <u>Work with data files</u> .
Clipboard	ſ	This tool and its two sub-options are not supported in the Lasergene free trial.
Settings	Ô	This tool offers four options, none of which are necessary or recommended as part of the free trial.
Enter fullscreen mode	R ^M	To open the free trial in full screen mode. Once in full screen mode, you can access the tools by hovering the cursor near the center-top of the screen. To return to normal mode, click the Exit fullscreen mode tool () or press the Esc key.
Toggle multiple monitors	ĴŌ	To toggle between displaying the free trial on different monitors, when more than one monitor is in use.
		This tool, located to the right of the other tools, provides two options:
Profiles		 Send feedback – Opens the DNASTAR <u>Contact us</u> page. End session – To <u>end the current free trial session</u>. To return to the free trial once you have left the session, see <u>Return to the free trial</u>.

Work with data files

The "My Files" file explorer lets you see all of the files on your free trial cloud-space. These files consist of the Lasergene demo data files, files you have <u>uploaded from your own computer</u>, and files created in the course of using your Lasergene free trial.

The initial file structure consists of two folders, one of which contains two subfolders:

- Home Folder This folder and its subfolders are the only places to which you should save or upload data. Storing data anywhere else will result in the data being lost after you leave the cloud session. The two subfolders are:
 - Lasergene Data Contains all of the data needed to follow the SeqBuilder Pro, Protean 3D, MegAlign Pro and/or SeqMan Pro <u>tutorials</u> on the DNASTAR website.
 - SAVE HERE The location in which you should save results files and upload data from your computer.
- **Temporary Files** The storage location for temporary files created by Lasergene applications in the course of performing analyses. We recommend that you do not open or use this folder.

For information on working with data files, see the following topics:

- Open files in a Lasergene application
- <u>Save Lasergene application results</u>
- Use the cloud file explorer
- Create a folder in the cloud
- <u>Upload files to the cloud</u>
- Delete files from the cloud
- Download a cloud file to your local computer
Open files in a Lasergene application

To open files in a Lasergene application:

While using the online free trial, you can only access files located in the online file explorer, "My Files". These files include the Lasergene demo data plus any files you have uploaded to the file explorer. You cannot directly open files located on your local computer.

Using the **File > Open** command from within a Lasergene application takes you directly to the **Home Folder**.

	SeqBuilder Pro
File Edit Features Enzymes Sequence Cloning Priming Format View	w Net Search Tools Window Help
😂 Open File	×
(a) (b) ¬ ↑ (b) (b) (c) (c) (c) (c) (c) (c) (c) (c) (c) (c	Search Home Folder 🔎
Organize 🔻 New folder	iii 🕶 🔟 🞯
Name	Date modified Type
 Downloads Home Folder SAVE HERE Temporary Files 	3/20/2019 4:53 PM File folder 3/20/2019 3:54 PM File folder
۲ اا	>
File name:	All Known Formats Open Cancel

- Lasergene demo data is located in the Home Folder > Lasergene Data folder.
- Data <u>uploaded from your local computer</u> or data saved while using your Lasergene free trial should be located in the Home Folder > SAVE HERE folder.

Save Lasergene application results

To save results from a Lasergene application:

When using a command like **File > Save** from within a Lasergene application, save the file to the **Home Folder > SAVE HERE** folder or to a sub-folder that you created in that location.

0										SeqBuilde	r Pro		
Fi	le Ed	dit Fe	atures	Enzymes	Sequence	Cloning	Priming	Format	View	Net Search	Tools	Windo	w Help
6						9	Save As						x
	€	۵ -	↑ I]] « Hom	ne Folder 🔸	SAVE HERE		~ ¢	S	earch SAVE H	ERE		٩
	Orga	anize 🔻	N	lew folder								≡ ▼	0
Ŀ	j 🛄	This P(2		Name		•		0	Date modified		Туре	
		Down Hom Tem	nloads e Folde porary F	er Files			No ite	ems match	n your s	earch.			
L				<				II					>
		Fil Save	e name as type	: test : SeqBuild	der Pro (*.sbo	l)							>
	ا ک	lide Fol	ders							Save		Cancel	

You can also save in the Lasergene Data folder, though this is not recommended.

If you save your results to any location outside the **Home Folder**, the files will be deleted when you leave the session.

Use the cloud file explorer

To open the cloud file explorer:

Press the **My Files** tool () near the top left of the **DNASTAR on AppStream** tab. The file explorer contains two folders: **Home Folder** and **Temporary Files**.

My	Files		
	Select a folder to view files		
	Name	Last Modified	Size
	Home Folder	3/19/2019, 5:13:57 PM	-
	Temporary Files	3/19/2019, 5:14:14 PM	-

To navigate "downward" to a subfolder or file:

Single-click on the name of the folder you wish to open.

To navigate "upward" to a parent folder:

Click on the left arrow in the blue bar at the top of the file explorer.

Му	Files		
Home Folder			
Ν	ly Files Name		
	Lasergene Data		
	SAVE HERE		

The absence of a left arrow indicates that you are already in the uppermost parent folder.

Create a folder in the cloud

Creating data folders in the cloud is optional. However, you may wish to create folders to better organize your input and results files in the **SAVE HERE** folder.

To create a new folder in the cloud:

- 1. Open the cloud file explorer by clicking the My Files tool ($\stackrel{\blacktriangleright}{\longrightarrow}$).
- 2. Navigate to the folder *Home Folder > SAVE HERE" or any of its user-created subfolders.
- 3. Press the **Add Folder** tool (Add Folder) in the blue bar at the top of the file explorer, then type the folder name into the text box.

My	Files		
<	SAVE HERE	Ado	l Folder
	Name	Last Modified	Size
	IMPORTANT.txt	3/20/2019, 10:54:32 AM	91.0 byt

4. Press the Enter key.

Upload files to the cloud

To transfer one or more files from your local computer to the cloud:

- 1. Open the cloud file explorer by clicking the My Files tool ($\stackrel{\frown}{\sim}$).
- 2. Navigate to the folder **Home Folder > SAVE HERE** or any of its user-created subfolders.
- 3. Once a file has been uploaded to the cloud, you cannot move it to a different folder. Therefore, you

should navigate to and open the desired folder, then press the **Upload Files** tool (**Upload Files**) in the blue bar at the top of the <u>file explorer</u>.

- 4. Navigate to the file(s) of interest, select them, and press **Open**. A progress wheel shows the progress of the upload. At the completion of the upload, the file(s) will be displayed in the file explorer.
- **Note:** If you upload the same file to the same location multiple times, it will be uploaded and saved each time with a parenthetical number suffix, e.g., "test(1).seq".

Delete files from the cloud

Once you have uploaded a file or folder to the cloud, you can delete it any time.

- Start in the Navigator and choose Window > Open Home Directory. This launches the Windows file explorer.
- 2. Navigate to the file or folder location. We recommend that you not delete the upper-level default directories named **Home Folder** and **Temporary Files**. Instead, to remove files or folders that are in these directories, open the directory and select the files/folders you wish to delete.
- 3. Right-click on the files/folders you wish to remove and choose **Delete**.
- 4. You will be prompted to confirm whether or not you wish to delete the file.



Download a cloud file to your local computer

To download files or folders from the cloud to your local computer:

- 1. Open the <u>cloud file explorer</u> by clicking the **My Files** tool ($\stackrel{\triangleright}{\sim}$).
- 2. Navigate to the location of the file, which should be in the folder **Home Folder > SAVE HERE** or any of its user-created subfolders.
- 3. Do either of the following.
 - · Click the name of the file you wish to download.
 - Click the downward-facing arrow to the right of the filename and choose **Download**.

test.sbd	3/20/2019, 12:57:31 PM	241.1 kB	~
			⊥ Download ∠ Rename

4. In the ensuing dialog, choose **Save File** and press **OK**.

Opening Ecoli DH10	DB.seq	×
You have chosen t	o open:	
🖹 Ecoli DH10B	seq	
which is: DN	IASTAR DNA Sequence File (4.5 MB)	
from:547e	841739da41192469878654e4d26.amazonappstream.com	
What should Firef	fox do with this file?	
○ <u>O</u> pen with	SeqBuilder Pro (default) ~	
Save File		
✓ Do this <u>a</u> uto	matically for files like this from now on.	
Settings can be ch	anged using the Applications tab in Firefox's Options.	
	OK Cancel	

The file is automatically saved to the default download location on your local computer.

If you are using a browser other than Google Chrome AND have popups disabled, you will instead receive this message from AWS AppStream:



Follow your browser's instructions (usually located near the top of the browser window) to enable popup messages and begin the download.

* Note: If you have an earlier copy of Lasergene installed on your computer, another alternative exists. You can use **Open with** to open the file in the locally-installed version of the application shown in the drop-down menu.

End a free trial session

To end an instant free trial session:

Closing the free trial browser window does not end your cloud session.

Instead, do any of the following:

• Use the **Profiles** tool near the upper right of the window and choose **End Session**.



- Stop using your Lasergene free trial for 2 hours. The session will end automatically.
- Use your Lasergene free trial for 12 hours in a row. At this point, you will receive a warning and the session will close shortly thereafter.

After the session ends, you will see the following message:



Thank You!

Your session has ended.

To log back in, please check your e-mail.

To resume using the Lasergene software, see Return to the free trial.

Return to the free trial

After closing your browser or closing a free trial session, you can return to the free trial using any computer with an Internet connection. You do not need to use the same computer you used when you first used the free trial.

OPTION A: Use the link in the e-mail that DNASTAR sent you when you applied for the free trial

- 1. Locate the e-mail from DNASTAR. If you did not receive the e-mail, please check your spam filter.
- 2. Click the link "Click here to get started".

Get started with your DNASTAR trial software



Thank you for requesting a free trial of DNASTAR Lasergene. You have been authorized for a fully functional 14-day trial version.

You can access the trial one of two ways: online using our instant trial, or locally by downloading to your computer.

Click here to get started

3. Click **Accept and Start Instant Trial**, then follow the <u>same steps you used when beginning the free</u> <u>trial</u>.

Click this link!

OPTION B: Create a DNASTAR account and enter through your "My Account" page

1. Go to the DNASTAR login page and click the link Forgot your password?.

Log In	
Email:	
Password:	Forgot your password?
	Log in

2. Enter the e-mail that you used when you applied for the free trial and click **Reset Password**.

Password Reset		
Please enter the email address associated with your account to have a		
new password emailed to you.		
Email:		
Reset Password		

- 3. Check your inbox for an email with your newly-assigned DNASTAR password.
- 4. Return to the <u>DNASTAR login page</u>. Enter the email address and password from the email and press **Log In**.
- 5. Click the Lasergene Instant Trial button on the top right.



6. Click on the free trial link to return to the free trial.

Keyboard shortcuts for Mac users

Because AppStream is Windows-based, Macintosh free trial users should note that shortcuts use the **Control** key instead of the **Command** key. To copy text, for instance, both Windows and Macintosh users should use **Control+C**.

If you later purchase Lasergene, the commands in the installed version of Lasergene will be the traditional ones used for these two operating systems.

Print from a Lasergene application on the cloud

While using a Lasergene application on the cloud, you may wish to use the **File > Print** command.

Since network discovery is disabled in AppStream (the Amazon application that powers the Lasergene free trial), however, there are only two printer options: **DCV Printer** and **Microsoft XPS Document Writer**.

DCV Printer is similar to the **Print to PDF** command found in many other applications. Choose **DCV Printer** to create a PDF from the selection and open it in a new tab. You can then print the PDF from your browser.

STEP 2 (OPTION B): Install Lasergene on your computer

When <u>applying for a Lasergene free trial</u>, you are asked to choose between installing the software or trying it online. If you decide to install it, the application process continues with the steps below.

On the right side of the web page, press **Download OSX** (Macintosh users) or **Download Windows** (Windows users).



IMPORTANT: Follow the rest of the procedure below, but be sure to leave the "Free Trial" browser window open. As shown above, it contains the **Product Key** you will need to authorize your free trial installation.

If a save dialog appears, choose **Save File**.

The Lasergene installation file will will be saved to your default download location and—at nearly 500 MB in size—will likely take several minutes to download completely. If the download hasn't completed within 5-10 minutes, we recommend that you try the download again using one of our global host sites. Scroll to the bottom of the Free Trial page and choose your location to get started.



Once the installation file has completely downloaded, follow the Lasergene installation instructions for <u>Windows</u> or <u>Macintosh</u>, beginning with Step 2.

When the installation has finished, the DNASTAR Navigator will appear. The following brief video shows how to use the Navigator to find and launch the software for your workflow of interest.