

How to install the Novell Client for Linux.

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Applies To:

- Novell Linux Desktop 9
- SUSE LINUX Professional 9.3

Introduction:

There are three supported ways for installing the Novell Client for Linux (NCL). These three methods are via a Terminal, Yast2, or Red Carpet. We will go over each one individually so that you can determine which one fits your needs.

Solution:

**** IMPORTANT **** Please read though the "Preparing the Workstation" section before moving on to any of the installation sections.

Preparing the Workstation

If you are running Novell Linux Desktop (NLD) 9 Support Pack 2 (due out in July 2005) then you can skip directly to the installation section. There are a couple of easy tests that you can perform to verify whether or not Support Pack 2 (SP2) is installed on your system. If you are running SUSE LINUX Professional (SLPro) 9.3, or a build of NLD that is prior to Support Pack 2, then you will need to prepare your workstation before you can install the Novell Client for Linux.

The reason for this is that there is a kernel module called `novfs` that is required for NCL. We were able to get this built into the kernel for NLD 9 Support Pack 2 because it had not yet shipped. This was not the case with SLPro 9.3 there are no full Support Packs that are built for SLPro. Therefore the kernel module is scheduled to be built into the next version of SLPro.

There are currently two builds of the Novell Client for Linux that cover our currently shipping desktops for Novell. One is for Novell Linux Desktop 9 and the other is for SUSE LINUX Professional 9.3. If you are using a Novell Linux OS other than these, then you will probably have the best luck using the Novell Linux Desktop 9 build. We cannot guarantee these builds will work on any other platform.

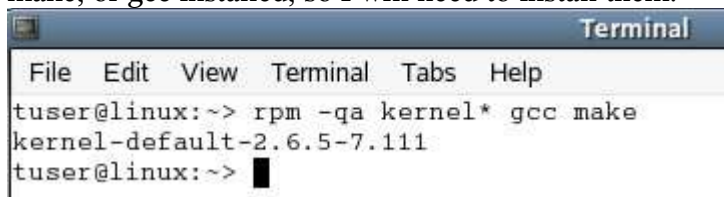
To prepare you workstation you must have three addition packages installed. These Packages are `kernel-source`, `gcc`, and `make`. They are not installed by default, so please follow one of the sections labeled "Preparing via the Terminal," "Preparing via Red Carpet," or "Preparing via Yast."

**** NOTE **** The default update mechanism for NLD 9 is Red Carpet and the default for SLPro is Yast Online Update, so Red Carpet is not installed on SLPro by default. That doesn't mean that it can't be used, it just means that you would first

need to install Red Carpet on SLPro if you were planning on updating with that solution. Either way, all three solutions are given below.

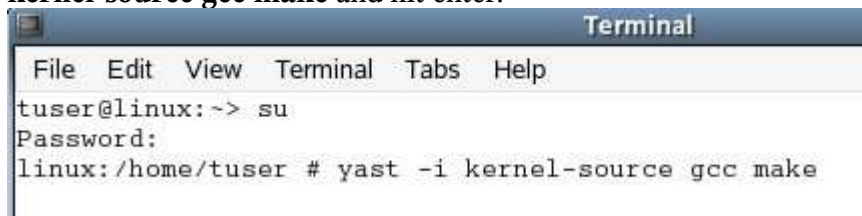
Preparing via the Terminal

1. Open a terminal
2. Check to see if your workstation has been properly prepared by typing **rpm -qa kernel* gcc make** and then hit enter. You should see a list that includes a kernel-smp or kernel-default (depending on whether you are have a single or multi processor). You may even see multiple kernels installed but we are really only concerned with the latest version. In my example I only have one kernel-default installed and you can see from the query that I do not have the kernel-source, make, or gcc installed, so I will need to install them.



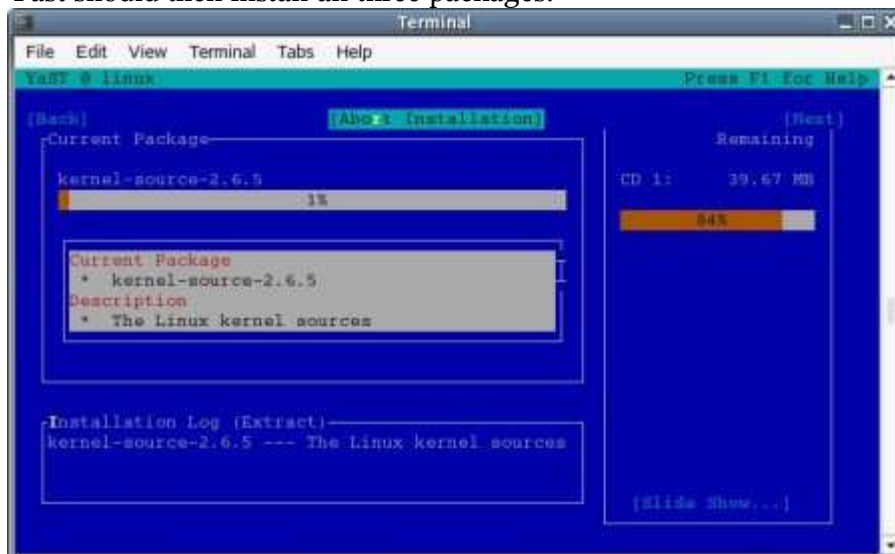
```
Terminal
File Edit View Terminal Tabs Help
tuser@linux:~> rpm -qa kernel* gcc make
kernel-default-2.6.5-7.111
tuser@linux:~> █
```

3. To install these packages you can use the **yast -i** command. You need to be root to use this command, so within the same terminal window, type **su** and hit enter. Put in roots password when prompted and hit enter. Then type in the command **yast -i kernel-source gcc make** and hit enter.



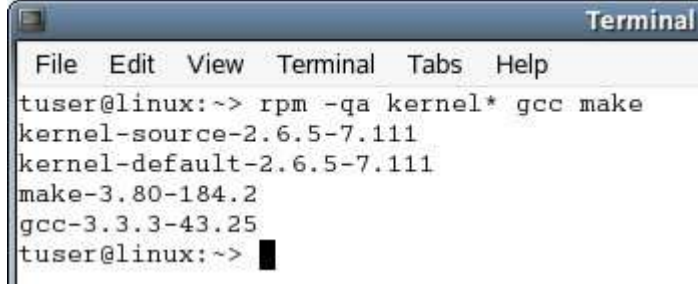
```
Terminal
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tuser@linux:~> su
Password:
linux:/home/tuser # yast -i kernel-source gcc make
```

4. Yast should then install all three packages.



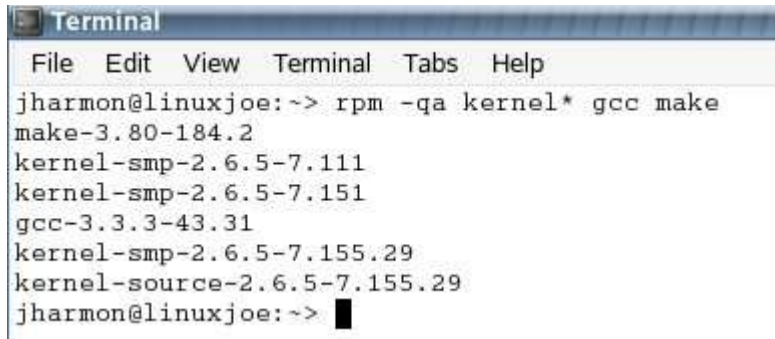
5. Once the installation is complete, run the **rpm -qa kernel* gcc make** command

again. You should now see that you have your kernel-source, gcc, and make packages installed.



```
Terminal
File Edit View Terminal Tabs Help
tuser@linux:~> rpm -qa kernel* gcc make
kernel-source-2.6.5-7.111
kernel-default-2.6.5-7.111
make-3.80-184.2
gcc-3.3.3-43.25
tuser@linux:~> █
```

6. **** CRITICAL **** In the example given in step 5, there was only one kernel installed. Depending on whether you use Yast Online Update (default for SUSE LINUX Professional 9.3) or Red Carpet (default for Novell Linux Desktop 9) you may or may not have multiple kernels installed. If you use used Yast Online Update then every time that a new kernel is installed, the old one is removed. If you used Red Carpet, then every time a new kernel is installed, the old one is kept. Whether or not there are multiple kernels is not the issue here. The problem arises if you do not match your kernel source version number to the latest version of the kernel-smp or kernel-default installed on your machine. The example from step 5 was easy because there was only one version to deal with. Given the example below (from another machine) you can see that there are three kernel-smp packages installed. Again, this is not a problem because we will only be using the latest kernel, but you must make sure that the kernel-source is the same as your latest kernel installed. In this example the latest kernel is kernel-smp-2.6.5-7.155.29, because the .155 is larger than .151 and .111. You can also see that the kernel-source package does match that kernel because it is kernel-source-2.6.5-7.155.29.



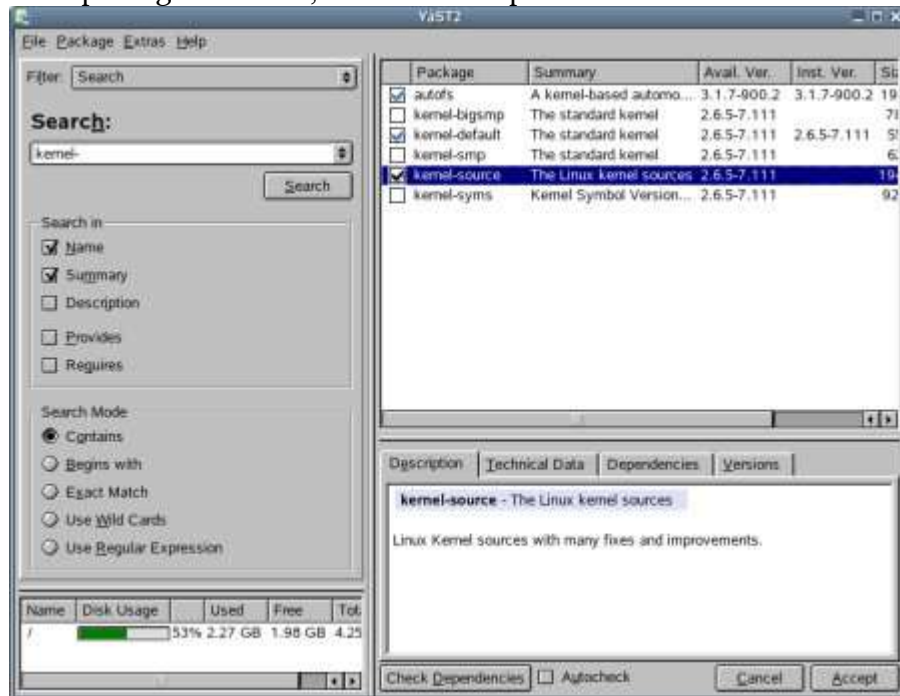
```
Terminal
File Edit View Terminal Tabs Help
jharmon@linuxjoe:~> rpm -qa kernel* gcc make
make-3.80-184.2
kernel-smp-2.6.5-7.111
kernel-smp-2.6.5-7.151
gcc-3.3.3-43.31
kernel-smp-2.6.5-7.155.29
kernel-source-2.6.5-7.155.29
jharmon@linuxjoe:~> █
```

7. If you updated your kernel (kernel-smp or kernel-default) to a newer version then you will need to reboot your workstation in order for your new kernel to take effect. If you only installed a kernel-source, gcc, or make then you shouldn't need to reboot at this time and you can move on to the installation section.

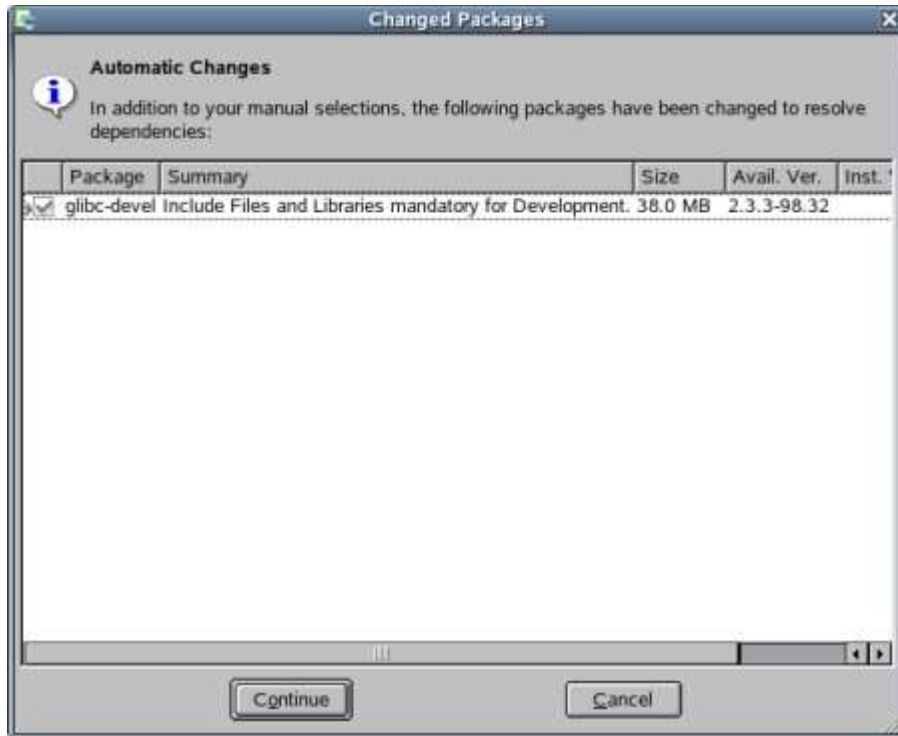
Preparing via Yast2

1. Launch Yast2 and choose Install and Remove Software.
2. We will now check to see if your workstation has been properly prepared by

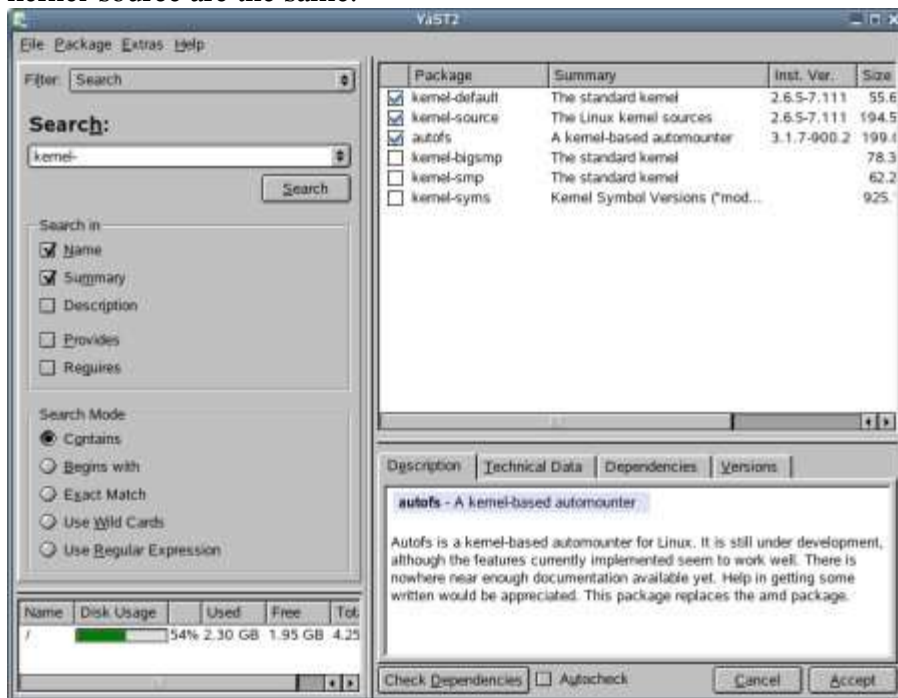
verifying that kernel-source, gcc, and make are all installed. You can do this by making sure the filter drop down is set to Search and typing **kernel-** in the search field. This should show what kernel packages you have installed. You should see a list that includes a kernel-smp or kernel-default (depending on whether you are have a single or multi processor). You may even see multiple kernels installed but we are really only concerned with the latest version. In my example I only have one kernel-default installed and you can see from the query that I do not have the kernel-source package installed. To install it I click in the box next to the package. Now change the search field from **kernel-** to **gcc** and hit enter. Check the box next to gcc. Follow the same procedure for the **make** package. Once you have all three packages selected, click the Accept button.



3. Yast2 will automatically resolve any dependencies and add any extra packages needed for the installation of kernel-source, gcc, and make. Just click Continue.



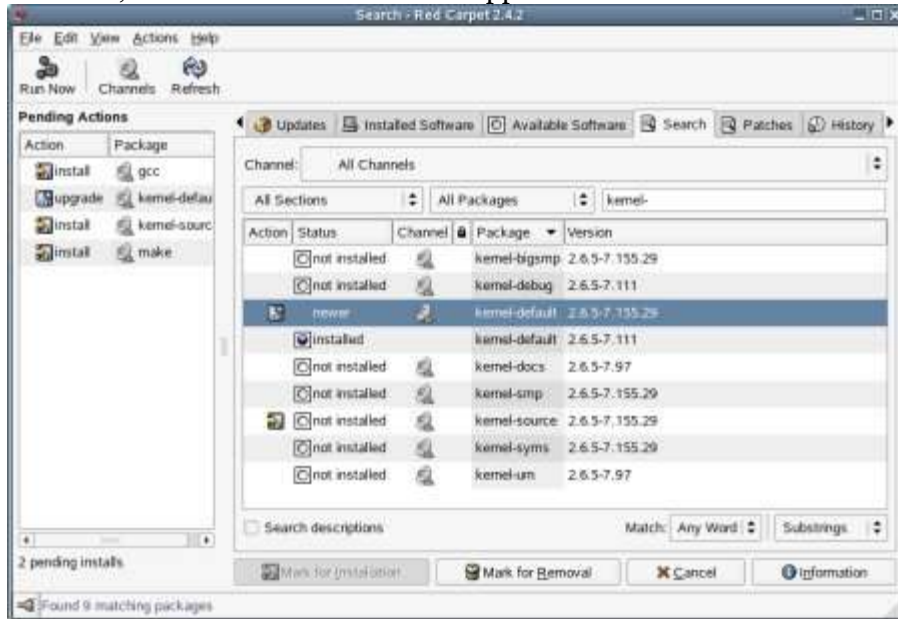
- Once the software has installed, make sure that you your kernel-smp or your kernel-default is the same version as your kernel-source. If it isn't then you will need to make sure they match by updating to the correct version before moving on to the next step. Again, you can do this by going back into Install and Remove Software and doing a search by typing in kernel- in the search field. You will notice in this example that the installed version of both the kernel-default and kernel-source are the same.



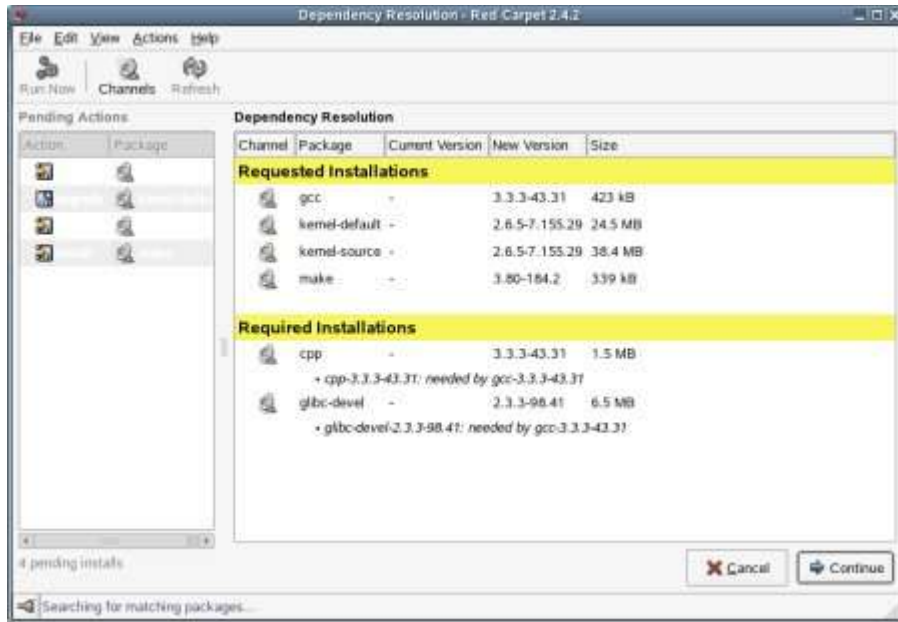
5. If you updated your kernel (kernel-smp or kernel-default) to a newer version then you will need to reboot your workstation in order for your new kernel to take effect. If you only installed a kernel-source, gcc, or make then you shouldn't need to reboot at this time and you can move on to the installation section.

Preparing via Red Carpet

1. Launch Red Carpet
2. Check to see that your workstation has been properly prepared by going to the Search tab and setting the "Channel" drop down to All Channels. In the Search field type **kernel-** and then hit enter. You should see a list that includes a kernel-smp or kernel-default (depending on whether you have a single or multi processor). You may even see multiple kernels installed but we are really only concerned with the latest version. In this example I only have a kernel-default installed, so I will need to install the kernel-source. This can be done by double clicking on the package, which in turn will prepare it to be installed. You will also notice that this example the kernel-source that I have listed as available is not the same version as my kernel-default. It is critical that these versions match, so I will also upgrade my kernel to that same version. Again, just double click on the package to have it installed. Perform this same search for the **gcc** and **make** packages and make sure they are included as well. Once your packages are ready to install, choose "Run Now" in the upper left corner.



3. Red Carpet will install any additional packages required by the dependency resolution process. Choose Continue to install the packages.



4. If you updated your kernel (kernel-smp or kernel-default) to a newer version then you will need to reboot your workstation in order for your new kernel to take effect. If you only installed a kernel-source, gcc, or make then you shouldn't need to reboot at this time and you can move on to the installation section. In my example I did update the kernel-default and therefore I do need to reboot.

Installation

Installing via the Terminal

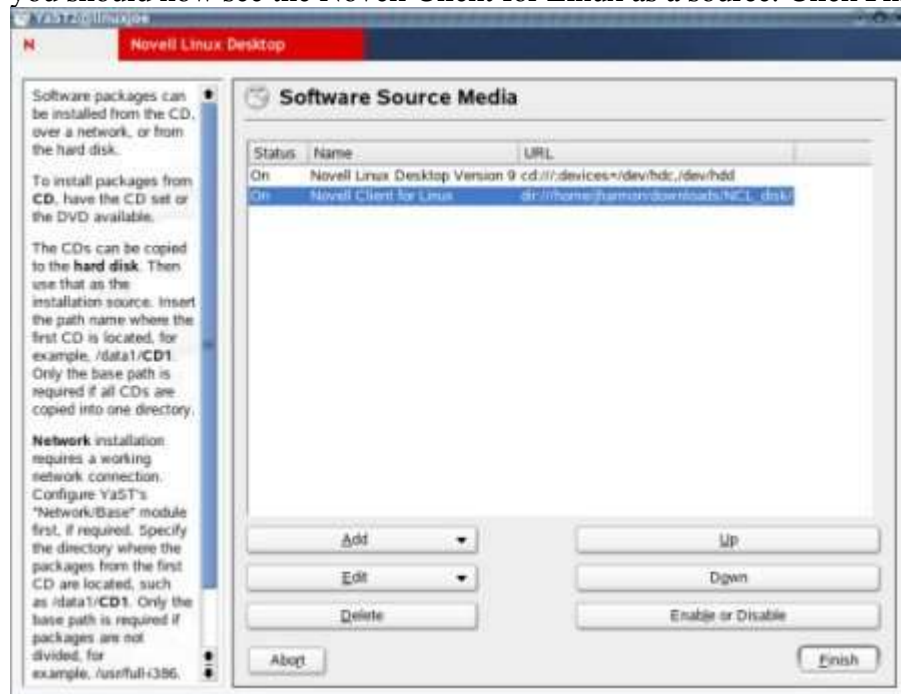
1. If you didn't read the "Preparing the Workstation" section then go back and read it before you start the installation.
2. Typically Linux users work out of their home directory because that is where they have rights. In this case we will download and extract the client to a temporary folder within my home directory. After downloading the file, change to the directory where the file was saved. You can then extract the file by typing **tar -xzf filename.tar.gz** within a terminal, where "filename" is the name of your file.
3. Now you will need to go to the source of your media. This could be a directory or CD depending on whether you extracted it or burned to a CD. Either way, you should see a file called **ncl_install**. You will need to **su** to root in order to run the installation. Then you can start the installation by typing **./ncl_install** and then pressing enter.
4. You will be prompted whether or not you wish to install the **novell-konqueror-plugin** and the **novell-nautilus-plugin**. The **novell-konqueror-plugin** is typically used with **KDE** and the **novell-nautilus-plugin** is typically used with **GNOME**.

For this example I have both GNOME and KDE installed, so I chose to install both plugins.

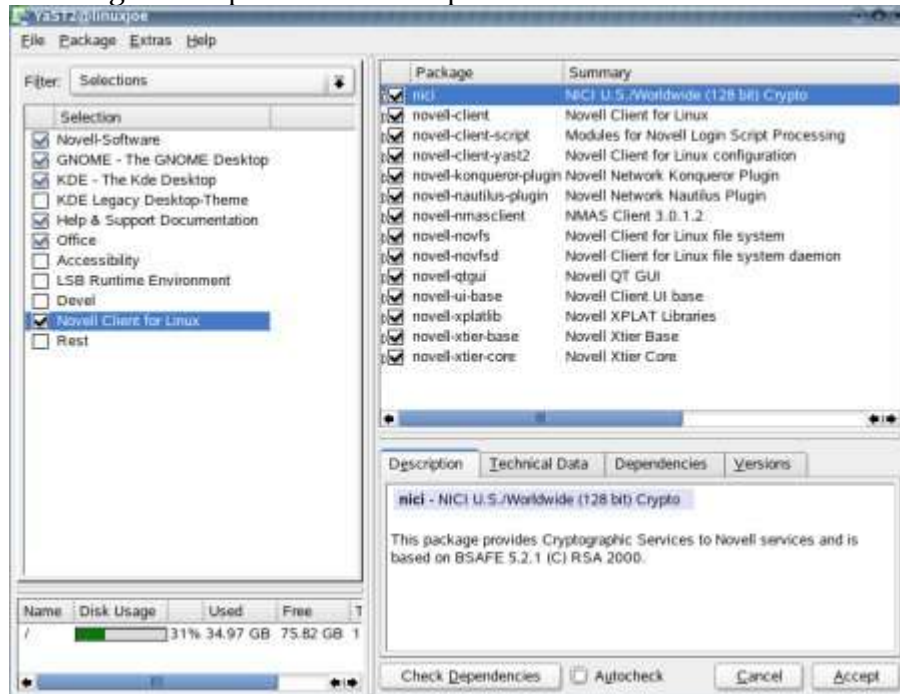
5. At the end of the installation you should see the following message: "[ncl_install] Installation of the Novell Client for Linux completed successfully." If you don't see this message then a portion of the installation failed and you will need to scroll back through the terminal window to see where it failed. If it did fail then it is suggested that you uninstall the client, resolve the issue causing the failure and then install the client again.
6. Reboot your workstation.

Installing via Yast2

1. If you didn't read the "Preparing the Workstation" section then go back and read it before you start the installation.
2. Typically Linux users work out of their home directory because that is where they have rights. In this case we will download and extract the client to a temporary folder within my home directory. After downloading the file, change to the directory where the file was saved. You can then extract by right clicking on the file and choosing the option "Extract Here." This should create a directory called NCL_disk.
3. Launch Yast and under the Software section, click on Change Source of Installation. Click on the Add drop down and choose the location of your client source. In this example I will choose local directory and browse to the location of my NCL_disk directory. If you are using a CD then just choose CD. Either way you should now see the Novell Client for Linux as a source. Click Finish .



- You should still have the Yast2 window open. Now choose Install and Remove Software under the Software section.
- Under the filter section choose Selections from the drop down menu. In the bottom left hand pane you should see a Selection called Novell Client for Linux. Check the box next to it and you will see it select all of the necessary packages on in the right hand pane. Click Accept to install.

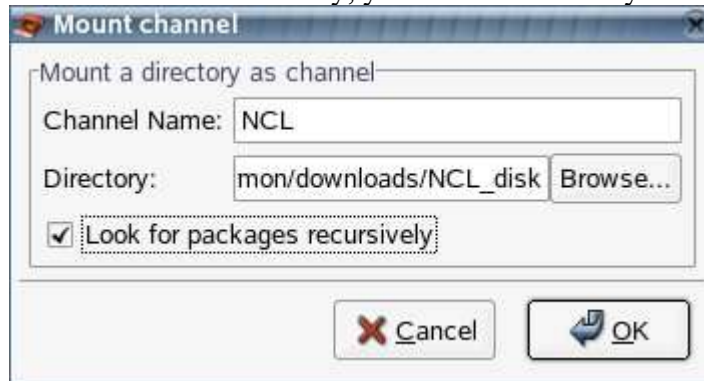


- If the installation fails at any time, you should receive errors before the installation is complete. If you receive an error during the installation, be sure that you click on the details button. If the error is "error: cannot get exclusive lock on /var/lib/rpm/Packages..." then most likely Red Carpet had the database locked. If you try the installation again it should go through. If it is any other error message then you will need to troubleshoot the problem.
- After your packages installed successfully, reboot your workstation.

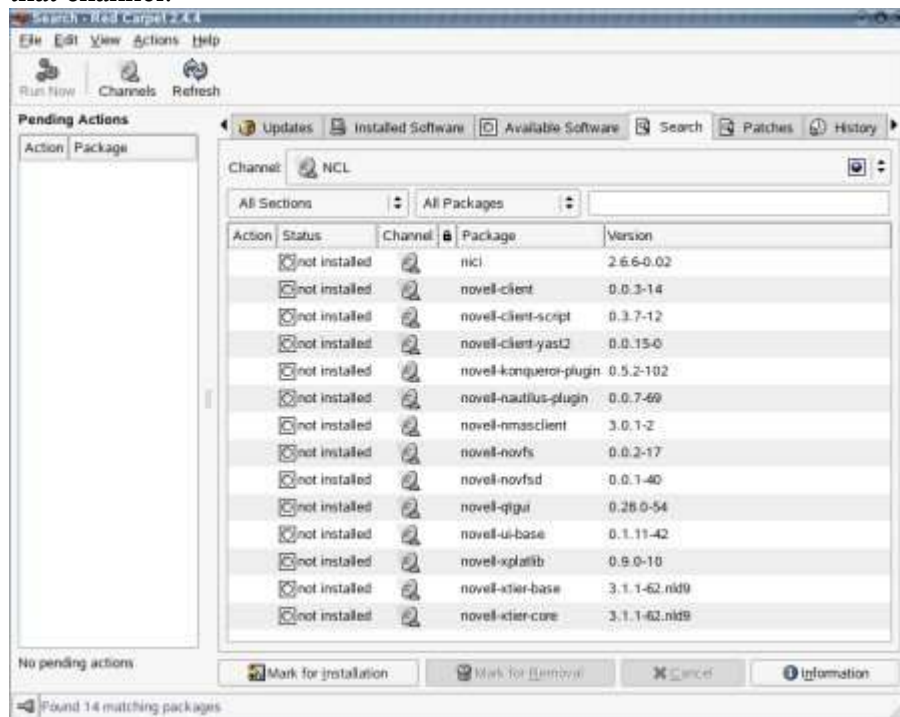
Installing via Red Carpet

- Launch Red Carpet.
- If you are subscribed to a Red Carpet service that has the client available then you can just click on the Channels button and select the channel that contains the client packages. If you downloaded the client and want to create a channel on your local machine then you can choose File | Mount Directory. In the dialog box put in the name of the desired channel. In this example we will just call it NCL, but it can be whatever you want to call it. Now click on the browse button and browse out to either the CD media or the local directory where the client was extracted. Be sure that you check the "Look for packages recursively" option.

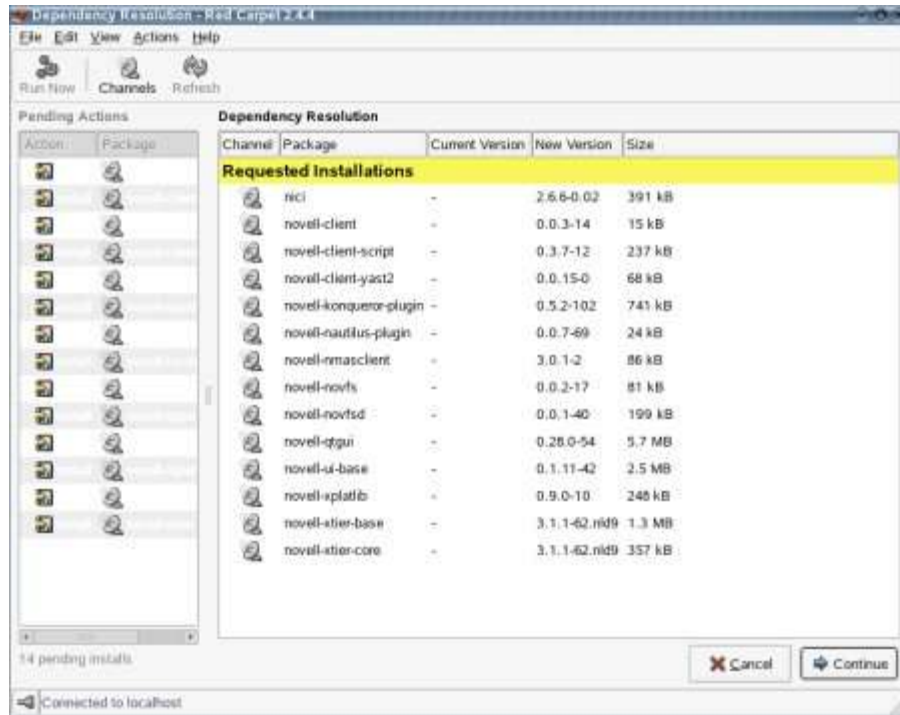
Then click OK. You don't need to subscribe to the channel because anytime you mount a channel manually, you are automatically subscribed.



3. Now go to the Search tab. In the Channel section choose NCL (or what ever you decided to name it). You should now see a list of all the packages available for that channel.



4. Either choose Edit | Select All, or press CNTL A to select all of the files in that channel. Then choose Mark for Installation. Then press the Run Now button in the upper left hand corner. The press continue in the bottom right hand corner.



5. Once the installation is complete, reboot your workstation.