

SEP Sesam Quick Start



Global Storage Management

Version 1.2

Linux Guide

This guide will jumpstart your SEP Sesam deployment by walking you through the basics of installing the SEP Sesam server, clients, and configuring a backup and restore task.

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System Requirements:

The following are the minimum requirements for using this version of SEP Sesam.

Item	Description
Processor	Microsoft 500mhz Linux 500mhz
Memory	64 MB RAM
Hard Disk	500 MB
Server Operating system	Windows 2003/2008/7, Linux above kernal 2.1, Sun Solaris v 2.7 and above, FreeBSD 7 and above. SLES 8 and Above.
Software	SUN JAVA 1.6 or higher for the backup server install or any system running the GUI. For x64 installs, Postgre SQL database will need to be set up prior to SEP Sesam installation.
DNS	Forward and reverse resolution has to work for both server and clients. Note: This is also required for the use of Remote Media Pools.
Helpful Resources	http://sepusa.com/getwiki/Main_Page

Java Installation:

Java is needed for any device running the SEP GUI. This can be installed via a package management system such as apt-get or YaST, or downloaded from <http://www.java.com>.

DNS:

SEP Sesam uses network resolution to communicate between server and client. It is highly recommended to test DNS before any installation. This is best accomplished with a simple ping check by both long and short name from server to client and back.

Server firewall:

It is recommended to disable the firewall on the server to avoid problems during installation of SEP Sesam. Once the system is installed and fully operational the firewall is safe to be re-enabled with exceptions made for the SEP Sesam services.

SCSI Configuration:

Verify that any SCSI devices in use are compatible with the operating system selected for install. SEP Sesam will only see devices detected by the operating system.

Download and Install SEP Sesam software:

Download:

SEP Sesam server and clients can be downloaded from <http://sepusa.com/downloads> . To access the available software you will need to create a free account.

Current User login or Create a new Account to Download a fully functional 30 day trial then Request a License extension.

 Linux 2.0+ Debian, Redhat SuSE, Generic	 Microsoft Windows NT, 2000,XP,03,08	 Novell Network Netware 5+,OES,OES2 OES-Linux, OES2-Linux
Novell/SuSE (32) (64) RedHat (32) (64) Debian (32) (64) Other (32)	(32 bit) (64 bit)	Novell/SuSE (32) (64) Sesam - Novell TSA Client for Linux

Download the correct server software for the operating system selected, as well as clients for any system that are to be used.

NOTE: For Novell NetWare and Open Enterprise Servers, be aware that a SLES or SLES OES server will need to be used as a “data-mover” agent.

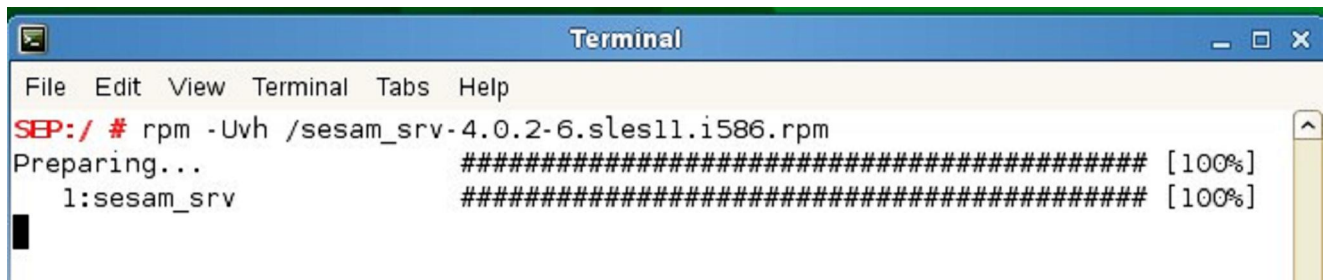
Server Installation:

To install SEP Sesam on a Linux server, root privileges are required. For RPM based systems the procedure is as follows:

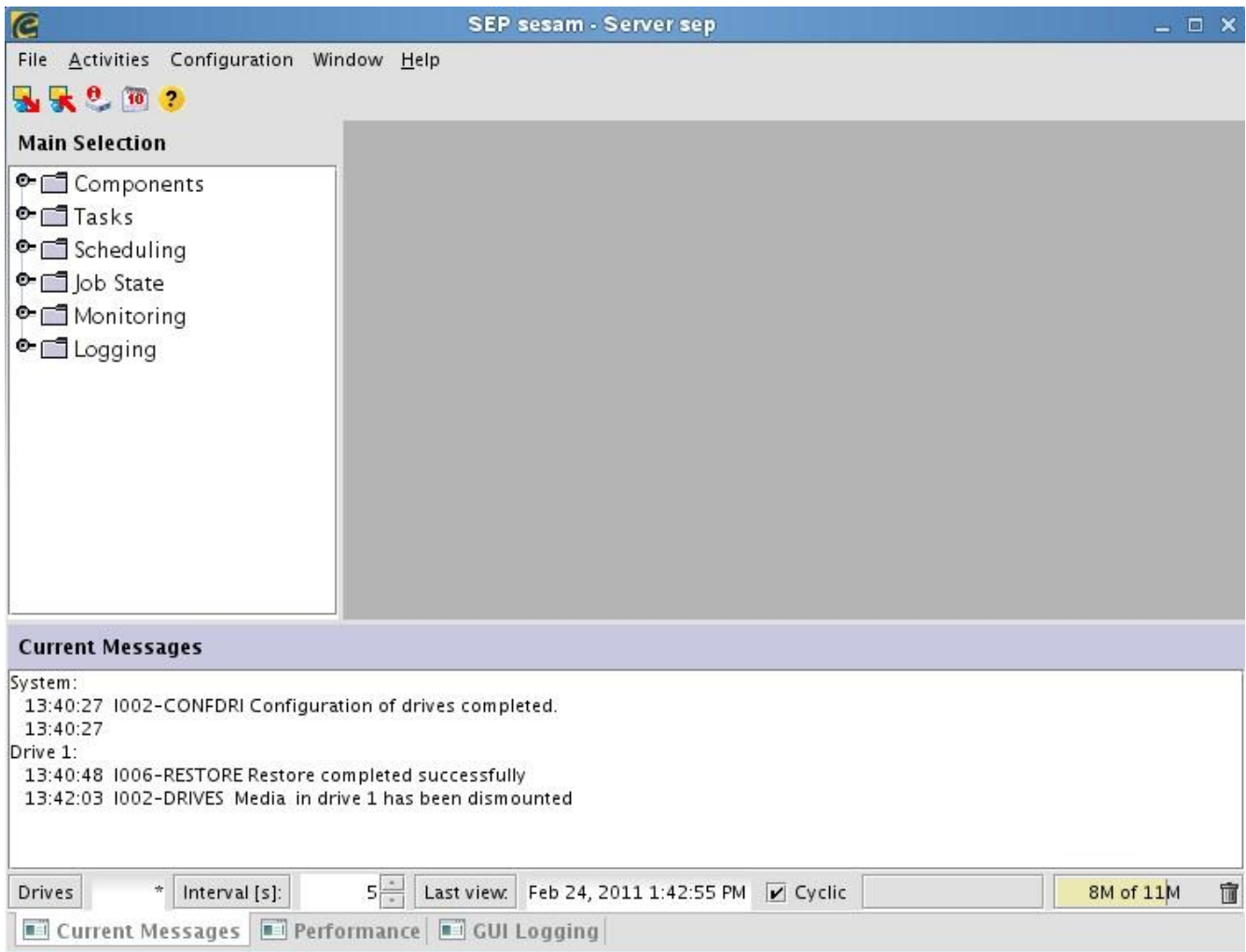
1. su to root or preface all commands with sudo
2. rpm -Uvh <file location>/Sesam_srv-4.0.Distro.rpm



```
Terminal
File Edit View Terminal Tabs Help
SEP:/ # rpm -Uvh /sesam_srv-4.0.2-6.sles11.i586.rpm
```



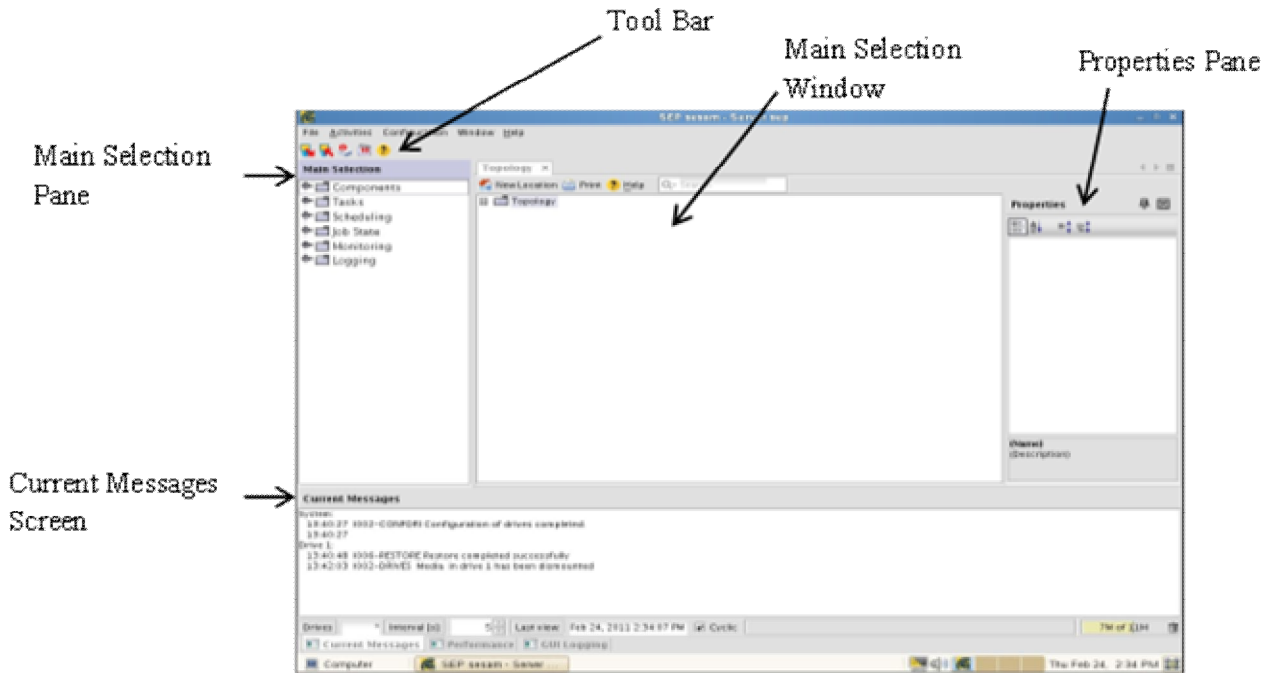
After the install finishes, the SEP Sesam GUI should start and you are now ready to setup clients and backups.



Configure SEP Sesam server and Clients:

Interface:

Now that you have set up your server and clients you are ready to configure them for use. This is a good time to take a look at the interface for SEP Sesam. Below you will see a picture of the interface for reference.

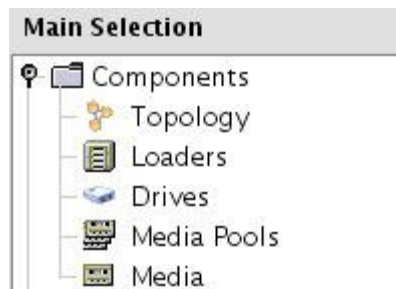


SEP Server Configuration:

Configure Storage for Use:

1. In the Main selection pane, select Loaders.
2. Select New Loader

NOTE: *SEP Sesam treats all backups as if they are going to a tape device. The Virtual "Tape loader" handles the "Virtual tapes" used to store the data.*



Create a Media Pool for the “virtual loader” to use:

1. In the Main selection pane, select Media Pools.
2. In the Properties pane, select New Media Pool.



3. In the New Media Pool window, enter a descriptive name for your media pool.
4. Select the “diskdrives” drop down menu under Drive Group and select your Virtual Loader.
5. Enter the storage path you are using. In this example “/tmp/bkup”
6. Enter the desired size of the Media Pool in MB. In this example “1000”



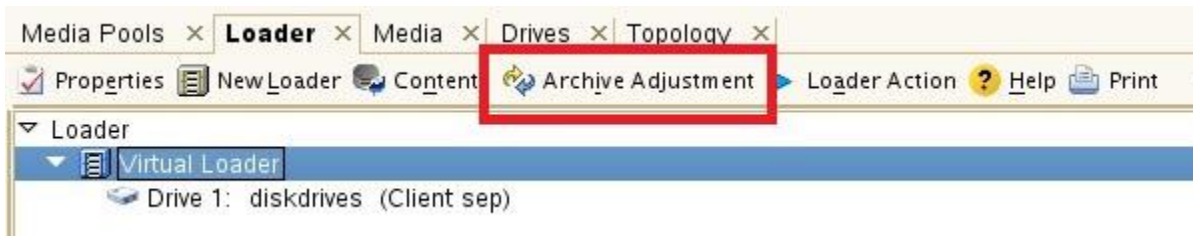
NOTE: This configures the storage but not the virtual media.

When calculating the overall size of your media pool, it is important to consider the following information. You will configure virtual media by way of selecting a Tape Type. The chart below shows the actual size of each tape type. Set the size of your Media Pool by calculating the number of tapes and the actual tape type size you plan to use.

DISK_25	25600KB
DISK_100	102400KB
DISK_200	204800KB
DISK_300	307200KB
DISK_400	409600KB
DISK_500	512000KB
DISK_1000	1024000KB
DISK_2000	2048000KB
DISK_5000	5242880KB
DISK_10000	10485760KB
DISK_20000	20971520KB
DISK_50000	52428800KB

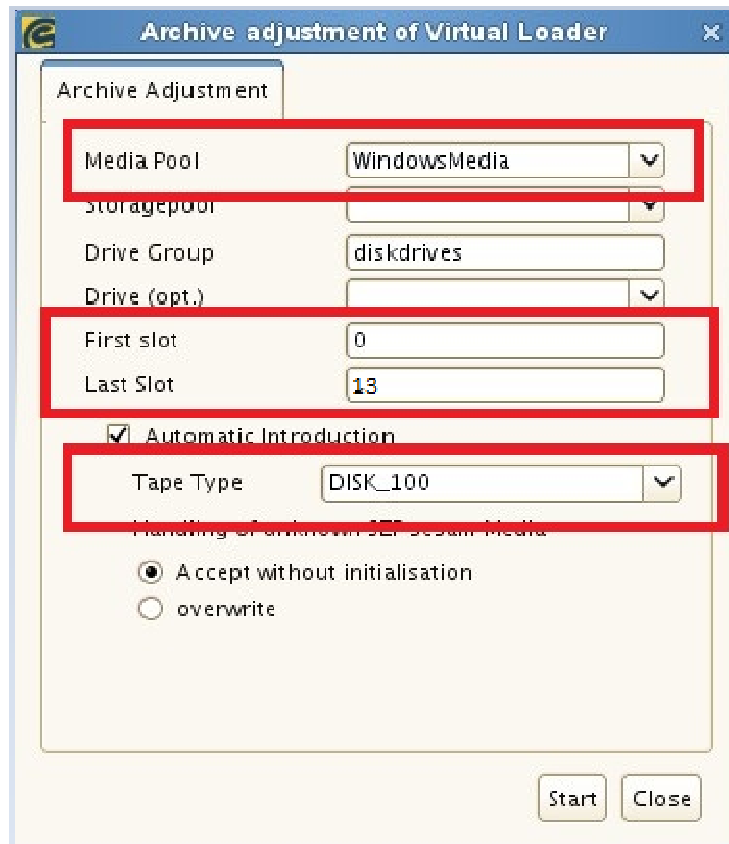
Configure the Virtual Media for use:

1. In the Main selection pane, select Loaders.
2. Select the Loader you created earlier.
3. Click on Archive Adjustment in the Properties pane.

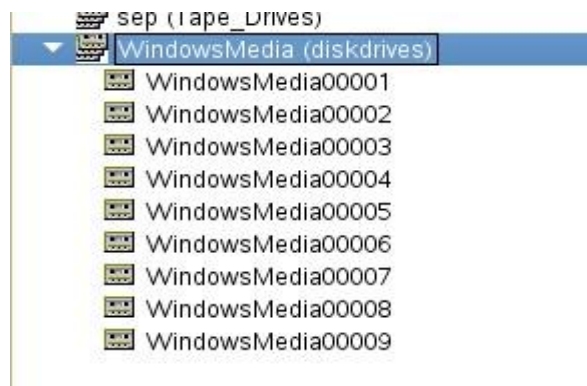


4. In the Archive Adjustment of Virtual Loader window, select your Media Pool. In this example, 'WindowsMedia'.
5. Enter '0' in the First Slot field.
6. Enter '13' in the Last Slot field.
7. Select the Tape Type drop down menu and select 'DISK_100'.

NOTE: The "slots" configure the number and size of your virtual tapes for your virtual loader. It is considered best practice to section your media pool size across several virtual tapes to ensure data aging performs properly. It is also recommended to configure 14 or more slots to allow for two weeks of data on disk.



If you look at your Media Pool, you will now see the disks you just created:



Your storage is now ready for use.

SEP Sesam Client Installation:

In this example we will install the SEP Sesam client on a Windows 2008 machine.

1. Place the installation files on the server or an appropriate network share.
2. Launch the appropriate self-extracting archive. Click allow when the Microsoft UAC appears.
3. Click "Install"



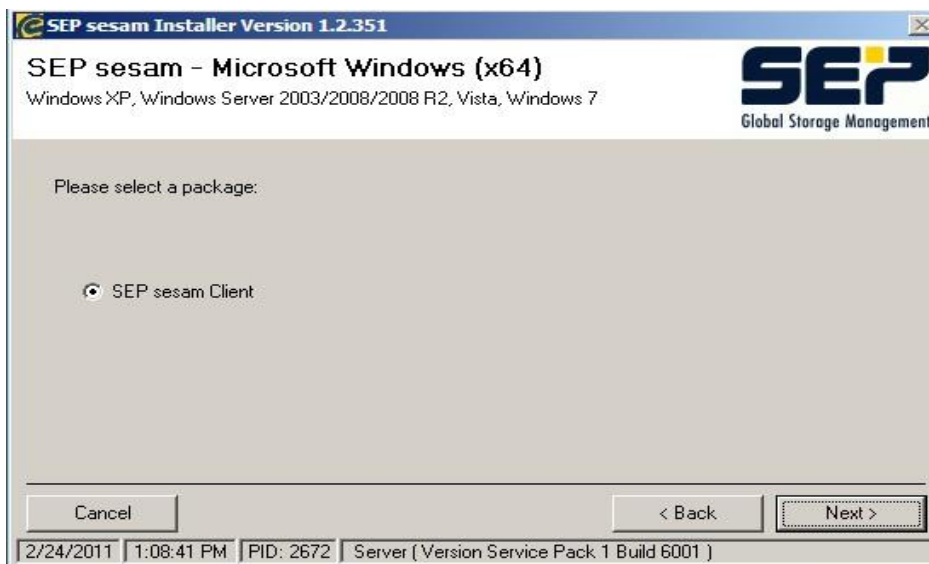
Select language preference:



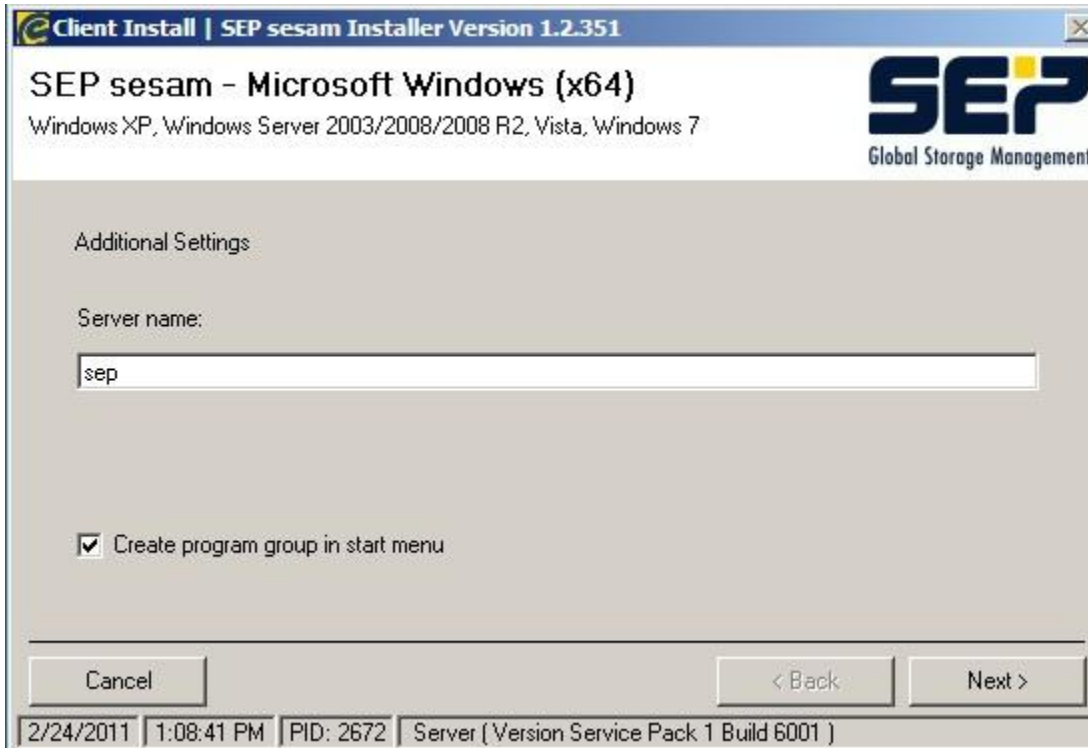
Select Next on the following screen.



After selecting the End User License Agreement, the system will then begin the SEP Sesam client installation.



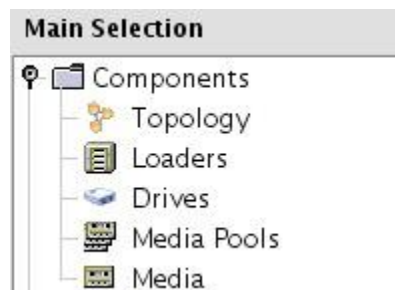
After the install is complete, enter the name of the SEP Sesam server. In some environments, it will require the FQDN be entered here.



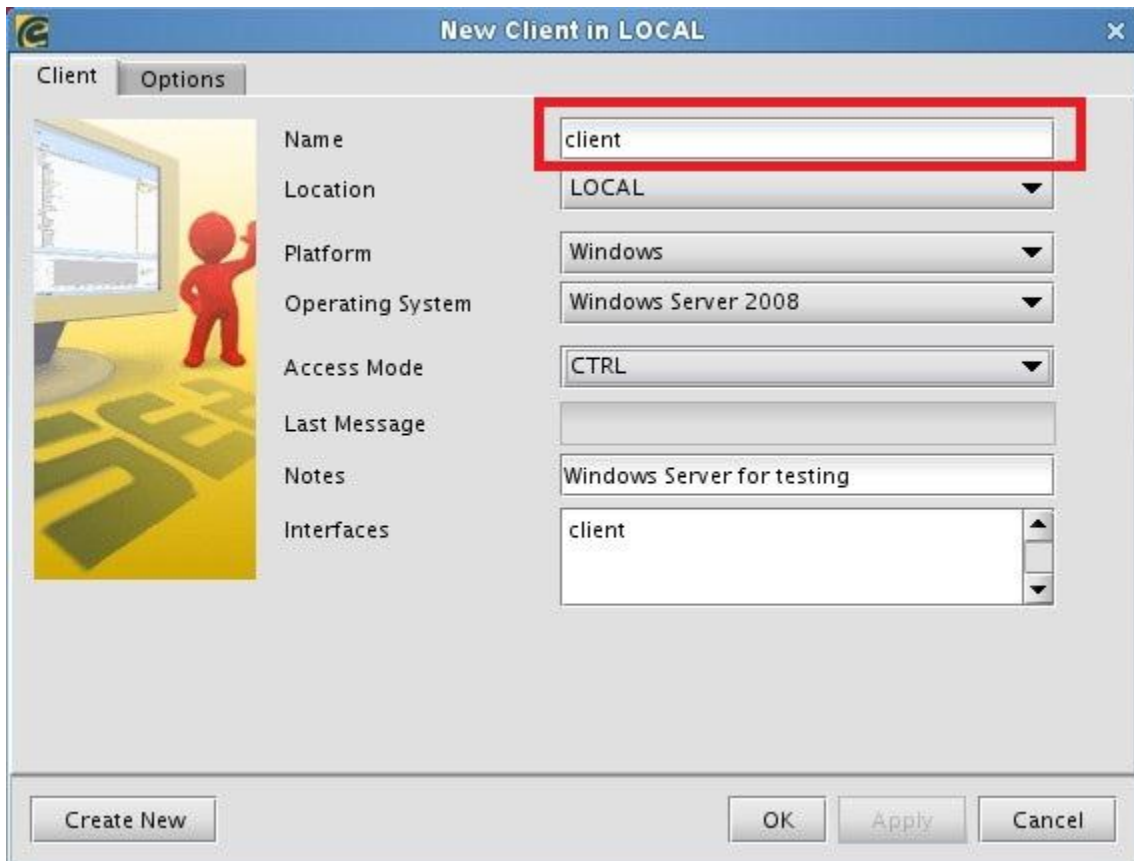
**Repeat the client installation on as many devices as you need to back up.

Add the client to the SEP Sesam server:

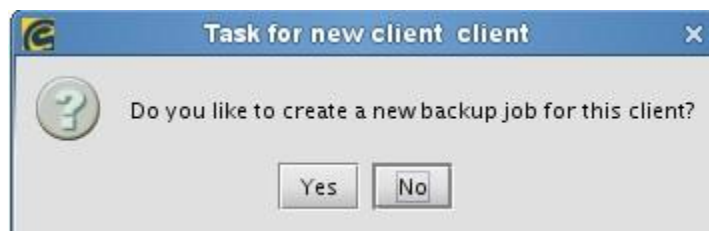
1. In the Main selection pane, select Components.
2. Select Topology.
3. In the Properties pane, expand Topology to view the sites.
4. Select New Client.



5. A New Client dialog will appear. Make the appropriate selections and click OK.
NOTE: *The Client name must be the DNS name of the system to be backed up. In this case "Client"*

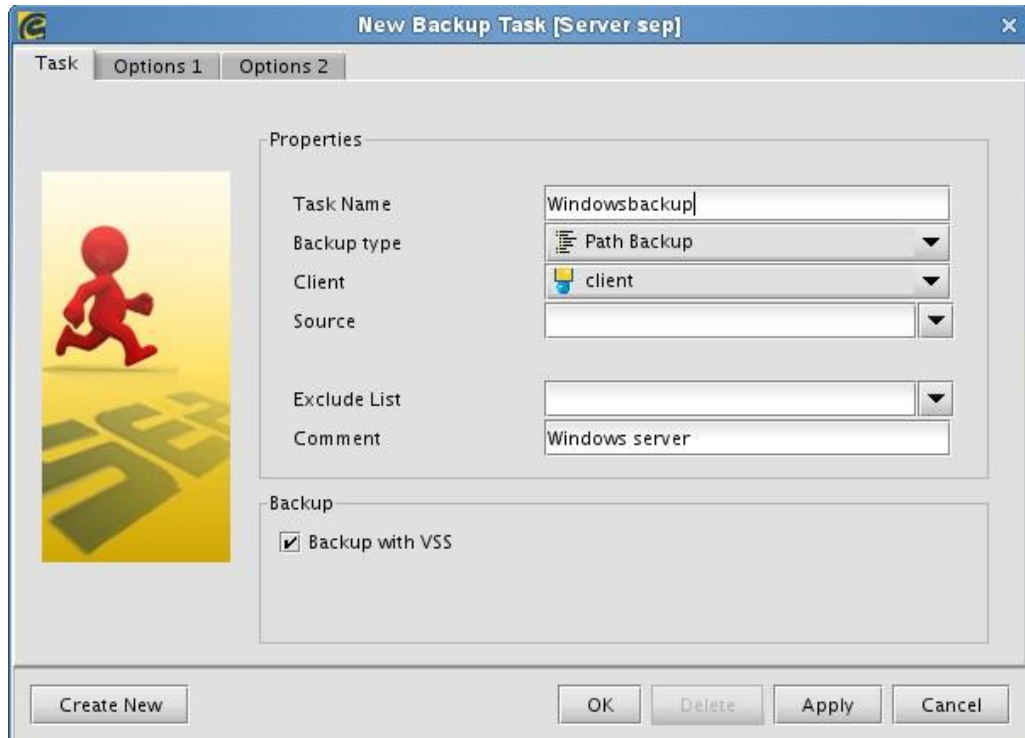


6. When prompted to Create a new backup, select Yes.

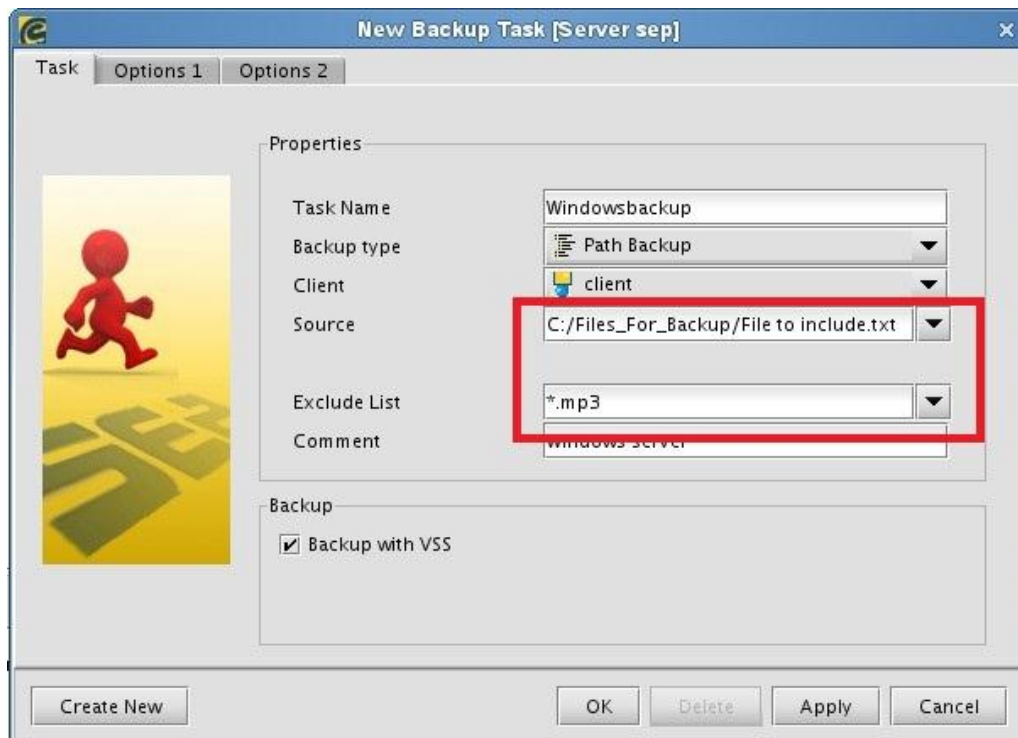


NOTE: *To create a Backup after a client is already added, Select Tasks in the Main Selection pane, select "by Clients" and click the button New Backup Task.*

7. Enter a descriptive backup name.
8. Select the Source drop down and select files to backup.
NOTE: *If you do not see the file system in this drop down, you may have a configuration issue. Check the DNS or Client configuration. Please see the SEP wiki for troubleshooting information.*

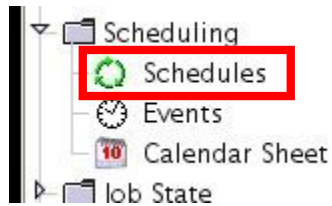


9. Select OK when finished.
10. You will now see that the Source field is now filled in with the backup path.
11. Fill in the Exclude list if necessary. This example shows *.mp3 added as an exception. Regular Expressions are supported here. For more information on Regular Expressions, visit the SEP Sesam wiki.
12. Select OK.

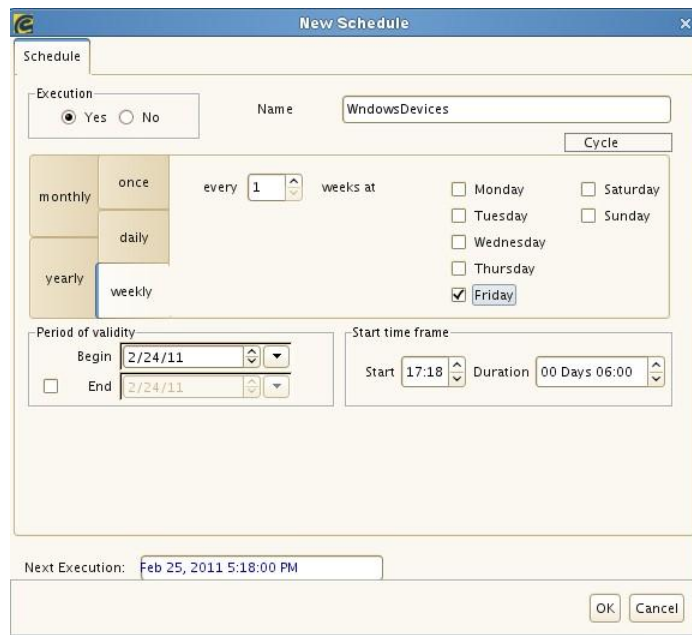


Create a schedule for your client backup:

1. In the Main selection pane, select Scheduling.
2. Select Schedules, then New Schedule.



3. In the New Schedules Window, enter the date, time and frequency of your backup.
4. Click OK to close this window.



5. Open the Schedule you just created.
6. Select the Parameter tab, in the Object section; select the Task for this event.

The screenshot shows a dialog box titled "New backup event in schedule 'WindowsDevices'". It has two tabs: "Schedule" and "Parameter". The "Parameter" tab is active. The dialog is divided into three main sections:

- Sequence control:** Includes a "Priority" spinner set to 1 and a "Blocking Date" checkbox which is unchecked.
- Execution parameter:** Includes several dropdown menus: "Backup type" (FULL), "Hot/Cold backup" (hot), "Media Pool" (DISK), "Drive Group" (diskdrives), "Drive (opt.)" (empty), and "Interface" (sep). There is also a "MEM" icon with a red arrow pointing down.
- Object:** Includes radio buttons for "Task" (selected) and "Task Group", and a dropdown menu for "client_C_Files_For_Backup".

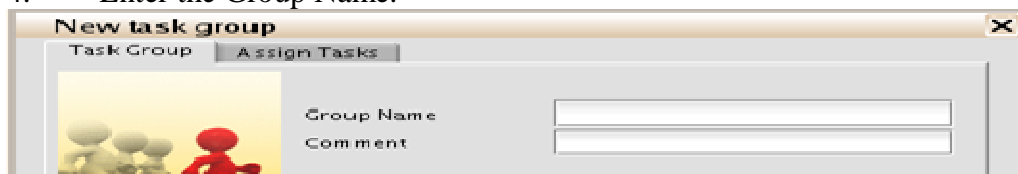
At the bottom, there is a "Next Execution:" field containing "Feb 25, 2011 5:18:00 PM" and "OK" and "Cancel" buttons.

You have now completed the creation of a backup job for a client system. Repeat these steps for each client you want to configure for backup.

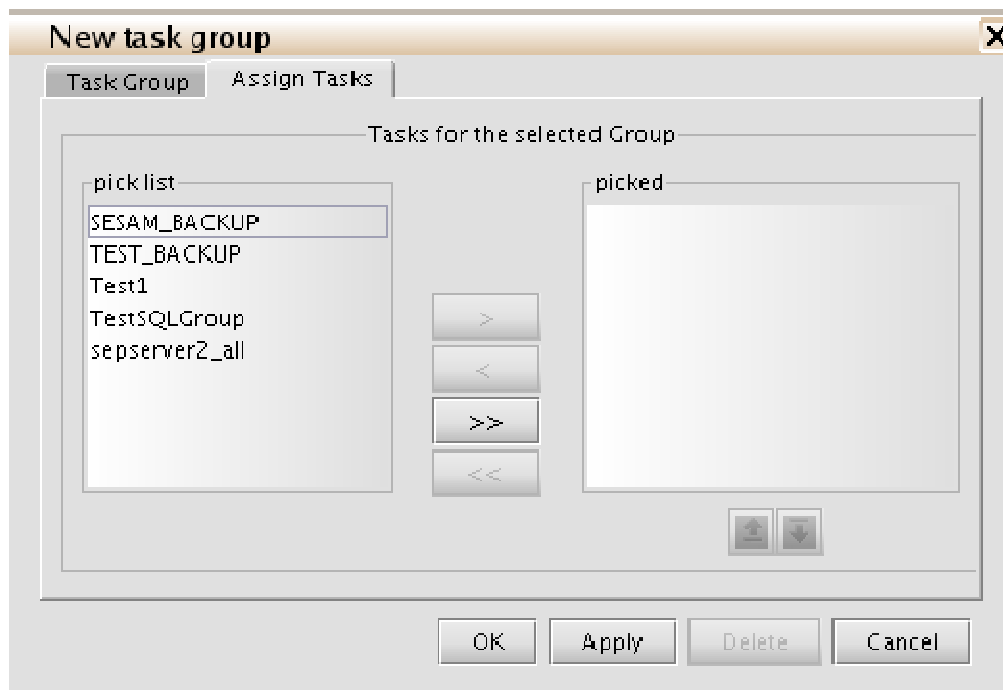
Create Groups for your backups:

You may want to manage your backup tasks by group. For example, you can group all of your SQL database backups together and then create a schedule for that group.

1. In the Main selection pane, select Tasks.
2. Select by Groups.
3. In the Properties pane, click New Task Group.
4. Enter the Group Name.



5. Click the Assign Tasks tab and select the backups you wish to include in this Group.

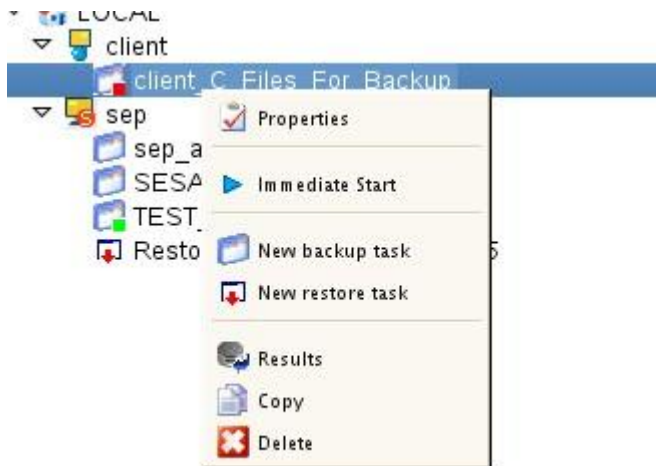


6. Click OK.
7. Next, you will want to schedule this task group by selecting Backup Plans from Tasks in the Main Selection pane.
8. Expand Task Groups, right click the task group you just created and select New Backup Event.
9. Configure the desired scheduling information and select OK.

Post Configuration Backup Testing

After configuring your backups, it is important that you test them for success:

1. In the Main Selection pane, select Tasks.
2. Expand Clients.
3. Right click on the desired client name and select Immediate Start.



To view the status of the backup you just started, expand Job State in the Main Selection pane and then choose Backups.



The example below displays both successful and unsuccessful backups.

Task	S	State	Last Full Backup	Start Time	Stop Time	Data Size	Thro
sm_startup	■	Successful		Feb 24, 2011 1:40:11 PM	Feb 24, 2011 1:40:19 PM		
sm_newday	■	Error		Feb 24, 2011 1:40:15 PM	Feb 24, 2011 5:21:48 PM	56.0 KB	
TEST_BACKUP	■	Successful		Feb 24, 2011 1:40:40 PM	Feb 24, 2011 1:40:44 PM	56.0 KB	196
INIT_DISK-1	■	Successful		Feb 24, 2011 1:40:40 PM	Feb 24, 2011 1:40:43 PM		
Windowsbackup	■	Error		Feb 24, 2011 4:46:44 PM	Feb 24, 2011 4:47:24 PM	0 B	
Windowsbackup	■	Error		Feb 24, 2011 4:54:22 PM	Feb 24, 2011 4:55:02 PM	0 B	
client_C_Files_For_Backup	■	Error		Feb 24, 2011 5:21:10 PM	Feb 24, 2011 5:21:48 PM	0 B	

Perform a Restore from backup

1. In the Main selection pane, select Tasks.
2. Select by Clients.
3. In the Properties pane, expand Clients to view the clients.
4. Right click the Client you wish to restore and select New restore task.

New Restore Task

Intro Filter **Tasks** Files Start

Search via

Task Name
 Filename or Path

Search pattern for filename or path

Task

*

Backup path

Saved in period

from to

Show external results

<Back Next> Save Cancel Help

5. From the Task drop down, select the task type you wish to use.
 6. Adjust the dates in the Saved in Period section, click Next.
 7. Select the backup that you would like to restore, check the box near the bottom that reads "complete restore of selected task" and click Next.
 8. In the Target section, be sure to select the location for the restored files.
 9. In the Execution Options section, select the desired behavior from the drop down.
 10. Click Start.
- If you return to the Job State area in the Main Selection pane, you can select Restore to see the progress of your job.