

## Exemplo 3. Aplicacións prácticas do Exemplo2

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## Exemplo 3. Aplicacións prácticas do Exemplo2

### OBRIGATORIA LECTURA. ESCENARIO

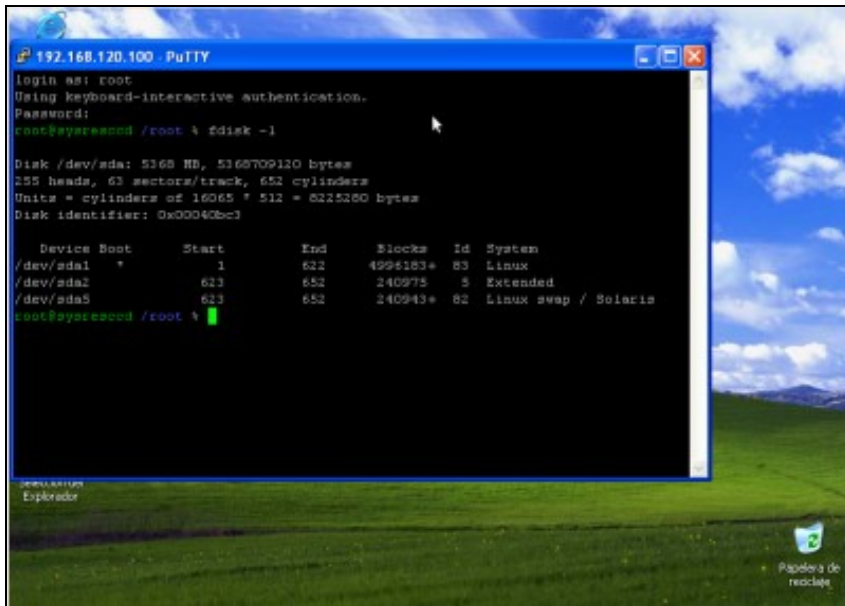
#### NOTAS:

1. Todos estes exemplos son válidos unha vez feito o **Exemplo2**
2. No **Exemplo2** o disco duro a montar na distribución Live SystemRescueCD posúe unha distribución GNU/Linux a recuperar
3. Picar nas imaxes para velas no tamaño orixinal

## Recuperación dun Sistema Operativo GNU/Linux mediante unha Xaula chroot

### Recuperar a password de root

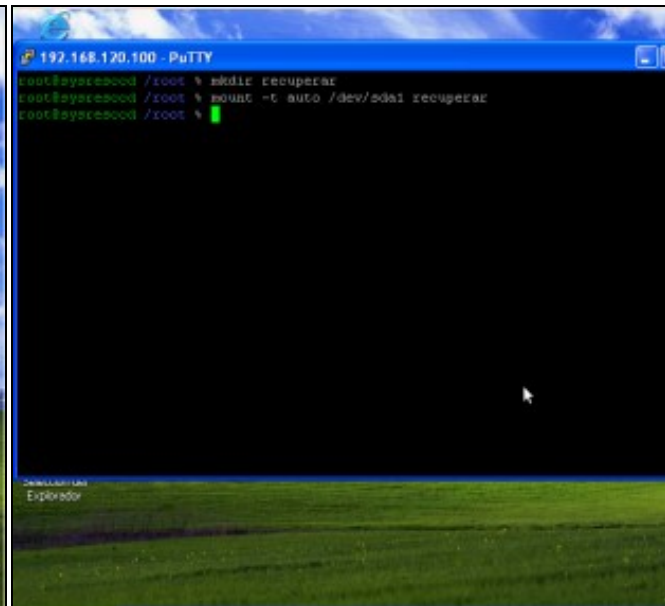
Unha vez establecida a conexión co **Servidor SSH** proceder do seguinte xeito:



```
192.168.120.100 - PuTTY
login as: root
Using keyboard-interactive authentication.
Password:
root@sysresccd /root % fdisk -l

Disk /dev/sda: 5168 MB, 5168709120 bytes
255 heads, 63 sectors/track, 652 cylinders
Units = cylinders of 16065 * 512 = 8225280 bytes
Disk identifier: 0x00040bc1

   Device Boot      Start         End      Blocks   Id  System
/dev/sda1 *          1           622     4996183+   83  Linux
/dev/sda2            623          652      240975+    5  Extended
/dev/sda5            623          652      240943+    82  Linux swap / Solaris
root@sysresccd /root %
```

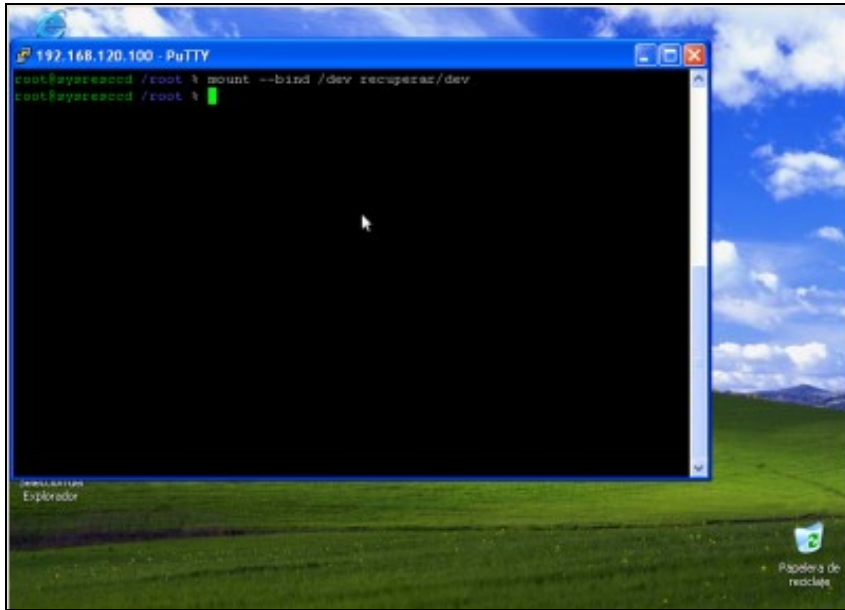


```
192.168.120.100 - PuTTY
root@sysresccd /root % mkdir recuperar
root@sysresccd /root % mount -t auto /dev/sda1 recuperar
root@sysresccd /root %
```

**a. Ver a táboa de particións do equipo (fdisk -l).**

Neste caso a distribución Linux ten 2 particións:

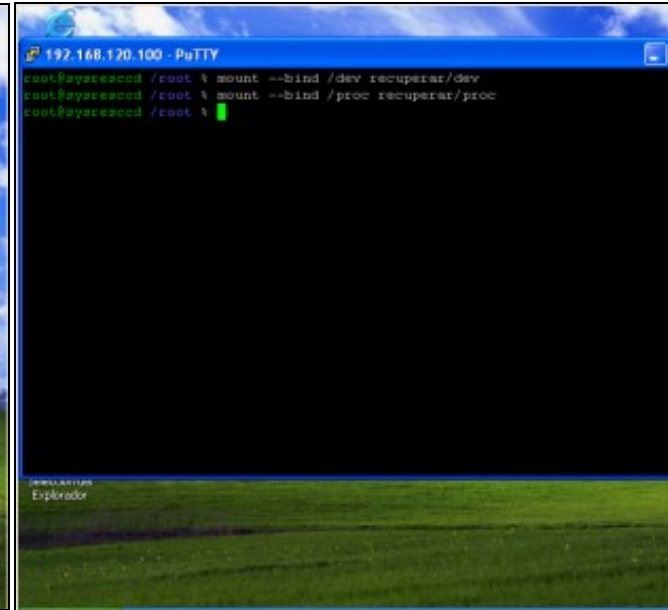
1. **/dev/sda1**: A partición / onde está montado todo o sistema de ficheiros.
2. **/dev/sda5**: A partición **swap** adicada ao espazo de intercambio.



**b. Crear cartafol para acceder á información do disco duro /dev/sda**

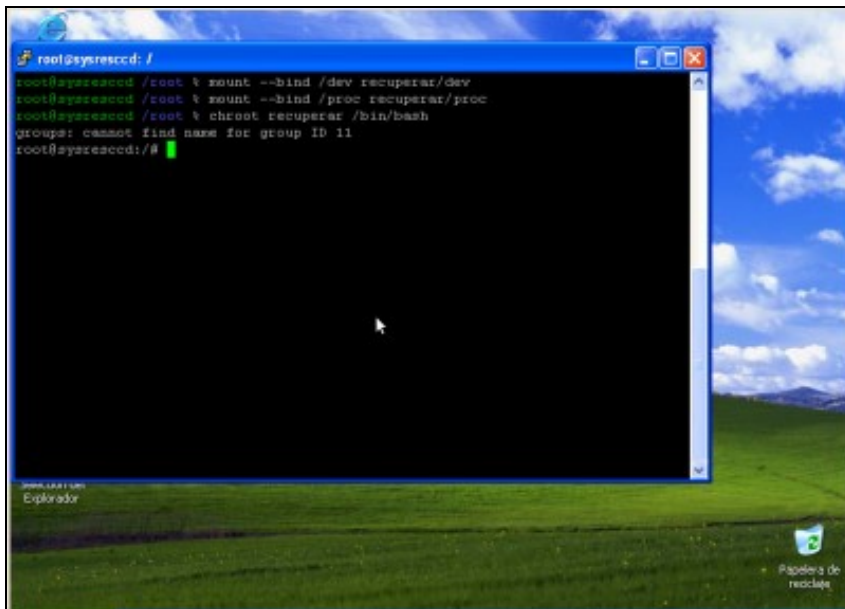
No cartafol creado, en **/root**, mediante o comando **mkdir recuperar** e a partición do disco **/dev/sda** co comando:

**mount -t auto /dev/sda1 recuperar**



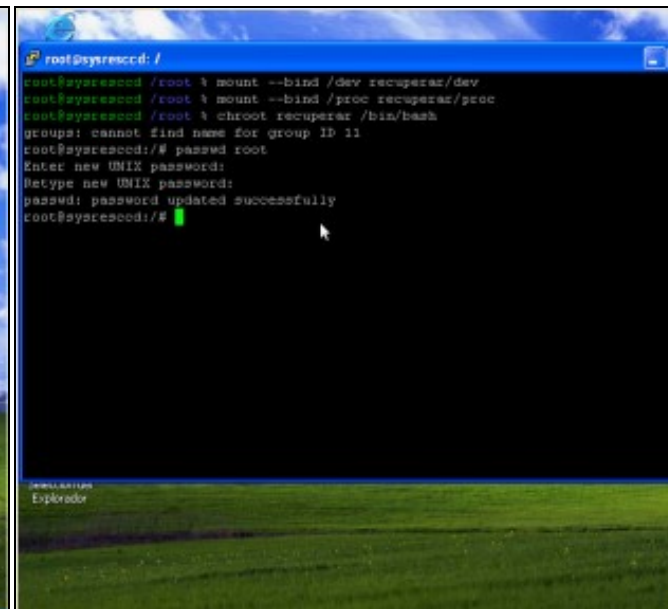
**c. Montar o cartafol /dev dentro de recuperar/dev para poder ter acceso a todos os dispositivos recoñecidos pola distribución SystemRescueCD. Comando empregado: mount --bind /dev recuperar/dev**

empregado: **mount --bind /dev recuperar/dev**



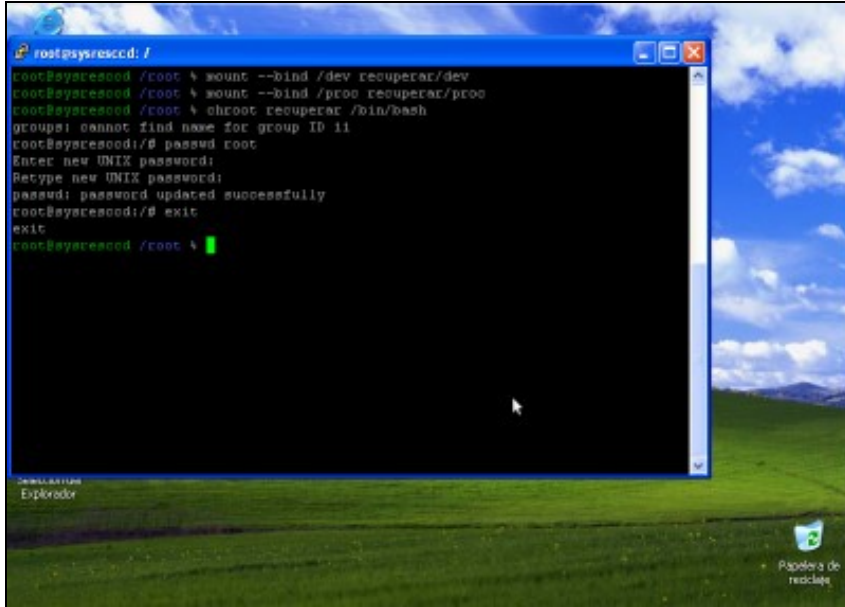
**d. Montar o cartafol /proc dentro de recuperar/proc para poder ter acceso a toda a información do sistema grazas a distribución SystemRescueCD. Comando empregado: mount --bind /proc recuperar/proc**

empregado: **mount --bind /proc recuperar/proc**



**e. Crear a xaula chroot co comando `chroot recuperar /bin/bash`.**

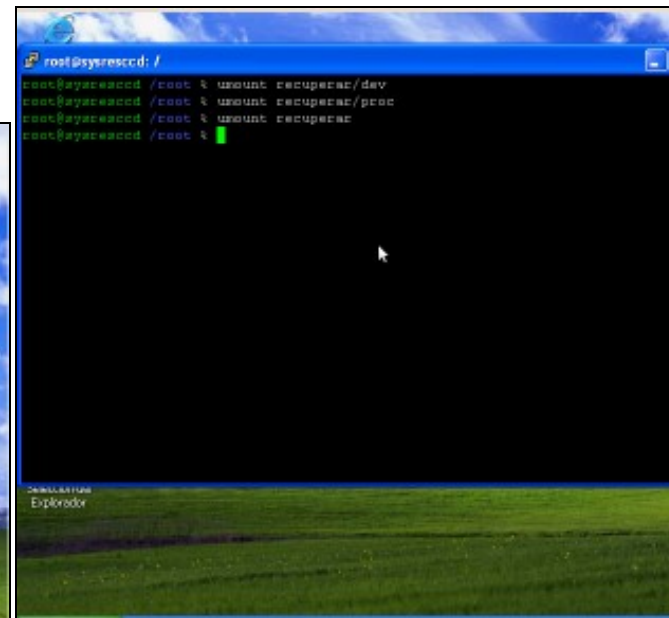
Con ise comando creamos unha xaula: un entorno pechado para a distribución Linux dentro de recuperar, de tal xeito, que unha vez dentro da xaula soamente existe ésta, e dicir, soamente existe a distribución Linux a recuperar, xa non estamos traballando na SystemRescueCD.



**g. Co comando `exit` saímos da xaula chroot.**

**f. Cambiar contrasinal root.**

Mediante o comando **`passwd root`** cambiamos o contrasinal de **root**, **abc123**. como novo contrasinal de **root**



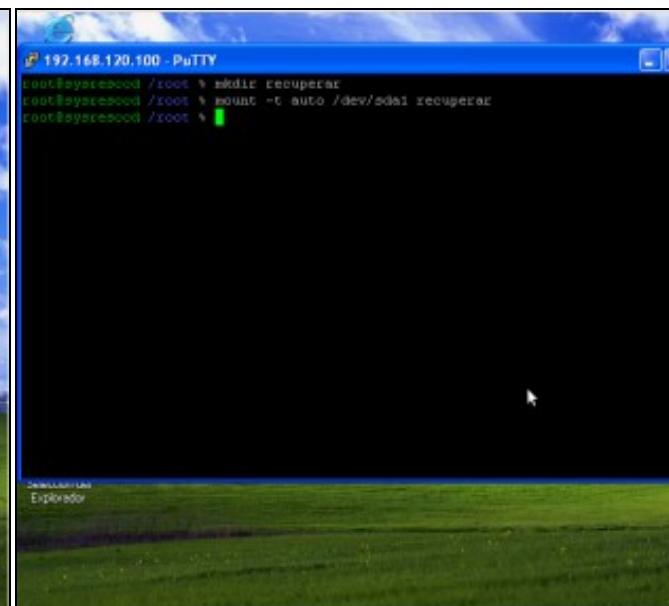
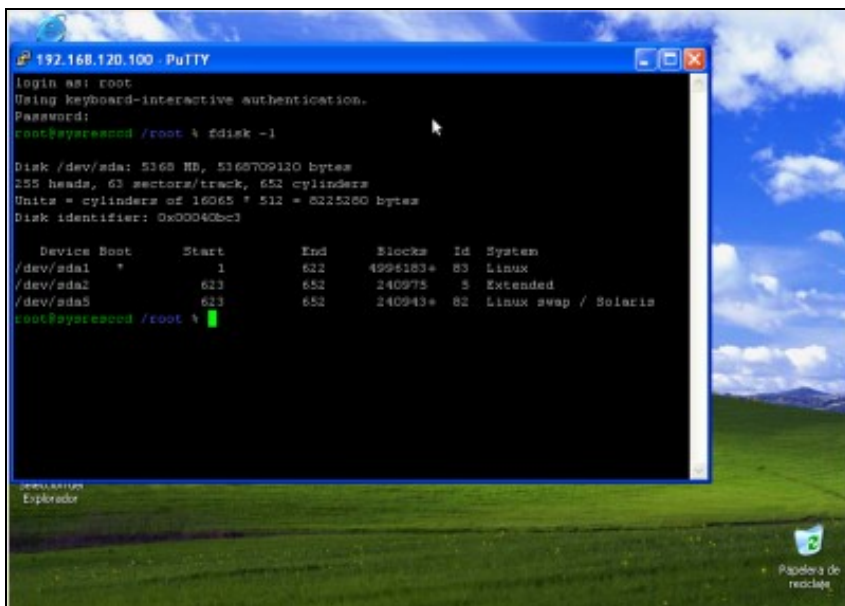
**h. Desmontar unidades montadas:**

1. `umount recuperar/dev`
2. `umount recuperar/proc`
3. `umount recuperar`

Apagar a SystemRescueCD e arrancar a distribución Linux recup funciona o contrasinal novo de root.

## Copiar o cartafol HOME de todos os usuarios

Unha vez establecida a conexión co Servidor SSH proceder do seguinte xeito:



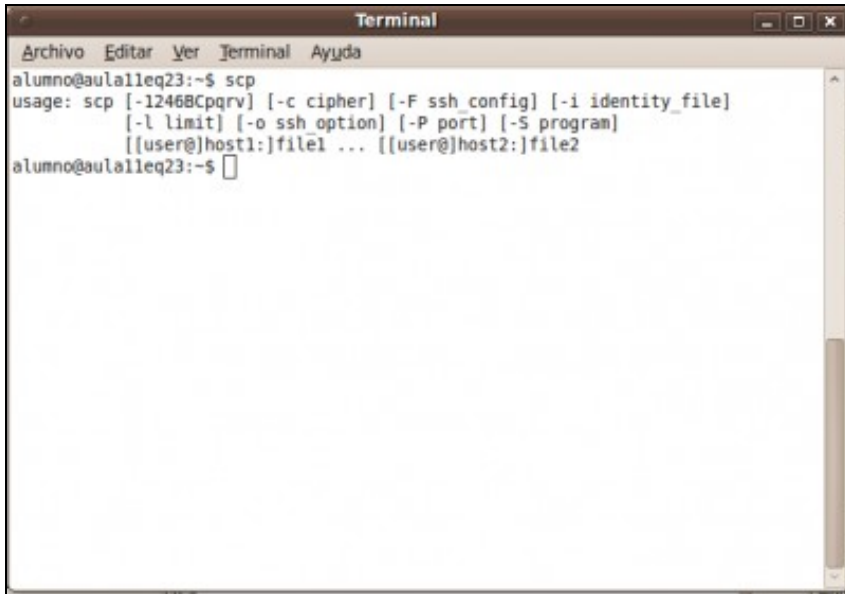
**a. Ver a táboa de particións do equipo (fdisk -l).**

Neste caso a distribución Linux ten 2 particións:

1. **/dev/sda1**: A partición / onde está montado todo o sistema de ficheiros.
2. **/dev/sda5**: A partición **swap** adicada ao espazo de intercambio.

**Cliente Distribución GNU/Linux: Empregando o comando scp**

Proceder:



```
Terminal
Archivo Editar Ver Terminal Ayuda
alumno@aulal1eq23:~$ scp
usage: scp [-1246BCpqrv] [-c cipher] [-F ssh config] [-i identity_file]
        [-l limit] [-o ssh_option] [-P port] [-S program]
        [[user@]host1:]file1 ... [[user@]host2:]file2
alumno@aulal1eq23:~$
```

**b. Crear cartafol para acceder á información do disco duro /dev/sda**

No cartafol creado, en **/root**, mediante o comando **mkdir recuperar** a

partición do disco **/dev/sda** co comando:

**mount -t auto /dev/sda1 recuperar**



```
Terminal
Archivo Editar Ver Terminal Ayuda
alumno@aulal1eq23:~$ mkdir copia_home
```

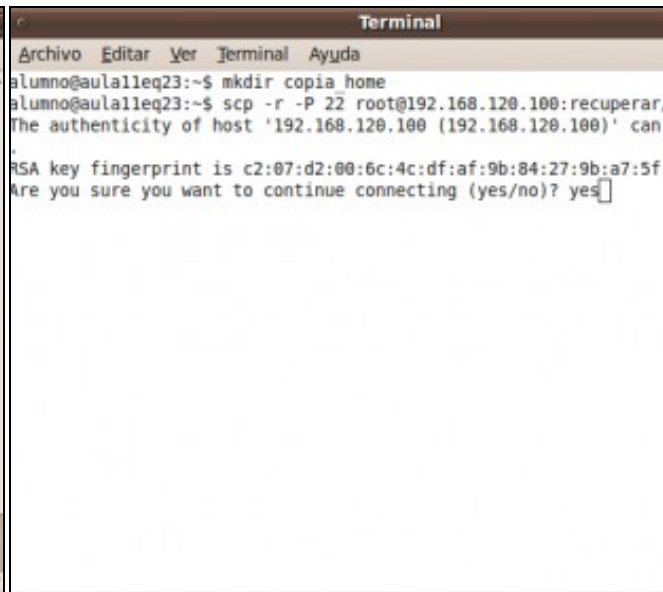
**a. Abrir un novo terminal para facer a copia mediante scp.**

Executando o comando **scp** podemos ver a sintaxe do mesmo.



```
Terminal
Archivo Editar Ver Terminal Ayuda
alumno@aulal1eq23:~$ mkdir copia_home
alumno@aulal1eq23:~$ scp -r -P 22 root@192.168.120.100:recuperar/home copia_home/
```

**b. Crear o directorio destino da copia: copia\_home**



```
Terminal
Archivo Editar Ver Terminal Ayuda
alumno@aulal1eq23:~$ mkdir copia_home
alumno@aulal1eq23:~$ scp -r -P 22 root@192.168.120.100:recuperar/home copia_home/
The authenticity of host '192.168.120.100 (192.168.120.100)' can't be
established.
RSA key fingerprint is c2:07:d2:00:6c:4c:df:af:9b:84:27:9b:a7:5f:
Are you sure you want to continue connecting (yes/no)? yes
```



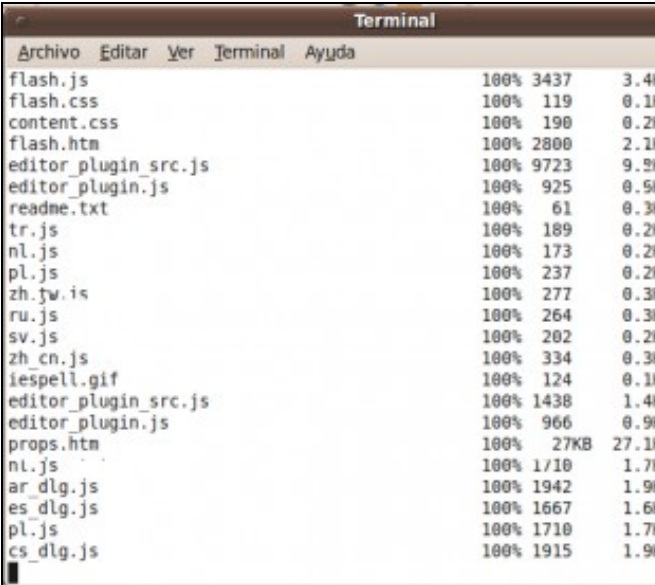
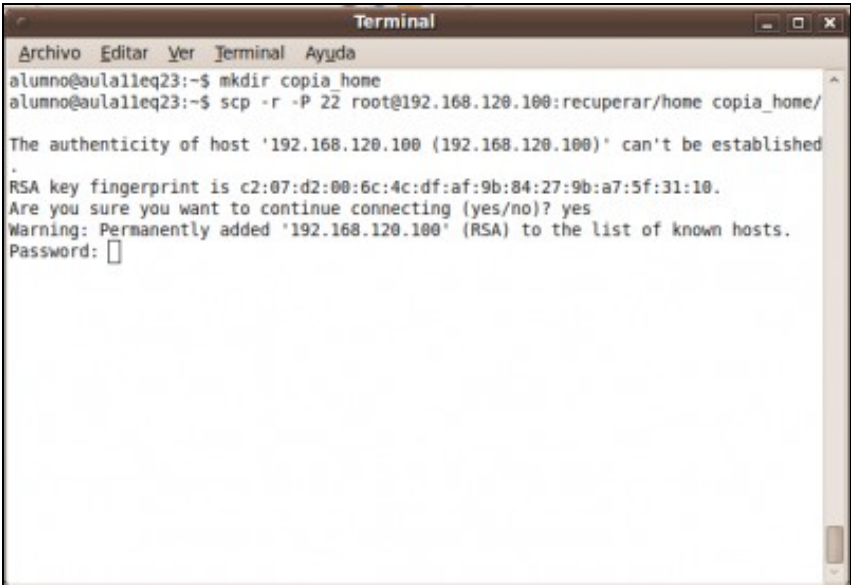
**c. Copiar o HOME de todos os usuarios.**

Para copiar o HOME de todos os usuarios debemos empregar o comando scp como segue:

**scp -r -P 22 root@192.168.120.100:recuperar/home copia\_home**, onde:

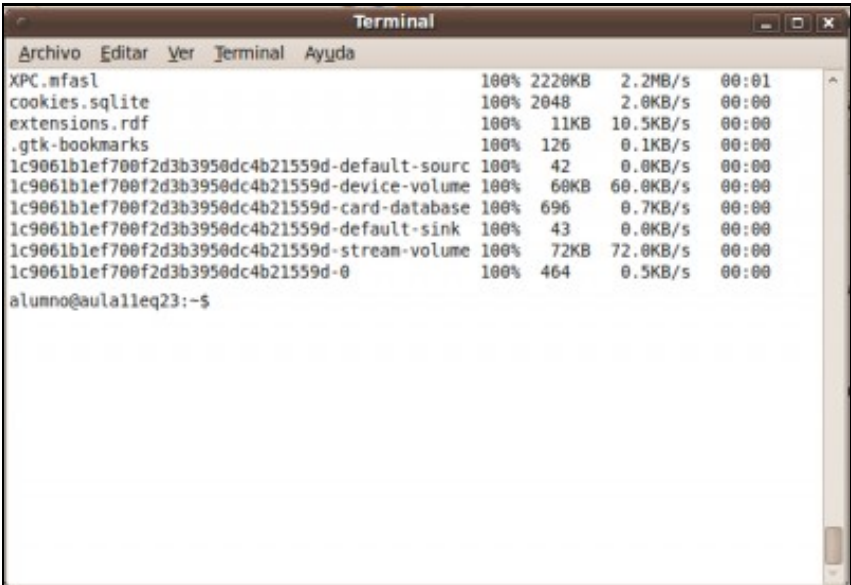
- 1. **-r** significa recursivo, serve para copiar cartafols enteiros.
- 2. **-P 22** indica o porto de conexión SSH
- 3. **root@192.168.120.100** indica o usuario root na máquina 192.168.120.100
- 4. **:recuperar/home** indica o cartafol a copiar na ruta parcial recuperar/home, que ven sendo a ruta absoluta /root/recuperar/home, xa que no caso de non indicar a ruta absoluta sempre se parte da ruta da casa do usuario, neste caso o usuario é root, co cal pátrese de /root
- 5. **copia\_home** é o cartafol destino da copia.

**d. Autenticación.** Se é a primeira vez que nos conectamos o servidoro estamos de acordo coa autenticación. Respostamos **yes** e pulsamos a primeira vez ver a seguinte imaxe.



**e. Password da conexión do usuario root: toor. Pulsamos Enter**

**f. Copiando...**

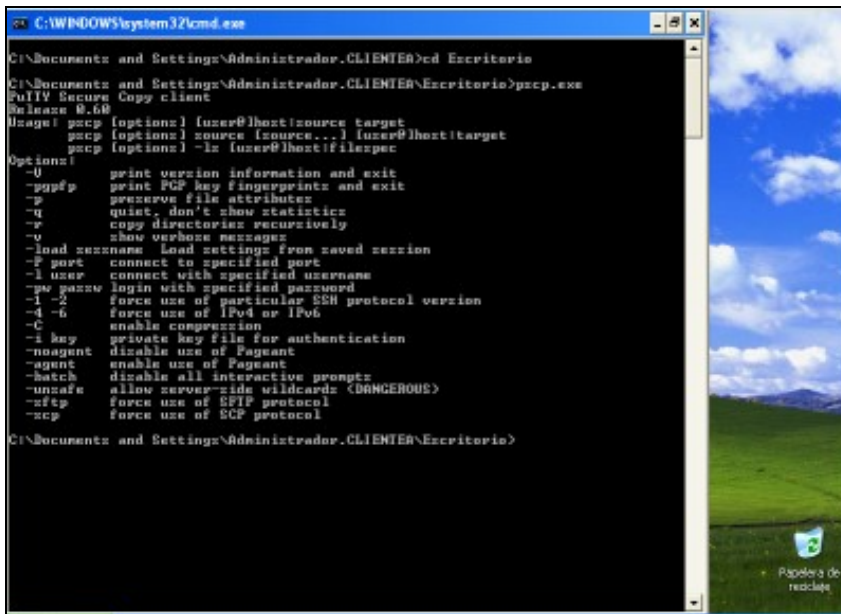


g. Cópia feita

## Cliente Windows: Empregando o comando pscp

NOTA: Para ver máis información sobre o comando pscp visitar a seguinte ligazón: [Comando pscp](#)

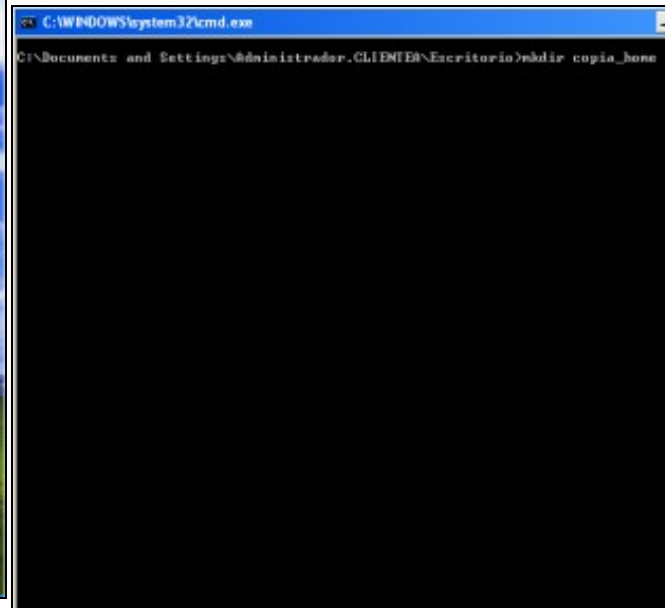
Proceder:



```
C:\WINDOWS\system32\cmd.exe
C:\Documents and Settings\Administrador.CLIENTE\Escritorio>cd Escritorio
C:\Documents and Settings\Administrador.CLIENTE\Escritorio>pscp.exe
PuTTY Secure Copy client
Release 0.60
Usage: pscp [options] [user@]host[:source target]
pscp [options] source [source...] [user@]host[:target]
pscp [options] -ls [user@]host[:file:spec]

Options:
-U          print version information and exit
-pppfp     print PGP key fingerprints and exit
-p         preserve file attributes
-q         quiet, don't show statistics
-r         copy directories recursively
-v         show verbose messages
-load sessname Load settings from saved session
-P port    connect to specified port
-l user    connect with specified username
-pw passwd login with specified password
-i -2      force use of particular SSH protocol version
-A -6     force use of IPv4 or IPv6
-C         enable compression
-i key     private key file for authentication
-noagent   disable use of Pageant
-agent     enable use of Pageant
-batch     disable all interactive prompts
-unsafe   allow server-side wildcards (DANGEROUS)
-sftp     force use of SFTP protocol
-scp      force use of SCP protocol

C:\Documents and Settings\Administrador.CLIENTE\Escritorio>
```

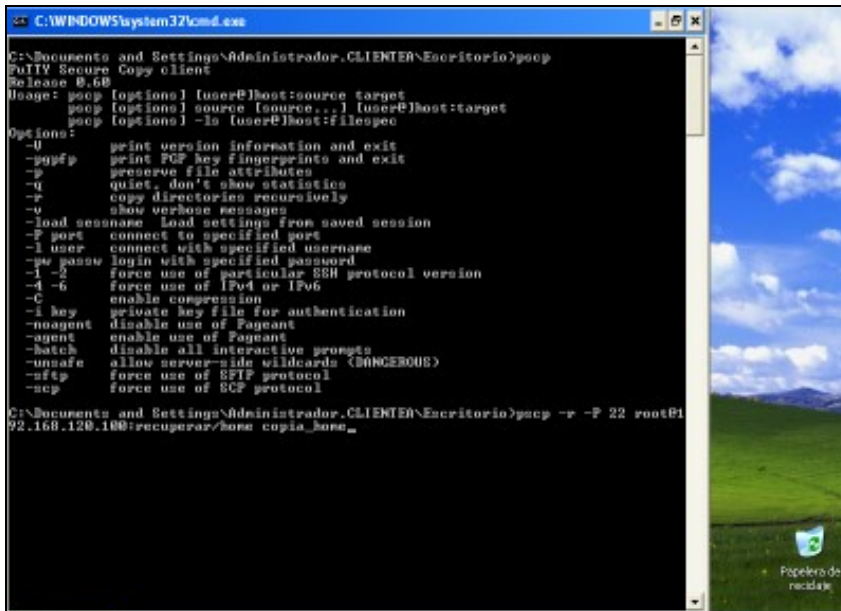


```
C:\WINDOWS\system32\cmd.exe
C:\Documents and Settings\Administrador.CLIENTE\Escritorio>mkdir copia_home
```

a. Abrir unha consola de comandos para facer a copia mediante pscp.

Executando o comando **pscp** podemos ver a sintaxe do mesmo.

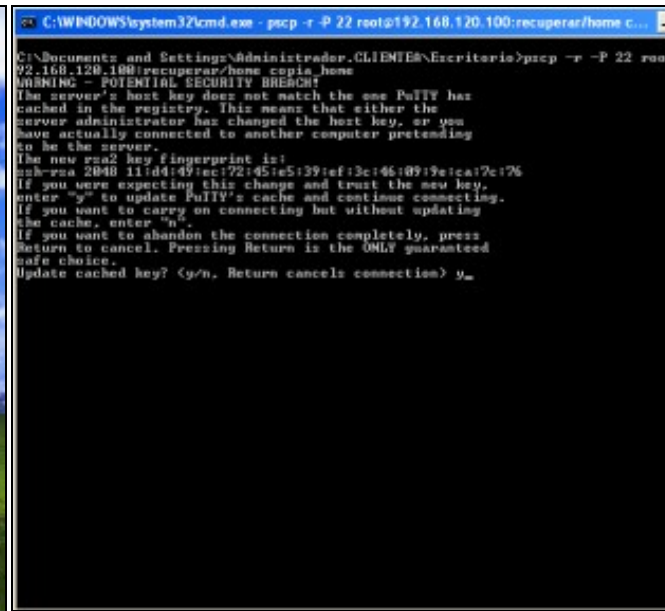
b. Crear o directorio destino da copia: copia\_home



```
C:\WINDOWS\system32\cmd.exe
C:\Documents and Settings\Administrador.CLIENTE\Escritorio>pscp
PuTTY Secure Copy client
Release 0.60
Usage: pscp [options] [user@]host[:source target]
pscp [options] source [source...] [user@]host[:target]
pscp [options] -ls [user@]host[:file:spec]

Options:
-U          print version information and exit
-pppfp     print PGP key fingerprints and exit
-p         preserve file attributes
-q         quiet, don't show statistics
-r         copy directories recursively
-v         show verbose messages
-load sessname Load settings from saved session
-P port    connect to specified port
-l user    connect with specified username
-pw passwd login with specified password
-i -2      force use of particular SSH protocol version
-A -6     force use of IPv4 or IPv6
-C         enable compression
-i key     private key file for authentication
-noagent   disable use of Pageant
-agent     enable use of Pageant
-batch     disable all interactive prompts
-unsafe   allow server-side wildcards (DANGEROUS)
-sftp     force use of SFTP protocol
-scp      force use of SCP protocol

C:\Documents and Settings\Administrador.CLIENTE\Escritorio>pscp -r -P 22 root@192.168.120.100:recuperar/home copia_home_
```



```
C:\WINDOWS\system32\cmd.exe - pscp -r -P 22 root@192.168.120.100:recuperar/home copia_home_
C:\Documents and Settings\Administrador.CLIENTE\Escritorio>pscp -r -P 22 root@192.168.120.100:recuperar/home copia_home_
WARNING - POTENTIAL SECURITY BREACH!
The server's host key does not match the one PuTTY has
cached in the registry. This means that either the
server administrator has changed the host key, or you
have actually connected to another computer pretending
to be the server.
The new rsa2 key fingerprint is:
ssh-rsa 2048 11:d4:49:ec:72:45:ec:51:39:ef:3c:46:09:19:ca:7c:76
If you were expecting this change and trust the new key,
enter "y" to update PuTTY's cache and continue connecting.
If you want to carry on connecting but without updating
the cache, enter "n".
If you want to abandon the connection completely, press
Return to cancel. Pressing Return is the ONLY guaranteed
safe choice.
Update cached key? (y/n, Return cancels connection) y_
```

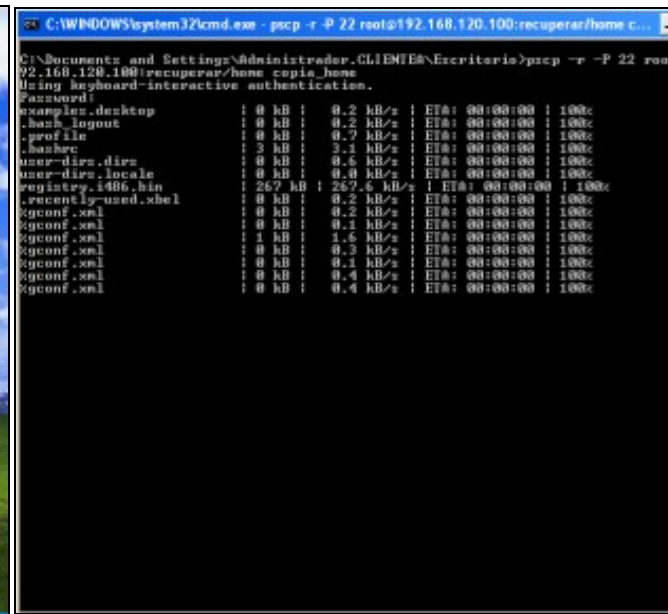
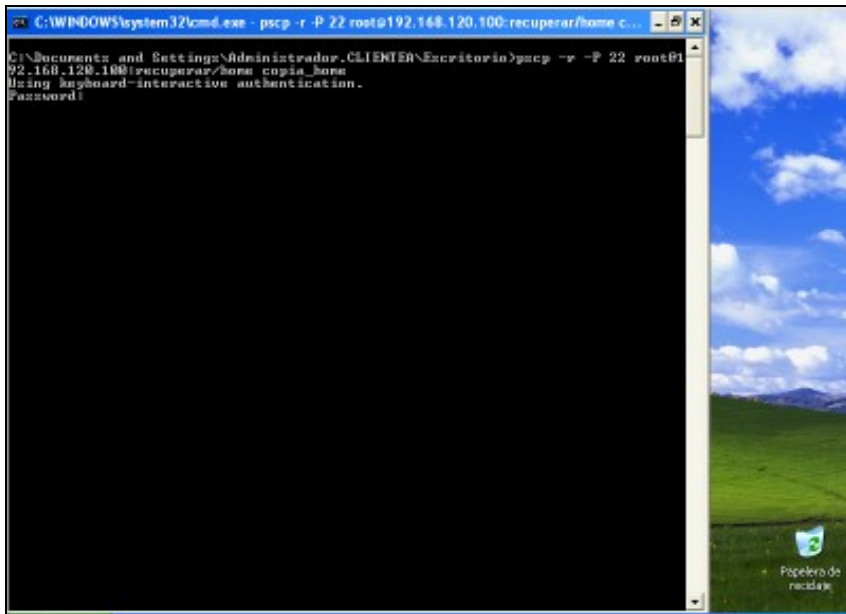
### c. Copiar o HOME de todos os usuarios.

Para copiar o HOME de todos os usuarios debemos empregar o comando pscp como segue:

**pscp -r -P 22 root@192.168.120.100:recuperar/home copia\_home**, onde:

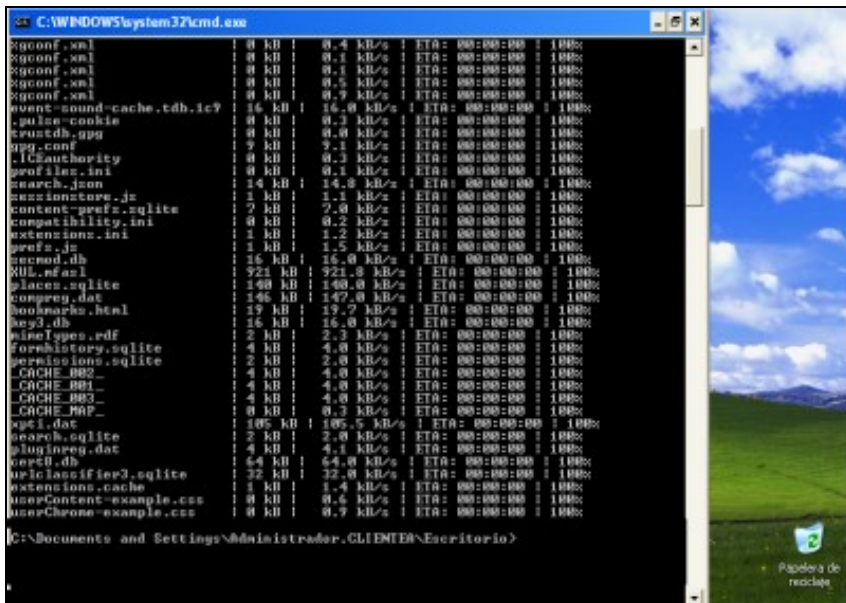
1. **-r** significa recursivo, serve para copiar cartafols enteiros.
2. **-P 22** indica o porto de conexión SSH
3. **root@192.168.120.100** indica o usuario root na máquina 192.168.120.100
4. **:recuperar/home** indica o cartafol a copiar na ruta parcial recuperar/home, que ven sendo a ruta absoluta /root/recuperar/home, xa que no caso de non indicar a ruta absoluta sempre se parte da ruta da casa do usuario, neste caso o usuario é root, co cal pátrese de /root
5. **copia\_home** é o cartafol destino da copia.

**d. Autenticación.** Se é a primeira vez que nos conectamos o servidor estamos de acordo coa autenticación. Respostamos **y** e pulsamos **Enter** a primeira vez ver a seguinte imaxe.



e. Password da conexión do usuario root: toor. Pulsamos **Enter**

f. Copiando...

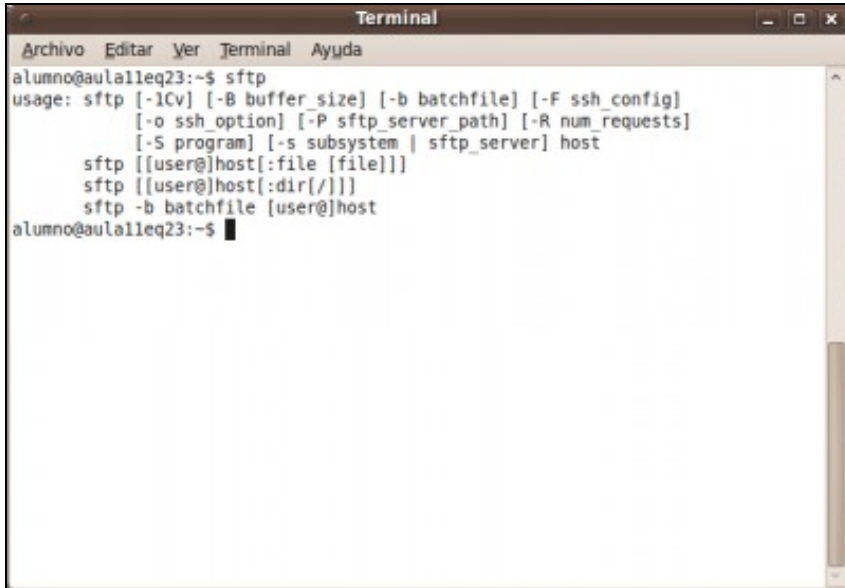


g. Cópia feita

## Transferir un ficheiro de forma segura

### Cliente Distribución GNU/Linux: Empregando o comando sftp

Proceder:



```
Terminal
Archivo  Editar  Ver  Terminal  Ayuda
alumno@aulal1eq23:~$ sftp
usage: sftp [-lCv] [-B buffer_size] [-b batchfile] [-F ssh_config]
          [-o ssh_option] [-P sftp_server_path] [-R num_requests]
          [-S program] [-s subsystem | sftp_server] host
      sftp [[user@]host[:file [file]]]
      sftp [[user@]host[:dir[/]]]
      sftp -b batchfile [user@]host
alumno@aulal1eq23:~$
```



```
Terminal
Archivo  Editar  Ver  Terminal  Ayuda
alumno@aulal1eq23:~$ mkdir transferencia_dir
alumno@aulal1eq23:~$
```

a. Abrir un novo terminal para facer a transferencia de arquivos mediante sftp.

Executando o comando **sftp** podemos ver a sintaxe do mesmo.

b. Crear o directorio destino da transferencia: **transferencia\_dir**



```
Terminal
Archivo  Editar  Ver  Terminal  Ayuda
alumno@aulal1eq23:~$ mkdir transferencia_dir
alumno@aulal1eq23:~$ sftp root@192.168.120.100
```



```
Terminal
Archivo  Editar  Ver  Terminal  Ayuda
alumno@aulal1eq23:~$ mkdir transferencia_dir
alumno@aulal1eq23:~$ sftp root@192.168.120.100
Connecting to 192.168.120.100...
The authenticity of host '192.168.120.100 (192.168.120.100)' can
d.
RSA key fingerprint is 11:d4:49:ec:72:45:e5:39:ef:3c:46:09:9e:ca
Are you sure you want to continue connecting (yes/no)? yes
```



**c. Transferir o arquivo /etc/passwd.**

Para transferir o arquivo /etc/passwd ao cartafol **transferencia\_dir** debemos empregar o comando sftp como segue:

**sftp root@192.168.120.100**, onde **root@192.168.120.100** indica o usuario root na máquina 192.168.120.100

```
Terminal
Archivo Editar Ver Terminal Ayuda
alumno@aula11eq23:~$ mkdir transferencia_dir
alumno@aula11eq23:~$ sftp root@192.168.120.100
Connecting to 192.168.120.100...
The authenticity of host '192.168.120.100 (192.168.120.100)' can't be established.
RSA key fingerprint is 11:d4:49:ec:72:45:e5:39:ef:3c:46:09:9e:ca:7c:76.
Are you sure you want to continue connecting (yes/no)? yes
Warning: Permanently added '192.168.120.100' (RSA) to the list of known hosts.
Password:
sftp>
```

**e. Password da conexión do usuario root: toor.** Pulsamos **Enter**

**d. Autenticación.** Se é a primeira vez que nos conectamos o servidor estamos de acordo coa autenticación. Respostamos **yes** e pulsamos a primeira vez ver a seguinte imaxe.

```
Terminal
Archivo Editar Ver Terminal Ayuda
Password:
sftp> help
Available commands:
cd path          Change remote directory to 'path'
lcd path         Change local directory to 'path'
chgrp grp path   Change group of file 'path' to 'grp'
chmod mode path  Change permissions of file 'path' to 'mode'
chown own path   Change owner of file 'path' to 'own'
df [path]        Display statistics for current directory or filesystem containing 'path'
help            Display this help text
get remote-path [local-path] Download file
lls [ls-options [path]] Display local directory listing
ln oldpath newpath Symlink remote file
lnkdir path      Create local directory
lpwd            Print local working directory
ls [path]        Display remote directory listing
lumask umask     Set local umask to 'umask'
mkdir path       Create remote directory
progress        Toggle display of progress meter
put local-path [remote-path] Upload file
pwd            Display remote working directory
exit           Quit sftp
quit          Quit sftp
rename oldpath newpath Rename remote file
rmdir path     Remove remote directory
rm path        Delete remote file
symlink oldpath newpath Symlink remote file
version        Show SFTP version
!command       Execute 'command' in local shell
!             Escape to local shell
?             Synonym for help
sftp>
```

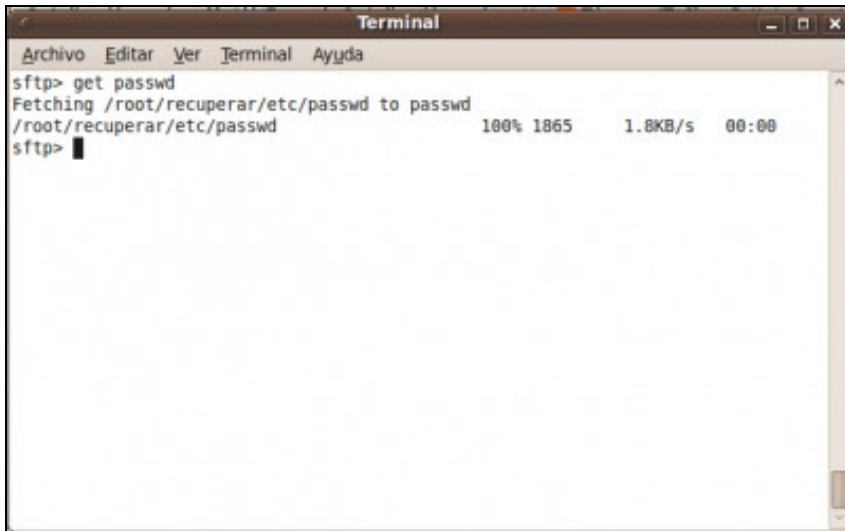
**f. Xa estamos dentro do cliente sftp, como amosa o prompt sftp>**  
Para ver os comandos deste cliente na transferencia de ficheiros executamos o comando **help**.

```
Terminal
Archivo Editar Ver Terminal Ayuda
ls [path]          Display remote directory listing
lumask umask       Set local umask to 'umask'
mkdir path         Create remote directory
progress          Toggle display of progress meter
put local-path [remote-path] Upload file
pwd              Display remote working directory
exit             Quit sftp
quit            Quit sftp
rename oldpath newpath Rename remote file
rmdir path       Remove remote directory
rm path          Delete remote file
symlink oldpath newpath Symlink remote file
version          Show SFTP version
!command         Execute 'command' in local shell
!               Escape to local shell
?               Synonym for help
sftp> pwd
Remote working directory: /root
sftp> lpwd
Local working directory: /home/alumno
sftp>
```

```
Terminal
Archivo Editar Ver Terminal Ayuda
mkdir path          Create remote directory
progress          Toggle display of progress meter
put local-path [remote-path] Upload file
pwd              Display remote working directory
exit             Quit sftp
quit            Quit sftp
rename oldpath newpath Rename remote file
rmdir path       Remove remote directory
rm path          Delete remote file
symlink oldpath newpath Symlink remote file
version          Show SFTP version
!command         Execute 'command' in local shell
!               Escape to local shell
?               Synonym for help
sftp> pwd
Remote working directory: /root
sftp> lpwd
Local working directory: /home/alumno
sftp> cd recuperar/etc
sftp> lcd transferencia_dir
sftp>
```

#### g. Comandos pwd e lpwd.

1. **pwd**: Empleamos o comando **pwd** para saber en que cartafol remoto estamos situados, neste caso: **/root**
2. **lpwd**: Empleamos o comando **lpwd** para saber en que cartafol local estamos situados, neste caso **/home/alumno**.



```
Terminal
Archivo Editar Ver Terminal Ayuda
sftp> get passwd
Fetching /root/recuperar/etc/passwd to passwd
/root/recuperar/etc/passwd 100% 1865 1.8KB/s 00:00
sftp>
```

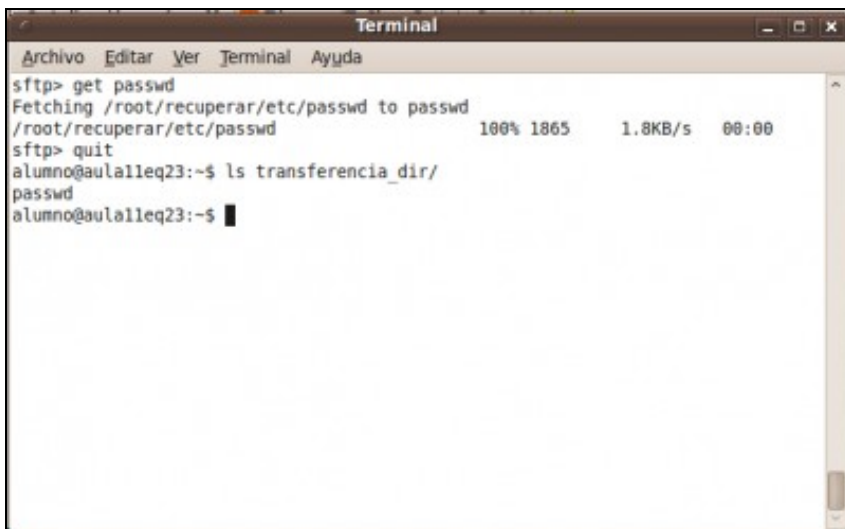
#### h. Comandos cd e lcd.

1. **cd**: Empleamos o comando **cd** para movernos entre cartafol remoto, neste caso empleamos o comando **cd recuperar** ao cartafol **/root/recuperar/etc** do equipo remoto.
2. **lcd**: Empleamos o comando **lcd** para movernos entre cartafol local, neste caso empleamos o comando **lcd transferencia\_dir** de movernos ao cartafol **/home/alumno/transferencia\_dir** de local.



```
Terminal
Archivo Editar Ver Terminal Ayuda
sftp> get passwd
Fetching /root/recuperar/etc/passwd to passwd
/root/recuperar/etc/passwd 100% 1865 1.8KB/s 00:00
sftp> cd recuperar
sftp> lcd transferencia_dir
alumno@aula11eq23:~$
```

#### k. Transferimos o arquivo ao cartafol local, antes escollido, mediante o comando get passwd. Pulsar Enter. Transferencia realizada.



```
Terminal
Archivo Editar Ver Terminal Ayuda
sftp> get passwd
Fetching /root/recuperar/etc/passwd to passwd
/root/recuperar/etc/passwd 100% 1865 1.8KB/s 00:00
sftp> quit
alumno@aula11eq23:~$ ls transferencia_dir/
passwd
alumno@aula11eq23:~$
```

#### l. Executamos o comando quit para sair do cliente sftp e finalizar

m. Na consola cmd executamos o comando `ls transferencia_dir` e podemos observar que o ficheiro foi transferido satisfatoriamente..

## Cliente Windows: Empregando o comando psftp

NOTA: Para ver máis información sobre o comando psftp visitar a seguinte ligazón: [Comando psftp](#)

Proceder:

```
C:\WINDOWS\system32\cmd.exe
C:\Documents and Settings\Administrador.CLIENTE\Escritorio>cd Escritorio
C:\Documents and Settings\Administrador.CLIENTE\Escritorio>psftp.exe -h
PuTTY Secure File Transfer (SFTP) client
Release 0.6.0
Usage: psftp [options] [user@]host
Options:
  -U          print version information and exit
  -pufp      print PUF key fingerprints and exit
  -b file     use specified batchfile
  -bc        output batchfile commands
  -be        don't stop batchfile processing if errors
  -v         show verbose messages
  -load sessname Load settings from saved session
  -l user     connect with specified username
  -P port     connect to specified port
  -pw passw  login with specified password
  -1 -2      force use of particular SSH protocol version
  -4 -6      force use of IPv4 or IPv6
  -C         enable compression
  -i key     private key file for authentication
  -noagent   disable use of Pageant
  -agent     enable use of Pageant
  -batch     disable all interactive prompts
C:\Documents and Settings\Administrador.CLIENTE\Escritorio>_
```

```
C:\WINDOWS\system32\cmd.exe
C:\Documents and Settings\Administrador.CLIENTE\Escritorio>mkdir transferencia_dir
C:\Documents and Settings\Administrador.CLIENTE\Escritorio>
```

a. Abrir unha consola de comandos para facer a transferencia de arquivos mediante psftp.

Executando o comando `psftp -h` podemos ver a sintaxe do mesmo.

b. Crear o directorio destino da transferencia: `transferencia_dir`

```
C:\WINDOWS\system32\cmd.exe
C:\Documents and Settings\Administrador.CLIENTE\Escritorio>mkdir transferencia_dir
C:\Documents and Settings\Administrador.CLIENTE\Escritorio>psftp.exe -P 22 root@192.168.1.20.100
C:\Documents and Settings\Administrador.CLIENTE\Escritorio>
```

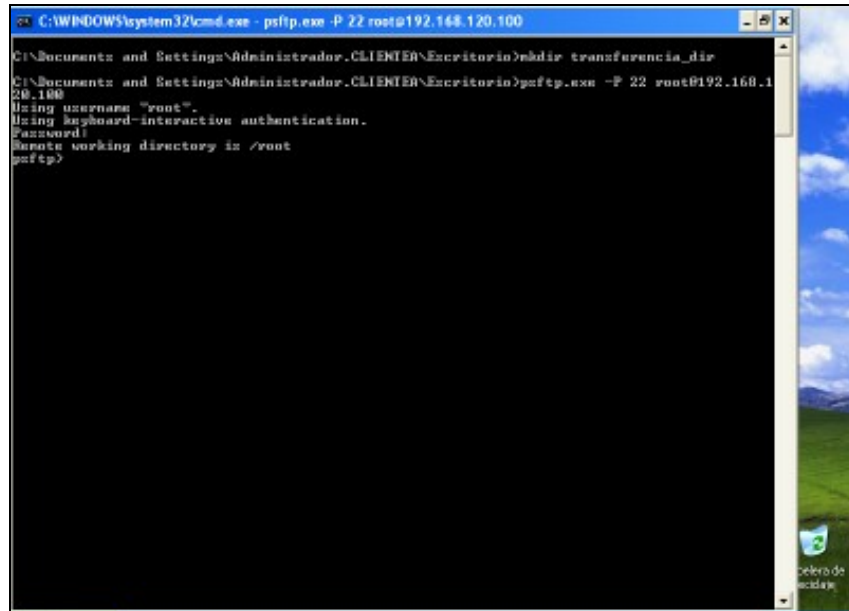
```
C:\WINDOWS\system32\cmd.exe - psftp.exe -P 22 root@192.168.1.20.100
C:\Documents and Settings\Administrador.CLIENTE\Escritorio>psftp.exe -P 22 root@192.168.1.20.100
The server's host key is not cached in the registry. You have no guarantee that the server is the computer you think it is.
The server's rsa2 key fingerprint is:
ssh-rsa 2048 11:d4:49:ec:72:45:e5:39:ef:3c:46:09:9e:ca:7c:76
If you trust this host, enter "y" to add the key to PuTTY's cache and carry on connecting.
If you want to carry on connecting just once, without adding the key to the cache, enter "n".
If you do not trust this host, press Return to abandon the connection.
Store key in cache? (y/n) y_
```

### c. Transferir o arquivo /etc/passwd.

Para transferir o arquivo /etc/passwd ao cartafol **transferencia\_dir** debemos empregar o comando psftp como segue:

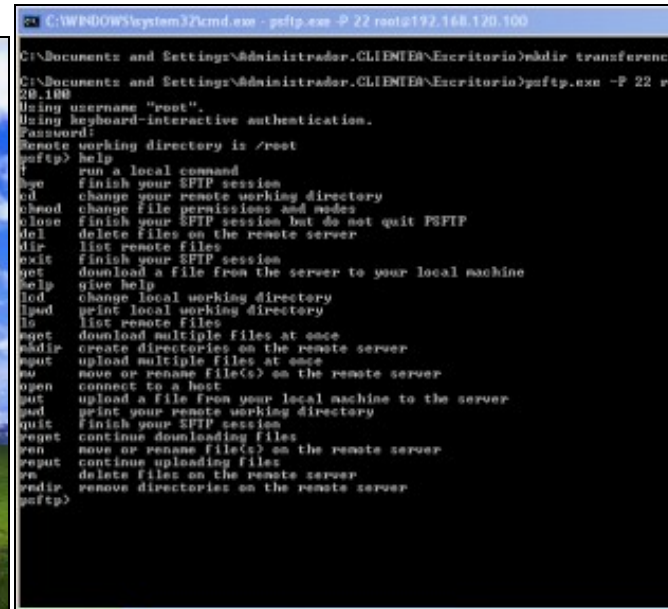
**psftp -P 22 root@192.168.120.100**, onde:

1. **-P 22** indica o porto de conexión SSH
2. **root@192.168.120.100** indica o usuario root na máquina 192.168.120.100



```
C:\WINDOWS\system32\cmd.exe - psftp.exe -P 22 root@192.168.120.100

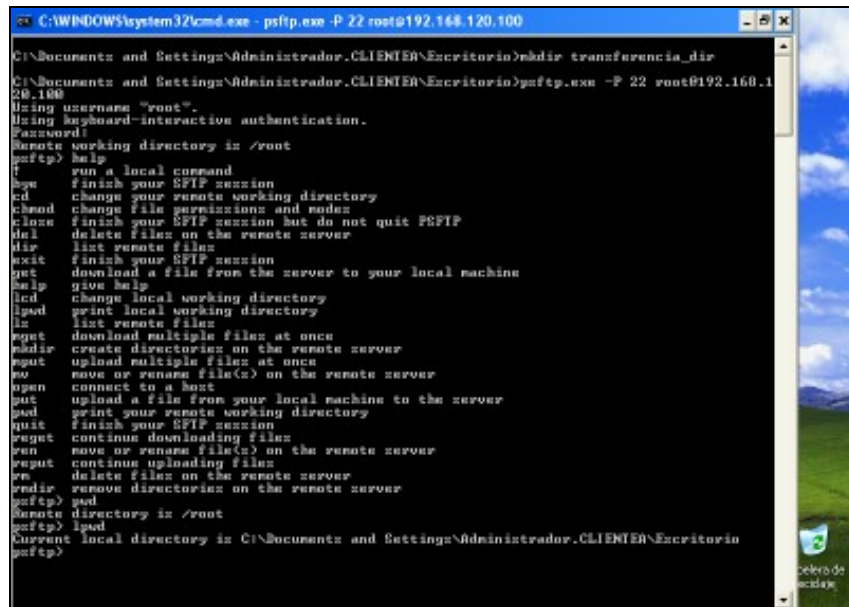
C:\Documents and Settings\Administrador.CLIENTE\Escritorio>mkdir transferencia_dir
C:\Documents and Settings\Administrador.CLIENTE\Escritorio>psftp.exe -P 22 root@192.168.120.100
Using username "root".
Using keyboard-interactive authentication.
Password:
Remote working directory is /root
psftp>
```



```
C:\WINDOWS\system32\cmd.exe - psftp.exe -P 22 root@192.168.120.100

C:\Documents and Settings\Administrador.CLIENTE\Escritorio>mkdir transferencia_dir
C:\Documents and Settings\Administrador.CLIENTE\Escritorio>psftp.exe -P 22 root@192.168.120.100
Using username "root".
Using keyboard-interactive authentication.
Password:
Remote working directory is /root
psftp> help
? run a local command
! finish your SFTP session
cd change your remote working directory
chmod change file permissions and modes
close finish your SFTP session but do not quit PSFTP
del delete files on the remote server
dir list remote files
exit finish your SFTP session
get download a file from the server to your local machine
help give help
lcd change local working directory
lpwd print local working directory
ls list remote files
lsget download multiple files at once
mkdir create directories on the remote server
mput upload multiple files at once
mv move or rename file(s) on the remote server
open connect to a host
put upload a file from your local machine to the server
pwd print your remote working directory
quit finish your SFTP session
reget continue downloading files
ren move or rename file(s) on the remote server
rput continue uploading files
rm delete files on the remote server
rmdir remove directories on the remote server
psftp>
```

### e. Password da conexión do usuario root: toor. Pulsamos Enter

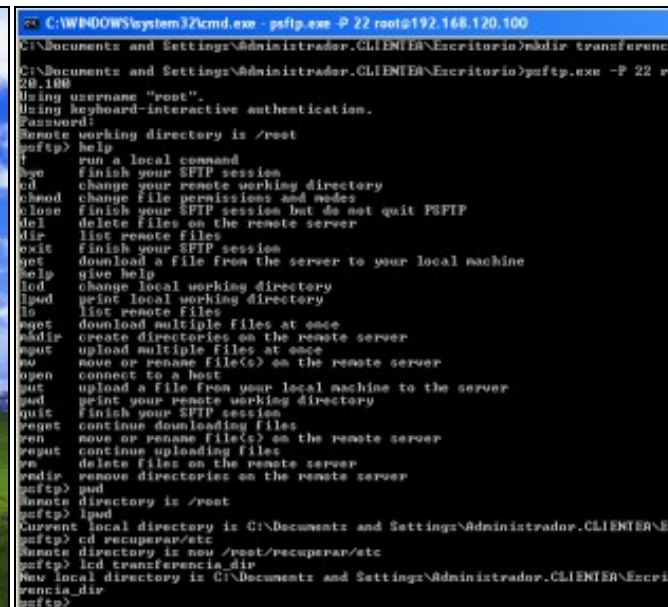


```
C:\WINDOWS\system32\cmd.exe - psftp.exe -P 22 root@192.168.120.100

C:\Documents and Settings\Administrador.CLIENTE\Escritorio>mkdir transferencia_dir
C:\Documents and Settings\Administrador.CLIENTE\Escritorio>psftp.exe -P 22 root@192.168.120.100
Using username "root".
Using keyboard-interactive authentication.
Password:
Remote working directory is /root
psftp> help
? run a local command
! finish your SFTP session
cd change your remote working directory
chmod change file permissions and modes
close finish your SFTP session but do not quit PSFTP
del delete files on the remote server
dir list remote files
exit finish your SFTP session
get download a file from the server to your local machine
help give help
lcd change local working directory
lpwd print local working directory
ls list remote files
lsget download multiple files at once
mkdir create directories on the remote server
mput upload multiple files at once
mv move or rename file(s) on the remote server
open connect to a host
put upload a file from your local machine to the server
pwd print your remote working directory
quit finish your SFTP session
reget continue downloading files
ren move or rename file(s) on the remote server
rput continue uploading files
rm delete files on the remote server
rmdir remove directories on the remote server
psftp> pwd
Remote directory is /root
psftp> lpwd
Current local directory is C:\Documents and Settings\Administrador.CLIENTE\Escritorio
psftp>
```

### f. Xa estamos dentro do cliente psftp, como amosa o prompt psftp>

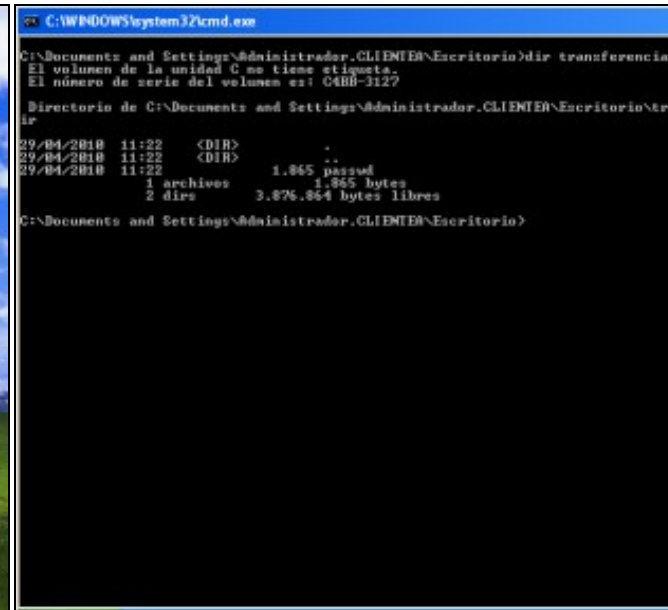
Para ver os comandos deste cliente na trasferencia de ficheiros executo o comando **help**.



```
C:\WINDOWS\system32\cmd.exe - psftp.exe -P 22 root@192.168.120.100

C:\Documents and Settings\Administrador.CLIENTE\Escritorio>mkdir transferencia_dir
C:\Documents and Settings\Administrador.CLIENTE\Escritorio>psftp.exe -P 22 root@192.168.120.100
Using username "root".
Using keyboard-interactive authentication.
Password:
Remote working directory is /root
psftp> help
? run a local command
! finish your SFTP session
cd change your remote working directory
chmod change file permissions and modes
close finish your SFTP session but do not quit PSFTP
del delete files on the remote server
dir list remote files
exit finish your SFTP session
get download a file from the server to your local machine
help give help
lcd change local working directory
lpwd print local working directory
ls list remote files
lsget download multiple files at once
mkdir create directories on the remote server
mput upload multiple files at once
mv move or rename file(s) on the remote server
open connect to a host
put upload a file from your local machine to the server
pwd print your remote working directory
quit finish your SFTP session
reget continue downloading files
ren move or rename file(s) on the remote server
rput continue uploading files
rm delete files on the remote server
rmdir remove directories on the remote server
psftp> pwd
Remote directory is /root
psftp> lpwd
Current local directory is C:\Documents and Settings\Administrador.CLIENTE\Escritorio
psftp> cd recuperar/etc
Remote directory is now /root/recuperar/etc
psftp> lcd transferencia_dir
New local directory is C:\Documents and Settings\Administrador.CLIENTE\Escritorio
psftp>
```





**l. Executamos o comando quit para sair do cliente sftp e finalizala conexión.**

**m. Na consola cmd executamos o comando dir transferencia\_dir para observar que o ficheiro foi transferido satisfactoriamente..**

--ricardofc [11/06/10]