

Answers to Even-numbered Exercises

22

2. What command would you give to mount on the local system the `/home` directory hierarchy that resides on the file server named `bravo`? Assume the mounted directory hierarchy will appear as `/bravo.home` on the local system. How would you mount the same directory hierarchy if it resided on the fileserver at 192.168.1.1? How would you unmount `/home`?

```
# mount bravo:/home /bravo.home  
# mount 192.168.1.1:/home /bravo.home  
# umount /home
```

4. What command line lists the currently mounted NFS directory hierarchies?

```
$ mount | grep nfs
```

or

```
$ df -t nfs
```

6. From a server, how would you allow read-only access to `/opt` for any system in `example.com`?

Place the following line in `/etc/exports`:

```
/opt *.*.example.com(ro,sync)
```

8. Describe the difference between the `root_squash` and the `all_squash` options in `/etc/exports`.

The `root_squash` option maps root to `nfsnobody`, while `all_squash` maps all users to `nfsnobody`.

10. Some diskless workstations use NFS as swap space. Why is this useful? What is the downside?

As it has no disk space, a diskless workstation has no swap space. The only choice is to use NFS; if it did not use NFS for swap space, the workstation would be limited by the amount of its physical memory (RAM).

Swapping in general is slow because disks are much slower than RAM. NFS is even slower than a local disk; any process that uses NFS swap will spend a long time waiting for pages to be swapped in.

12. What does the mount **nosuid** option do? Why would you want to do this?

The **nosuid** option forces setuid executables in the mounted directory hierarchy to run with regular permissions on the local system.

Giving a user the ability to run a setuid program can give that user the power of root. Normally, you do not want an ordinary user running a program as a privileged user.