Scope	Build a primary and secondary file server for a college dormitory with 100 users, three supervisors and two network administrators using two Windows 2012 Servers. The computers will have two 2 TB hard drives setup using RAID 1. The users will be saving their files created on Apple and Windows computers and connect to the machines by 100 Mbps Ethernet cable. The servers should have two network interface cards.
Active Directory	All 100 users will be loaded in Active Directory and they can only read and write to their own project folder. Supervisors will have their own accounts and have full permissions to read and write to all folders. Administrators will have their own accounts and have full permissions to read and write to all folders.
Security	Username and passwords will conform to institution rules used in other departments.
Roles	Active Directory, DNS, File services
Documentation	Create an installation manual showing every step to build the two servers for disaster recovery purposes. 1. Title page 2. Table of contents 3. Hardware requirements 4. BIOS settings 5. Windows 2012 installation 6. Drivers load 7. Updates and service packs 8. Security settings and audit policies 9. Active Directory setup 10. DNS setup 11. Personel load and folder setup 12. Establish RAID 1 backup 13. Procedure for Apple clients to save files to the server 14. Procedure for Window clients to save files to the server 15. Setup procedure for the secondary server 16. Testing 17. LAN Diagram 18. Index 19. Disk with Windows 2012 Server, drivers and documents

Procedures are at: http://www.worldclasscad.com/server2012.htm

Specifics:

Installation will be Windows 2012 Standard Server
All critical updates installed
All drivers installed (check your drivers before you reinstall)

- Refer to manufacturer' website

All password, account and audit policies set
Servers will have 2 NICs with the external card on the 192.168.10.0 network (use IP assigned)
Router address is 192.168.10.1
External IP address will be 192.168.10.2 and 192.168.10.3 (successive addresses per your IP address sheet)
Internal IP address is:

- Group 1:   192.168.50.1
- Group 2:   192.168.51.1
- Group 3:   192.168.52.1
- Group 4::   192.168.53.1
- Group 5:   192.168.54.1
- Group 6:   192.168.55.1

Install SNMP feature
The server will be a Domain Controller (AD load)

- Domain name will be dorms(number).local
- Primary DC name is dorm1
- Secondary DC name is dorm2

DNS forwarders will be:

8.8.8.8
8.8.4.4
209.18.47.61
209.18.47.62
74.202.52.145
216.136.95.2
64.132.94.250
206.222.120.186

Setup A host for your client computer
Setup a Reverse Lookup Zone
Setup a WINS server
Setup VPN and open the firewall for VPN
Setup a DHCP scope for 50 IP addresses
Setup printer and print server for network printer at 192.168.10.100
Synchronize your server with US Navy NTP server

Load yourself as an administrator with a user folder

Load your instructor as an administrator (email your instructor their username and password)

Create accounts for 100 users with shared folders

        User: Jane Smith

        Group: Student

        Password: JM1234

        Each student has full rights for their own folder

Create accounts for 2 instructors with a shared folders

        User: Ryan Thompson

        Group: Instructor

        Password: RT1234

        Each instructor has full rights for their own folder and for every student folder

Create accounts for 2 administrators (one for yourself and the other for your partner)

        User: Toni Golf

        Group: Administrators

        Password: ABCdef123

        Each administrator has full rights to every student folder

Setup Windows recommended file sizes for the server log

Logon on the server from the client computer as Jsmith (username)

Open a file in Microsoft Word and save it to the server (user's folder) as test.docx