

Using the EMP20 PROM Programmer

1. Make sure that the communications cable from the EMP20 is connected to the parallel port of the associated PC and that the power cable is plugged in before turning on the PC. There should be a small card inserted in the EMP20 next to the chip socket. If this card is not present, see the Professor.
2. Turn on the PC and login with your account. (Actually any valid account would work.)
3. Double click the shortcut on Windows XP desktop to run the program **EMP20**. The software will start and if the EMP20 programmer is properly connected it will complete by successfully connecting to the programmer. Press any key to get to the main menu.
4. Use the arrow keys or the mouse to select the manufacturer and then the actual target device. Note that for 16.480 and 16.552, we are using the Atmel AT28C16 EPROM.
5. Use the arrow keys or the mouse to move to entry area **V** and press the enter key. This will open a dialog box for you to specify the file name of the binary image for your EPROM. Make sure you include the full path to the file and then press the enter key.
6. Use the arrow keys or the mouse to select the **Load file from disk** option and press the enter key. This will load the specified binary image for your EPROM.
7. Insert the EPROM chip into the programmer and then lift the lever, locking the chip in place. Make sure that the EPROM is properly oriented by matching the chip orientation to the drawings on the EMP20.
8. Use the arrow keys or the mouse to select the **Program device** option and press the enter key. This will reprogram the EPROM.
9. Make sure to verify that the program was successfully loaded into the EPROM. You can verify against the buffer containing your binary file.
10. Once you have programmed the EPROM, press the **Escape** key to exit the EMP20 software, pressing the **Y** key when prompted by the software.
11. Lift the lever on the EMP20 programmer and remove the programmed EPROM. You are now ready to use the EPROM in your circuit.