How can I get more information on MATLAB?

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- If you know the name of the function you want help on you can use the matlab help command.

```
>> help           % lists the names of all Directories in the
                        % MATLABPATH search path
        >> help dir_name  % lists contents of directory dir_name, if
                        % dir_name is a directory in the MATLABPATH
                        % and contains a Contents.m file
        >> help fname     % Shows the help message for a particular function
```

  The command "more on" sets matlab to pause between screenfuls of text, rather than scrolling it beyond view. (Use spacebar to advance a page, RETURN to advance a line, "q" to exit from the item being displayed.) For example, typing "help fft" gives:

```
>> help fft

 FFT    Discrete Fourier transform.
        FFT(X) is the discrete Fourier transform of vector X.  If the
        length of X is a power of two, a fast radix-2 fast-Fourier
        transform algorithm is used.  If the length of X is not a
        power of two, a slower non-power-of-two algorithm is employed.
        FFT(X,N) is the N-point FFT, padded with zeros if X has less
        than N points and truncated if it has more.
        If X is a matrix, the FFT operation is applied to each column.

        See also IFFT, FFT2, IFFT2, FFTSHIFT.
```

- If you are unsure of the function name, you can try to find the name using the Matlab "lookfor" command. This command does a keyword search on the first comment line of each .m file in the MATLABPATH, and may take some time to finish. (The switch "-all" can be used to search through the entire first comment block, but this will lengthen the search.) For example

```
>> lookfor cartesian

 CART2POL Transform Cartesian to polar coordinates.
 CART2SPH Transform Cartesian to spherical coordinates.
 POL2CART Transform polar to Cartesian coordinates.
 SPH2CART Transform spherical to Cartesian coordinates.
```

- The MathWorks' web-based "Help Desk" includes a full documentation set in Adobe Acrobat (PDF) format, a searchable command index, and links to other information. It can be started from matlab:

```
>> helpdesk
```

  or from Athena

```
athena% add matlab; matlabdoc
```

  and it will open up in your web browser.

- There is a "Matlab on Athena" document (AC-71) available on the web at http://web.mit.edu/olh/Matlab/Matlab.html. SIPB also puts out an "Inessential Matlab" document.