**Question #1 (20 marks):**  
**For the following file type extensions provide a brief description of its purpose and what it is used for:**  
Example: .bmp short for:  bitmap used for: graphics, Microsoft Windows, no compression, very large files

1. **.jpg/jpeg**

.jpeg short for: Joint Photographic Expert Group used for: lossy graphics file, used by digital cameras, storing photos smaller than .bmp in size, compressed,

1. .**gif**

.gif short for: Graphical Interchange Format used for: web graphics, gif compression, image transfer and online storage, used to store multiple bitmap images in a single file

1. **.png**

.png short for: Portable Network Graphic used for: store graphics for web images, contains bitmap of indexed colors, lossless compression, improved version of .gif without the copyright problems.

1. **.psd**

.psd short for: Photoshop Document created by Adobe Systems used for: professional image-editing, enhance digital photos, and web graphics, used to create multiple layered images in a single .psd file

1. **.pdf**

.pdf short for: Portable document format created by Adobe Systems used for: saving documents and publications in standard format, can be used with any pdf viewer or editor, they preserve rich text electronically across different platforms.

1. .**mov**

.mov short for: Metal Oxide Varistor a video file extension developed by Apple is used for: storing different media types, using MPEG-2 codec compression

1. **.txt**

.txt short for: Plain Text File is used for: unformatted text, created using Notepad or TextEdit, storing plain text with basic fonts and styles

1. **.htm/html**

.html short for: Hypertext Markup Language which a standard web page file type used for: format text, tables, images, and contents for a webpage, saved in standard text format but consists of tags that denote the structure of a webpage

1. **.exe**

.exe short for: Executable file used for: execution, Windows, contains binary machine code and graphics for GUI, a program that is capable of being executed.

1. **.java**

.java is a source code file in Java programming language developed by Sun Microsystems used for: object-oriented programming approach

**Question #2 (6 marks):  
  
Although “dog.jpg” and “dog.JPG” and “Dog.jpg” and “DOG.JPG” all appear to be the same file, they are not considered the same when programming web pages on the Internet.  Why is that?  Consider the HTML code <img src=”dog.jpg”  /> when answering this question. Please consider the different operating systems involved: Microsoft Windows, Apple Macintosh, and Linux (the electron server, Web servers in general)**

The HTML code is not the problem here when it comes to file type it differs from the server it is deployed on. In other words, the type of Operating System it is being run on. Different OS handle strings differently:

* are case insensitive, so their servers are case insensitive as well.For example, dog.jpg, and .JPG and DOG.JPG are considered the same by windows
* Apple, UNIX and Linux web-based servers are case insensitive. So the above examples will be considered different.

**Question #3 (4 marks):  
  
How do you reveal the actual file name in either the Windows OR the MAC environment?**

In the Mac Environment, (macOS Mojave ver: 10.14.5)

* + - Goto the desktop, click on the Finder menu and choose preferences then click on the advanced tab and finally check-mark the show all file extensions button

**Question #4 (10 marks):**  
  
**When using today’s digital cameras file sizes are often saved in a format that is well over 1 Megabyte.  This may be great for high definition photo reproductions but is a disaster for uploading to the web.  Images on your web site should be no larger than 500 Kilobytes.  Describe how you would reduce the file size of an image.  Please choose from the following software programs: GIMP, Adobe Photoshop(if you have it), FormatFactory, or IrFanView.  You DO NOT have to purchase a program for this assignment.  Most of these are free.**

Image size reduction using Adobe Photoshop

* + First, I would open the image in the Adobe Photoshop domain, then click image on the toolbar (located at the top of the screen) then click image size. After the small screen of the image size box pops up. There is various settings(adjusting pixels) that enables one to choose from to reduce the size of the image. Then save the image and finally the image has been reduced.