

I co-authored this training manual and this is part of one session.

Session 3

Web Server Installation and Overall configuration

Web Server software is installed on a computer just as we would install any other software. If the software is installed on a Windows platform, this process is far less complicated than in any other platform such as UNIX. Usually when Web Server software is installed and operated on a computer, there are some default settings chosen by the installation software itself. Following are some of those parameters that you need to be aware of.

Port 80: Port number 80 is the standard port number assigned for Web Servers. This is the TCP/IP port. In the settings for the server, there are ways to change this if one wishes to do so. Situations when a different port number would be used include: access to the administrative functions, other private applications, etc. are

Root Directory: This location is where all server specific pages, tools and other software are placed. These may be located in subdirectories or sub folders of the root directory. In some cases, this also acts as the Document Root where the default home page for the site is placed. During the installation of the server software, the user is provided with a chance to choose the Root Directory. Once the software is installed and if we want to change the Root Directory, it would have to be done with extreme caution since this could result in the failure of the Web Server software to start.

Document Root: This is the directory where the home page or the default page for the Web site is placed. Usually this is a sub directory of the Root Directory. It can also be a separate directory somewhere else in the system. Once this is set, then that directory corresponds to the Document Root of the site.

Server ID/Server IP Name/Server IP Address: When the server is accessed from a remote workstation using a browser, usually we type in <http://www.myserver.com/>. This is typically referred to as the URL (Uniform Resource Locator). However, www.myserver.com also happens to be the IP Name of the server. Sometimes it is also referred to as Server ID.

Content Management

A document is obtained using its URL, which contains the name of the server and name of the document on that server. The information on the server may be organized in many ways according to the needs of the server and information provider. The web server acts as a translator between the simple view of a single tree of a document, which is what users of the browser see, and the files that contain the information.

In the case of IIS, such mapping is done using Virtual Directories. In the case of PWS, this is referred to as an Alias. A Virtual Directory is created in IIS and while defining its properties, one can map this to any file system folder. The virtual directory name is entered by the user of the browser and the files from the file system folder that this virtual directory is mapped to are presented to the user. The first file that is displayed is often referred to as the Default Document. In IIS, you would be able to set this in the Document Properties of the Virtual Directory.

Following is a table that maps Virtual Directories to URLs and also to File System path names.

Web Site Manager

Virtual Directory (Alias)	URL	File System Path
/	http://www.myurl.com/	c:\inetpub\wwwroot
/image/	http://www.myurl.com/image/	c:\inetpub\wwwroot\images\
/demos/	http://www.myurl.com/demos/	c:\mydemos\default.htm
/projects/	http://www.myurl.com/projects/	c:\projects\index.htm

Notice that in the case of “demos” we chose default.htm as the default page whereas in the case of “projects” it is index.htm. This can be configured using IIS Management Console. Also notice that in the case of “images” the file system folder is a sub folder of the Document Root itself whereas for “demos” and “project” they are located elsewhere in the file system. The HTML files in this location can refer to the image files sitting in the “images” directory using its virtual path. For example, a link can be created in the “index.htm” file of projects that can refer to a file in “images” by “/images/icon.gif”.

