Chapter: 04   Web Application Server

❖ Introduction

- **Web server** is a server that used to deliver web content to end-user that request by using HTTP protocol through internet connection.

- **The Apache:** web server is the leading web server software**IIS (Internet Information Service):** is an extensible web server created by Microsoft for use with Windows NT family
- **Wamp Server/ XAMPP Server or LAMP Server** those are open source.

❖ Basic Functional of Server
- A web server delivers data requested by a browser
- In Static or Dynamic Website contained data such as:

    ✓ HTML

    ✓ Image

    ✓ video or sound files

- Browsers and servers communicate using HTTP

    ✓ A web server can also perform tasks, such as

    ✓ Limiting access to specific pages

    ✓ Logging access to a file

    ✓ Encrypting the connection

❖ Pre-requisite
Before install and configure web server make sure that you already have:
- Assign IP address to web server
- Assign hostname to web server
- Add DNS record for web server and CNAME record for websites

❖ Step to install Web Application

1. Open **Server Manager**

2. Under **Manage** Menu, select **Add Roles** and **Features**

3. Select Role-based or Feature-based installation

4. Select the appropriate server (local is selected by default)

5. Select **Web Server (IIS)**

6. No additional Features are needed for IIS, so click **Next**

7. When the IIS installation completes, the wizard reflects the installation status

❖ Configure Hosting Website on IIS

To create a new Web site in IIS, follow these steps:

1. Log on to the Web server computer as an administrator.

2. Click Start, point to Settings, and then click **Control Panel**.

3. Double-click **Administrative Tools**, and then double-click **Internet Services Manager**.

4. Click Action, point to **New,** and then click **Web Site**.

5. Type site name for Web site. This description is used internally to identify the Web site in Internet Services Manager only. Then brow to website folder on local drive.

6. Select the IP address to use for the site.
   If you select All (unassigned), the Web site is accessible on all interfaces and all configured IP addresses.

7. Type the TCP port number to public the site on

8. Type the Host Header name (the real name that is used to access this site)

9. Select the access permission for the Website.
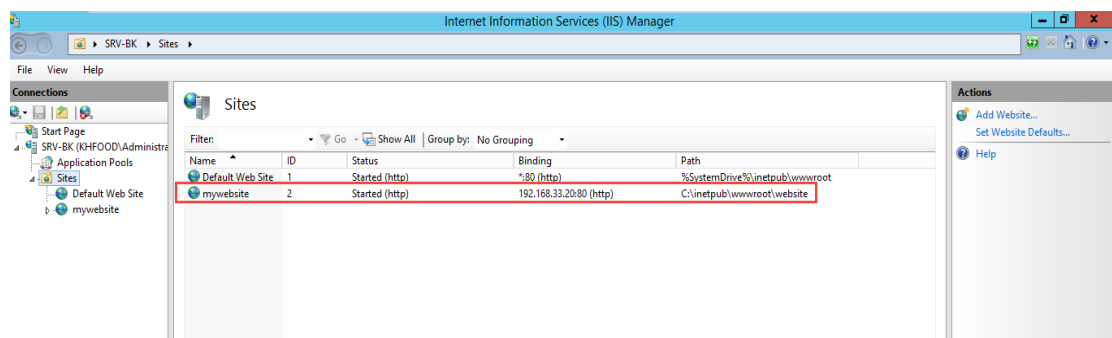
❖ Configure Virtual Host on Web server

▪ The Concept of Virtual Hosts

- By default, setup the following URLs below can be used to access the files in the Document Root (C:\inetpub\wwwroot)

  http://localhost

  http://web_server_IP_address

  http://*web_server_hostname*

▪ Apache can be configured to host multiple virtual web servers on one physical system

  ✓ Called virtual hosts

  ✓ A DNS entry is needed for each virtual host
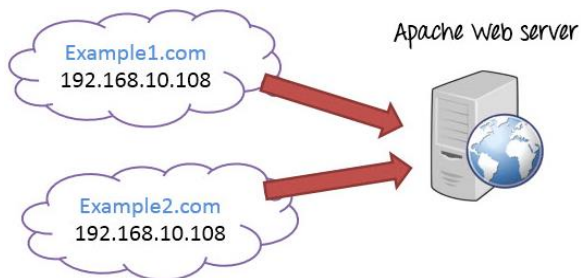
Domain Name	IP Address
www.ramki.com	192.168.1.15
www.krishnan.com	192.168.1.15
www.blog.ramki.com	192.168.1.15

- "**Virtual hosting**" means hosting multiple web-sites with different domain names on the same IP address.

- **Binding** is to configure an alias name to web server.

- In the "**Site Bindings**" dialog, select the first item, and click the "Edit" button:

- Enter the web-site domain name in the "Host name" field:

- Click the OK button in all the dialogs to save your changes.
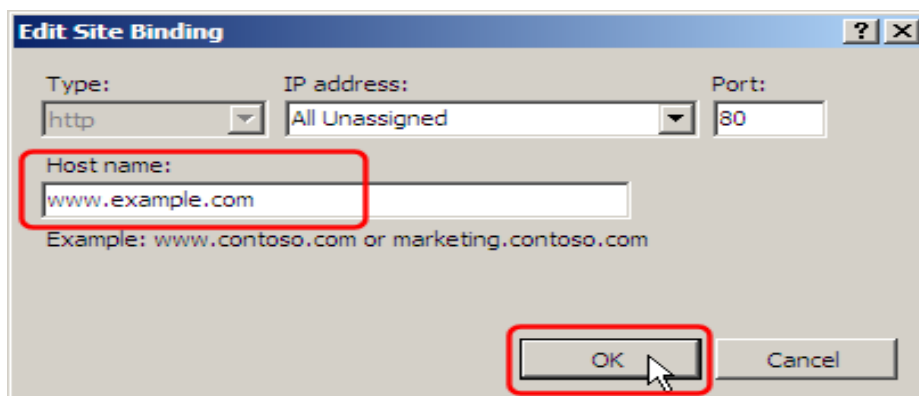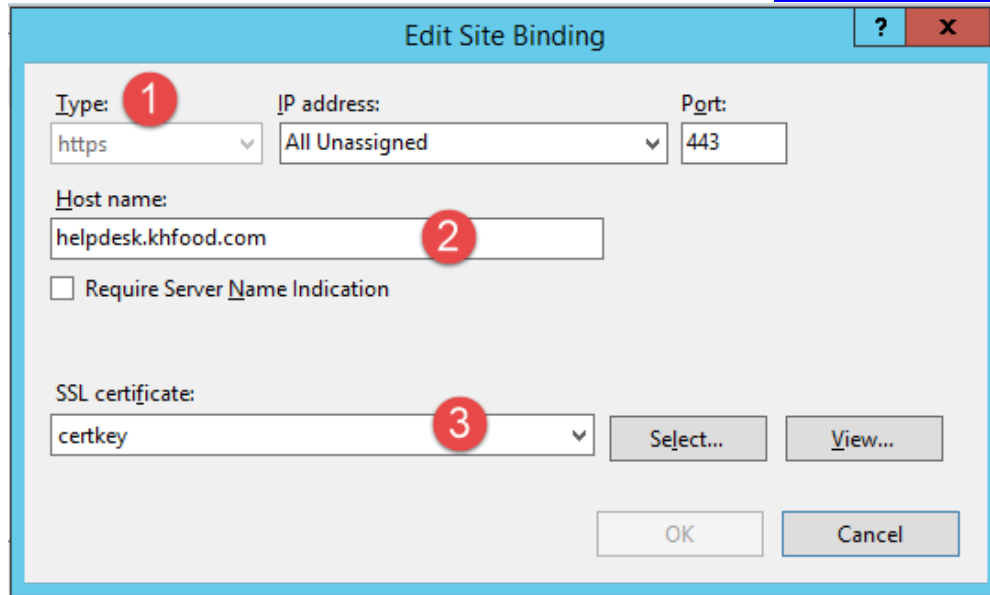
❖ How to hosting Multiple Web Site

1. On Webserver we can hosted multiple website on the single Server as following step below:

2. Create virtual name (Record name on DNS)

3. Copy Web site to Web Server, path C:\inetpub\wwwroot

4. Create the new Website on IIS manager, and set the path of website place in inetpub\wwwroot

5. Set IP Address to unassigned and Set virtual Host

6. If you want to hosting multiple website you just add new website then hosting

❖ How to Create Certificate for SSL

To install and configure Certificate following Step below:

1. On Web Server need to Join Domain to AD DS

2. Logon User administrator from Domain Controller

3. Add Role on Web Server Choose name **Microsoft Certificate Authority**

4. After finished install MCA, click on notification icon then choose Configure Active Directory Certificate

5. After finished configure, Go to IISM then Create Certificate Request

6. After configured Certificate request, Click on Default site then choose certificate then click on brow on the right side

7. After brow copy Certificate Request contain in file text to past on browser

8. Download Certificate, then go to certificate on IISM choose option Complete certificate, brows to certificate place that already download

9. Go to website that you want to configure using HTTPS, bind add new https, URLs.

Passerelles numériques
A Gateway for Life

❖ What is Wamp Server?

WAMP stands for "Windows, Apache, MySQL, and PHP." WAMP is a variation of LAMP for Windows systems and is often installed as a software bundle (Apache, MySQL, and PHP). ... One popular package is called "WampServer," which provides a user-friendly way to install and configure the "AMP" components on Windows.

❖ How to install WAMP Server

To install Wamp on Windows Server we need following step below:
- Install Microsoft Virtual C++ 2008, 2010, 2013
- Install Wamp Server verion 2.5 (Don't using Verion 3.5 because we need to update the server, if we using verion 2.5 no need to update and we can use.)

*** Noted: Test install Wamp Server if it working no need to install Mcrosoft Virtual C++

✦ Summary Lesson:

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✦ Summary Lesson:

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