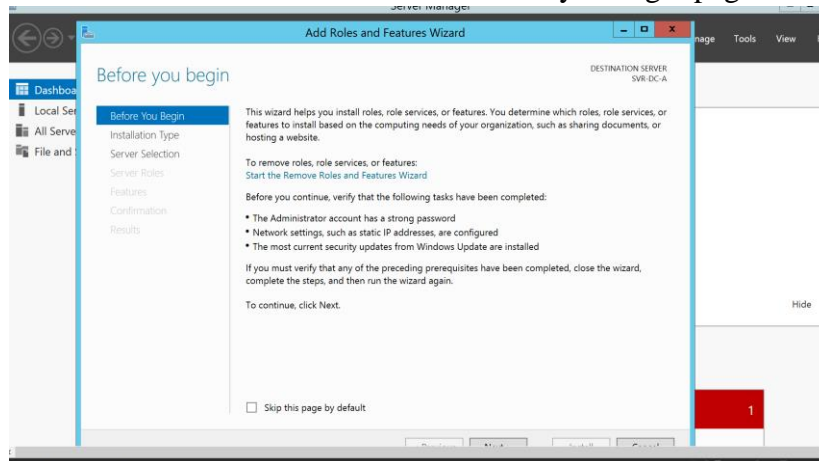# Installing Domain Controller

Lab Objectives:

- Installing Active Directory Domain Services Role
- Creating A New Forest
- Creating a Child Domain

For This Lab we will Deploy two Windows 2012 servers in a local Network in VMs. Which will be configure to function as the domain controllers for a domain called *adatum.com*
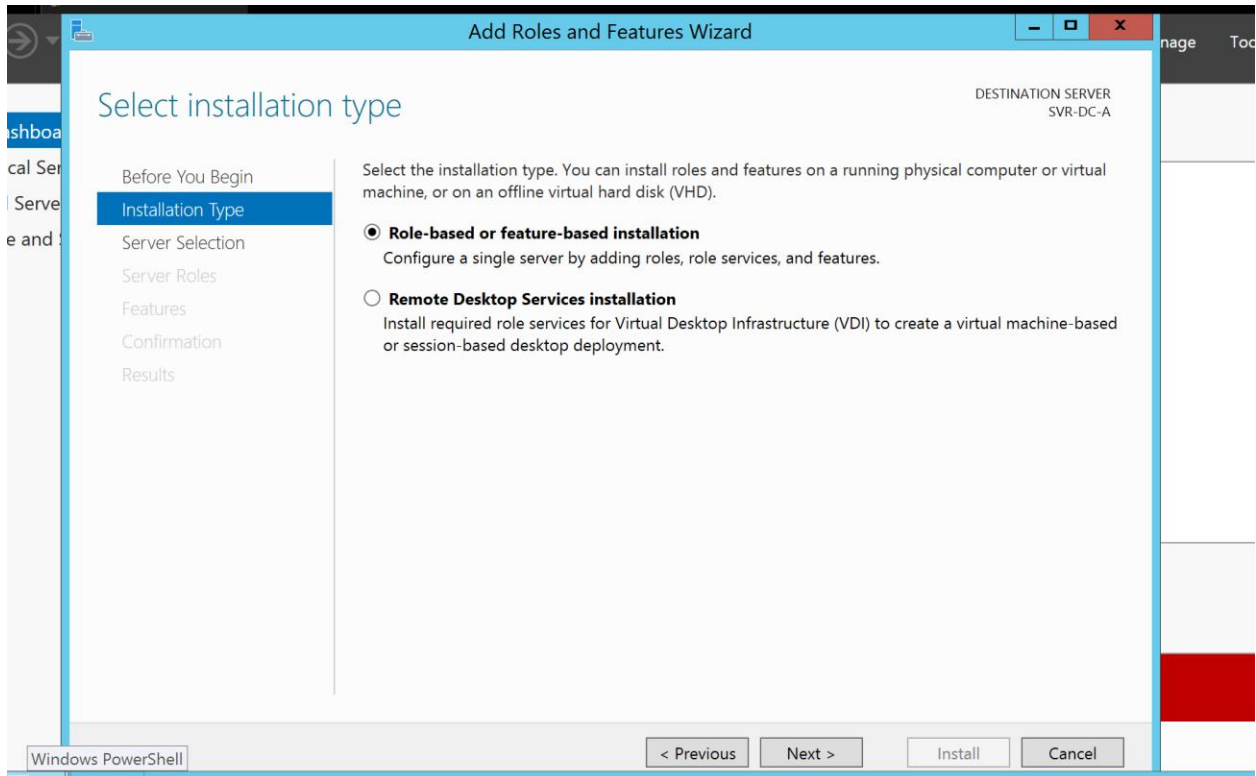
- Login the SVR-DC-A computer using password Pass@word01
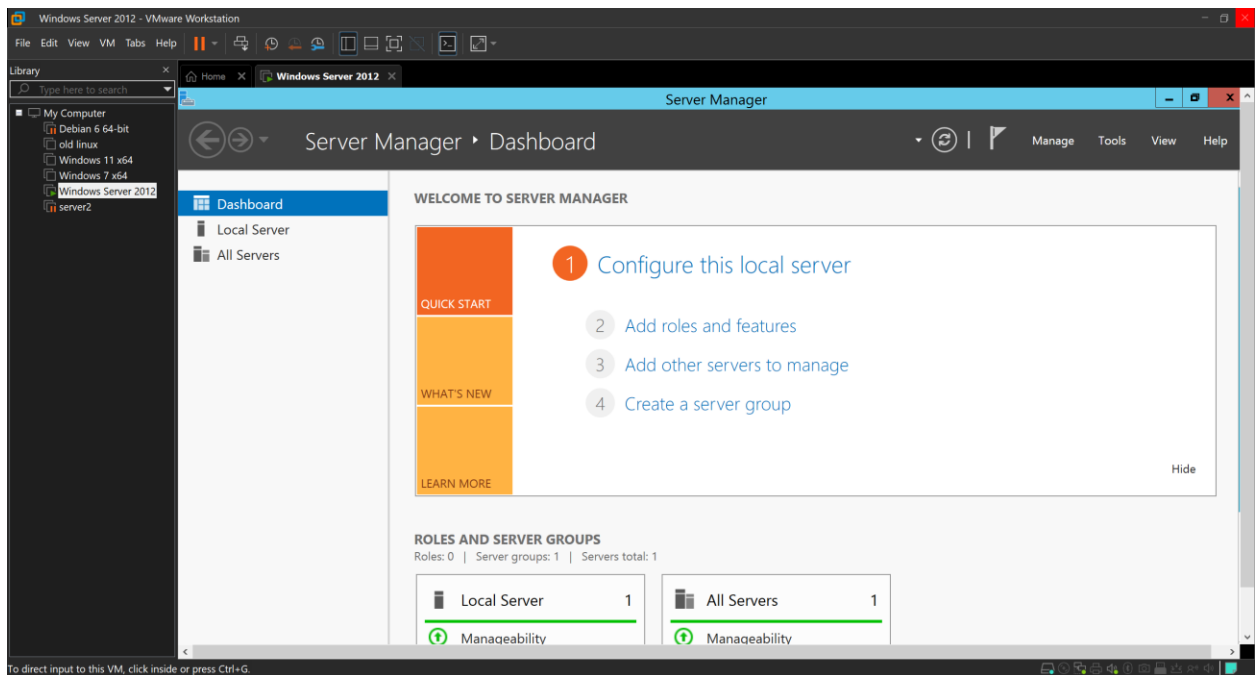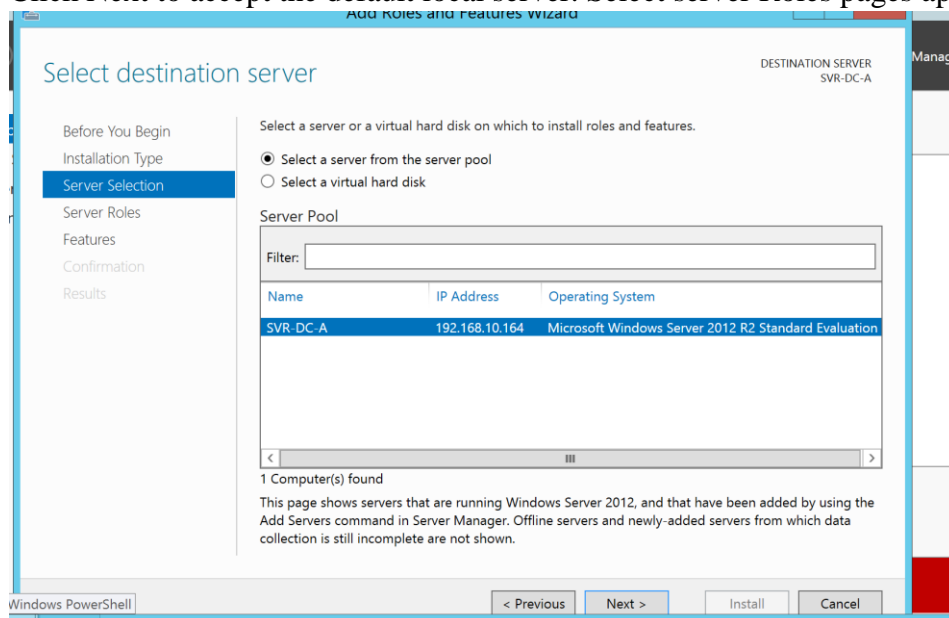

- Select Add Roles and Features and Before you begin page.
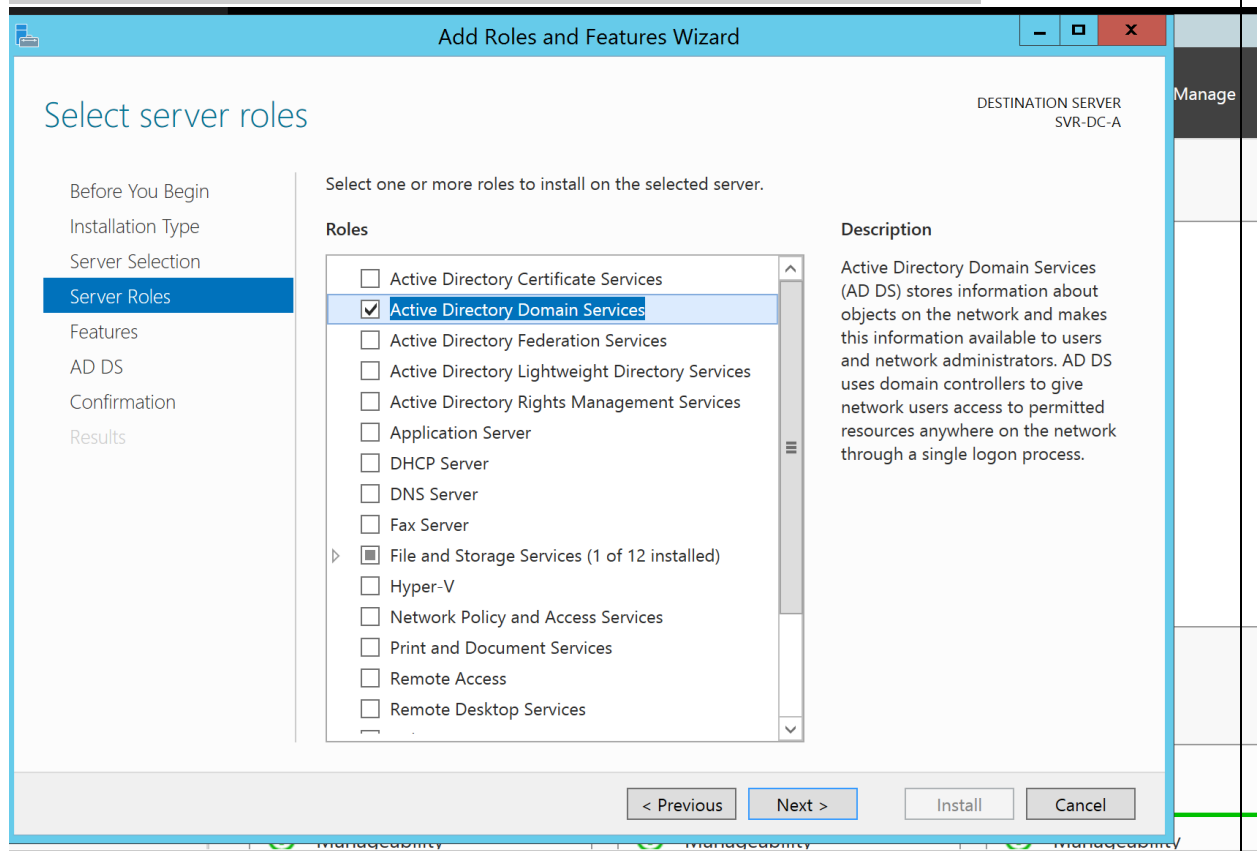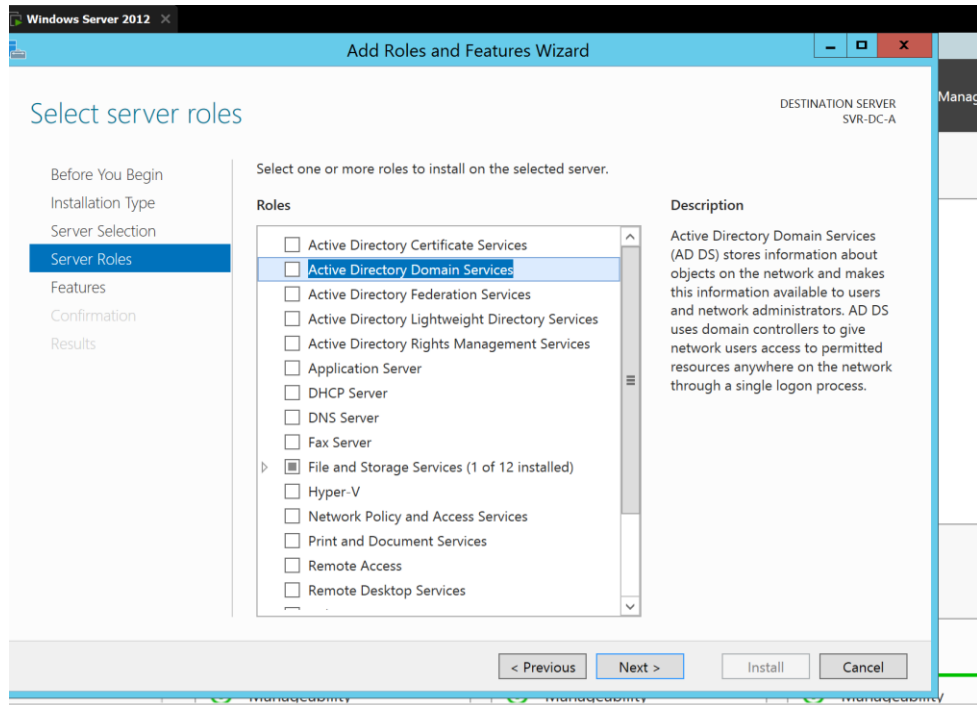

- Leave the Role-Based or feature-based installation and click next.
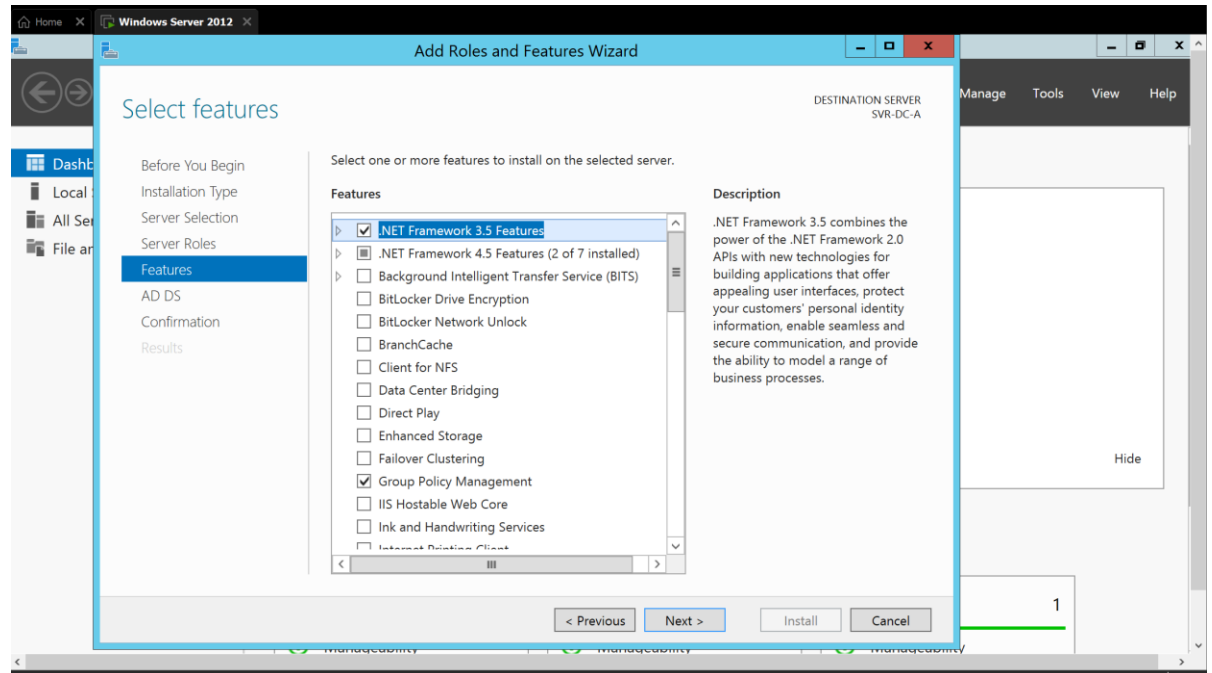
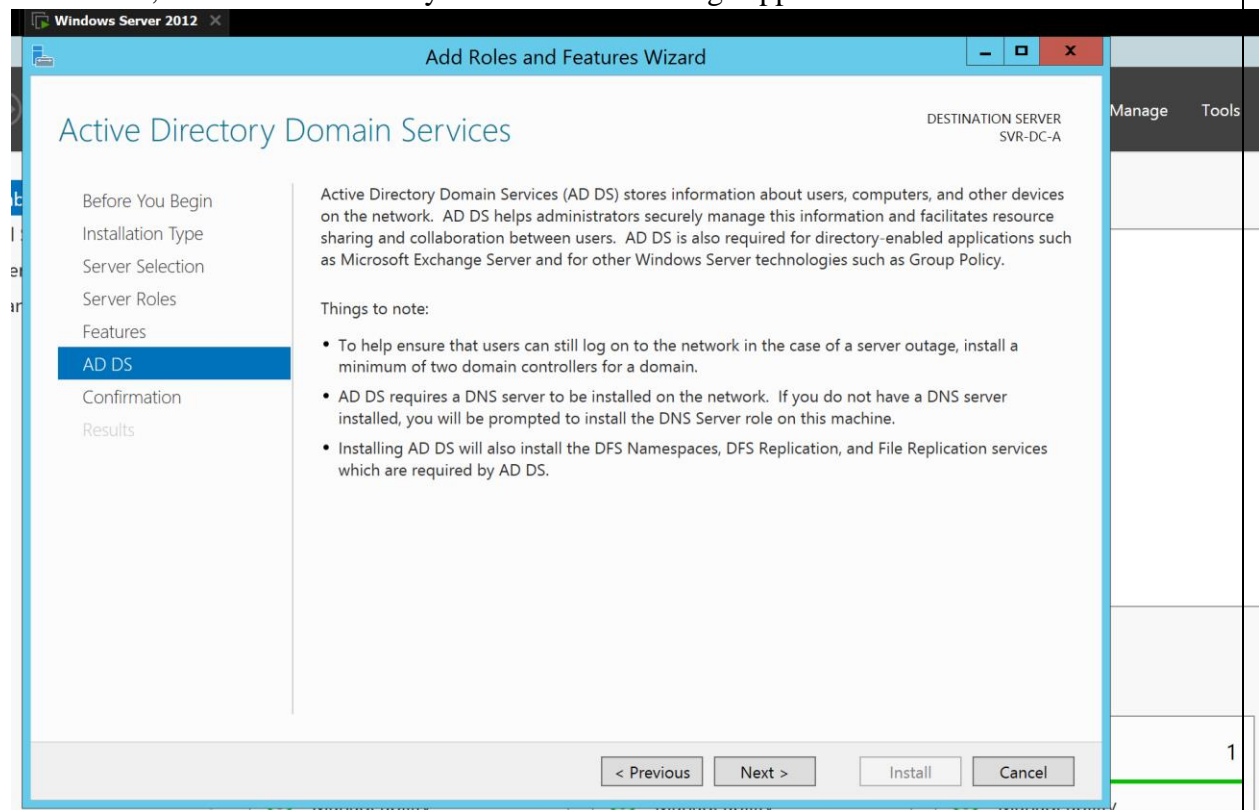- Click Next to accept the default local server. Select server Roles pages appears.

- Select the Active Directory Serve check box. The Add features that are requires for Active Directory Domain Services? Page appears

Add Roles and Features Wizard

Windows Server 2012

Select server roles

DESTINATION SERVER
SVR-DC-A

Select one or more roles to install on the selected server.

Before You Begin
Installation Type
Server Selection
Server Roles
Features
Confirmation
Results

Roles

- [ ] Active Directory Certificate Services
- [ ] Active Directory Domain Services
- [ ] Active Directory Federation Services
- [ ] Active Directory Lightweight Directory Services
- [ ] Active Directory Rights Management Services
- [ ] Application Server
- [ ] DHCP Server
- [ ] DNS Server
- [ ] Fax Server
- [▣] File and Storage Services (1 of 12 installed)
- [ ] Hyper-V
- [ ] Network Policy and Access Services
- [ ] Print and Document Services
- [ ] Remote Access
- [ ] Remote Desktop Services

Description

Active Directory Domain Services (AD DS) stores information about objects on the network and makes this information available to users and network administrators. AD DS uses domain controllers to give network users access to permitted resources anywhere on the network through a single logon process.

< Previous | Next > | Install | Cancel

Add Roles and Features Wizard

Select server roles

DESTINATION SERVER
SVR-DC-A

Select one or more roles to install on the selected server.

Before You Begin
Installation Type
Server Selection
Server Roles
Features
AD DS
Confirmation
Results

Roles

- [ ] Active Directory Certificate Services
- [✓] Active Directory Domain Services
- [ ] Active Directory Federation Services
- [ ] Active Directory Lightweight Directory Services
- [ ] Active Directory Rights Management Services
- [ ] Application Server
- [ ] DHCP Server
- [ ] DNS Server
- [ ] Fax Server
- [▣] File and Storage Services (1 of 12 installed)
- [ ] Hyper-V
- [ ] Network Policy and Access Services
- [ ] Print and Document Services
- [ ] Remote Access
- [ ] Remote Desktop Services

Description

Active Directory Domain Services (AD DS) stores information about objects on the network and makes this information available to users and network administrators. AD DS uses domain controllers to give network users access to permitted resources anywhere on the network through a single logon process.

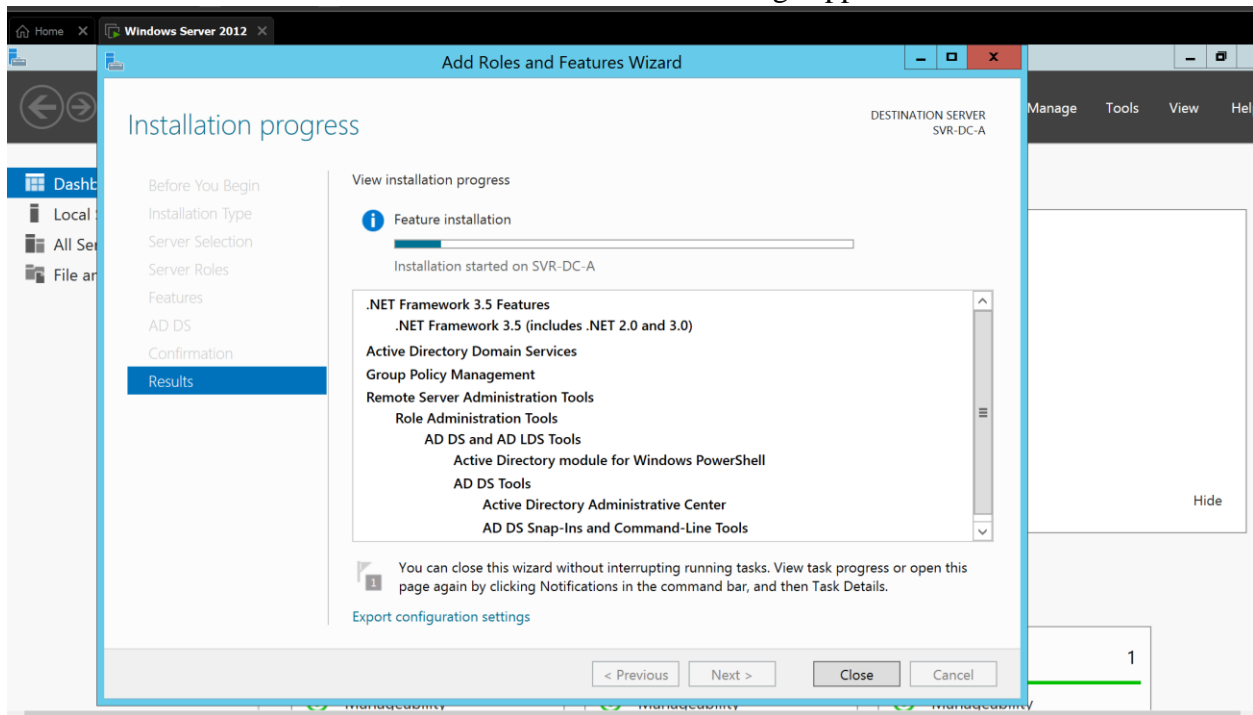< Previous | Next > | Install | Cancel

- Click Add Features Page.

- Click Next, The Active Directory Domain Services Page appears.

- Click Next the Confirm Installation Selection Page appears.

- Click Close. The Add Roles and Features Windows closes. In Server Manager click Tools, Active Directory Users and Computers. The Active Directory User and Computers console fails to open properly.

- End Lab.

Task 3.2

Creating a new Forest.

Once you have Installed the Active Directory Domain Services role, you must promote the server to a domain controller. In this lab you will create a new forest and configure the server to function as the domain controller

- On SVR-DC-A, in a Server Manager, click the AD DS Link in left panel.
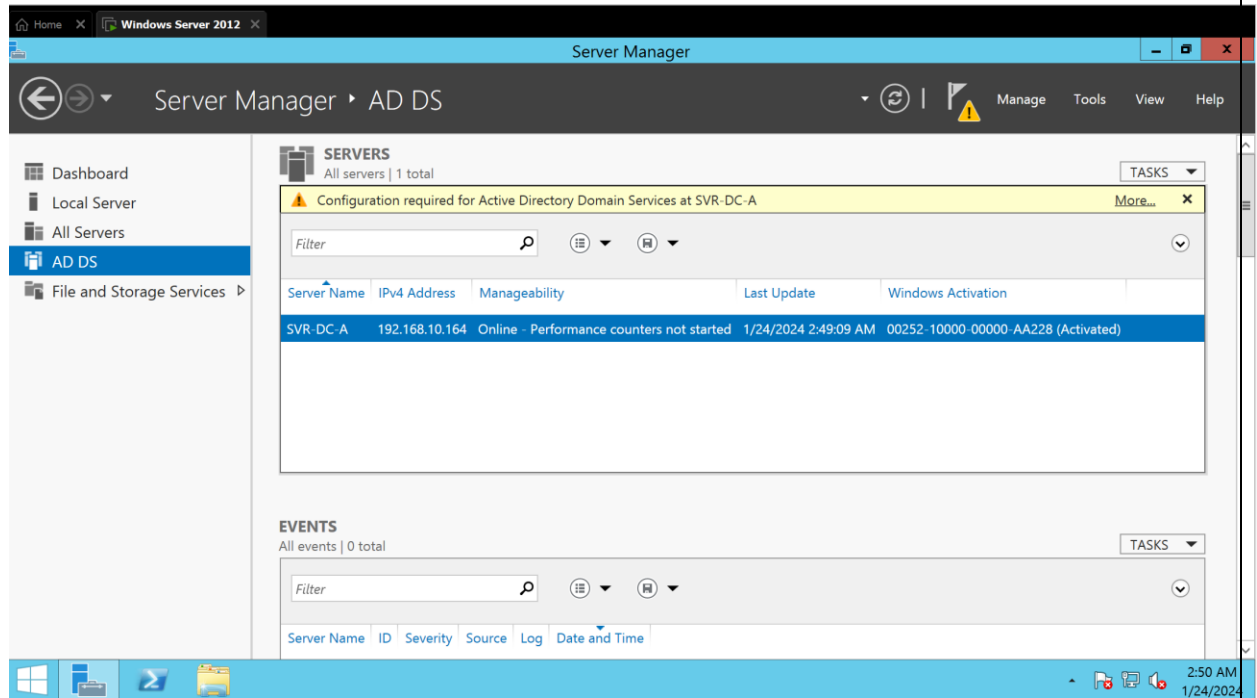
- Click on More Link. The All Servers Tasks Details window appears.
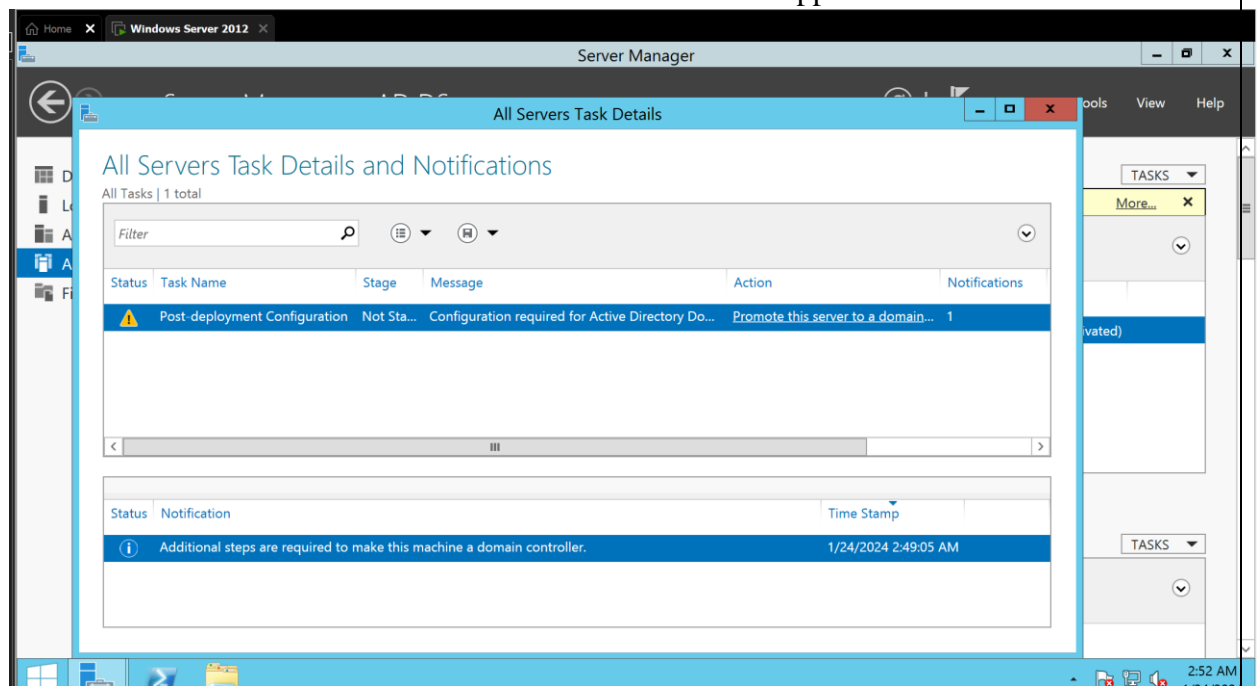
- Click Promote this server to Domain Controller. The Active Directory Domain Services Configuration wizard appears.
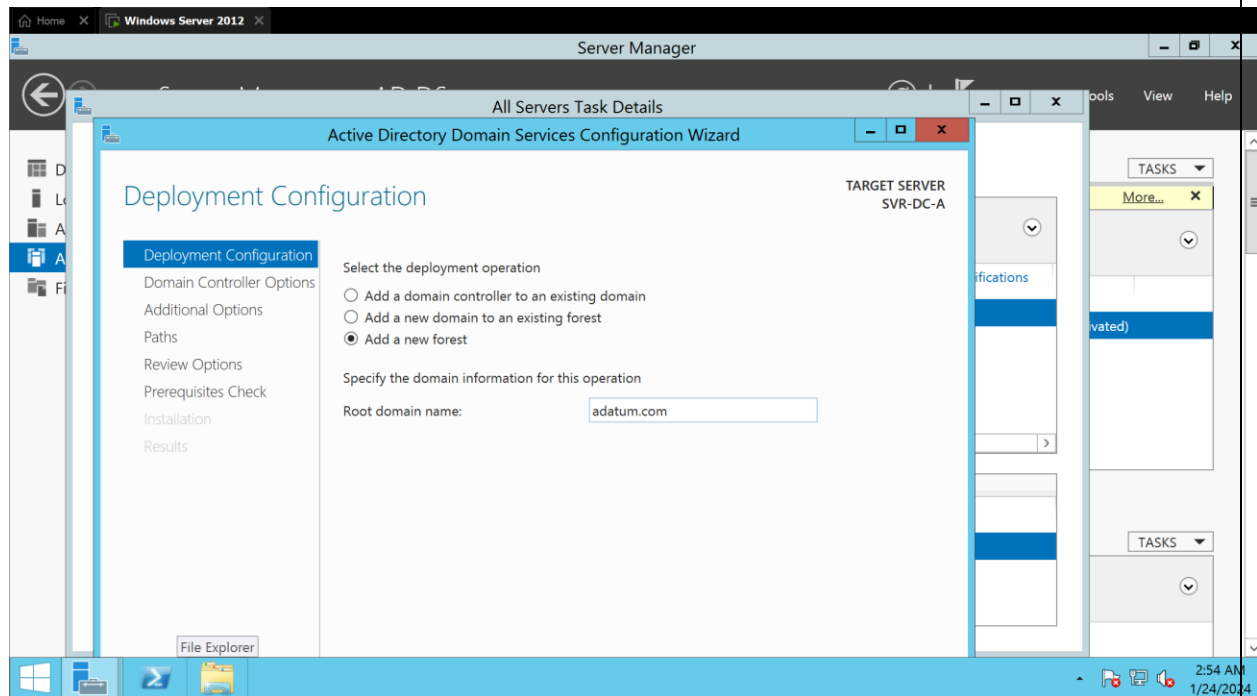
- In Domain Controller option, Password and Confirm Password text box, type Pass@word01 and click next.
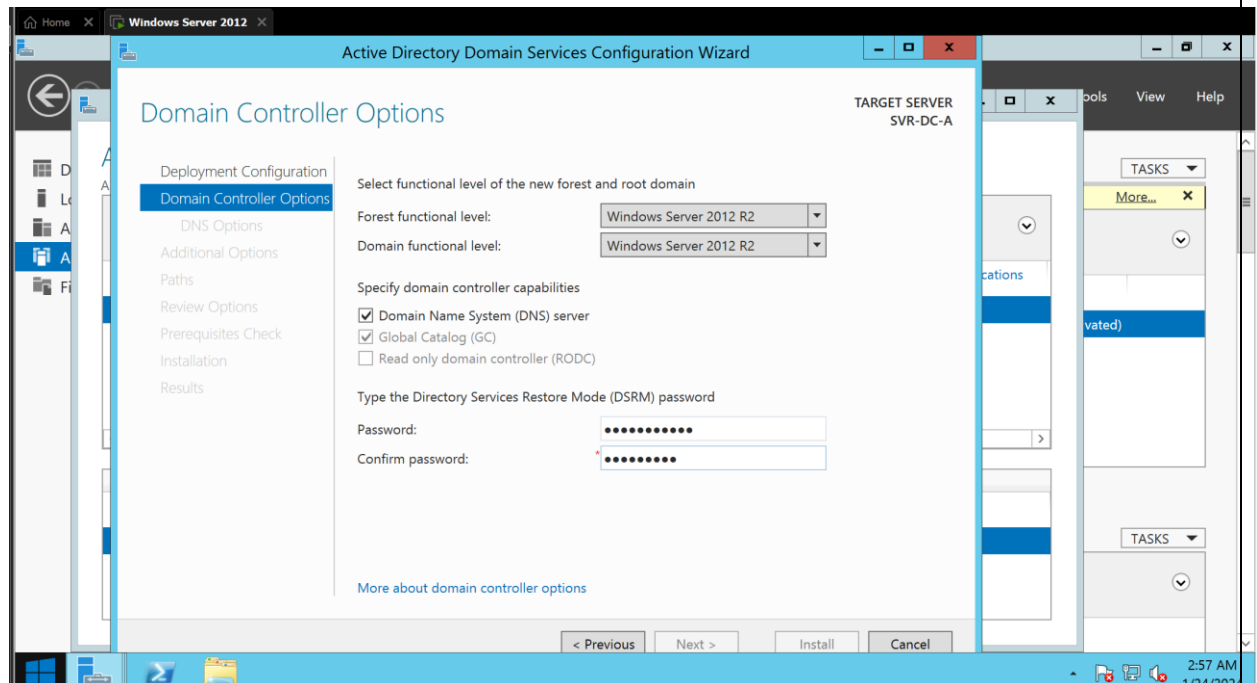
- Click Next, The Additional Options page appears and, after that brief delay the NetBIOS domain name appears in the text box,
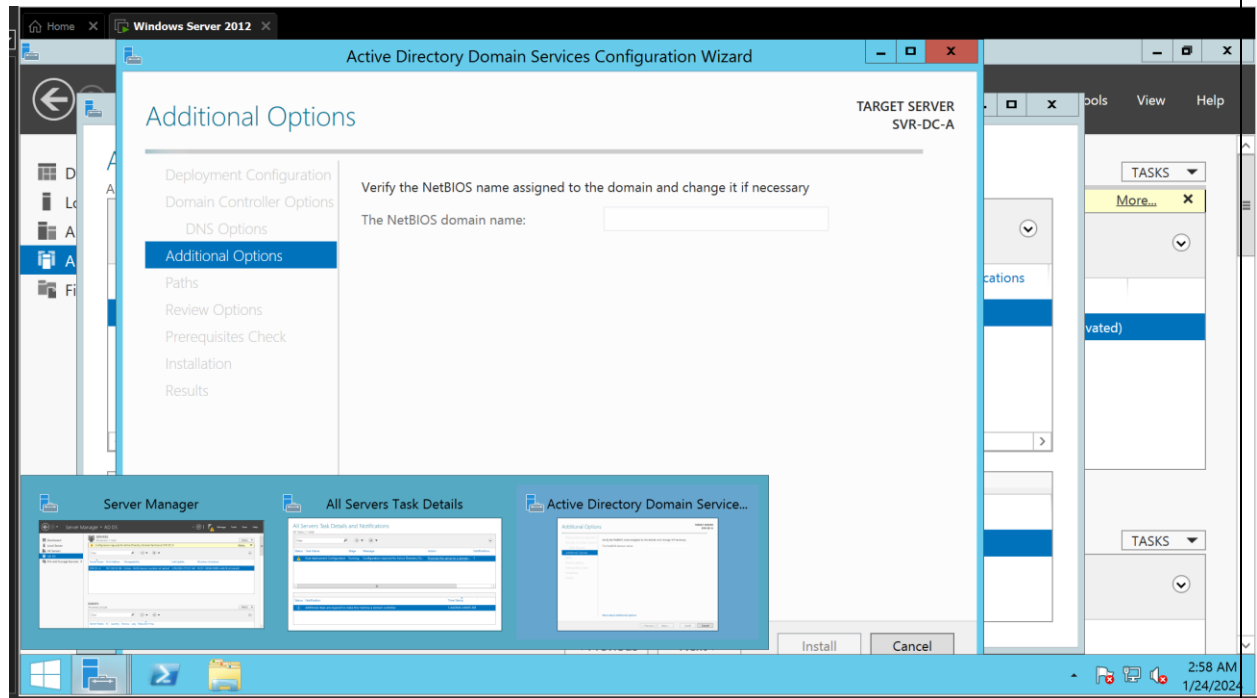
- Click Next, The Path page appears.
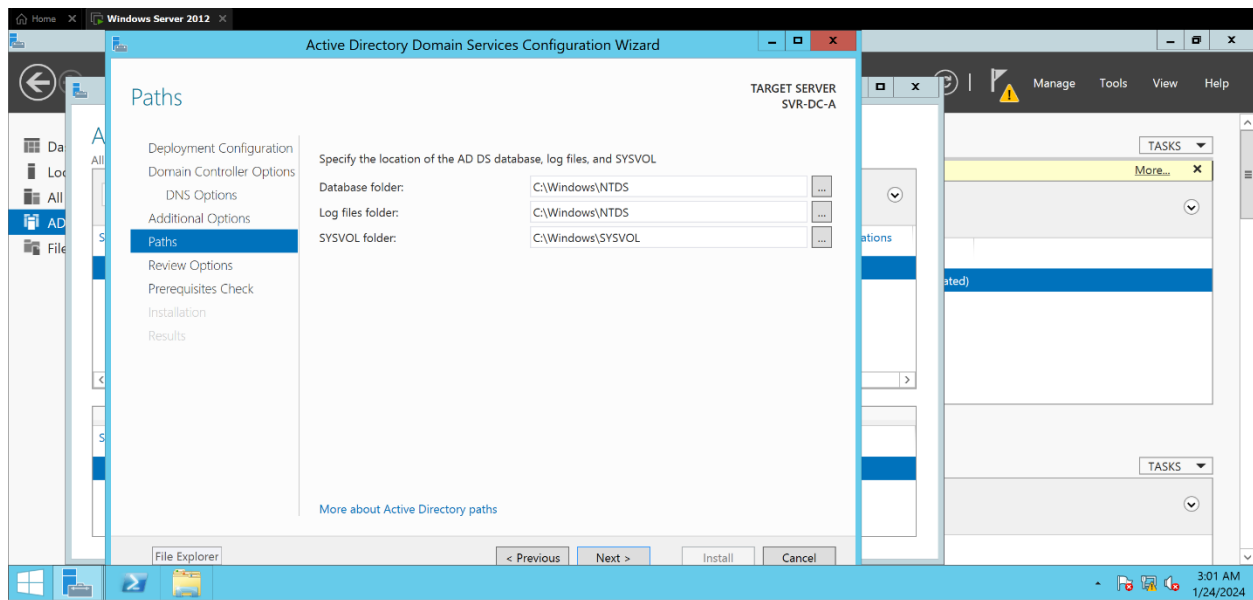
- Click Next, the Review page appears.
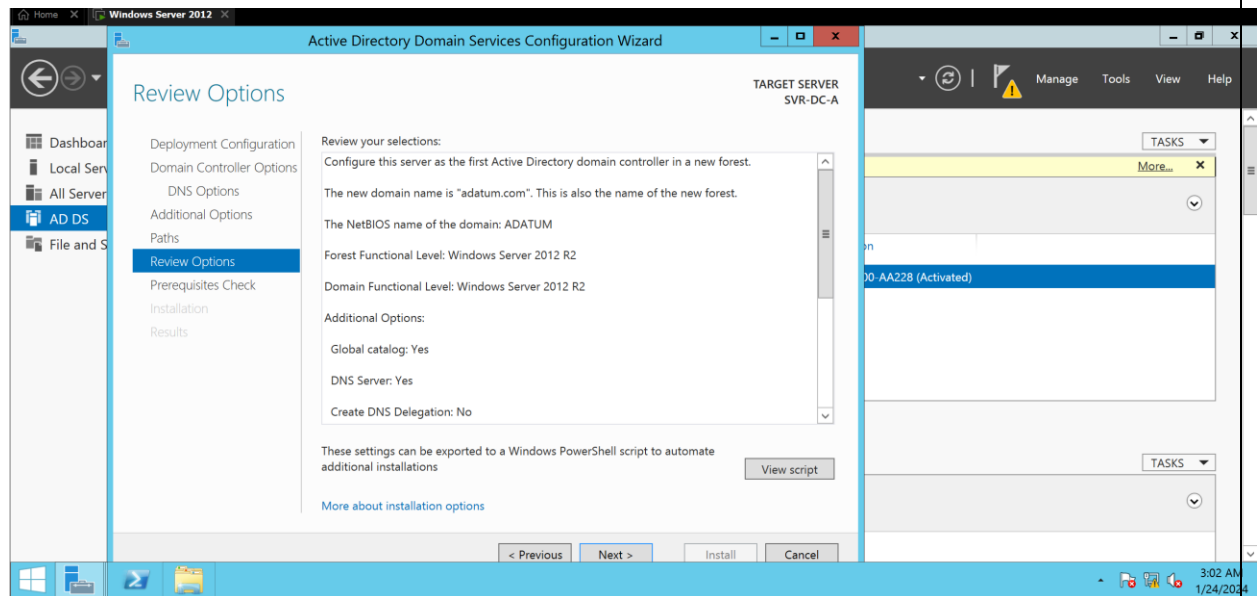
- Click the View script button. A Notepad Window appears contain windows power-shell scripts equivalent to settings that are just configured.
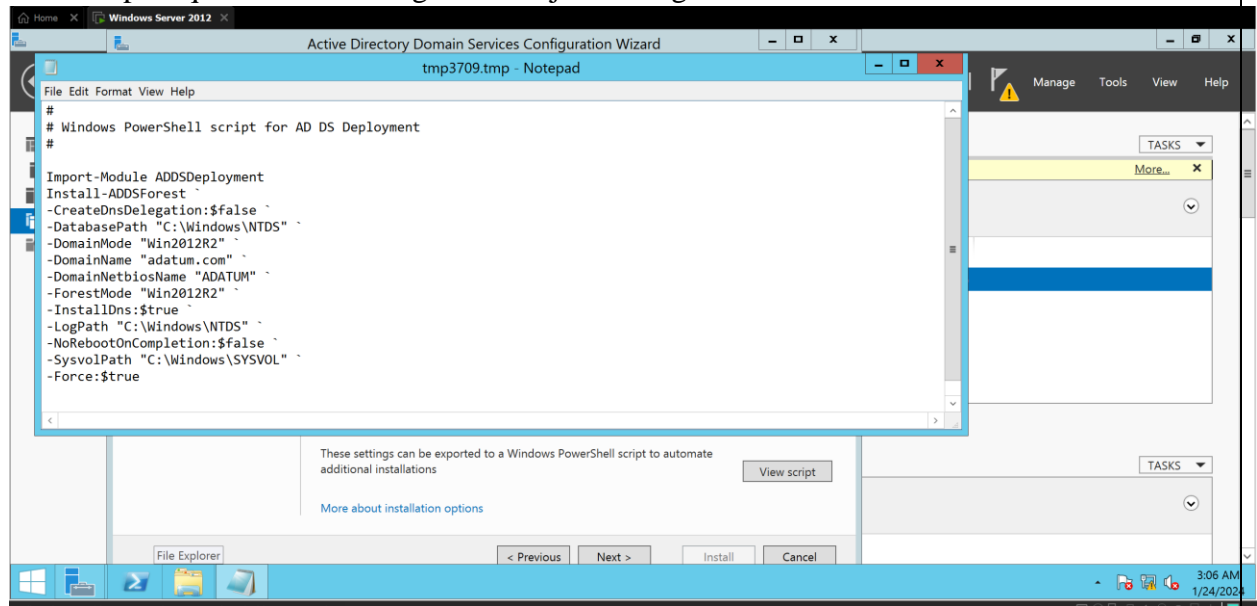
- Click Install to complete installation, Installation page appears as the window creates the new forest and promote the server to domain controller.
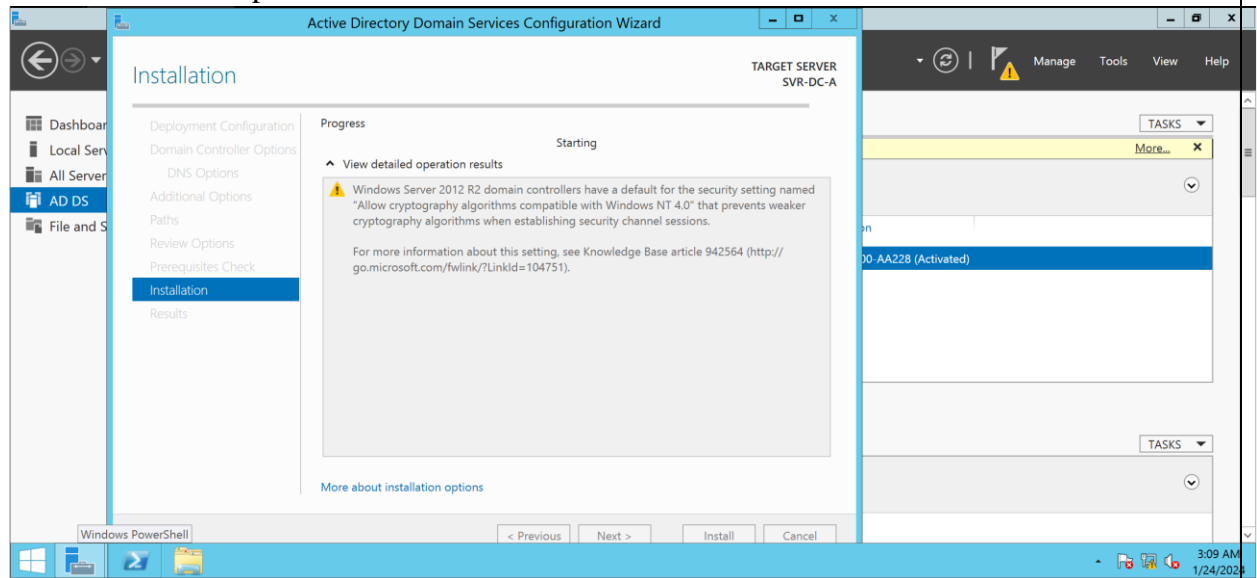
- Installation Begins.
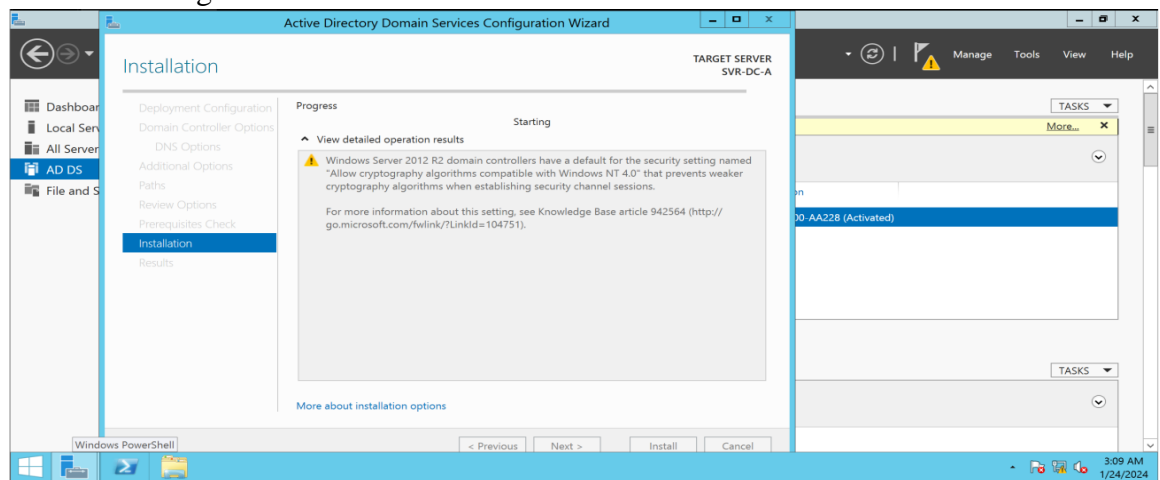
- After Installation System rebooted.
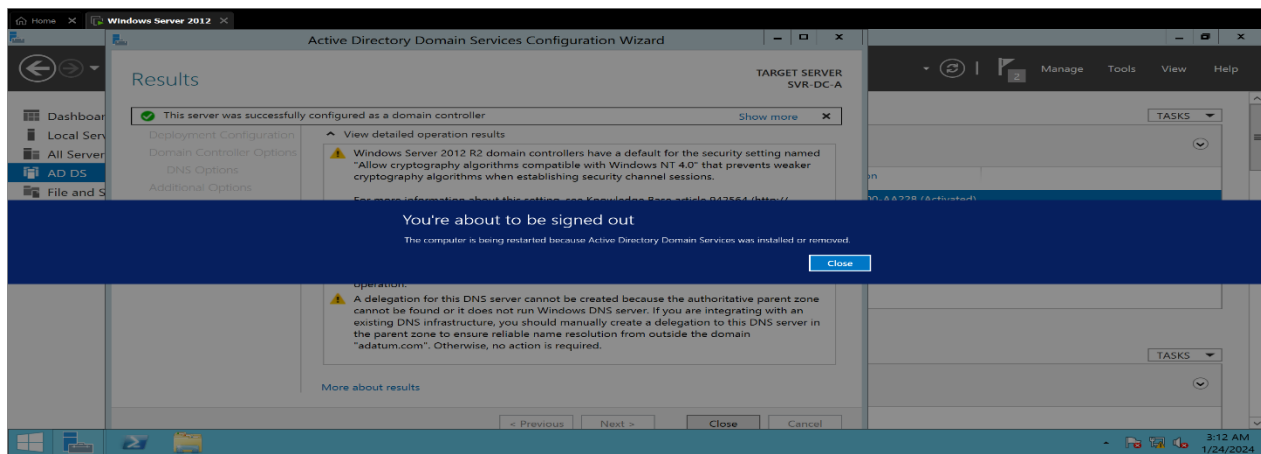
- Login using Adatum\Adminstrator and the Password Pass@word01.
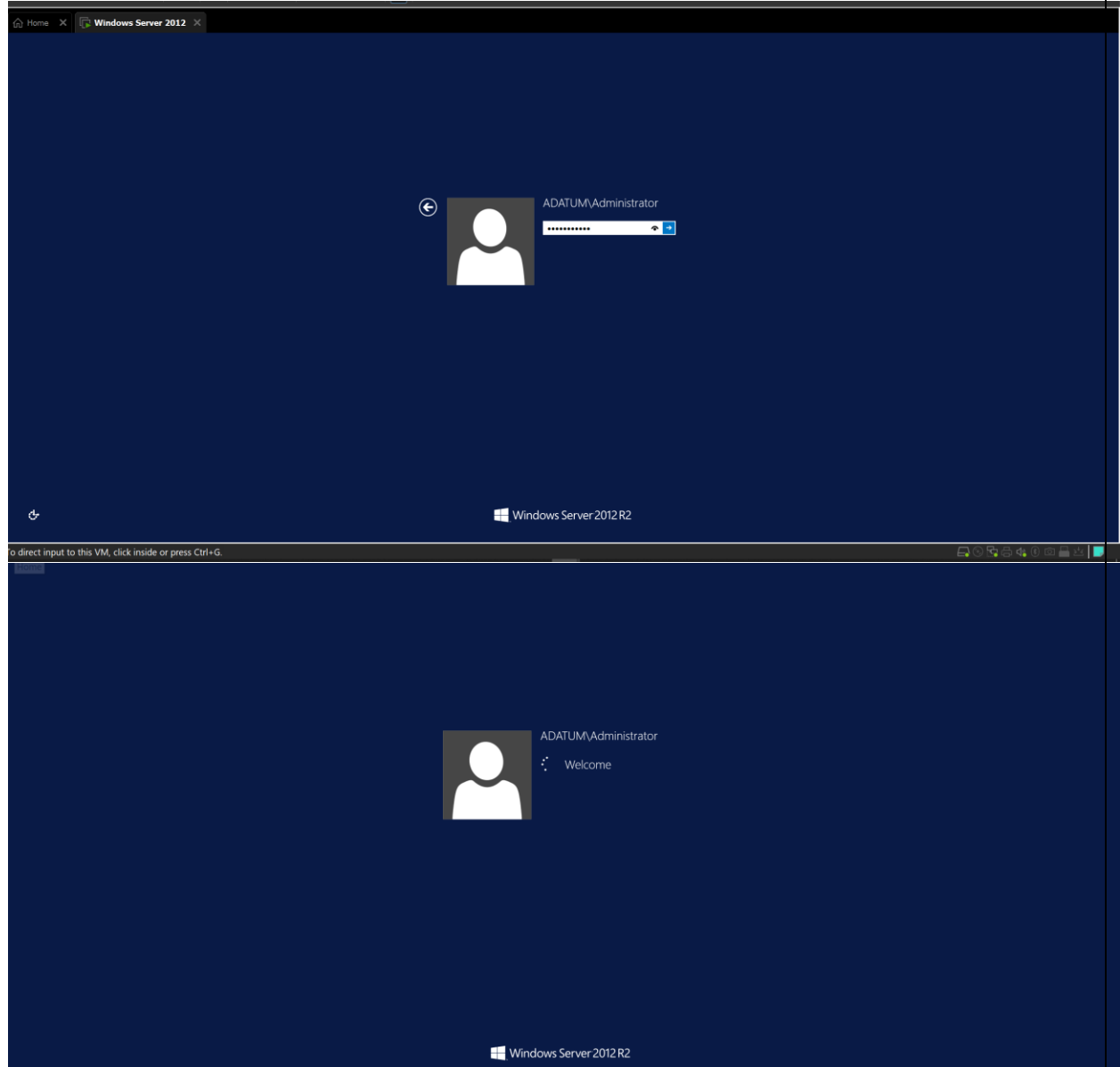
- End of Lab.

Creating a Child Domain.

In this lab you create a subdomain beneath the Adatum.com domain you created previously.

- Login to SVR-DC-B Computer using local Adminstrator account and the password Pass@word01.
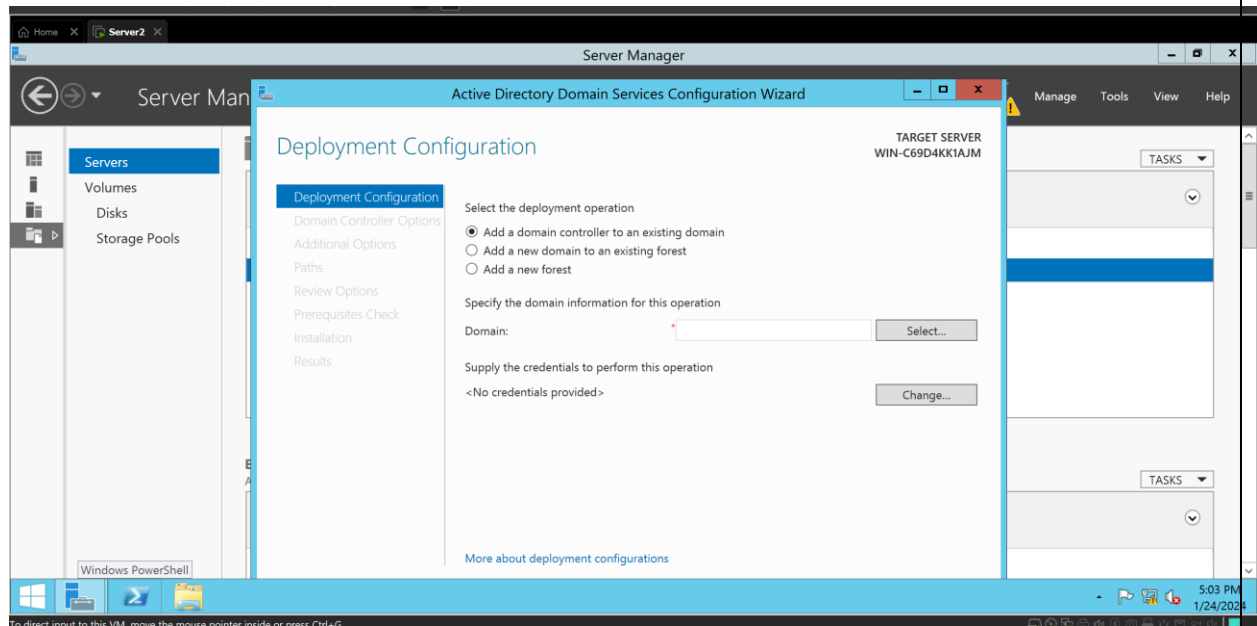
- On the installation progress page that appears at the end of the active directory domain services role installation procedure, click the promote this server to a domain controller hyperlink.
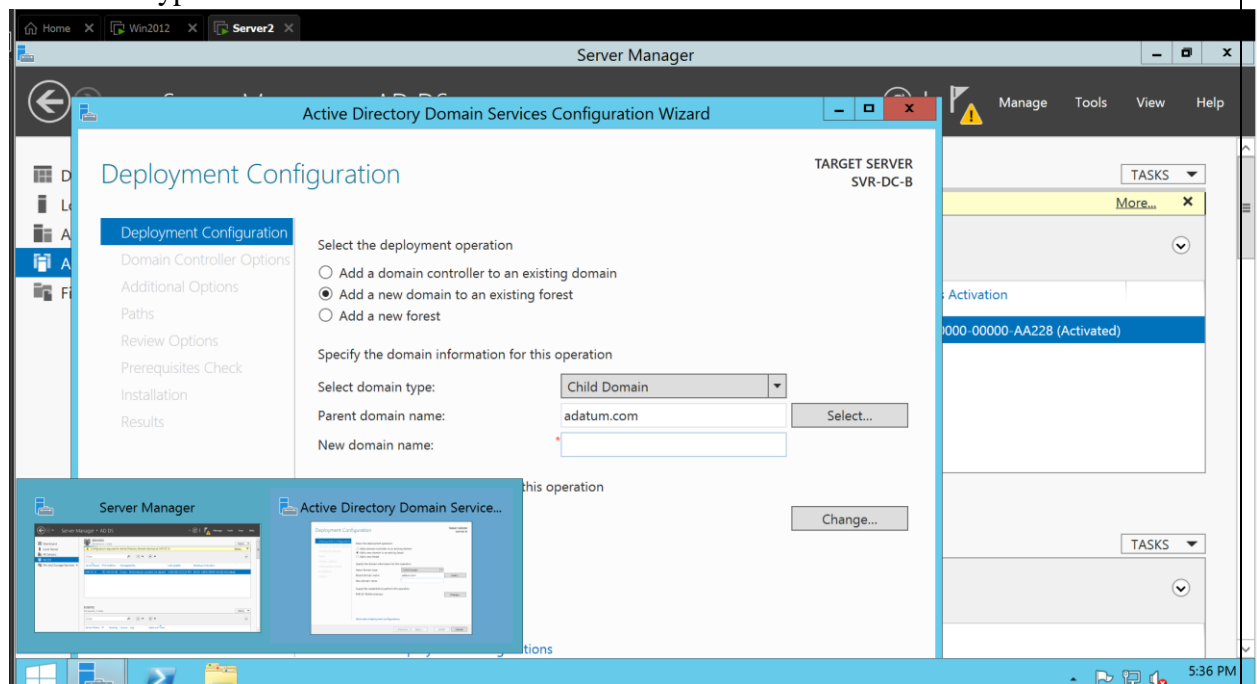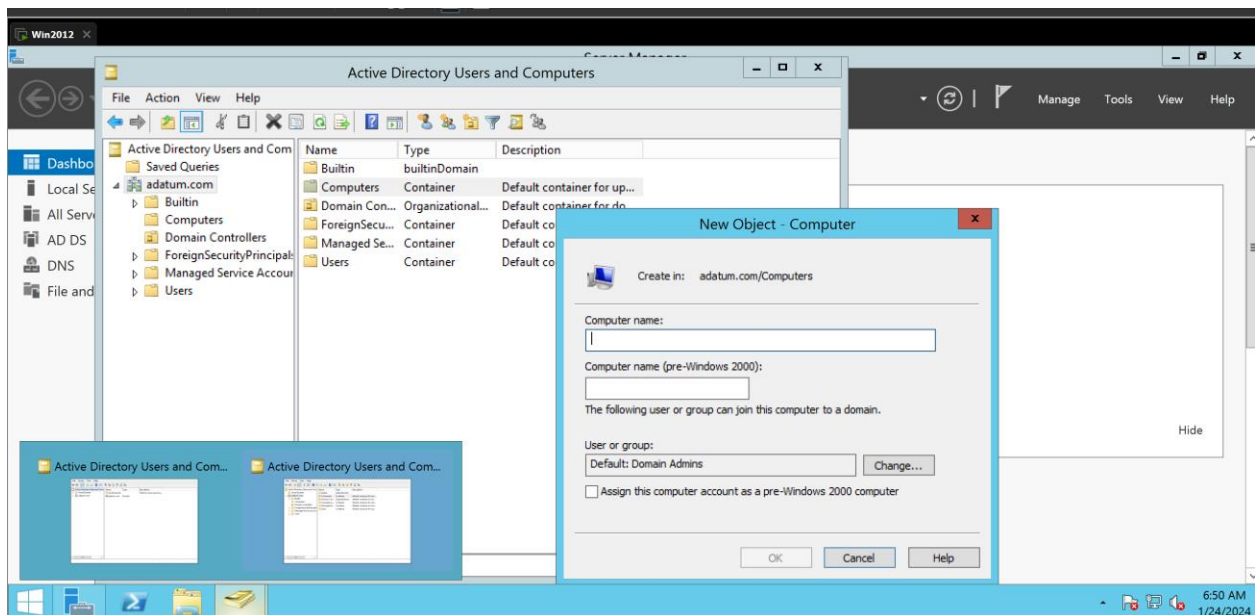

- In the New domain name text box, type NY and click Next. The Domain Controller Options page appears.
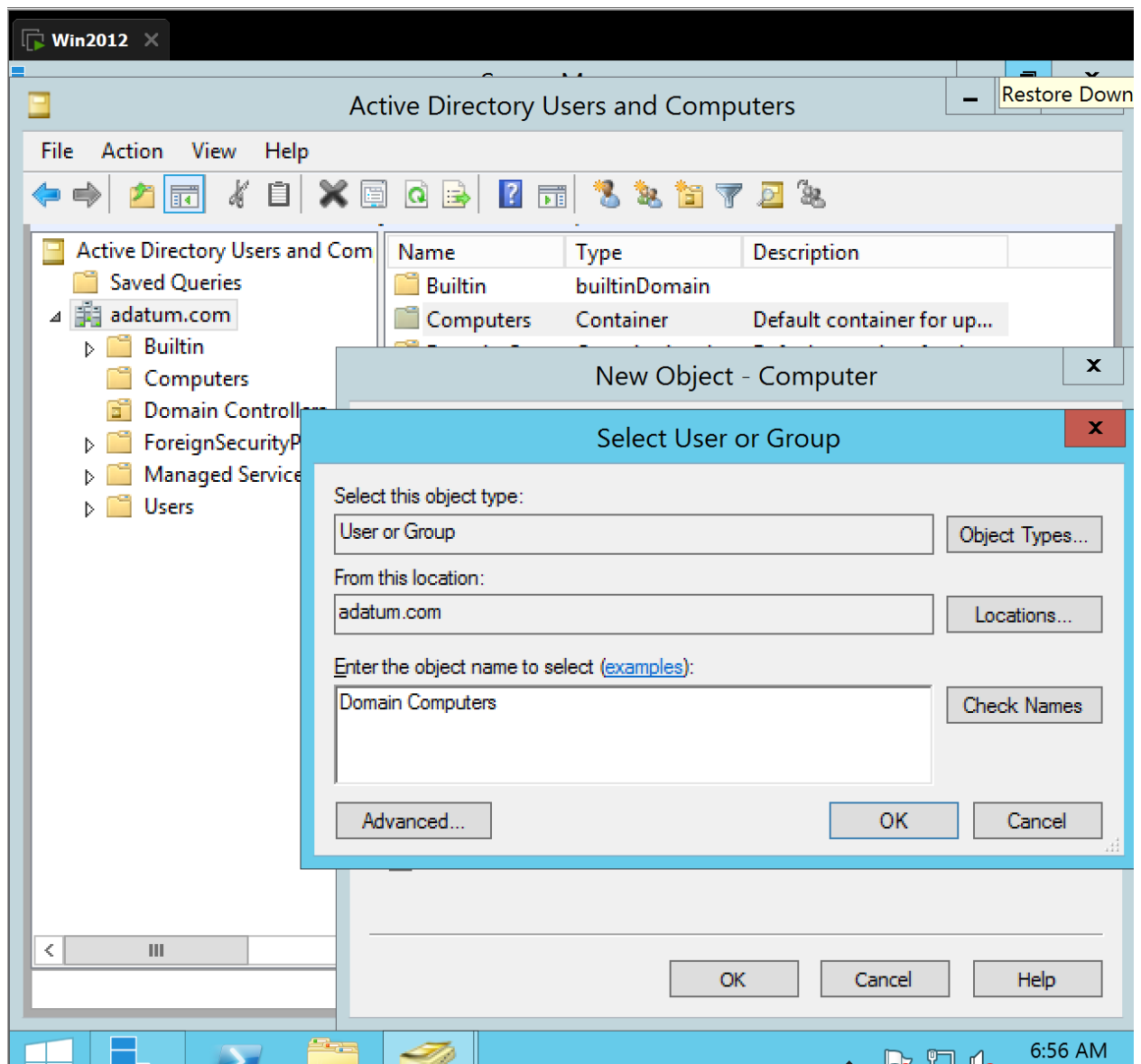- End Lab.

Creating and Managing

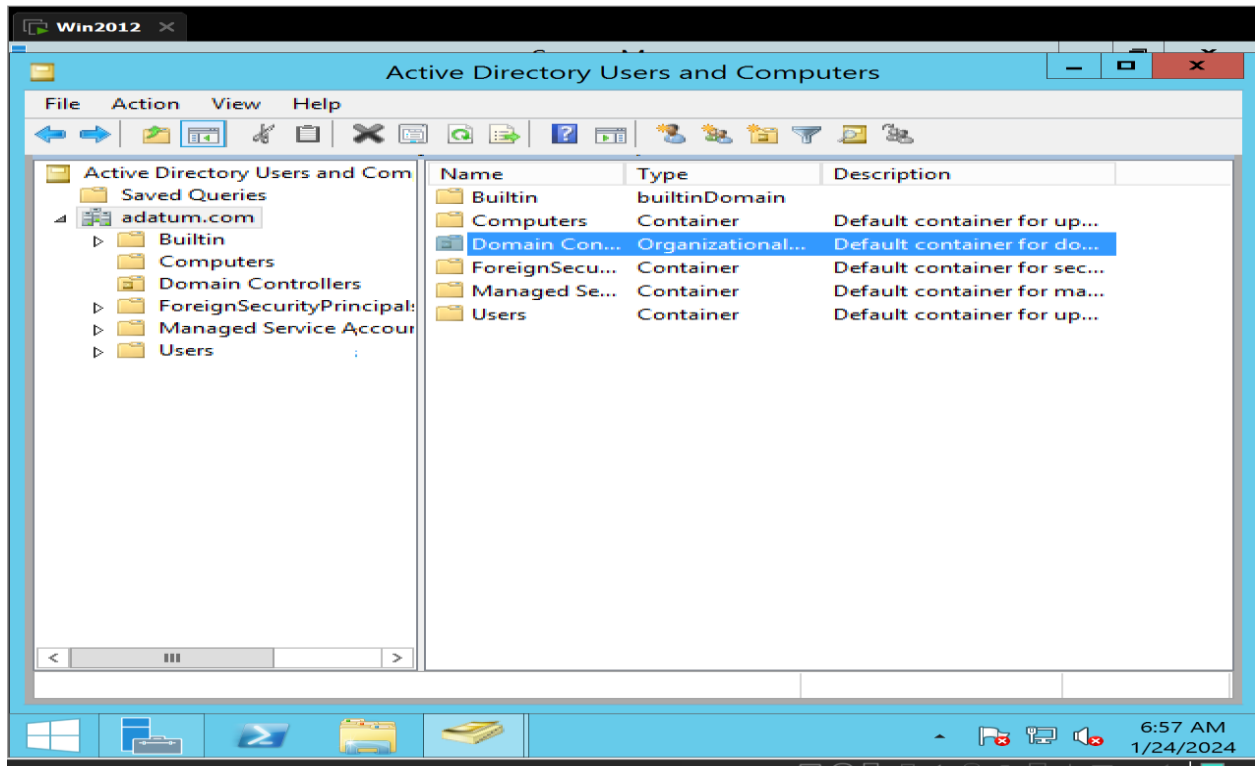- Select Tools and Active Directory and Computers, Console is shown.
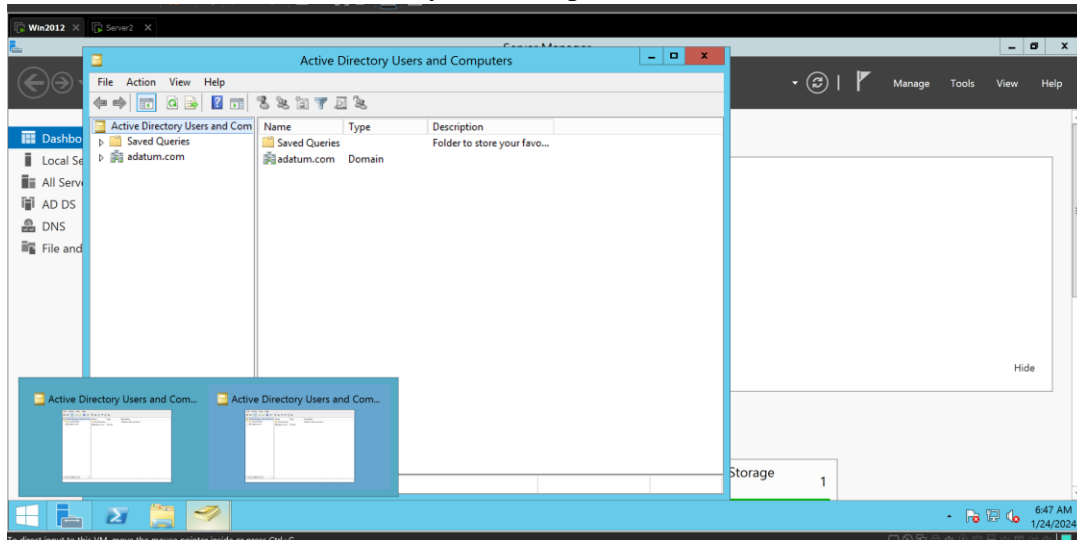
- Expand Adatum.com and right click on computers and click new object.

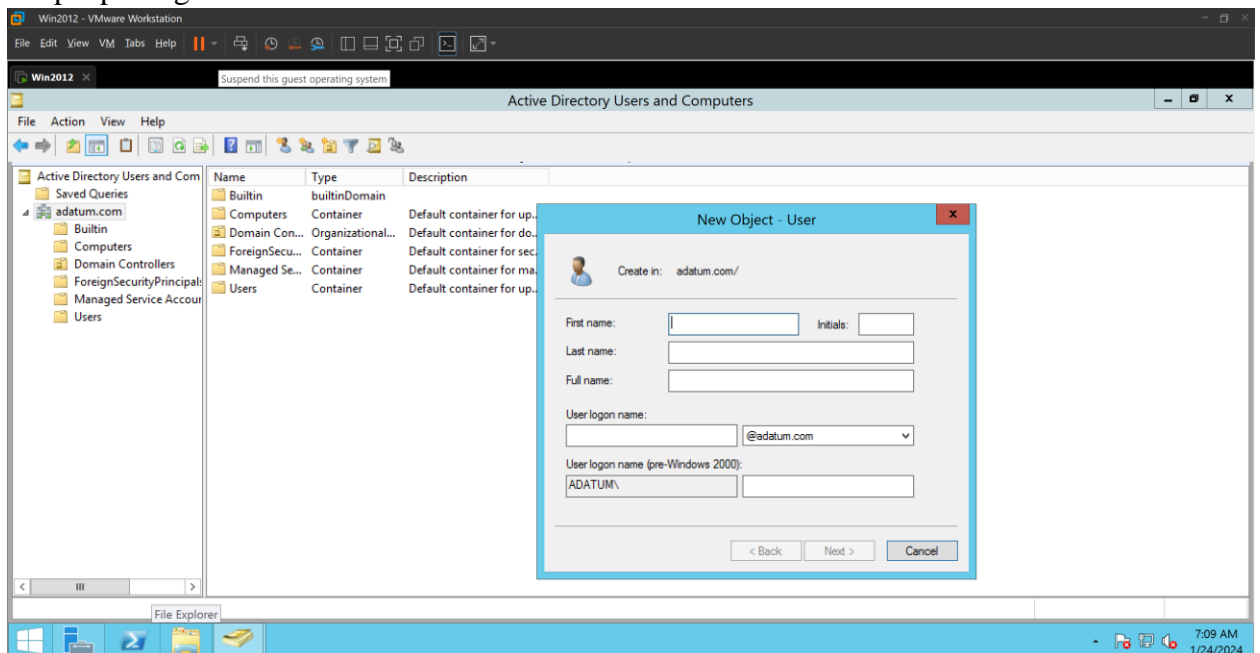- In the computer name type Wkstan1. And rest of the configuration.

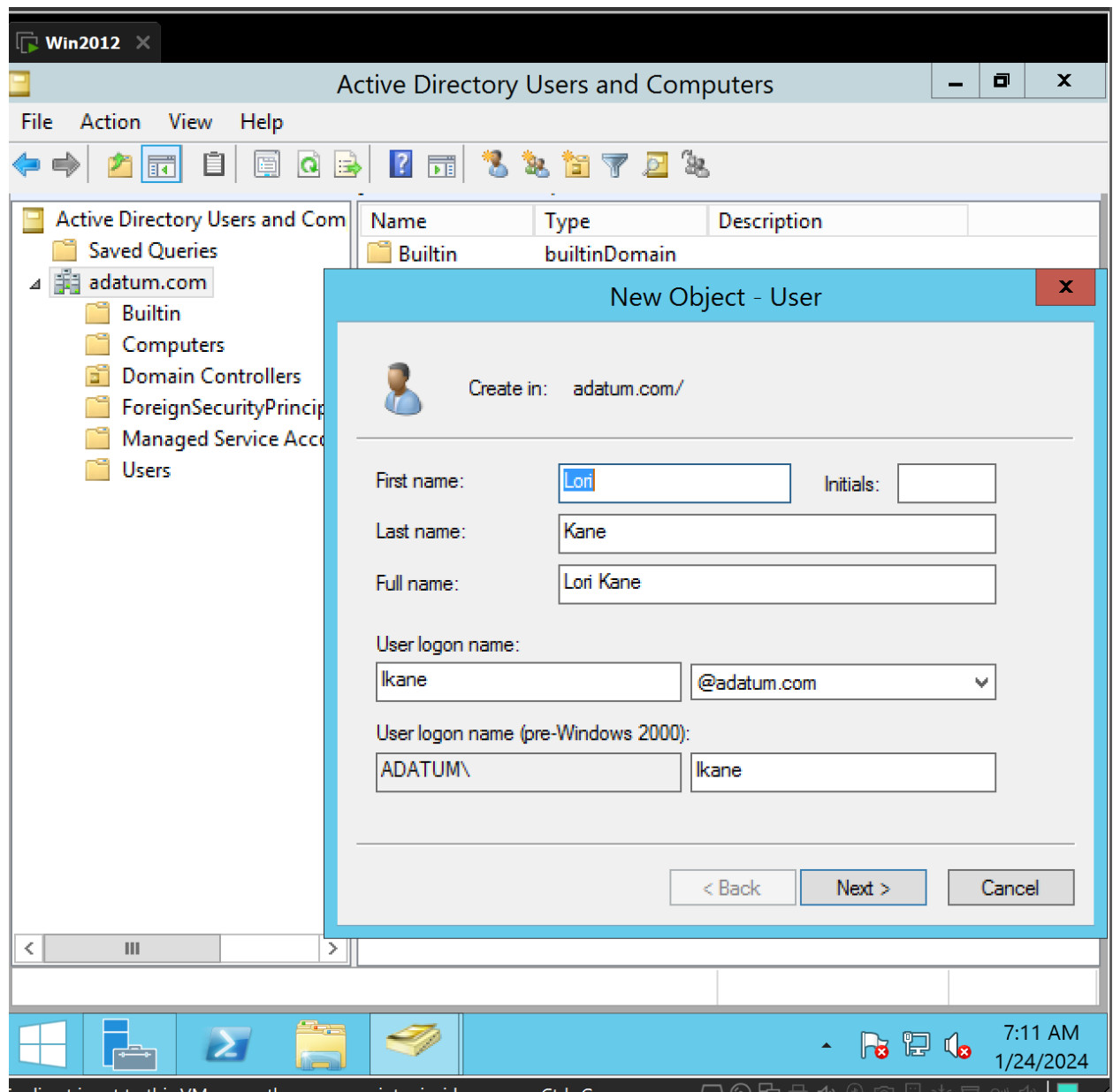- Click OK to save computer object and the Final Output required is.
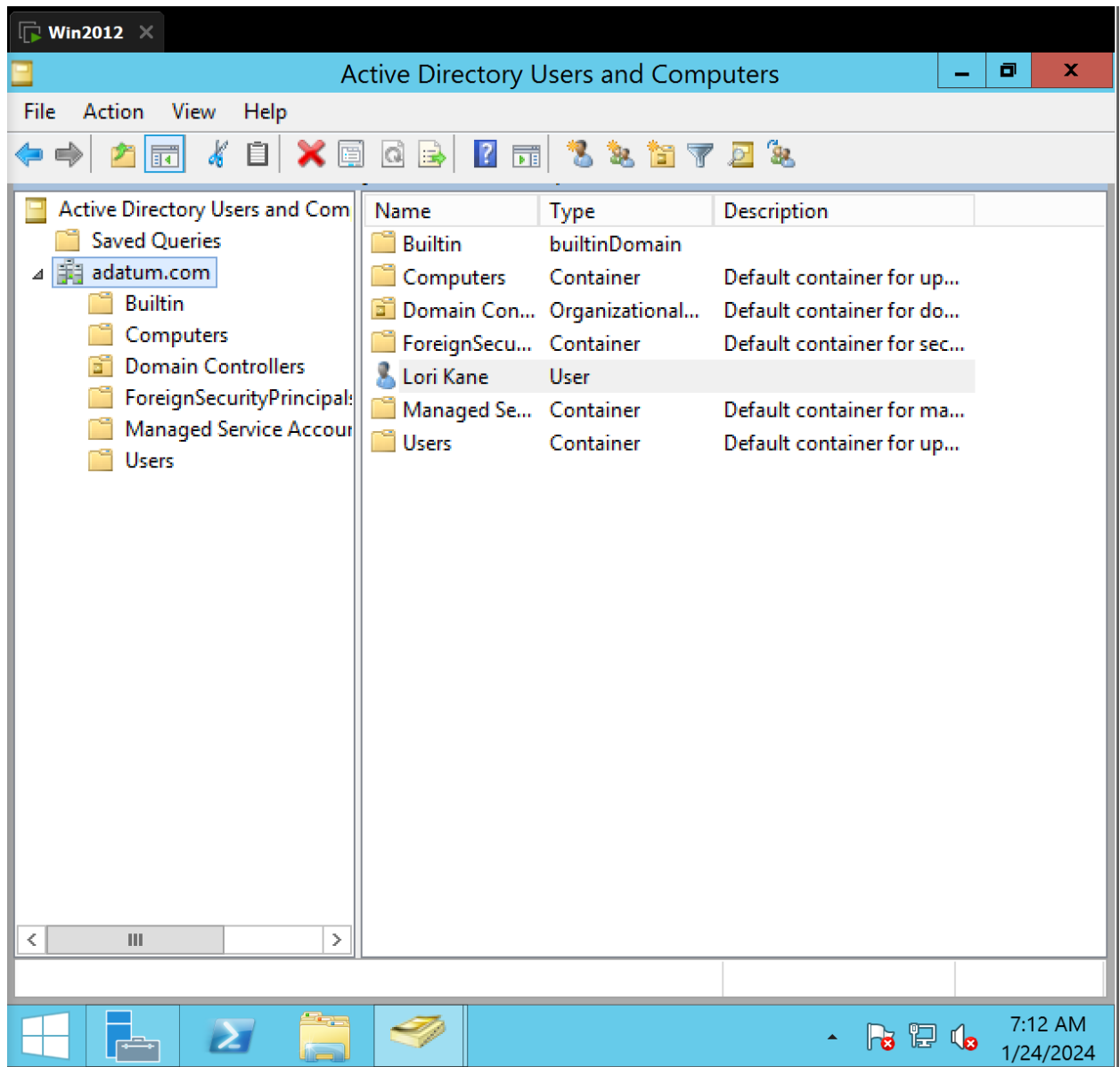
End of Task.

Creating Single User

- One SVR-DC-A computer, in the active directory users and computers console, selects the people organization unit.
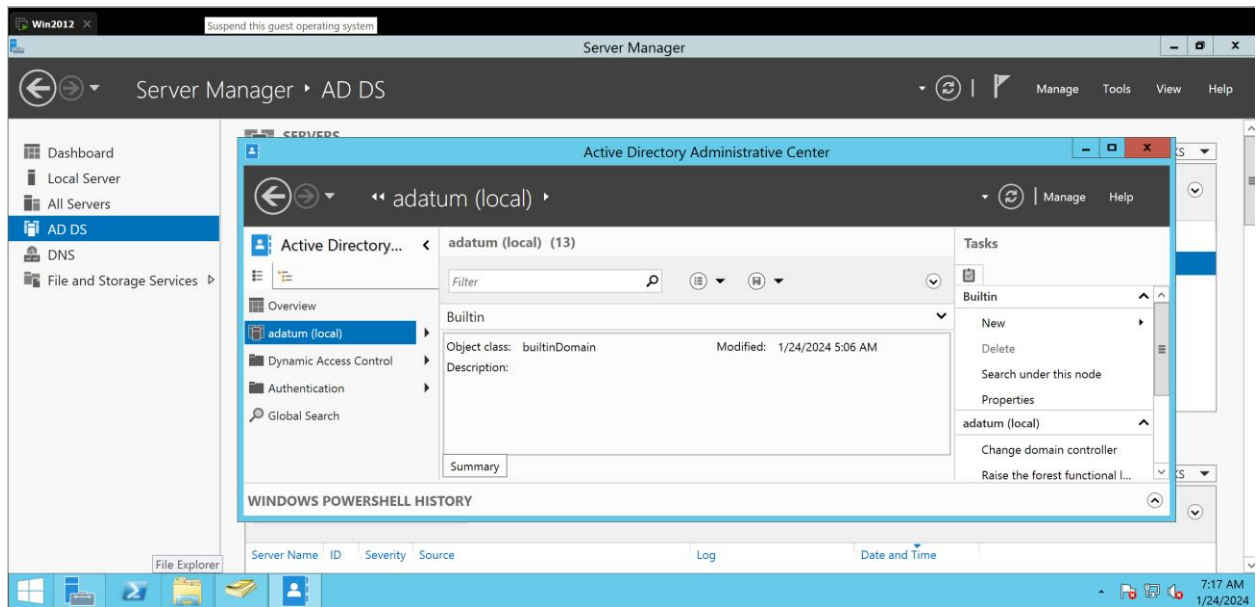
- And Click Finish.

- End of Task

**<u>Using Active Directory Administrative Center</u>**

- On the SVR-DC-A computer, in the Server Manager console, select Tools > Active Directory Administrative Center. The Active Directory Administrative Center console appears.
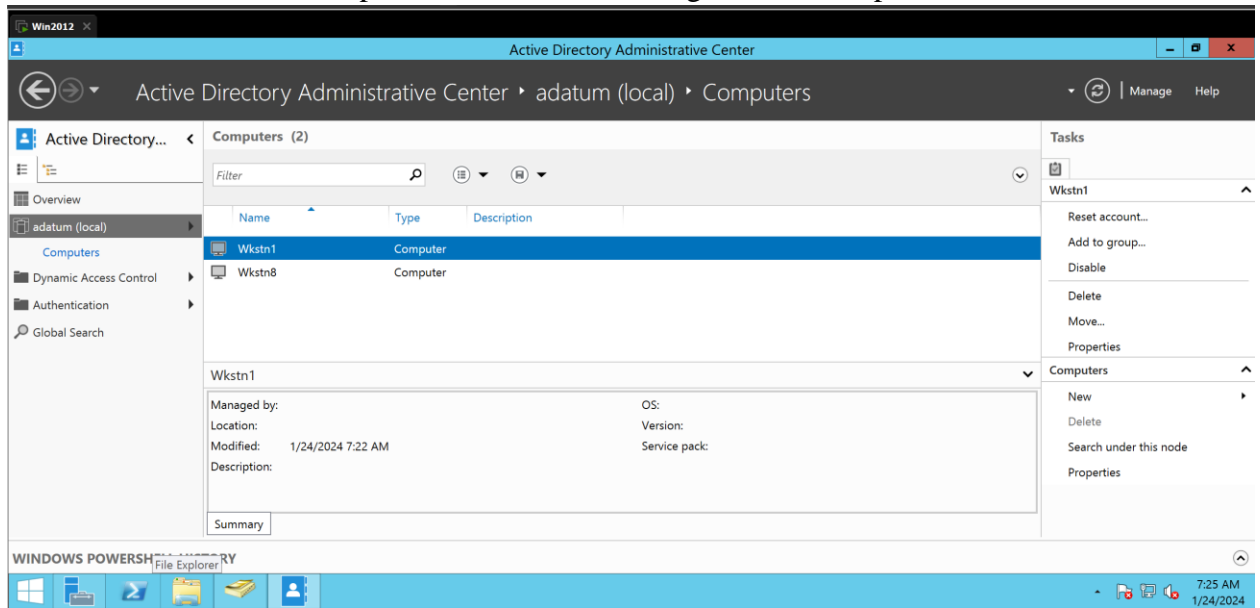
- In the left pane, select the adatum (local) node and, in the center pane, double-click the Computers container. The contents of the Computers container appears in the center pane
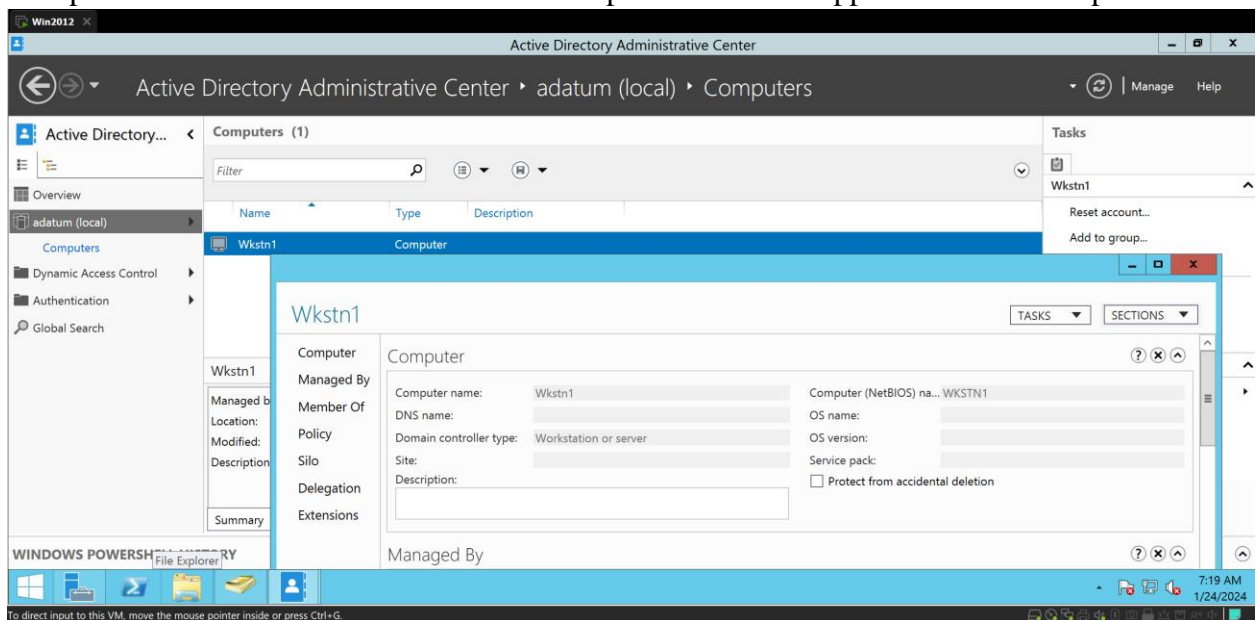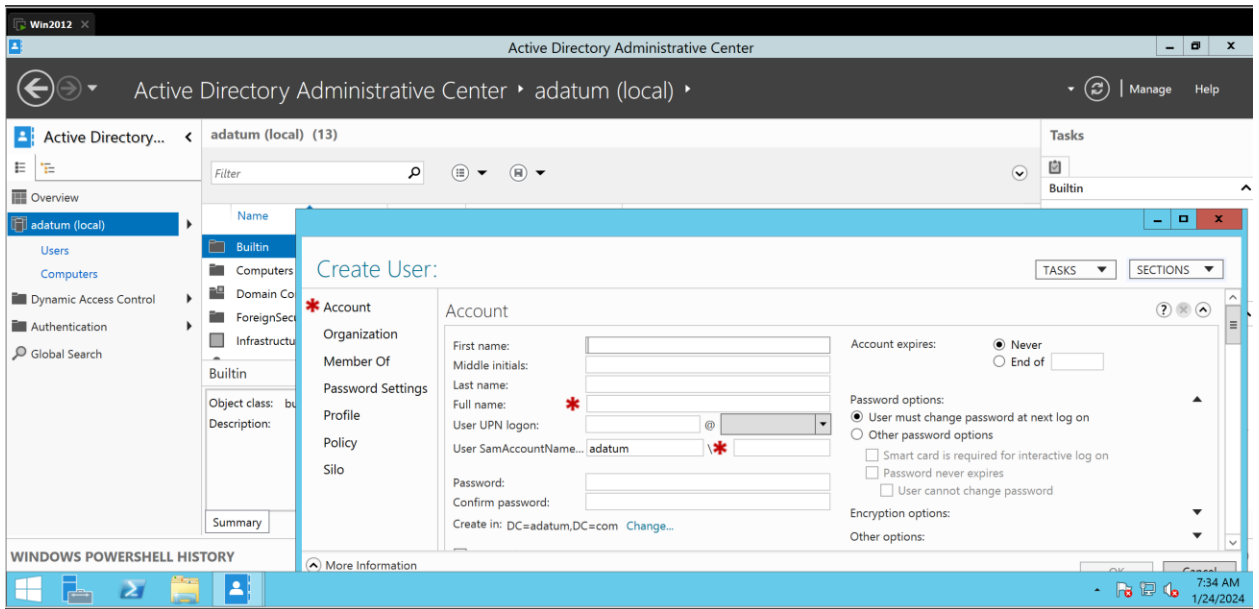

- In the right pane, select New > Computer. The Create Computer dialog box appears.
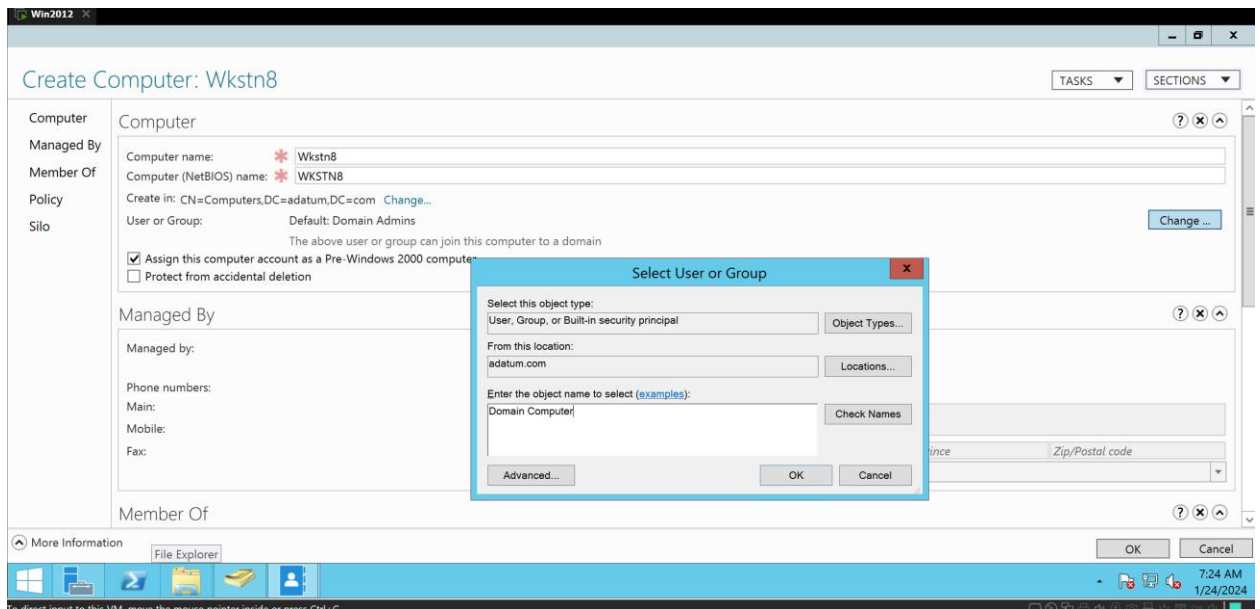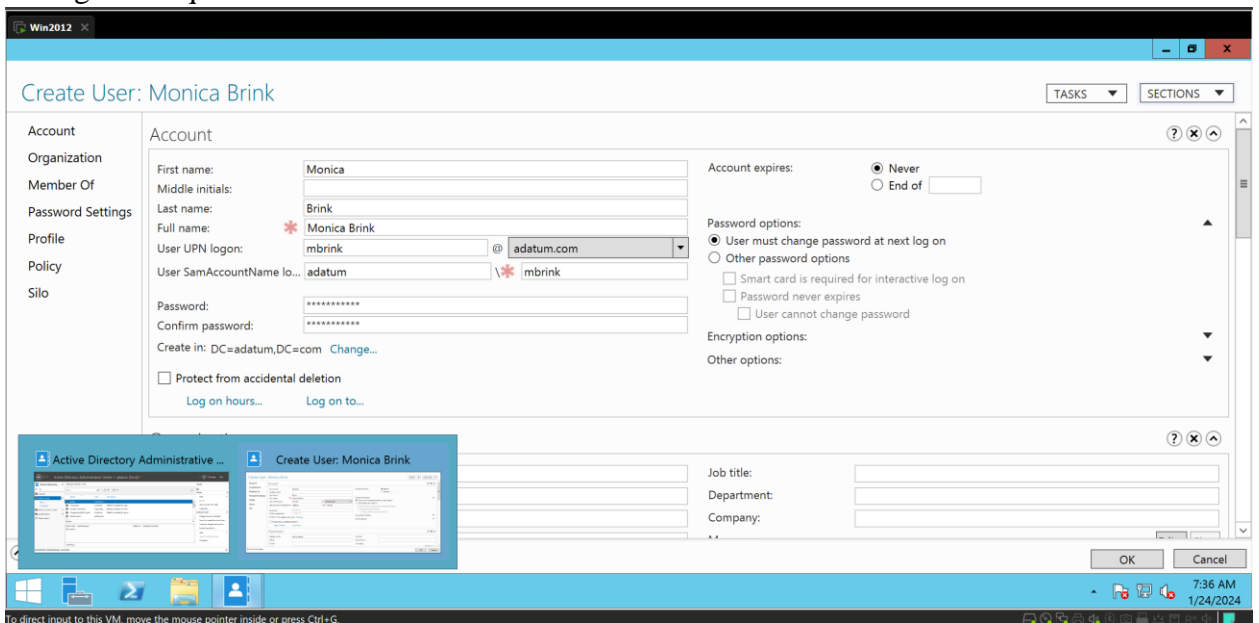
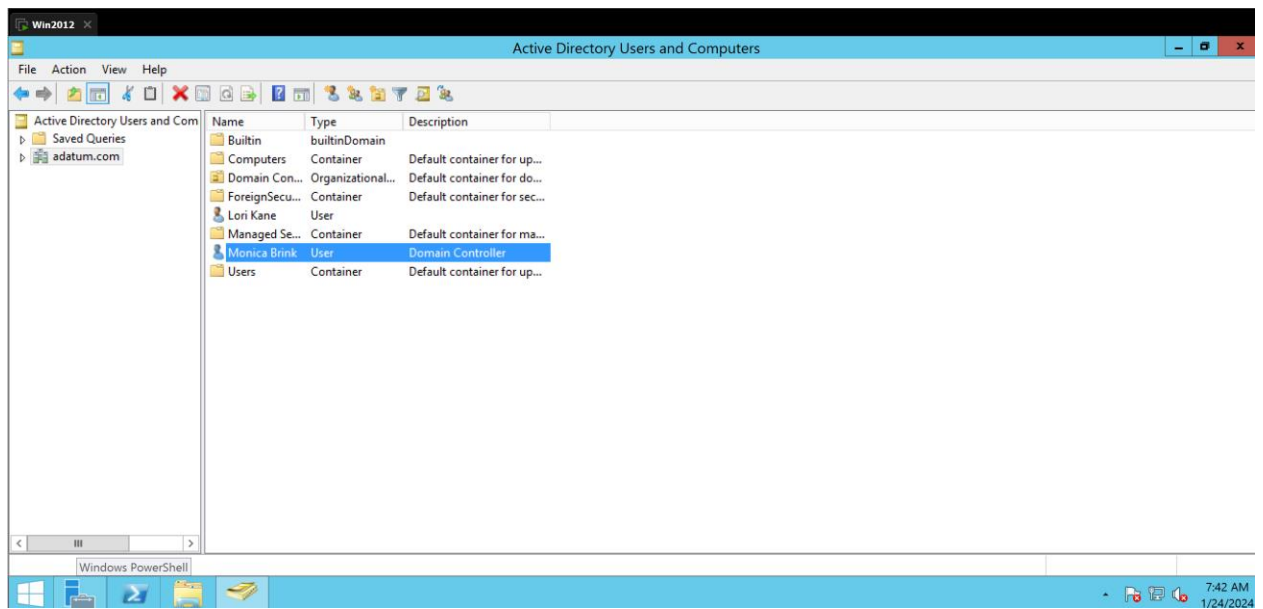- Take a Screen Shot of Computer Container containing the new computer.

- In the left pane, select the adatum (local) node and, in the center pane, double-click the People OU. The contents of the People container appears in the center pane.
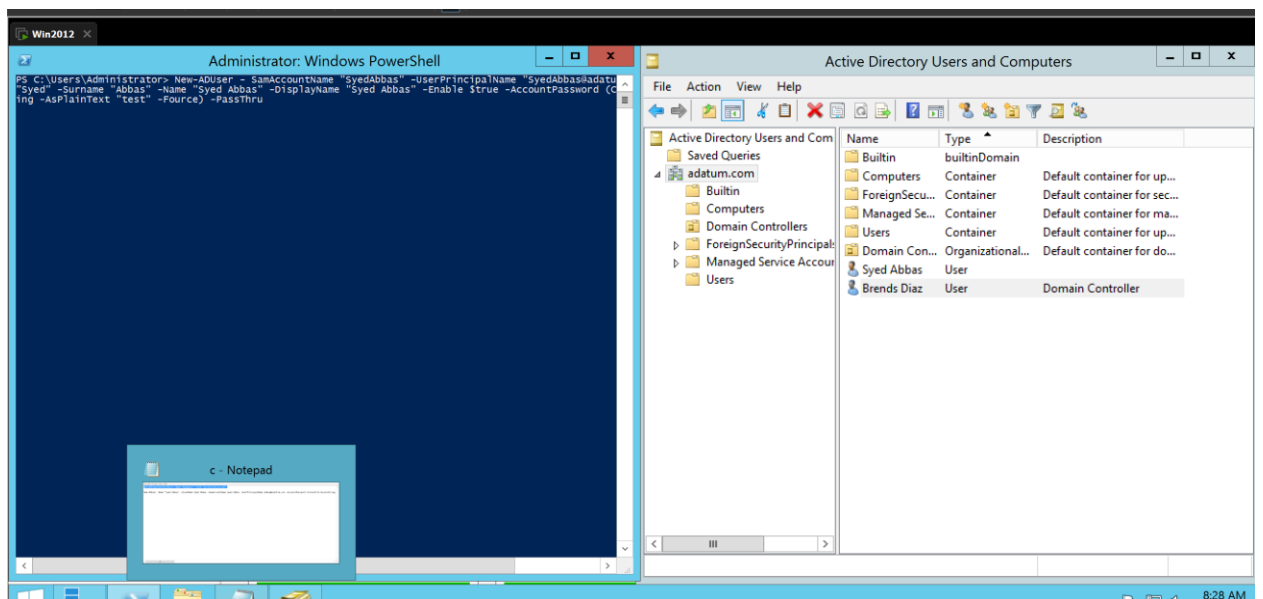
- Filling the Required Information.

End of Task.

Creating Users With Posershell

Using the Command
New-ADUser -SamAccountName "SyedAbbas" -UserPrincipalName "SyedAbbas@adatum.com" -GivenName "Syed" -Surname "Abbas" -Name "Syed Abbas" -DisplayName "Syed Abbas" -Enabled $true -AccountPassword (ConvertTo-SecureString -AsPlainText "test" -Force) –PassThru

End Task.

Conclusions:
In this lab, the installation and configuration of Active Directory Domain Services were successfully completed on two Windows 2012 servers, establishing a new forest and a child domain under "adatum.com." The tasks also involved creating computer objects, single users, and utilizing Active Directory Administrative Center and PowerShell commands for user creation.

References:
1- Desmond, B., Richards, J., Allen, R., & Lowe-Norris, A. G. (2008). Active Directory: Designing, Deploying, and Running Active Directory. " O'Reilly Media, Inc.".
2- Richards, J., Allen, R., & Lowe-Norris, A. G. (2006). Active Directory. " O'Reilly Media, Inc.".
3- Dias, J. (2002). A guide to microsoft active directory (ad) design (No. UCRL-MA-148650). Lawrence Livermore National Lab.(LLNL), Livermore, CA (United States).