



Installing Banner

Via GPO

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Steps involved

- Preparing the MSI Package for Distribution
- Creating the Group Policy Object (GPO) to push the MSI Package

Preparing the MSI Package for Distribution

- Upload the MSI package to a network-accessible computer
- Create a Local Security Group
 - e.g. “PushClients”
 - Add “%Domain%\Domain Computers” to the Group
- Share the MSI package
- Set the NTFS permissions on the share
 - Grant “PushClients” the appropriate permissions

- **Steps needed on the computer that will be sharing the MSI package**
 1. Copy the MSI (all files in same directory structure) to a network-accessible computer (if your domain is a Hokies child domain, you can not use your DCs since creating a share violates the ROE)
 2. Create a local security group (e.g. PushClients) on the computer and add “%Domain%\Domain Computers” to the group (**Figure 1**)
 3. Create a share for the .MSI package (**Figure 2** - Folder named “msi, Share named “BanPush”)
 4. Set the NTFS permissions on the .MSI package to give the local security group “Allow” - “Read & Execute”, “List Folder Contents”, and “Read” permissions (make sure this permission is inherited by subfolders/files) (**Figure 3**)

Creating the GPO

- Run “Active Directory Users and Computers” on the BGPO-Master
 - If not present, run the “adminpak.msi” to install
- Browse to your Domain and select the OU to which you would like to assign the GPO
 - Or create a new OU
- Add a new GPO and name it (e.g. BanPush)

- 1) On the “BGPO-Master” computer, install the Admin Pack
 - a) Run “adminpak.msi”
 - b) Found in the i386 directory of either the Windows 2000 Server CD or in extracted Service Pack 3 files
- 2) Run “Start”→”Programs”→”Administrative Tools”→” Active Directory Users and Computers” (**Figure 4**)
 - a) You must be logged onto the computer with a domain admin account so you can access both the OU properties and the network path to the MSI share
- 3) (Optional) Click on “View”→”Advanced” to enable “Advanced View”
- 4) Browse to your appropriate domain if necessary by right-clicking on w2k.vt.edu and selecting “Connect to Domain...” from the context menu that appears (Check “Save this domain setting for the current console” to have “Active Directory Users and Computers” open in your domain on subsequent executions) (**Figure 5a and 5b**)
- 5) Browse to the OU you wish to create the GPO for or create a new OU for this purpose
 - a) To create a new OU, browse to where you want the OU to be located and, in the right-hand pane, right-click a blank area and select “New”→”Organizational Unit” from the context menu that appears (**Figure 6**)
- 6) Right-click on the OU you wish to create the GPO for and select “Properties” (**Figure 7**)
- 7) Click on the “Group Policy” Tab (**Figure 8**)
- 8) Click “New” and name the GPO that appears (**Figure 9**)

Editing the GPO

- Initially Disable the GPO through Object Permissions
- Add the MSI Package for distribution
- Add NTFS permission changes (optional)

Disabling the GPO

- Edit the Object Permissions of the GPO
 - Add the “Everyone” group
 - Grant it the “Deny” – “Apply Group Policy”
 - Click “Yes” to the Security Warning that pops up

To prevent the GPO from being pushed prematurely, edit the Object Permissions to “deny” “Everyone” the right to apply it.

- i) Select the new GPO and click “Properties”
- ii) In the “**GPO** Properties” box that appears, click on the “Security” tab then click on “Add” (**Figure 10**)
- iii) Add the “Everyone” group and click “OK”
- iv) Back in the “**GPO** Properties” box, select “Everyone” and under “Permissions” select “Deny – Apply Group Policy” (Leave “Allow – Read”) then click “OK” (**Figure 11**)
- v) You will receive a Security warning that “deny” access takes priority over “allow” access. Click “Yes” to continue then “OK” to close the “GPO Properties” box.

Adding the MSI Package for distribution

- Edit the GPO to add the MSI Package for distribution
 - Browse to the “Software Installation” section under “Computer configuration”
 - Add a new package and enter the network path to the MSI package
 - Configure the deployment as desired
 - For our example, we kept the default settings

b) Select the GPO you just created and click on “Edit”

c) BANNER PUSH

i) In the “Group Policy” window that appears, browse to “Computer configuration”-->“Software Settings”-->“Software installation”

ii) Right-click a blank space in the right window and select “New”-->“Package” from the context menu that appears (**Figure 12**)

Through “My Network Places” (or by typing “\\servername.domain.com\share” in the “File name:” field), browse to the network location of the .MSI package (**Figure 13**)

iv) Configure the deployment how you wish. For our testing, we kept the default settings

Adding NTFS Permission changes

- Edit the GPO to add NTFS permission changes for the “loadbal and “uu” folders
 - Browse to the “File System” section under “Computer configuration”
 - Add the “C:\Program Files\loadbal” folder
 - Modify the NTFS permissions to grant “Modify” permissions to the “Everyone” group
 - Select the option to replace the existing permissions on all files and subfolders
- Repeat the above for the “uu” folder

(Optional) RESET NTFS PERMISSIONS

- i) Now browse to “Computer configuration”-->”Windows Settings”-->”Security Settings”-->”File System”
- ii) Right-click a blank space in the right window and select “Add File...” in the context menu that appears (**Figure 14**)

Browse to the “C:\Program Files\loadbal” (or just type it in the top line) and click “OK” (**Figure 15**)

- iv) In the “Database Security for...” box that appears, add “Everyone” and give them “Allow” permissions for “Modify”, “Read & Execute”, “List Folder Contents”, “Read”, and “Write” (leave all other settings as is) and click “OK” (**Figure 16**)
- v) In the “Security Policy Setting” window, select “Configure this file or folder then” and “Replace existing permissions on all subfolders and files with inheritable permissions” and click “OK” (**Figure 17**)
- vi) Repeat steps ii-v for the uu folder (**Figures 18-21**)

Close the “Group Policy” window

Prepare the OU for GPO assignment

- The GPO is now ready to be enabled for assignment
 - Verify that all target computers are located in the “0_Test” OU
 - Remove the “Deny” – “Apply Group Policy” permission

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