

Installing Double-Take

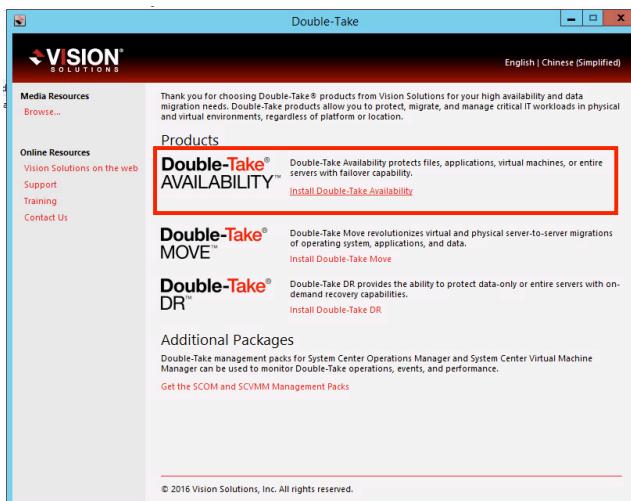
Overview

- For Double-Take Replication to take place, you must have the following requirements:
 - Double-Take Availability installed on the Source Server
 - Double-Take Availability installed on the Target Server
 - A License key for the Source Server
 - The DTMU Configurator installed on the Target Server

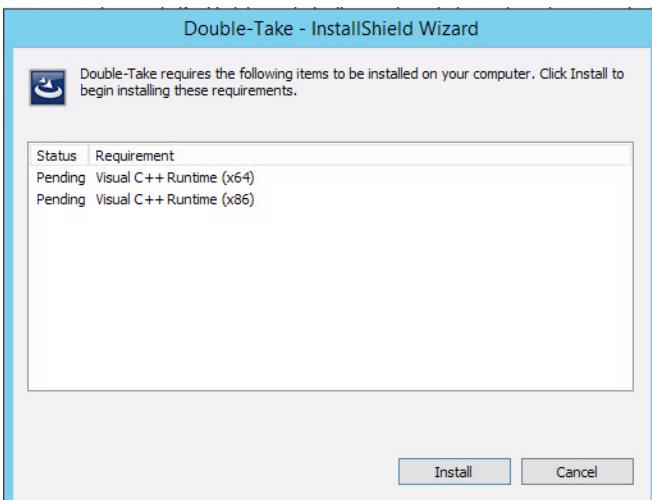
Manual Server Installation

To install Double-Take Availability, you can use the below instructions:

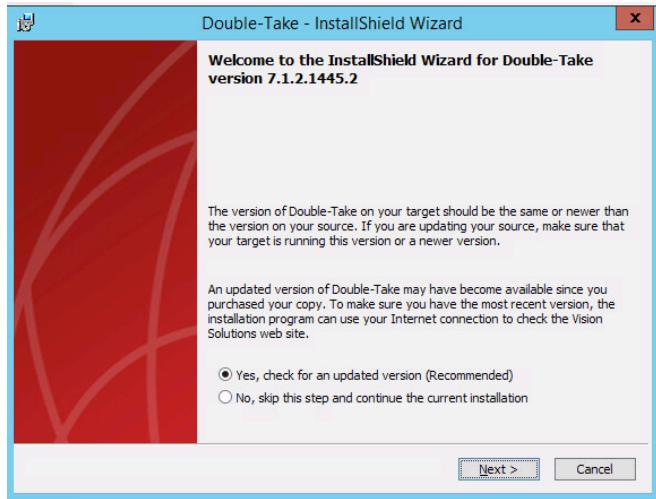
- Log into one of your Source or Target servers to be used in replication and download the Double-Take Availability executable.
 - Double-Take install files available at ftp://downloads.iland.com/Double-Take/Doubletake_availability/
 - Username: downloads
 - Password: d0wnd0wn
 - Unzip the files and begin the install by selecting “Double-Take Availability” as your install type.



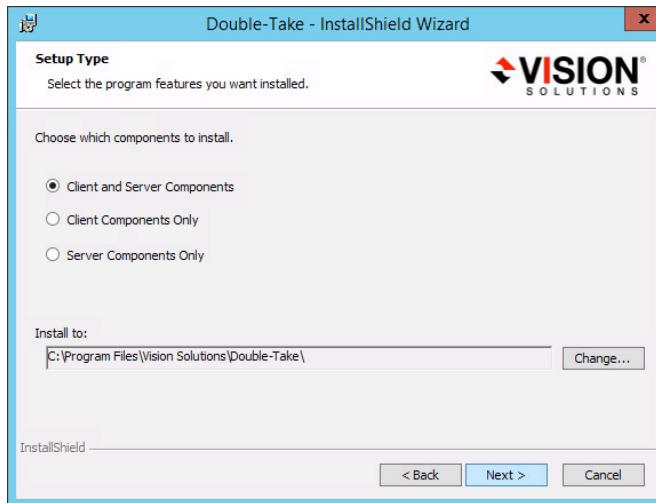
- You may need to install .Net Framework or C++ Framework. Select Install if prompted, as these features are required to install Double-Take.



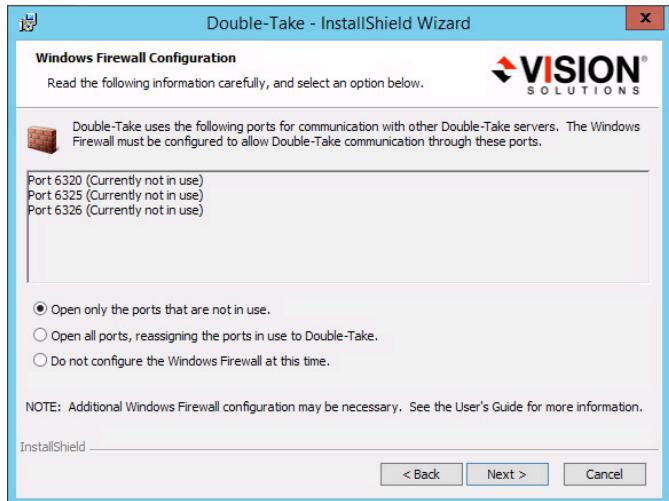
- The next screen will ask if you would like to check for updated versions, or just proceed with the current installation. If you proceed with the current installation, you have the ability to check for updates later.



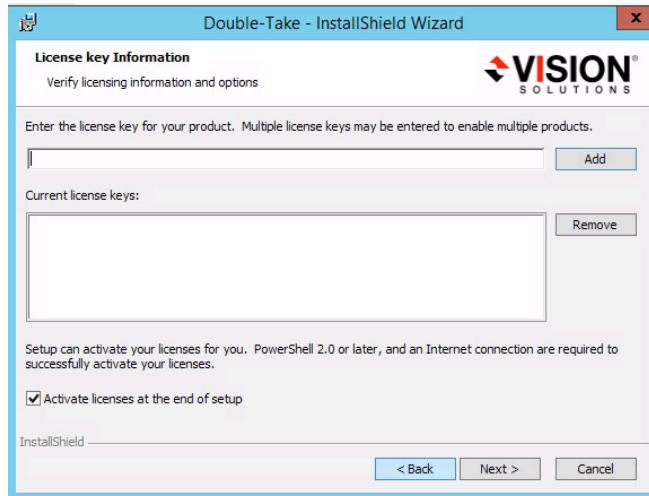
- Accept the terms in the license agreement to continue. The next screen gives you a message about licensing. Double-Take will require a active license to replicate. Certain version of Double-Take may grant a 14-day grace period, but will halt replication once that is complete.
- The next page asks if you would like to install Client, Server or both components on the server. If you are unsure, it may be safest to install both Client and Server components.
 - **Client Components:** Allows you to administer and monitor Double-Take Servers. For instance, you can create one server with the Client Components only installed that will manage the Double-Take Replication. This server would not be replicated, but you can use the console on this server to add Source and Target servers and create replica jobs. The Client Components do not require an activation key.
 - **Server Components:** Installs the services and components required to allow a server to act as a Double-Take Target or Source for replication. Server Components require an activation license.



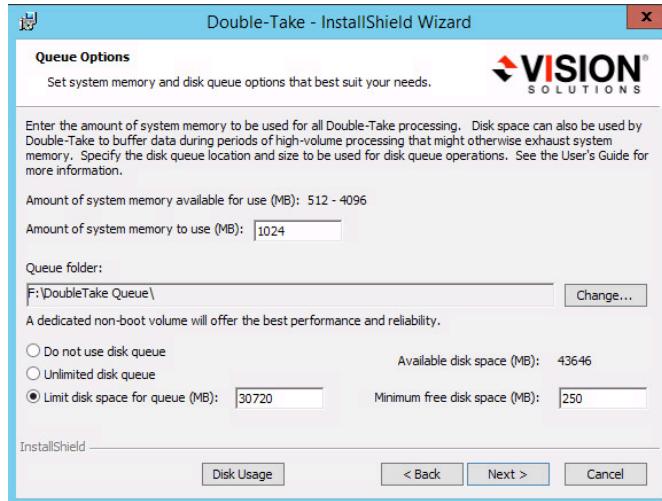
- Next, Double-Take will open the required ports for functionality in the Windows Firewall. Most Likely, you can just use the first "Open only the ports that are not in use" option. This means that the Double-Take ports required are not currently used by any other services on your server and Double-Take will open and use these ports.
 - If you see some of the ports listed are currently used, you may need to investigate which services are using those ports. The second radio button, will open the ports and assign them to Double-Take, even if they are being used by another service. This may cause issues and could require some Windows Firewall and Default port changes. You can console the Double-Take Users guide for more information.



- If this server is the Source Server, meaning the server that is to be Replicated to it, enter the license key on the next window. If this installation is occurring on the Target Server, the server being replicated to it, click next without entering a key.



- The next page has the Queue Options. Here, you will be able to set some key information about the amount of RAM and disk space to be used during the replication process. These settings will be in use during high volumes of replication, such as the first replication process or periods of high data change on the source.
 - **Amount of system memory to use (MB):** This option allows you to set the amount of RAM to be used by Double-Take in MB. For instance, in the screenshot I have set for Double-Take to use only 1GB of RAM (1024MB) out of a total of 4GB RAM on my server.
 - **Queue Folder:** You can browse to a folder to designate as the Double-Take Queue Folder. This will be the folder where to buffer replicated data during periods of high replica traffic. It is best practices to set this folder on a disk that is not the root disk. However, if you only have one disk that is okay as we can set limits for the size of the Queue Folder. This queue folder will be used on both the source and target servers.
 - **Size Limit:** The bottom left portion has 3 radio buttons. You can set the Queue folder to not be used at all, use an unlimited amount of space or set a limit of space that can be used by the queue folder. In my screenshot, I have set for this folder to have a limit of 30GB
 - **Minimum Free Space:** On the left hand side, you can also set the Minimum free disk space required for the Queue folder. By default, this is set to 250MB but can be raised to your preference. If the amount of Available Free disk space drops below this limit, the queue folder will not be used anymore and will not grow in size. In the case where you have the queue folder located on the root drive, you may want to set this limit higher to prevent issues with the root disk becoming full.

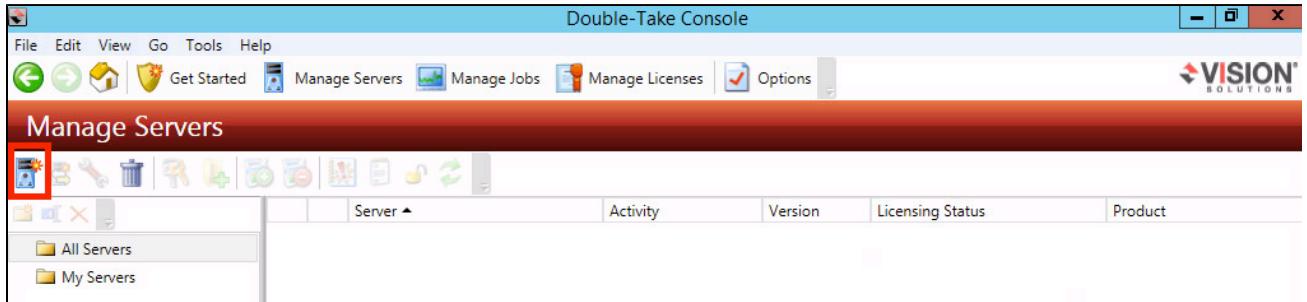


- The next page details the automatically created user groups, Double-Take Admin and Double-Take Monitor. Local Administrator accounts will automatically be set in the Double-Take Admin group, but you can also set individual users in the Admin or Monitor group to your preference.
- Click Install on the last page to begin the Double Take installation.
- This process will need to be repeated on all Source, Target and Management Servers for your Double-Take Replication environment.

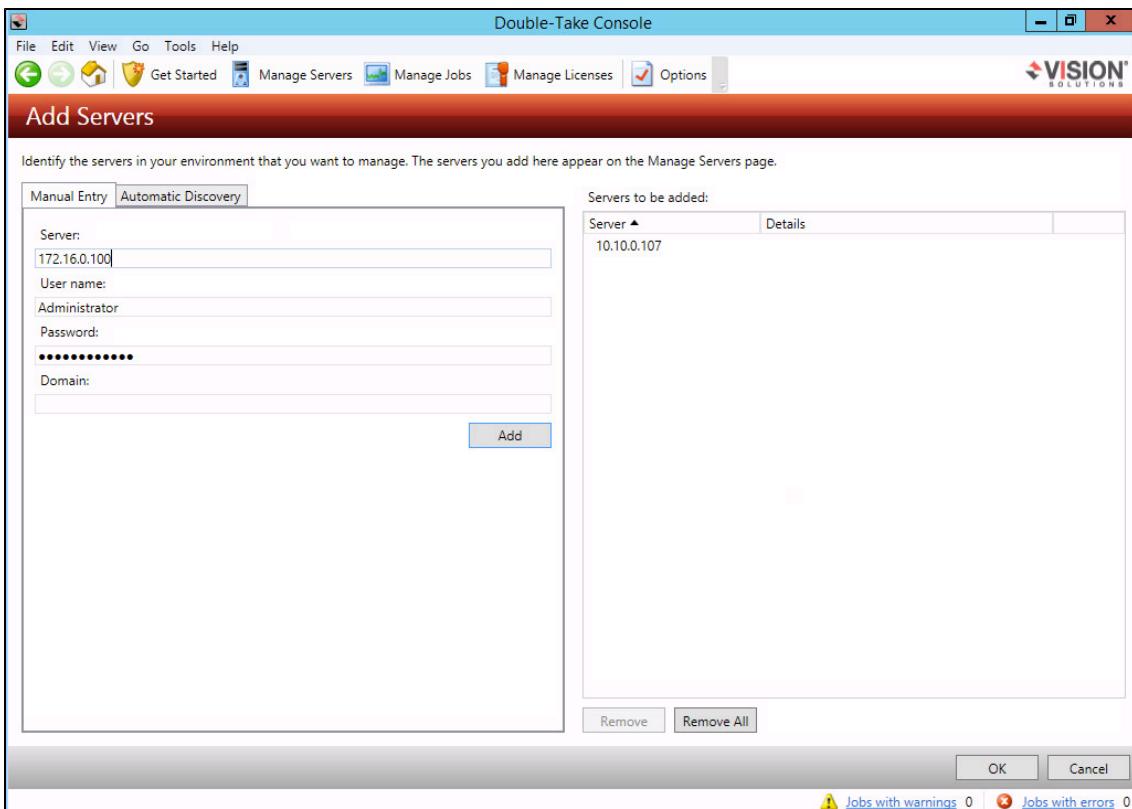
Double-Take Installation: Console Method

iLand recommends using a Double-Take Management server that would be located in the iLand ECS environment. This server would not act as a Source or Target for replication, but to manage and monitor replication. Once Double-Take has been installed on this server, you are able to complete many administrative tasks, such as Double-Take installation from the console.

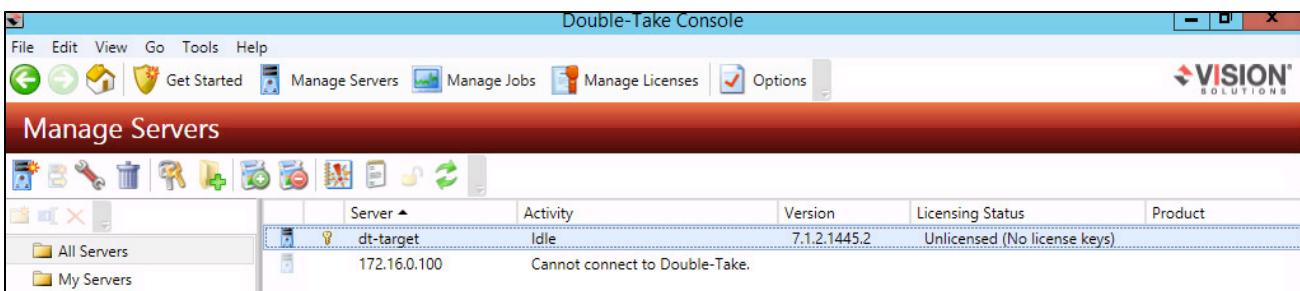
- Click on the Manage Servers tab in the Double-TakeConsole.
- On the left hand side, click the Add Server button



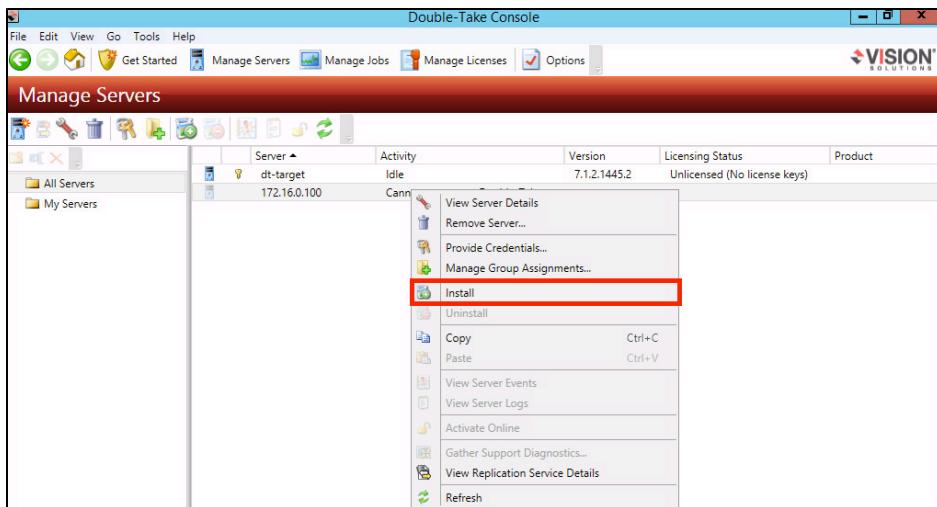
- The Add Servers window allows you to add multiple servers to the Double-Take Console.
 - Server:** Use the IP or DNS name of a server to be used in replication.
 - Username:** Username for a user in the Local Administrators or DT-Admin group
 - Password:** The password of the user account
 - Domain:** The domain the server is a member of, can be blank if not a part of a domain.



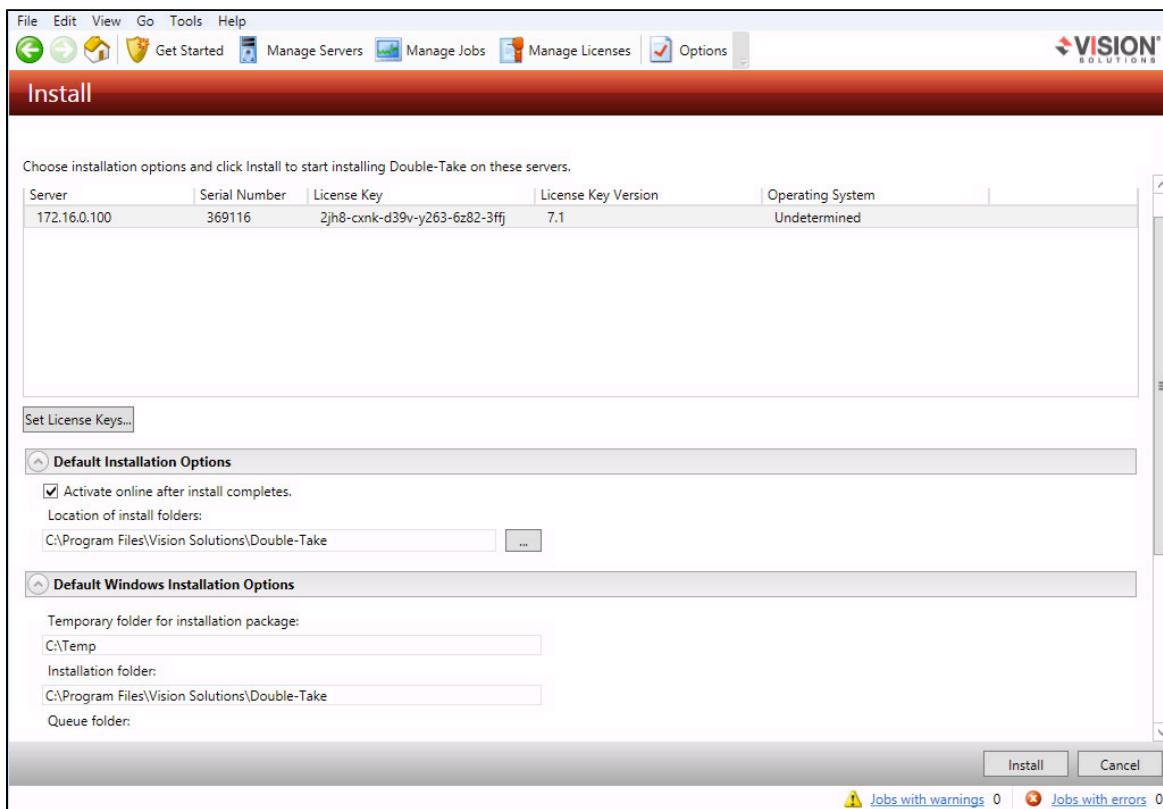
- In my screenshot, I have added the Target Server and provided the credentials and am now adding the Source Server. Click add to present the servers in the Double-Take Console.
- If the server added already has Double-Take installed, you will see the version, hostname and licensing status populated.
- If the server does not have Double-Take already installed, you will see a Cannot Connect to Double-Take status.

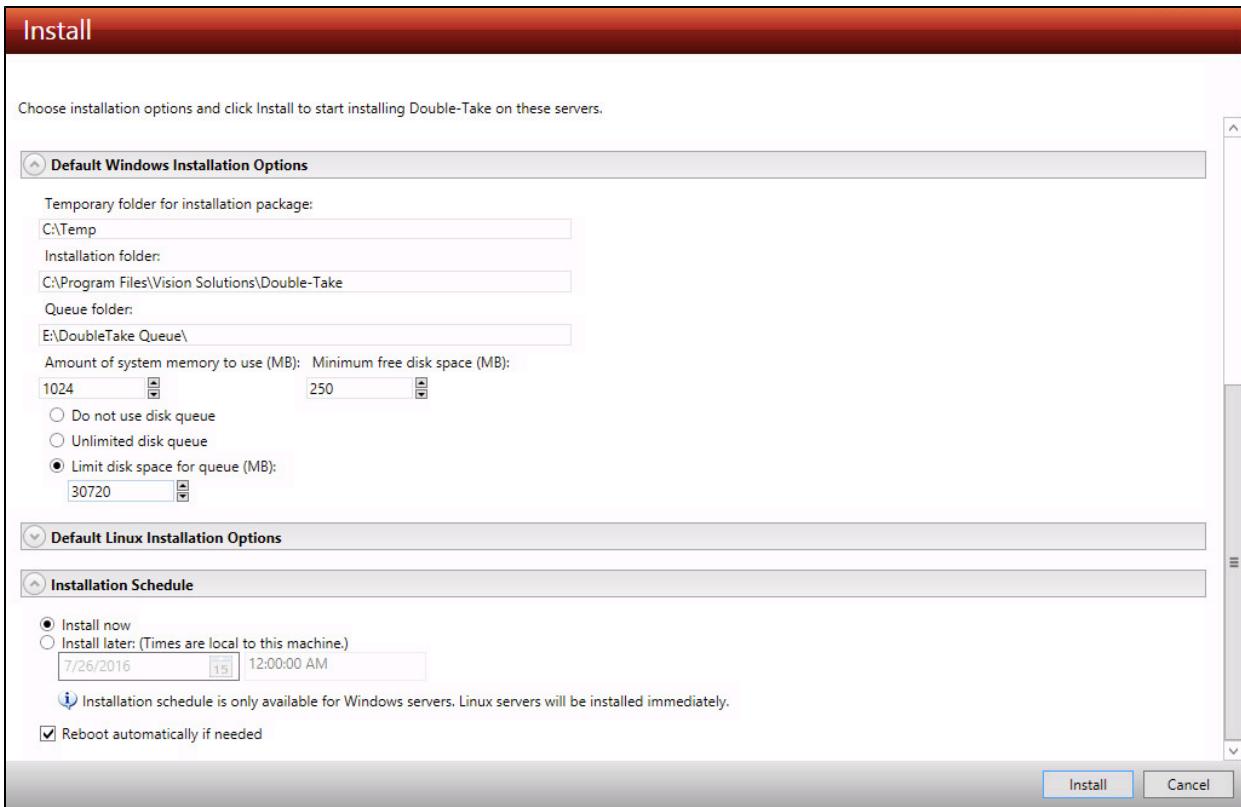


- To install Double-Take to a remote server from the console, right click the server under the Manager Servers tab and click Install.



- The Install screen brings up the same options as we saw with the Manual Installation Process
 - Location of install folders:** This is the folder path to the Double-Take installation files. Typically, this will be left to the default value.
 - Temporary Folder for installation package:** Selects the folder to be used to store the temporary zip files. Leave this at the default value.
 - Installation folder:** This designates the folder path for the installation on the remote server. I have left this at the default location, but you can change this to your preference.
 - Other parameters such as the Queue folder location, RAM to use, Queue folder limit and Minimum Free disk space limit can also be set in this window.
 - Installation Schedule:** Click to run the installation now, or schedule for a later time. For instance, if you wish to automatically run the installation at midnight on a Saturday.
 - Reboot Automatically if Needed:** It is best to have this checked to ensure the reboot completes without issues. You will not always need to reboot, typically this would only be required if .Net Framework or C++ components need to be installed or updated.





- Click **Install** to begin the automatic installation, or to save the scheduled install task for later.
- You will see the **Install** process running under the **Manage Servers** tab in the Double-Take console.

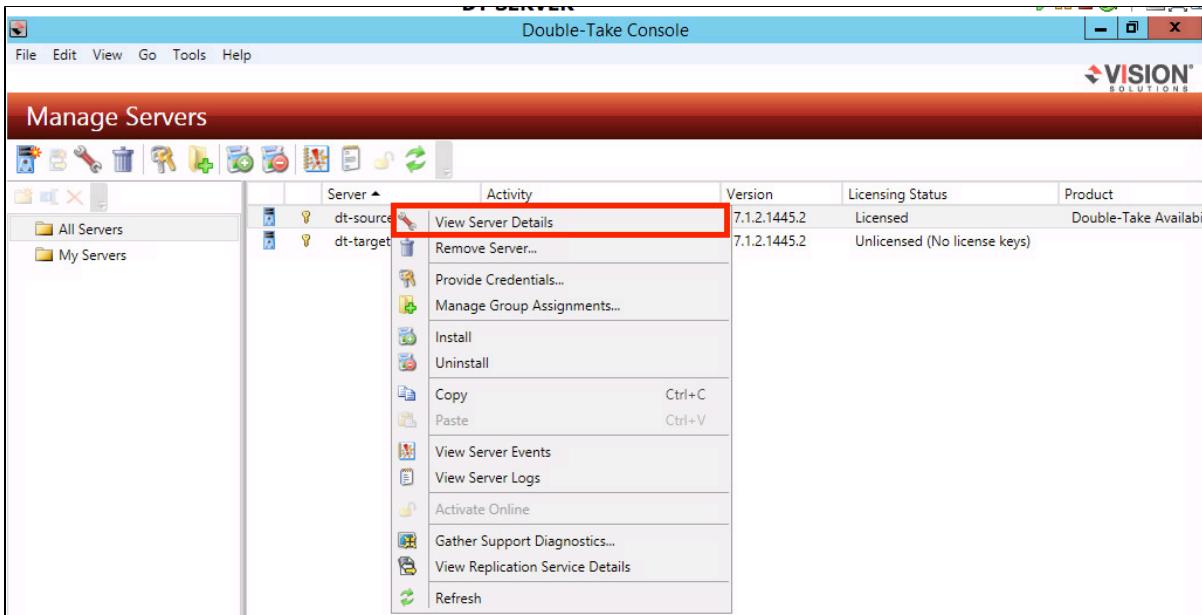
Manage Servers					
	Server	Activity	Version	Licensing Status	Product
All Servers	172.16.0.100	Executing installer		Unlicensed (No license keys)	(Unable to obtain the
My Servers	dt-target	Idle	7.1.2.1445.2	Unlicensed (No license keys)	

- When completed, you should now see the hostname, version, Licensing status and Product populated.
- This process can be repeated on each server that needs to be installed from the console. You can also highlight all servers that need an install and push the installation to all servers. However, this will use the same Install Folder Location, Queue Folder Location, RAM, and Disk usage limits on each server.

Source and Target Activation

In order to replicate with Double-Take, both the Source and Target servers must be activated. The source server will be activated by inputting the License Key given to you by iland. This key will be used for all source servers unless otherwise notified. The Target server requires you to download and install the Double-Take Metered Usage application. This is a very small executable that connects you to the Double-Take licensing service and licenses the Target server.

- My dt-source server has been activated by providing the license key during the install process.
- You can also add a license to a Source Server by browsing to the Manager Servers tab in the Double-Take console. Then right click on the server and choose View Server Details.



- In the Server Details page, you will see any licenses currently allocated to the server. If this section is blank or the Licensing Status is expired or unlicensed, click the Edit Server Properties button.

View Server Details

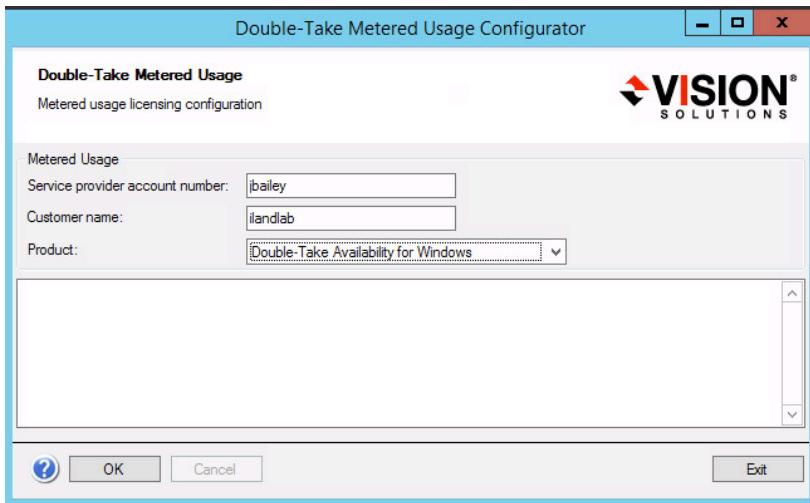
Inspect the details of this server.

Properties											
dt-source											
Operating system:	Microsoft Windows NT 6.2.9200.0										
Roles:	Engine Role										
Status:	Online										
Activity:	Idle										
Connected via:	172.16.0.100 on port 6325; Web-Services										
Version:	7.1.2.1445.2										
Access:	Administrator										
User name:	Administrator										
Licensing:											
<table border="1"> <thead> <tr> <th>Product</th> <th>Serial Number</th> <th>Expiration Date</th> <th>License Key</th> <th>Licensing Status</th> </tr> </thead> <tbody> <tr> <td>Double-Take Availability...</td> <td>369116</td> <td>2jh8-cxnk-d39v-y26...</td> <td>Licensed</td> <td></td> </tr> </tbody> </table>		Product	Serial Number	Expiration Date	License Key	Licensing Status	Double-Take Availability...	369116	2jh8-cxnk-d39v-y26...	Licensed	
Product	Serial Number	Expiration Date	License Key	Licensing Status							
Double-Take Availability...	369116	2jh8-cxnk-d39v-y26...	Licensed								

Tasks

- [Edit server properties](#) (highlighted with a red box)
- [Provide credentials](#)
- [View events on this server](#)
- [View logs on this server](#)
- [View replication service details for this server](#)

- Expand the Licensing section and type in a valid license in the “Add license keys and activation keys:” text box. Click the Add button to add the license key to the server and hit OK to save the changes
 - If you have already added the license to the console, you may be able to just click the Choose... button to add the existing license to the Server.
- To activate a Target Server, login to the Target Server and download the DTMUConfigurator.
 - The DTMUConfigurator install file is available at ftp://downloads.iland.com/Double-Take/Doubletake_availability/
 - Username: downloads
 - Password: d0wnd0wn
- Once downloaded, open the Install file
- Click next to select the Folder to installed the application into. Once selected, click next again
- Click next one more time to begin the installation, it should complete quickly
- Double-Click the Double-Take Metered Usage Configurator that should now be located on your desktop
- You will need to fill in the following information
 - Service Provider Account number:** This will be provided to you by iland
 - Customer Name:** This will be provided to you by iland
 - Product:** Choose Double-Take Availability for Windows



- When the required information has been filled in, click OK to activate the license
- You may be prompted that the Double-Take Service will be restarted. Click Ok on this dialog box, if there is replication currently running to this server, the service restart will not cause a Mirror Sync status.
- When the License Activation process completes, click the Exit button.
- On your Double-Take Management server, log back into your Double-Take Console and click on the Manager Servers tab.

Server	Activity	Version	Licensing Status	Product
dt-source	Idle	7.1.2.1445.2	Licensed	Double-Take Availability
dt-target	Idle	7.1.2.1445.2	Licensed (Metered)	Double-Take Availability

- You should now see that both the Source and Target servers are activated.
- You will use this same process to Activate all Target Servers only. The Source Servers will all be activated with the license key provided to you by iland.

Technical Support Details

At iland, we take great pride in our best in class technical support services. We provide access to our 1st, 2nd, and 3rd Tier technical support representatives.

For urgent matters, our technical support lines can be reached 24x7:

- North America: (800) 697-7088 option 2
- United Kingdom: 44.0.20.7096.0149
- Singapore: 65.3158.8301

For less urgent matters, email is best. Our support team can be reached at support@iland.com