

Register SQL Diagnostic Manager services as a Clustered Resource

Registering SQL Diagnostic Manager services with Microsoft Failover Cluster Manager allows the Microsoft Cluster Service to manage the services in failover situations. The following configuration ensures the high availability of the services during a failover.

Below, you can find two sets of instructions to register the SQL Diagnostic Manager services as a clustered resource:

- [Creating a new role for SQL Diagnostic Manager services](#)
- [Adding the SQL Diagnostic Manager services to an existing role](#)

Creating a new role for SQL Diagnostic Manager services

This set of instructions helps you to configure SQL Diagnostic Manager services in its own cluster using a Cluster Disk or Cluster Network shared folders. This option requires an available disk on the cluster to store the temporary files used by the SQLDM services.



For cluster disks, the available disk on the cluster can be any visible disk to all nodes in the cluster; including a network disk reachable via the UNC path.

1. Launch **Failover Cluster Manager** on a node of the cluster.




For more information on how to launch the Failover Cluster Manager, check [Installing the Failover Cluster Feature and Tools in Windows Server 2012](#)

2. Right-click on **Role** and select **Create Empty Role**.
3. Right-click on **New Role** and select **Properties**.
4. Specify a new name for the role and click **OK**.
5. Right-click on the **Role**, select **Add Resource**, and click **Client Access Point**.
6. When the New Resource Wizard opens, type a unique network name and an IP address, and click **Next**.
7. Click **Next** on the Confirmation screen.
8. Click **Finish** on the Summary screen.
9. Create a SQLdm DataPath:
 - a. For a Cluster Disk:
 - i. Right-click on the **Role** and select **Add Storage**.
 - ii. Select a disk, and click **OK**.
 - iii. In File Explorer, create a folder to be used by SQLDM services on the disk that was added.
Eg. *P:\SQLdmDataPath*
 - b. For Cluster Network shared folder:
 - i. On your network shared folder create a folder for SQLdm and ensure it has writing access to this **DataPath**.
Eg. *\\Server\SharedFolder\SQLdmDataPath*
10. Open Registry Editor and navigate to *HKEY_LOCAL_MACHINE\SOFTWARE\dera\SQLdm*
11. Right-click the SQLdm key, select **New**, click **Key**, and enter **Default** for the name.
12. Right-click the Default key, select **New**, click **String Value**, and enter **DataPath** for the name.
13. Double-click on the recently created **DataPath** string value and enter the path to the folder that was created for SQLDM services, click **OK**.
14. Go back to Failover Cluster Manager.
15. Right-click on the **role**, select **Add Resource**, and click **Generic Service**.
16. On the Select Service screen, select the **SQLdm Collection Service**, and click **Next**.
17. Click **Next** on the Confirmation screen.
18. Click **Finish** on the Summary screen.
19. Repeat steps 17-20 for the remaining SQLDM services: SQLdm Management Service, SQLdm Predictive Analytics Service, and SQLdm Rest Service.
20. Right-click on one of the added SQLDM services and select **Properties**.
21. Go to the **Dependencies** tab and add the following resources:
 - a. Name
 - b. IP Address
 - c. Disk



You can skip adding the Disk resource only if a shared folder was used.

22. Click **Apply** and go to the **General** tab.
23. Check the box Use the network name for the computer name, and click **Apply**.
24. Go to the Registry Replication tab, click **Add**, enter *SOFTWARE\dera\SQLdm\Default*, and click **OK**.

 There is a bug in Windows 2012 where the Registry Replication tab is not available. If the tab is unavailable, use the [Add-ClusterCheckpoint](#) PowerShell cmdlet to add the necessary setting.


EXAMPLE: Add-ClusterCheckpoint -ResourceName "SQLdmCollectionService`\$Default" -RegistryCheckpoint "SOFTWARE\Idera\SQLdm\Default" -Cluster "SQLdmServices"

25. Click **Apply**, and then click **OK**
26. Repeat steps 17-27 for the remaining SQLDM services: SQLdm Management Service, SQLdm Predictive Analytics Service, and SQLdm Rest Service
27. Right-click on each SQLDM service and select **Bring Online**

Adding the SQL Diagnostic Manager services to an existing role

The following set of instructions helps you to add the SQL Diagnostic Manager services to an existing role:

1. In File Explorer, create a folder to be used by SQLDM services on a disk that has been added as a cluster resource.
2. Open Registry Editor and navigate to *HKEY_LOCAL_MACHINE\SOFTWARE\Idera\SQLdm*
3. Right-click the SQLdm key, select **New**, click **Key**, and enter **Default** for the name
4. Right-click the Defaultkey, select **new**, click **String Value**, and enter **DataPath** for the name
5. Double-click the string value and enter the path to the folder that was created for SQLDM services, click **OK**
6. Launch **Failover Cluster Manager** on a node of the cluster. For more information on how to launch the Failover Cluster Manager, check [Installing the Failover Cluster Feature and Tools in Windows Server 2012](#)
7. Right-click on an existing role, select **Add Resource**, and click **Generic Service**
8. On the Select Service screen, select **SQLdmCollection Service**, and click **Next**
9. Click **Next** on the Confirmation screen
10. Click **Finish** on the Summary screen
11. Repeat steps 7-10 for the remaining SQLDM services: SQLdm Management Service, SQLdm Predictive Analytics Service, and SQLdm Rest Service
12. Right-click on one of the added SQLDM services, and select **Properties**
13. Go to the **Dependencies** tab and add the following resources:
 - a. Name
 - b. IP Address
 - c. Disk
14. Click **Apply** and go to the **General** tab
15. Check the box of Use network name for the computer name, and click **Apply**.
16. Go to the Registry Replication tab, click **Add**, enter *SOFTWARE\Idera\SQLdm\Default*, and click **OK**

 There is a bug in Windows 2012 where the Registry Replication tab is not available. If the tab is unavailable, use the [Add-ClusterCheckpoint](#) PowerShell cmdlet to add the necessary setting.

EXAMPLE: Add-ClusterCheckpoint -ResourceName "SQLdmCollectionService`\$Default" -RegistryCheckpoint "SOFTWARE\Idera\SQLdm\Default" -Cluster "SQLdmServices"

17. Click **Apply**, and then click **OK**
18. Repeat steps 12-17 for the remaining SQLDM services: SQLdm Management Service, SQLdm Predictive Analytics Service, and SQLdm Rest Service
19. Right-click on each SQLDM service and select **Bring Online**

When you finish registering the SQL Diagnostic Manager services as Clustered Resources, you need to [Reconfigure the SQLDM Services and Repository Database](#).