

Dell Client Configuration Toolkit Installation Guide



Notes, Cautions, and Warnings



NOTE: A NOTE indicates important information that helps you make better use of your computer.



CAUTION: A CAUTION indicates either potential damage to hardware or loss of data and tells you how to avoid the problem.



WARNING: A WARNING indicates a potential for property damage, personal injury, or death.

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Contents

1 Introduction.....	5
Installation Pre-requisites.....	5
Accessing CCTK Installer.....	5
Installing CCTK On Systems Running Windows.....	5
Installing CCTK Using DUP.....	6
Installing CCTK Using .msi File.....	6
Installing CCTK Silently Using DUP.....	7
Installing CCTK Silently In A Custom Folder Using .msi File.....	7
Installing CCTK Silently In The Default Folder Using .msi File.....	7
Installing CCTK On Systems Running Linux.....	7
Installing CCTK On Systems Running Red Hat Enterprise Linux 6.....	8
Installing CCTK On Systems Running RHEL 5.....	8
Important Information.....	8
Installing HAPI.....	8
Uninstalling HAPI.....	8
Uninstalling CCTK On Systems Running Windows.....	8
Uninstalling CCTK On Systems Running Linux.....	9
Uninstalling CCTK On Systems Running RHEL 6.....	9
Uninstalling CCTK On Systems Running RHEL 5.....	9
Upgrading CCTK On Systems Running Windows.....	9
Upgrading CCTK On Systems Running Windows Using DUP.....	9
Upgrading CCTK 2.2 and 2.1.1 On Systems Running Windows Using .msi File.....	10
Upgrading CCTK On Systems Running Linux.....	10
Upgrading CCTK On Systems Running RHEL 6	10
Upgrading CCTK On Systems Running RHEL 5.....	10
CCTK For Windows Pre-Installation Environment (Windows PE).....	11
Creating A Bootable Image PE Using Windows PE 4.0 and Windows PE 5.0.....	11
Creating A Bootable Image PE Using Windows PE 3.0 And 3.1.....	12
Reference.....	13
Accessing Documents From Dell Support Site.....	13


Introduction

Dell Client Configuration Toolkit (CCTK) is a packaged software offering that provides BIOS configuration capability to Dell business client platforms. You can configure the client systems in two ways: using Graphical User Interface (GUI) or using Command Line Interface (CLI). This guide provides the installation instructions for CCTK.

Installation Pre-requisites

The pre-requisites are given in the following table:

Table 1. Installation Pre-requisites

Systems	Requirements
Windows	<ul style="list-style-type: none">• The CCTK installation file, Systems-Management_Application_6HCTN_WN_2.2.1_A00.exe.• Workstation running the Microsoft Windows operating system.• Administrator privileges on the system where you are installing CCTK.• Microsoft .NET 4.0, to install and run CCTK GUI. <p> NOTE: Select Microsoft .NET Framework x.x.x on the Turn Windows features on or off screen on systems running Windows Vista or later operating systems.</p>
Linux	<ul style="list-style-type: none">• The CCTK installation file, cctk-linux-version-buildnum.tar.gz.• Workstation running the Linux operating system.• Red Hat Package Managers (RPMs) provided in the CCTK installation file.• Root login privileges.


Accessing CCTK Installer


The CCTK installation file is available as a Dell Update Package (DUP) at support.dell.com. To download the DUP:

1. Go to support.dell.com and navigate to the **Drivers and Downloads** page.
2. Select the client system.
3. Select the operating system, and then select **Systems Management** as the category.
4. Select **Client Configuration Toolkit** from the options, and then click **Download**.

Installing CCTK On Systems Running Windows

You can install CCTK from the downloaded DUP using the GUI or perform a silent installation. You can perform both the installations using the DUP or .msi file.

 **NOTE:** Microsoft .NET must be installed on the client system for CCTK GUI installation.

 **NOTE:** If UAC is enabled on Windows Vista, Windows 7, Windows 8 and Windows 8.1 systems, you cannot install CCTK in silent mode.

Related Links:

- [Installing CCTK Using DUP](#)

- [Installing CCTK Silently Using DUP](#)
- [Installing CCTK Using .msi File](#)
- [Installing CCTK Silently In The Default Folder Using .msi File](#)
- [Installing CCTK Silently In A Custom Folder Using .msi File](#)

Installing CCTK Using DUP

1. Double-click the downloaded DUP and click **Install**.
The CCTK **InstallShield Wizard** is launched.
2. Run the **InstallShield Wizard**.
For more information, see [Running The InstallShield Wizard](#).

Installing CCTK Using .msi File

1. Double-click the downloaded DUP.
2. Click the **Extract without Installing option**.
3. Specify a folder location where you want to extract the installer.
4. Click **OK**.
5. To view the extracted files, click **View Folder**.

The folder contains the following files:

- cctk.msi
- mup.xml
- package.xml
- cctk_ig.pdf
- Release notes.txt

6. To launch the CCTK **InstallShield Wizard**, double-click **cctk.msi**.
7. Run the **InstallShield Wizard**.

For more information, see [Running The InstallShield Wizard](#).

After you install CCTK, you can use the GUI or the CLI to configure the Dell client systems. For more information on configuring the systems, see the following documents at dell.com/support/manuals:

- *Dell Client Configuration Toolkit Command Line Interface Reference Guide*
- *Dell Client Configuration Toolkit User's Guide*




NOTE: CCTK can run only on a Dell system. It generates the following error on a non-Dell system: `This is not a Dell machine. CCTK supports only Dell machines.`

Running The InstallShield Wizard

1. From the folder where you extracted the **cctk.msi** file, double-click the file, or the DUP and click **Install**.
The welcome screen of **InstallShield Wizard** is displayed.
2. Click **Next**.
The **License Agreement** screen is displayed.
3. Read and accept the license agreement, and then click **Next**.
The **Customer Information** screen is displayed.

4. Type the customer information, select the user for the application, and then click **Next**.
The **Custom Setup** screen is displayed.
5. Click **Next** to install CCTK CLI and GUI in the default directory. The default CCTK installation directories are **C:\Program Files\Dell\CCTK** (for 32-bit system) and **C:\Program Files (x86)\Dell\CCTK** (for 64-bit system).


 **NOTE:** Click **Change** to install CCTK in a specified directory.

The **Ready to Install the Program** screen is displayed.

6. Click **Install**.
The **Installing Dell Client Configuration Toolkit** screen is displayed. When the installation completes, the **InstallShield Wizard Completed** screen is displayed.
7. Click **Finish**.
If CCTK GUI is successfully installed, the shortcut for the GUI is displayed on the desktop.

Installing CCTK Silently Using DUP

1. Launch the command prompt and navigate to the folder where you have downloaded the DUP.
2. Run the following command: `Systems-Management_Application_6HCTN_WN_2.2.1_A00 /s.`

 **NOTE:** For more information on using the commands, type the following command: `Systems-Management_Application_6HCTN_WN_2.2.1_A00 /h.`

Installing CCTK Silently In A Custom Folder Using .msi File

To specify a custom installation directory:

Run the following command: `msiexec /i cctk.msi INSTALLDIR=<destination> /qn` where **<destination>** is the custom directory and **INSTALLDIR** must be in uppercase.

For example, the following command line installs CCTK in silent mode in the destination directory: `msiexec /i cctk.msi INSTALLDIR=c:\destination /qn`


Installing CCTK Silently In The Default Folder Using .msi File

1. Navigate to the folder where you have extracted the CCTK installer from the DUP.
2. Run the following command: `msiexec.exe /i cctk.msi /qn`

The CCTK components are silently installed in the following locations:

- **C:\Program Files\Dell\CCTK** (for 32-bit systems)
- **C:\Program Files (x86)\Dell\CCTK** (for 64-bit systems)

Installing CCTK On Systems Running Linux

 **NOTE:** CCTK GUI is not supported on systems running the Linux operating system.

1. From support.dell.com, download the **cctk-linux-version-buildnum.tar.gz** file.
2. Untar the file using the following command: `tar -zxvf cctk-linux-version-buildnum.tar.gz`
3. Install the RPMs in the file.

Related Links:

- [Installing CCTK On Systems Running Red Hat Enterprise Linux \(RHEL\) 6](#)

- [Installing CCTK On Systems Running RHEL 5](#)

Installing CCTK On Systems Running Red Hat Enterprise Linux 6

To install CCTK on systems running Red Hat Enterprise Linux 6 (RHEL 6) systems using 64-bit RPMs, navigate to **RHEL6** directory (**\lx64\RHEL6**), untar the file, and run the commands in the following order:

1. `rpm -ivh srvadmin-hapi-7.4.0-4.2.8.el6.x86_64.rpm`
2. `rpm -ivh cctk-linux-2.2.1-buildnum.el6.x86_64.rpm`

Installing CCTK On Systems Running RHEL 5

To install CCTK on systems running RHEL 5 using 64-bit RPMs, navigate to **RHEL5** directory (**\lx64\RHEL5**), untar the file, and run the commands in the following order:

1. `rpm -ivh srvadmin-hapi-7.4.0-4.2.8.el5.x86_64.rpm`
2. `rpm -ivh cctk-linux-2.2.1-buildnum.el5.x86_64.rpm`

Important Information

The common scenarios for Hardware Application Programming Interface (HAPI) installation:

- If you have installed only CCTK CLI, you must install HAPI version 7.4 on the system.
- If the system does not have HAPI, when you run a CCTK command, HAPI is automatically installed. After the option is configured, HAPI is uninstalled.
- If you run CCTK commands frequently, install HAPI before you execute CCTK commands for better performance.

Related Links:

- [Installing HAPI](#)
- [Uninstalling HAPI](#)

Installing HAPI

1. Navigate to the HAPI directory (**\x86** for 32-bit systems and **\x86_64** for 64-bit systems).
2. Run the **HAPIInstall.bat** file.

Uninstalling HAPI

1. Navigate to the HAPI directory (**\x86** for 32-bit systems and **\x86_64** for 64-bit systems).
2. Run the **HAPIUninstall.bat** file.

Uninstalling CCTK On Systems Running Windows

1. Perform any one of the following:
 - Click **Start** → **All Programs** → **Dell** → **CCTK** → **Uninstall**.
 - Click **Start** → **Control Panel** → **Programs And Features**.
2. Select **Dell Client Configuration Toolkit** and click **Uninstall**.

Uninstalling CCTK On Systems Running Linux

To uninstall CCTK on systems running RHEL 6 and RHEL 5, you have to run different RPMs.

Related Links:

- [Uninstalling CCTK On Systems Running RHEL 6](#)
- [Uninstalling CCTK On Systems Running RHEL 5](#)



NOTE: Uninstalling and upgrading CCTK on Linux systems leaves empty files and folders on the system. The files and folders do not have any functional impact.

Uninstalling CCTK On Systems Running RHEL 6

To uninstall CCTK on systems running RHEL 6, navigate to **RHEL6** directory (**\x64\RHEL6**), untar the file, and run the commands in the following order:

1. `rpm -e cctk-linux-2.2.1-buildnum.el6.x86_64`
2. `rpm -e srvadmin-hapi-7.4.0-4.2.8.el6.x86_64`

Uninstalling CCTK On Systems Running RHEL 5

To uninstall CCTK on systems running RHEL 5 systems, navigate to **RHEL5** directory (**\x64\RHEL5**), untar the file, and run the commands in the following order:

1. `rpm -e cctk-linux-2.2.1-buildnum.el5.x86_64`
2. `rpm -e srvadmin-hapi-7.4.0-4.2.8.el5.x86_64`

Upgrading CCTK On Systems Running Windows

You can upgrade CCTK using DUP or .msi file.



NOTE: Microsoft .NET must be installed on the client system for CCTK GUI installation.



NOTE: If UAC is enabled on Windows Vista, Windows 7, Windows 8 and Windows 8.1 systems, you cannot install CCTK in silent mode.

Related Links:

- [Upgrading CCTK On Systems Running Windows Using DUP](#)
- [Upgrading CCTK 2.2 and 2.1.1 On Systems Running Windows Using .msi File](#)

Upgrading CCTK On Systems Running Windows Using DUP

1. Double-click the downloaded DUP and click **Install**.
The CCTK **InstallShield Wizard** is launched.
2. Run the **InstallShield Wizard** and follow the instructions on the screen.

Upgrading CCTK 2.2 and 2.1.1 On Systems Running Windows Using .msi File

1. Download the latest installation file, **Systems-Management_Application_6HCTN_WN_2.2.1_A00.exe** from **support.dell.com**.
2. Extract the installation:
 - From the folder where you extracted the file, double-click the **cctk.msi** file, or
 - From the command prompt, navigate to the directory where you extracted the file, and then run the following command:

```
msiexec.exe /i cctk.msi REINSTALL=ALL REINSTALLMODE=VOMUS
```

The **InstallShield Wizard** screen is displayed.

3. Follow the instructions on the screen to upgrade.



NOTE: For a silent upgrade, run the following command: `msiexec.exe /i cctk.msi REINSTALL=ALL REINSTALLMODE=VOMUS /qn`

Upgrading CCTK On Systems Running Linux

1. From **support.dell.com**, download the **cctk-linux-version-buildnum.tar.gz** file and save it on your system.
2. Untar the file using the following command: `tar -zxvf cctk-linux-version-buildnum.tar.gz`.
3. Upgrade the version of CCTK on the system.



NOTE: To upgrade to CCTK 2.2.1 using 64-bit RPMs, uninstall the 32-bit RPMs, and then install 64-bit RPMs.



NOTE: The ipmi and omicore RPMs are deprecated.



NOTE: Uninstalling and upgrading CCTK on Linux systems leaves empty files and folders on the system. The files and folders do not have any functional impact.

Related Links:

- [Installing CCTK On Systems Running Linux](#)
- [Upgrading CCTK On Systems Running RHEL 6](#)
- [Upgrading CCTK On Systems Running RHEL 5](#)

Upgrading CCTK On Systems Running RHEL 6

To upgrade CCTK on RHEL 6 systems using RPMs, navigate to `lx64\RHEL6` directory, untar the file, and run the commands in the following order:

1. `rpm -Uvh srvadmin-hapi-7.4.0-4.2.8.el6.x86_64.rpm`
2. `rpm -Uvh cctk-linux-2.2.1-buildnum.el6.x86_64.rpm`

Upgrading CCTK On Systems Running RHEL 5

To upgrade CCTK on RHEL 5 systems using RPMs, navigate to `lx64\RHEL5` directory, untar the file, and run the commands in the following order:

1. `rpm -Uvh srvadmin-hapi-7.4.0-4.2.8.el5.x86_64.rpm`
2. `rpm -Uvh cctk-linux-2.2.1-buildnum.el5.x86_64.`

CCTK For Windows Pre-Installation Environment (Windows PE)

Windows PE provides a standalone pre-installation environment that is used to prepare a system for Windows installation. For client systems that do not have an operating system installed, you can create a bootable image that contains CCTK to run the CCTK commands on Windows PE. To create Windows PE 3.0, and 3.1 image, you can use Microsoft Windows Automated Installation Kit (Windows AIK) and to create Windows PE 4.0 image, and Windows PE 5.0 image, you can use Windows Assessment and Deployment Kit (Windows ADK).

Using Windows PE 3.0, Windows PE 3.1, Windows PE 4.0, and Windows PE 5.0, you can integrate CCTK, HAPI, and related drivers directly into a bootable ISO image.

Related Links:

- [IG CCTK Creating A Bootable Image PE Using Windows PE 4.0, and Windows PE 5.0](#)
- [Creating A Bootable Image PE Using Windows PE 3.0 And 3.1](#)

Creating A Bootable Image PE Using Windows PE 4.0 and Windows PE 5.0

1. From the Microsoft website, download and install Windows ADK on the client system.



NOTE: While installing select only **Deployment Tools** and **Windows Preinstallation Environment (Windows PE)**.

2. From support.dell.com, download and install CCTK.
3. Integrate the CCTK directory structure to an ISO file to create a bootable ISO image.

Related Link:

- [Integrating CCTK Directory Structure To An ISO File Using Windows PE 5.0](#)
- [Integrating CCTK Directory Structure To An ISO File Using Windows PE 4.0](#)

Integrating CCTK Directory Structure To An ISO File Using Windows PE 5.0

1. Install Windows 8.1 operating system.
2. Download and install Windows ADK for Windows 8.1.
3. Create Windows PE 5.0 image.

Related Links:

- [Creating Windows PE 5.0 64-Bit Image](#)
- [Creating Windows PE 5.0 32-Bit Image](#)

Creating Windows PE 5.0 64-Bit Image

1. Navigate to **C:\Program Files (x86)\Dell\CCTK\X86_64**.
2. Open the command prompt with administrator privileges.
3. Run the following command: `cctk_x86_64_winpe_5.bat C:\winpe_x86_64 C:\Progra~2\Dell\CCTK`.
4. Navigate to **C:\winpe_x86\WIM** and burn the ISO image.

Creating Windows PE 5.0 32-Bit Image

1. Navigate to **C:\Program Files (x86)\Dell\CCTK\X86**.
2. Open the command prompt with administrator privileges.
3. Run the following command: `cctk_x86_winpe_5.bat C:\winpe_x86 C:\Progra~1\Dell\CCTK`.

4. Navigate to **C:\winpe_x86\WIM** and burn the ISO image.

Integrating CCTK Directory Structure To An ISO File Using Windows PE 4.0

1. Install Windows 7 SP1 or Windows 8 operating system.
2. Download and install Windows ADK for Windows 8.
3. Create Windows PE 4.0 image.

Related Links:

- [Creating Windows PE 4.0 64-Bit Image](#)
- [Creating Windows PE 4.0 32-Bit Image](#)

Creating Windows PE 4.0 64-Bit Image

1. Navigate to **C:\Program Files (x86)\Dell\CCTK\X86_64**.
2. Open the command prompt with administrator privileges.
3. Run the following command: `cctk_x86_64_winpe_4.bat C:\winpe_x86_64 C:\Progra~2\Dell\CCTK`.
4. Navigate to **C:\winpe_x86\WIM** and burn the ISO image.

Creating Windows PE 4.0 32-Bit Image

1. Navigate to **C:\Program Files (x86)\Dell\CCTK\X86**.
2. Open the command prompt with administrator privileges.
3. Run the following command: `cctk_x86_winpe_4.bat C:\winpe_x86 C:\Progra~1\Dell\CCTK`.
4. Navigate to **C:\winpe_x86\WIM** and burn the ISO image.

Creating A Bootable Image PE Using Windows PE 3.0 And 3.1


1. From the Microsoft website, download and install Windows AIK on the client system.
2. From support.dell.com, download and install CCTK.
3. Integrate the CCTK directory structure to an ISO file (for Windows PE 3.0 and 3.1) to create a bootable ISO image.

Related Links:

- [Integrating CCTK Directory Structure To An ISO File Using Windows PE 3.0](#)
- [Integrating CCTK Directory Structure To An ISO File Using Windows PE 3.1](#)

Integrating CCTK Directory Structure To An ISO File Using Windows PE 3.0

CCTK provides the **cctk_x86_winpe_3.bat** and **cctk_x86_64_winpe_3.bat** scripts to integrate CCTK, HAPI, and related Dell drivers to the ISO image. To integrate the CCTK directory structure to an ISO file:

1. Navigate to the directory where the script is located.
 **NOTE:** By default, the script for 32-bit system is located in the **cctk_x86** directory. The script for 64-bit system is located in the **cctk_x86_64** directory.
2. If you have installed AIK in a non-default directory, open the script, set the **AIKTOOLS** path, and save the file.
For example, Set **AIKTOOLS=C:\WINAIK\Tools**.
3. Run the script with the path where you want to create the ISO file and the CCTK installation directory as two arguments.



NOTE: Make sure that the directory specified for the ISO image is not an existing directory.

- For a 32-bit system, run `cctk_x86_winpe_3.bat C:\winPE_x86 C:\Progra~1\Dell\CCTK`.
- For a 64-bit system, run `cctk_x86_64_winpe_3.bat C:\winPE_x86_64 C:\Progra~2\Dell\CCTK`.

The ISO image and the WIM file are created in **winPE_x86\WIM** folder.

Integrating CCTK Directory Structure To An ISO File Using Windows PE 3.1

1. Install Windows 7.
2. Install Windows 7 SP1.
3. Install Windows 7 AIK.
4. Download Windows PE 3.1 AIK, install, and create Windows PE 3.1 image.

Related Links:

- [Installing Windows PE 3.1 AIK](#)
- [Creating Windows PE 3.1 64-Bit Image](#)
- [Creating Windows PE 3.1 32-Bit Image](#)

Installing Windows PE 3.1 AIK

1. Burn the Windows AIK supplement ISO image to a DVD-ROM.
2. Open the command prompt with administrator privileges.
3. Run the following command to replace the installed Windows PE 3.0 files with the corresponding Windows PE 3.1 files from the ISO: `xcopy E:\ "C:\Program Files\Windows AIK\Tools\PETools" /ERDY`.
E:\ is the root directory of the ISO image.

Creating Windows PE 3.1 64-Bit Image

1. Run `cctk_x86_64_WinPE_3.bat C:\WinPE3.1_64bit C:\Progra~2\Dell\CCTK`.
2. Navigate to **C:\WinPE3.1_64bit\WIM** and burn the image.

Creating Windows PE 3.1 32-Bit Image

1. Run `cctk_x86_winpe.bat C:\WinPE3.1_32bit C:\Progra~1\Dell\CCTK`.
2. Navigate to **C:\WinPE3.1_32bit\WIM** and burn the image.

Reference

In addition to this guide, you can access the following guides available at dell.com/support/manuals.

- *Dell Client Configuration Toolkit User's Guide*
- *Dell Client Configuration Toolkit Command Line Interface Reference Guide*

Accessing Documents From Dell Support Site

To access the documents from Dell Support site:

1. Go to dell.com/support/manuals.
2. In the **Tell us about your Dell system** section, under **No**, select **Choose from a list of all Dell products** and click **Continue**.

3. In the **Select your product type** section, click **Software and Security**.
4. In the **Choose your Dell Software** section, click the required link from the following:
 - **Client System Management**
 - **Enterprise System Management**
 - **Remote Enterprise System Management**
 - **Serviceability Tools**
5. To view the document, click the required product version.



NOTE: You can also directly access the documents using the following links:

- For Enterprise System Management documents — **dell.com/openmanagemanuals**
- For Remote Enterprise System Management documents — **dell.com/esmmanuals**
- For Serviceability Tools documents — **dell.com/serviceabilitytools**
- For Client System Management documents — **dell.com/OMConnectionsClient**
- For OpenManage Connections Enterprise systems management documents — **dell.com/OMConnectionsEnterpriseSystemsManagement**
- For OpenManage Connections Client systems management documents — **dell.com/OMConnectionsClient**