

DELL

Dell™ Client System Management with Microsoft® System Center Configuration Manager

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END-TO-END COMPUTING

Dell | Systems Management Solutions



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INTRODUCTION

Dell provides IT Administrators with various tools to enable simplified management of Dell business client systems with Microsoft System Center Configuration Manager (ConfigMgr). Objective of this whitepaper is to provide information on the various products available from Dell that coupled with ConfigMgr provide best in class enterprise system management and simplify IT for IT administrators.

During the lifecycle of a typical client hardware asset, an IT administrator typically needs to perform some or all the following tasks:

- Initial deployment of OS and system
- Configure BIOS
- Perform day-to-day management
- Perform Asset Management and Reporting
- Update BIOS, drivers and firmware

Dell provides a number of tools to assist the IT administrator in these tasks using the capabilities of ConfigMgr.

INITIAL DEPLOYMENT OF OPERATING SYSTEM

IT departments typically manage a heterogeneous mix of decentralized client hardware and various software applications. Administration of such large scale enterprises involves centralized systems management processes using consistent methods for managing a diversity of clients on the network. Typical job activities of an IT Administrator involve deploying standardized corporate images on the hardware that they manage and then using a consistent mechanism to gather a variety of information on application software, hardware, and operating systems across their network from a central management console like ConfigMgr.

Dell System Deployment Cabs enable IT administrators to rapidly deploy their own customized corporate image on a Dell System. Dell System Deployment Cabs simplify the deployment process by providing the base drivers necessary to get a Dell system up and running. The drivers are pre-packaged for easy importation into ConfigMgr.

For More information on how to simplify image deployment and driver management using the Dell Driver Cab with ConfigMgr please see the additional resources at the end of this document.

CONFIGURE BIOS

While infrequent, configuring BIOS settings on thousands of remote machines is one of an IT administrator's greatest challenges.

Dell Client Configuration Utility (DCCU) lets you easily create a stand-alone executable package that you can run on a Dell business client computer to configure BIOS settings. This standalone package (.exe) can be deployed remotely to Dell client systems using the Software distribution features in ConfigMgr. This enables the IT administrator to configure BIOS settings without requiring a desk side visit. DCCU provides an easy to use User Interface to select the BIOS settings that the user wishes to configure. DCCU supports Latitude™, OptiPlex™ and Dell Precision™ systems.

DAY TO DAY MANAGEMENT

Remote Management with Intel® vPro™ Technology

Dell business client systems are enabled with Intel vPro technology. vPro technology helps the IT administrator to manage their global desktops and laptops – without leaving their desk. An admin can remotely diagnose, isolate and repair PCs and thus help reduce desk side visits.

Configuration Manager 2007 Service Pack 1 provides the user with an Out of Band Management console that can be used to manage Dell Systems enabled with vPro using Intel Active Management technology (AMT). AMT provides a secure out of band channel for management tasks. The following features are provided

- Remote Power Control
- IDE redirection (Map a local hard drive to remote system)
- Text console redirection (Ability to view BIOS setup screen remotely)
- Consistent UUID with both AMT and Configuration Manager Hardware inventory
- Report on Hardware inventory and System State.

For more information please see the additional resources at the end of this document.

Asset Management and Reporting

Using the reporting features in ConfigMgr the IT administrator can perform detailed asset management in the enterprise. By integrating OMCI within ConfigMgr the IT administrator is able to perform enhanced reporting for managed Dell business client platforms.

Dell OpenManage™ Client Instrumentation (OMCI) software provides extensive information about your Dell client system, including the following:

- General system – Docking station and system summary
- Boot order
- BIOS configuration
- HDD – physical and logical attributes
- Hardware: battery, fans, Controllers (USB, infrared, parallel, SCSI, serial), PC cards, processors, memory, HIDs and displays, PCI devices, sensors, interrupts/DMA,
- Operating system information

Dell OMCI allows systems management application programs to access information about the client computer, monitor the status of the client computer, or change the state of the computer, such as shutting it down remotely. OMCI uses the Common Information Model (CIM). Microsoft Windows Management Instrumentation (WMI) is Microsoft's implementation of CIM instrumentation. OMCI provides data to WMI, which is the common interface to WMI management applications. Detailed information on how to integrate OMCI seamlessly along with a few sample reports is provided in the Dell OMCI Integration Whitepaper (See Resources section of this whitepaper).

UPDATE

Hardware Patch Management

ConfigMgr gives the administrator the ability to schedule remote updates of software components. Dell provides enablement of ConfigMgr to simplify this process for the administrator. The Dell System Center Updates Publisher (SCUP) Catalogs automate the patch process of system updates for Dell business client systems in a ConfigMgr environment. The catalog files contain detailed information to determine which updates are required for Dell business client systems, and how to apply them. It can be used in conjunction with the software update management functionality of Microsoft Configuration Manager to provide automated BIOS, firmware, driver, and Dell application updates. For a full list of supported systems and detailed information on required steps, see the Hardware Patch management section in the resources section of this whitepaper.

ADDITIONAL RESOURCES

Additional information is available from the following sources.

Image Management :

<http://www.delltechcenter.com/page/Dell+Business+Client+Operating+System+Deployment>

Dell Client Configuration Utility (DCCU):

http://www.dell.com/content/topics/global.aspx/sitelets/solutions/management/client_software

Management with Intel® vPro™:

<http://communities.intel.com/community/openportit/vproexpert/microsoft-vpro>

Dell OMCI Integration:

<http://www.delltechcenter.com/page/Using+OMCI+with+ConfigMgr>

Hardware Patch Management:

<http://www.delltechcenter.com/page/Dell+Updates+Catalogs>

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