

# **DELL Services**

Optimize your infrastructure with thorough, data-driven planning and assessments

#### **Infrastructure Services**

- End User Computing
- MDS
- Microsoft Services

#### **Global Storage Services**

- Server, Storage
   Network Services
- Simplification
- Deployment

#### **Support services**

- Prosupport
- Prosupport +





Deployment



Support



# The time to **migrate** is **now**

## Problem

Windows 2003 Server support ends July 14th, 2015

# Scale

>10m Servers are still on 2003

# Risk

Security and Vulnerability risk due to no scheduled patching from Microsoft

# Cost

\$5000/Server/YR for custom support from Microsoft\*

There is no single answer that suits all workloads. Dell will help to rank and classify your workloads based on business criticality.

## Solution

- Dell Windows Server OS Modernization Services
- Dell Datacenter Transformation methodology
- Dell Global Application packaging factory (Compatibility testing and remediation)

<sup>\*</sup> Microsoft will charge \$5,000 per server for year 1 up to a limit of 300 servers. This means that the MAXIMUM they will charge in year 1 to remain on Dell MS Server 2003 is \$1.5m (yes even if the customer has 10,000 severs). Each security patch will cost \$50,000. Costs will double each subsequent year.



# What we're **hearing** from customers

"There are a significant amount of legacy apps without development staff to support migration"

"The software and configuration are not available – they left with the original developer"

"We know the application is **not supported** on the target Windows 2008/2012 platform"

"As long as we're migrating the workload, we need to consider increased virtualization or cloud"

"We just don't have enough resources to hit the July 2015 deadline in all of our locations"



# The upside: **Improved** product since server 2003

Reduce operational costs



Improve efficiency and reliability

Enhance security and audit standards



Self-service provisioning, extensive automation and standardisation



Provision individual servers or whole application environments from templates



Standardised, pooled, high-availability server configurations



Segregate admin duties, enforce security and audit policies



Costs **\$\Pi\$** by > 20%

Deployment time ↓ from weeks to hours or minutes







# Define the **right level** of expertise and support with IT Consulting



Skilled Solution Architects • Automated tools and analysis • Best of breed partners
Unique intellectual property • Reference architectures



# End to end services to meet your needs

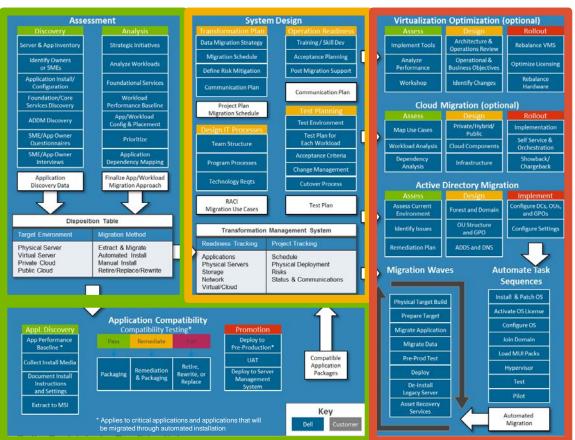
**Team up** with the **leader** in Windows Migration to help you **quickly migrate** from **Windows 2003** regardless of where you are in the process.

#### **Assessment System Design** Support / Educate Windows technical training from Transformation Planning and Design Analysis of infrastructure and Apps Application inventory Scheduling & Migration planning **Dell Education Services** Dependency analysis App/Workload specification Flexible delivery models Performance Base lining Design, Build and Validate target solution Microsoft Gold Certified Partner App owner interviews Step by step migration plan Global availability Workshop Workshop Workshop Workshop **Implementation System Design** Disposition Migrate the Systems • Compatibility testing & Define unique approach for each app Target apps to platforms; physical, Remediation virtual, private cloud, public cloud Packaging & deployment Determine target OS automation Dell - Restricted - Confidential Prioritization Configure Target & Migrate app

and data

# Typical 26-52 weeks

# Windows Server 2003 migration plan











# Workshop offering (CWS)

4 hours on-site workshop

# Workshop Understand the potential

# Agenda

15 min Introduction and end in mind

60 min "AS-IS": general discovery, Issue prioritization,

Requirements, expected results

15 min Break

15 min Introducing **DELL migration methodology & POV** 

60min Defining customer migration strategy & plan

("AS-IS" > "TO-BE" Journey)

15 min Summary and Next Steps

60min Executive summary / Presentation



# Workshop Executive summary

#### 1. AS-IS CompanyName Background

(1) Need to modernize ~ HofServers Windows 2003 servers before they reach end of life (July 2015) Sufficient due diligence needed, but not at the cost of modernization progress

Desire for maximum repeatability and automation in modernization process

#### Windows 2008R2 is current desired target, though Windows 2012 approval is imminent (2) Need to create a trusted repository of data on servers, workloads and applications in scope

#### SCOM currently tracks server & app information but validation is needed

- Desire for questionnaire/interview framework and process across LOBs & companies that
- maximizes needed data gathered and minimizes app owner time investment Need to discover server / application dependency and supportability on W2008/2012
- Need to derive modernization groupings, priority and method or disposition Need to understand current functionality levels and user experience to compare later

#### (3) Need to determine application compatibility with Windows 2008/2012

Need to evaluate if application is supported by vendor currently and license lifecycle If legacy apps, need to understand if application can run on a 64-bit operating system Need to define possible outcomes and dispositions per application to use in planning

#### (4) Need to pilot and prove out modernization processes for Windows 2003 workloads Desire to evaluate possible processes and tools for migrating to Windows 2008/2012

Need to have a process and tools where installation files and instructions do not exist Desire to pilot and prove out both easy and complex applications Desire to pilot and prove out with the "hard" applications rather than the easy

#### Pilot goal is mostly process capture and tool validation, rather than app owner comfort

- (1) Currently #OfServers Windows 2003 servers are identified for modernization in the environment CompanyName already reduced the addressable footprint (low-hanging fruit) The #OfServers servers are mostly virtualized (75% or approximately ### server workloads)
- Physical servers tend to have multiple applications, while virtual are mostly 1:1 The #Servers servers are estimated to span ### apps as well as several IIS far (2) The #OfServers servers host ###-### applications from multiple operating companies

- The current application estate spans LOB and has as many as ## App Owner Managers Each app owner manager has 1-3 app owner analysts reporting to them
- 50% of applications are considered "home grown" and are supported internally Many vendor applications are no longer officially supported but are still used (ex. EPRI)

#### 2. Scope & Key Assumptions

#### (1 & 2) Discovery and Validation of Server and Application Inventory Asset and Application Discovery (inclusive of titling of applications)

- Server and application dependency discovery and analysis Application owner interviews and data analysis/correlation
- Discovery of supportability status (internal / vendor / expiration) Modernization grouping and initial disposition recommendations
- Prioritization of application migrations based on application owner feedback (2) Creation of Trusted Repository of Application and Server Data for Modernization
- Deployment and Customization / Integration of Dell Transformation Manager (DTM)
- Data import and rationalization from discovery and validation efforts Creation of linkages to existing relevant CompanyName systems (i.e. CMDR\_APART)
- Standardizing and optimizing online app owner questionnaires to be used in discovery Enabling DTM use in support of discovery, validation, compatibility testing, and pilot efforts

#### (3) Application Compatibility Testing and Disposition Determination Using discovered and validated data from DTM repository perform Application Compatibility Testing (ACT) on the

in-scope applications using ChangeBASE

Red/Amber/Green (RAG) report, support status & recommended disposition and method of migration Validate recommendations with application owners and seek feedback and agreement

(4) Pilot Modernization / Application Migration Methods and Refine Recommendations Pilot modernization process and tools for applications that have install files and configuration

Pilot modernization process and tools for applications that need re-packaging

Pilot migration process and tools for applications that are not supported and have no install files Refine and revise disposition and method recommendations based on results of pilot

#### Access to all existing inventory and technical documentation existing for servers and apps Ability to interact with and obtain information from key stakeholders and app owners

- Access to technical IT resources (network, security, database, etc.) as relevant for discovery Infrastructure components (storage, network, compute) available prior to pilot kickoff
- The ability to deploy, gain network connectivity, input credentials and deploy agents for Asset Inventory, Dependency, ACT and software titling tools (deployed local to CompanyName)

#### 3. CompanyName Input into Process

#### (1, 2 & 3) Modernization Discovery, Analysis, Creation of Trusted Repository and Planning Senior business unit and functional (application owner) management commitment

- Coordination of input from various LOBs, divisions and operating companies Network connectivity to targets, root/admin credentials, existing inventory & app docs
- Technical and Application-specific knowledge for discovery, validation & planning Sufficient Virtual Infrastructure Capacity to host discovery tools & DTM (defined at kickoff)
- (4) Modernization Pilot and Disposition Process and Tool Planning Provide pilot applications and servers to serve as candidates for both AppZero and Factory Provide application exercising for AppZero migrations Provide feedback, review results and undertake testing of modernized applications

#### 4. High Level Plan

#### 1) Asset and Application Discovery & Validation (including performance): a. CompanyName CMDB serves as baseline for assets

- b. Dell Asset Manager with SCCM import validates and titles applications c. MAP data collection on asset targets captures performance state
- 2) Ascertain supportability status and application owner correlation a. Light survey of application owners b. Dependency data gathering and correlation with asset tracking
- c. Vendor support status research ann owners and ann factory 3) Setup of trusted repository for discovery data (integration/import)
- 4) Application Compatibility Testing & Disposition option determination a. Dell ChangeBase and Dell App Factory automate large quantity

h Red/Amher/Green analysis sneeds up decision-making on disposition 5) Modernization Grouping of applications, dispositioning, planning 6) Validation of discovery, testing and research finding with app owners 7) Pilot of modernization/migration methods & options (can run parallel)



#### 5. Discovery and Analysis

Discover and Document Application Estate with Dell Asset Manager

- (Software Asset Inventory DB >400,000 asset titles) System Center Configuration Manager integration – existing data Properly size target platform: Microsoft Assessment Planning (MAP)
- Performance Baseline analysis to properly size target and capture known performance requirement / footprint
- Size your target appropriately to reduce app owner strife Discover dependencies with BMC's ADDM deployed as an appliance
- Application Dependency & Data mapping for complex LOB apps Enable deeper app interview discussions and mitigate transition risk
- Test app compatibility on Win2003/2012 with Dell Change BASE: Automated app compatibility testing and integration with Dell Application Factory for easy remediation, in-depth testing and reducing uncertainty during execution and mitigating transition risk





#### Asset Manager

ADDM

#### 6. Dell Knowledge Base and Best Practices

#### - Dell brings strong data center transformation methodology and managed datacenter services to the table Dell's relationship with Microsoft:

- 2012 and 2013 U.S. Windows Deployment Partner of the Year and the 2013 U.S. Windows Partner of the Year
- #1 MS enterorise partner group (EPG) partner
- #1 in worldwide in Windows 7. Lync and data center deployments - Technology adoption program (TAP) for Windows Server 2012 - Dell Transformation Manager: this proprietary technology underpins the
- service as the central data repository & 'single source of truth': - Risk/Issue Integration
- Task Integration
- Utilize existing data where
- Discover to fill gaps - Easy transition to execution



- Dell Asset Manager & Dell ChangeBASE (Quest acquisition) Automates Software Titling and Compatibility Testing & remediation of application

Dell Application Factory provides cost-efficient Assessment, Remediation and Testing for most common modernization options. With 5 global locations including US, it has created > 19,600 Windows Installer packages and > 4100 virtual packages (App-V) since 2006.

#### CompanyName Deliverables

Company Logo

Establish Foundation: Depending on chosen option(s) the cost is \$270K or \$385/server (ROM cost subject to +/- 20%):

#### 1 & 2) Discovery of Existing Data and Tool-Based Collection

- Data gathered from discovery assessment on up to seven hundred (700) Windows 2003 servers, using multiple tools and leveraging existing CompanyName data where available and applicable

- Data gathered with Dell Asset Manager (software titling), ADDM (dependency) and MAP (perf. baseline) Additional data resulting from import of existing SCCM records into Dell Asset Manager (DAM)

- Results of a conducted light survey of CompanyName's SMEs & application owners Vendor compatibility data and support status – researched as part of discovery

2) A Trusted Repository for Application & Server data for Modernization Deployment of a centralized repository database and Dell Transformation Manager (DTM) portal Integrate all data points and tool outputs with DTM ( rationalization, discovery & validation) Integrate links from existing CMDBs to DTM so that it becomes a "single source of truth" for the effort

3) Application Compatibility & Disposition Options Testing Implement ChangeBASE for Application Compatibility Testing (ACT) for 175 applications Integrate AppZero with ChangeBase as required for Application Compatibility Testing for selected applications

Use ChangeBASE Red, Amber, Green (RAG) status to determine options for app disposition & migration methods Conduct app owner interviews to assist in work estimates for the disposition plan for each application/server 1, 2 &3) Data Analysis, Correlation and Recommended Disposition Determination

- Correlated Data and Disposition Recommendations Based on: CompanyName-provided data - Discovered inventory, application and capacity data via tools (DAM, MAP)
  - Discovered dependency data via ADDM tool Performance baseline data
  - Application Compatibility (ACT) data from Change BASE analysis - Software support status data based on vendor research Assignment of apps & servers to consistency groups
- CompanyName Stakeholder and Application Owner survey data as well as interviews - Dell Transformation Manager accessible via a portal to derive the following intelligence for execution :
  - Assignment of initial recommended disposition to workloads and applications - All available and related discovery data for workloads and applications

#### Execute a Pilot of 6 Applications:

Documentation & Presentation of Results

4) Pilot of W2003 Modernization Disposition Options and Migration Methods Disposition Options and Migration Use Cases to be Piloted are as follows::

- Two (2) Apps with Install files & configuration available - process-centric and application owner-led - Two (2) Apps that would require re-packaging - Dell's Application Packaging Factory to be used if possible

Two (2) Apps that are not supported and have no install files available - Use AppZero process if possible Dell to perform discovery/design and provide status, progress and reporting (success rate, issues, risks identified) - Transformation Planning (definition of server & app workload dispositions, updated data via DTM if available) - Capture and document recommended process, strategy & approach for subsequent program phases

#### 8. Benefits to CompanyName (1) Analytics, Supportability and Application Compatibility Testing Benefits

(a) Server OS instance and Application (with dependency mapping) inventory to obtain clear picture & mitigate risk (b) Maximum automation and repeatability of process in testing compatibility with desired OSs (Win2008R2/2012) - Reduced risk - get it right the first time

Optimize app owner interaction and ensure testing is minimally invasive to ongoing operations (c) Create the right plan and disposition for most visibility into timely completion by Windows 2003 End of Support

(2) Base decisions on a Trusted Repository of project data (a) Single source of truth for modernization program progress - turn data into intelligence (b) Custom online survey of application owners optimizes interaction times and automates data collection

(c) Easy transition to execution, with Dell Transformation Manager as the trusted repository bridging the gap (3) Determine Compatibility, Supportability and actionable Outcomes for Windows 2003-based Application (a) The correlated data from DAM, ChangeBASE, Surveys and Interviews provides a clear picture and go forward plan (b) Risks are flushed out based on extensive analysis and testing and mitigations and plan are clear and actionable

(4) Prove out Feasibility and test Modernization Options by Undertaking a Pilot (a) Use Dell's proven and documented processes and tool relationships to undertake a pilot remediation effort (b) Gain clear understanding and visibility into the execution phase and gain comfort in Dell's ability to deliver results (c) Leverage lessons learned from pilot to smooth the way during discovery, testing, dispositioning and execution

#### 9. Financial Justification

- Cost avoidance via better planning and risk reduction Platform maintenance / Break fix / Administration
- · Patching ease and improvements Process standardization
- (2) CAPEX reduction limiting potential financial exposure in 2015 and beyond Avoidance of Microsoft support penalties:

 Microsoft has provided data to show that support cost will be \$5K in year 1 and \$10K in year 2 per device, which means that CompanyName's exposure is \$3.5M / \$7M for years 1 and 2 if no action is taken

- Furthermore, Microsoft provided cost to receive Security Updates rated as important at \$50K per update in year 1 and \$100K per update in year 2, opening up CompanyName to further practically unlimited secure systems still on Windows 2003 after July of 2015

#### Workshop



Understand the potential



# Workshop offering (CWS)



# Get it for FREE



