


Tru64 UNIX Update – New Features & Roadmap

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Agenda

- Overview
- Support Roadmaps
- Tru64 UNIX V5.1B
- Tru64 UNIX V5.1B Enhancements
- Future Release and Plans
- Tru64 UNIX to HP-UX Migration Solutions
- Resources


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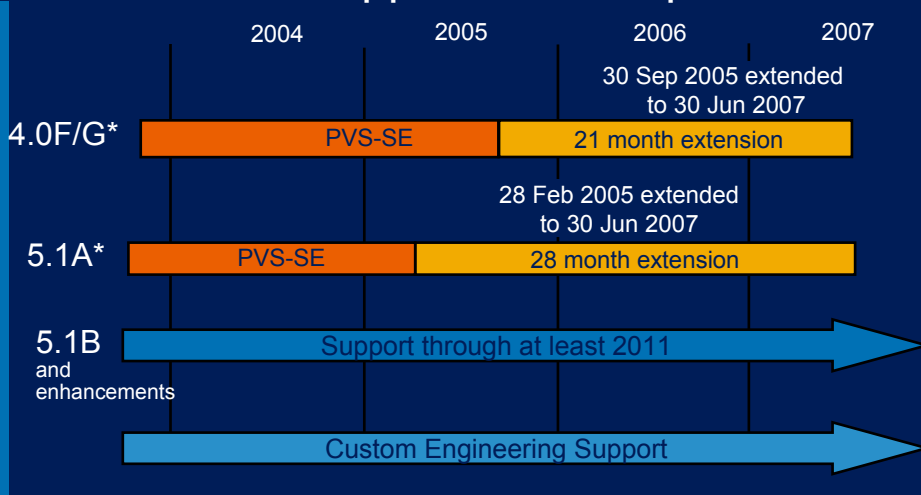
Overview

- Unchanged Roadmaps still on schedule
 - New version added
- V5.1B Support at least until 2011
 - 5 years beyond last alpha server sale date
- PVS extended for selected versions
 - Tru64 UNIX V4.0F/G extended 21 months
 - Tru64 UNIX V5.1A extended 28 months
 - Ends 30 June 2007

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Tru64 UNIX Support Roadmap



The diagram shows a timeline from 2004 to 2007. It details support periods for three versions of Tru64 UNIX: 4.0F/G*, 5.1A*, and 5.1B and enhancements. For 4.0F/G*, support (PVS-SE) ends in late 2005, with a 21-month extension ending on 30 Jun 2007. For 5.1A*, support (PVS-SE) ends in late 2005, with a 28-month extension ending on 30 Jun 2007. For 5.1B and enhancements, support continues through at least 2011, with an option for Custom Engineering Support.

2004 2005 2006 2007

30 Sep 2005 extended to 30 Jun 2007

4.0F/G* PVS-SE 21 month extension

28 Feb 2005 extended to 30 Jun 2007

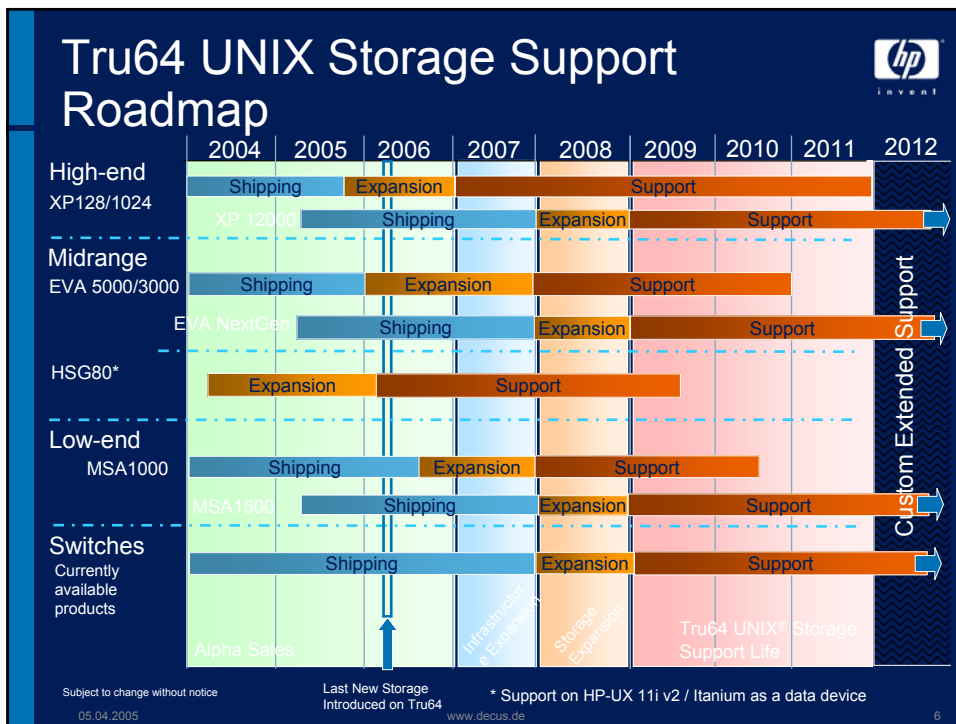
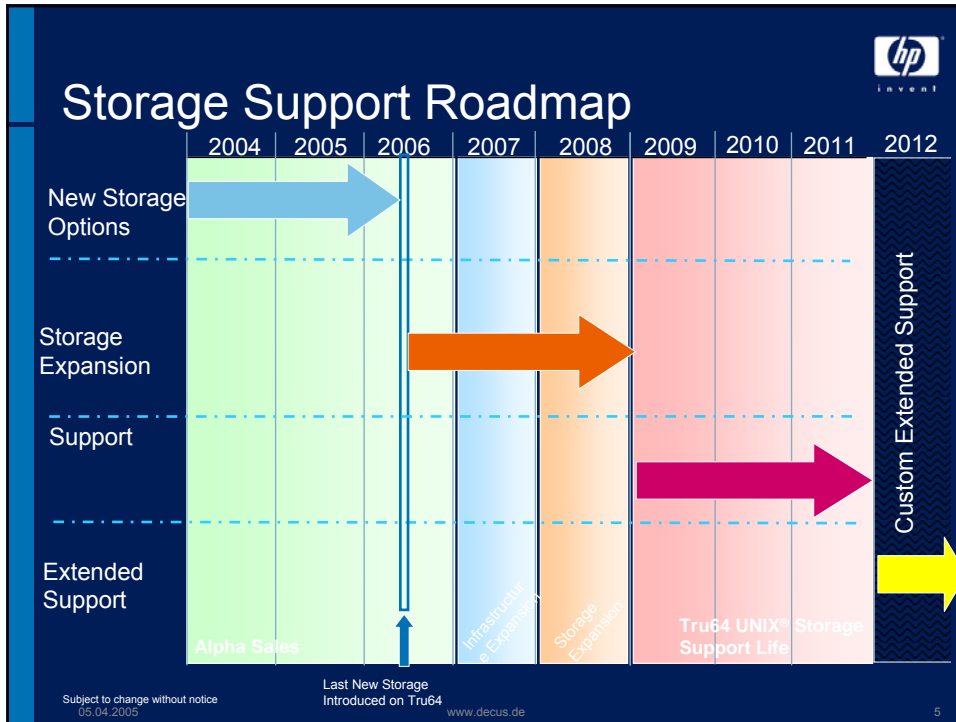
5.1A* PVS-SE 28 month extension

5.1B and enhancements Support through at least 2011


Custom Engineering Support









PVS-SE: *Prior Version Support – Sustaining Engineering*
* - Restricted Configurations

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Top ISV Support Roadmap



	Oracle RDBMS (9i/10g), 9iAS, Application Server 10g, E-Business Suite 11iR1, supported at least through 2011 , except Oracle Collaboration Suite which is supported at least through 2006.
	Informix Dynamic Server (IDS) v9.40 and WebSphere MQ 5.1, supported at least through 2011 with a 12-month advance notice of any change.
	PeopleTools 8.20 and 8.45, supported at least through 2010
	WebLogic Server, WebLogic Portal, Tuxedo, and BMQ, supported at least until 2009 – in accordance with BEA standard and extended support agreements, unless the specific BEA product and version is retired on all platforms sooner.
	VERITAS NetBackup™ software support until mid-2008 . See the VERITAS Support Handbook at support.veritas.com for additional support details.
	OpenEdge™ 10 and Progress® Version 9, supported at least until 2007 , at least as long as customers with maintenance contracts require support.
	ASE 12.5 and RepServer 12.6, supported in accordance with Sybase standard and extended support agreements - at least until 2007 - unless the specific Sybase product and version is obsoleted on all platforms sooner.
	DataStage V7.5 and QualityStage 7.0, supported through 2005


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Tru64 UNIX V5.1B



- EV7 platform support (Marvel)
 - 2-8, 16 and 32 CPU's (ES47, ES80, GS1280)
- New Management Enhancements
 - SysMan
 - Collect, Collgui, Sys_check
 - Environmental monitoring
 - Improved boot times
 - IPv6 production mode
 - Kernel Crash Dump
 -


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Tru64 UNIX V5.1B

- New monitoring utilities and daemons
 - Essential Services Monitor Daemon (esmd)
 - maintains the availability of essential system daemons
 - Performance Manager metrics server daemon (pmgrd)
 - provides general UNIX performance metrics on request
 - PK-2
 - xmesh (EV7 based systems)
 - utilization reports for mesh components
 - PK-3


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Tru64 UNIX V5.1B

- Security Enhancements
 - SSH bundled with V5.1B
 - set EnforceSecureRutils=yes
 - rlogin, telnet or rsh equivalent ssh2
 - rcp or ftp equivalent scp2 or sftp
 - Buffer overflow protection (PK-2)


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Tru64 UNIX V5.1B

- New AdvFS Features
 - Online LUN/Unit Expansion
 - mount [-u] -o extend ...
 - vFast Utility
 - continuously defragmenting and balancing files
 - Freeze/Thaw
 - allow coherent hardware snapshots within multivolume
- New LSM Features
 - Fast Plex Attach
 - Volclonedg supports snaps/clones


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Tru64 UNIX V5.1B

- Big Memory Pages Support
 - Support for pages of 64KB, 512KB and 4096KB
 - Optimized page size controlled by kernel
- TruCluster Server Enhancements
 - CFS Load Monitoring Daemon (cfsd)
 - Dynamic load balancing
 - CAA application resource balancing
 - parallel roll support
 - Faster SW upgrades


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Tru64 UNIX V5.1B-1

- Binary Compatibility to V5.1B
- Support for 64 CPU EV7 Systems
- Support for DS15
- HP-UX 11i migration tools availability
 - filescanner, scansummary, scandetail ...
- V5.1B-1 „Vail“ release includes NHD-7 and PK-3
 - plus updated/new applications


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Tru64 UNIX V5.1B-1

- Enhanced Big Memory Pages Support
 - Application tunable button in 5.1B-1
- Greater file system scalability
 - Higher LSM I/O throughput
 - AdvFS panic avoidance
- Broader support of StorageWorks products
 - MSA1000, EVA, XP-Storage Array...
 - HP Data Protector


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Tru64 UNIX V5.1B-2

- Binary Compatibility to V5.1B
- Support for EV7z
- Updated HP-UX 11i compatibility tools
 - Scanwizards
 - developers documentation
 - HP-UX Manual-Pages included
- V5.1B-2 „Utah“ includes NHD-7 and PK-4
 - plus updated/new applications

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Tru64 UNIX V5.1B-2

- Enhanced Big Memory Pages Support
 - Basic functionality in 5.1B
 - Application tunable in 5.1B-1
 - Support for system page tables in 5.1B-2
 - Will greatly improve performance of
 - Memory Intensive Applications (i.e. DB)
 - Finite Element Applications (i.e. Modeling)

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Tru64 UNIX V5.1B-2

- Reduced time for patch installation
- Faster boot with clustered LSM
- Improved memory channel performance
- Unified Buffer Cache scaling
 - Improved performance (SMP, Numa, EV7, PCI-X)
- Improved bad disc detection and handling
- XP12000 support added

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Tru64 UNIX V5.1B-3

- Tru64 UNIX V5.1B-3 „Tahoe“ release
 - Planned for June 2005
 - Support for new I/O operations
 - Enhanced HP-UX 11i compatibility tools
 - Application Updates
 - Quality Updates
- V5.1B-2 includes NHD and PK-5
 - plus updated/new applications

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Tru64 UNIX V5.1B-3

APCD I	Updated Components	Unchanged
Advanced Printing SW		•
Advanced Server for UNIX	•	
Cobol RT Library		•
Development Enhancements		•
Fortran RT Library		•
Hypersort		•
Java™		•
LDAP Client Utilities	•	
DataDirect (ODBC/JDBCdriver)	•	
Mozilla	•	
Multimedia Services		•
OpenLDAP	•	
Pascal RT Library		•
Worldwide Language Support	(updated via patch kit)	
Tru64 UNIX®to HP-UX STK vX		•
BinaryScan v1.0	•	
hpuxman v1.1		•


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Tru64 UNIX V5.1B-3

APCD II	Updated Components	Unchanged
Perl	TBD	
Collgui	TBD	
DECevent		•
Extended System V		•
GNU Source		•
Graphical Program TK		•
Legato Networker	TBD	
Motif	•	
Porting Assistant		•
Powerstorm Graphics		•
Secure Web Server	•	
Sysman SW Manager ADK		•
TruCluster Server	(updated via patch kit)	
UniCensus check	•	
Visual Threads	TBD	
WEBES	TBD	
Windows 2000 SSO		•
Xemacs		•
Retired components		•


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Tru64 UNIX V5.1B-3

- AdvFS quality updates
- Optimization of NUMA Architecture in EV7
 - Set CPUs in a Resource Affinity Domain (RAD)
- Collect Utility Enhancements
 - Support dynamic changes to AdvFS
- Better Cluster Performance
 - Better performance Cluster inter-node communication
 - Faster Cluster boot time

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Tru64 UNIX V5.1B-3

- Storage Handling Improvements
 - More robust search to determine a path to target disk
 - Support for LSM fast failover
- ISV enablement
 - Improvements to the OS necessitated by ISV partners
- Accounting
 - Refined accounting of system end user utilization time


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Tru64 UNIX V5.1B-3

- Patch installation/deleting enhancements
 - License Wrapper included
 - Accept license agreement on patch installation
 - Deleting patch kit in multi-user mode
 - Single user mode still recommended
 - Forced installation on system conflicts
 - Expansion to baseline
 - Limited use still recommended


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Tru64 UNIX V5.1B-3

- Clusterwide *fuser()* command
- Cluster Application Availability (CAA)
 - Improve the overall quality of the code base
- Cluster Alias Serviceability Enhancement
 - Improved debugging capabilities


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Tru64 UNIX V5.1B-3

- LSM performance improvements
 - Mirrored volume plex detach on device error
 - LSM startup and rescan for large cluster environments
- Fast-fail option for LSM mirrored volume I/O
 - Selectable for I/O improvements on device errors
- LSM improved supportability
 - New vold option for real-time debugging

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Future Release and Plans



- New Tru64 UNIX Version 5.1B-4 added
 - Planned for 2006
 - Last Tru64 UNIX version
 - Application updates
 - Quality updates
 - Storage options
 - ??

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Future Release and Plans

V5.1B with its enhancements, sales until 2006, with support at least until 2011 

V5.1B-2 2004	V5.1B-3 2005	V5.1B-4 2006
<ul style="list-style-type: none"> • EV7z AlphaServers • Improved storage management • Storage options • Resiliency enhancements • HP-UX 11i compatibility tools • Application updates 	<ul style="list-style-type: none"> • Storage options • Resiliency enhancements • ISV support • HP-UX 11i compatibility tools • Application updates 	<ul style="list-style-type: none"> • Storage Options • Resiliency enhancements • ISV support • Application updates <div style="text-align: right; margin-top: 10px;">  </div>



 Maintain binary compatibility,
 Continue focus on quality, stability and security
 

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Tru64 to HP-UX Migration Solutions

<i>Existing Tru64 Solutions</i>	<i>Equivalent HP-UX Solutions</i>
<i>LSM</i>	<i>VxVM + HP File Mover Tool</i>
<i>AdvFS</i>	<i>VxFS + HP File Mover Tool</i>
<i>AdvFS & LSM</i>	<i>Storage Foundation + HP FMT</i>
<i>TruCluster (v4 and v5)</i>	<i>HP Serviceguard + Storage Foundation (v4) or Storage Foundation CFS (v5)</i>
<i>TruCluster for Oracle customers (v4 and v5)</i>	<i>HP Serviceguard + Storage Foundation (v4) for Oracle or Storage Foundation CFS for Oracle (v5)</i>
<i>TruCluster for Oracle RAC customers (v5)</i>	<i>HP Serviceguard + Storage Foundation CFS for Oracle RAC</i>


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Tru64 to HP-UX Migration Solutions

- HP File Mover Tool (FMT)
 - Designed to assist customers with data migrations
 - In-house application developed by HP
 - Still beta but will be released soon
 - Moves directory contents
 - Source system (Tru64 UNIX) Target system (HP-UX 11i)
 - Will not handle ISV files (database files for instance)
 - Will not handle application binaries
 - Will handle SOME endian issues
 - Incompatible file systems between Tru64 UNIX and HP-UX
 - Endian conversion program for customer specific binary formats


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Tru64 to HP-UX Migration Solutions

- HP File Mover Tool
 - Client Server Design
 - A set of programs that operate in four sequential stages
 - Stage 1: Analysis
 - Stage 2: Transfer
 - Stage 3: Endian Conversion (optional)
 - Stage 4: Verification


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Resources

- Tru64 UNIX to HP-UX migration information
 - [Application Transition Homepage](#)
 - [Tru64 UNIX HP-UX Transition Tools](#)
 - [Tru64 UNIX HP-UX Transition Modules](#)

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Resources

- [DECUS IT Symposium 2004 - Bonn](#)
- [Sustaining Engineering Supported Product List](#)
- [Tru64 UNIX Technical Updates](#)
- [Tru64 UNIX and TruCluster Server Info](#)
- [Tru64 UNIX Reference Pages](#)

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