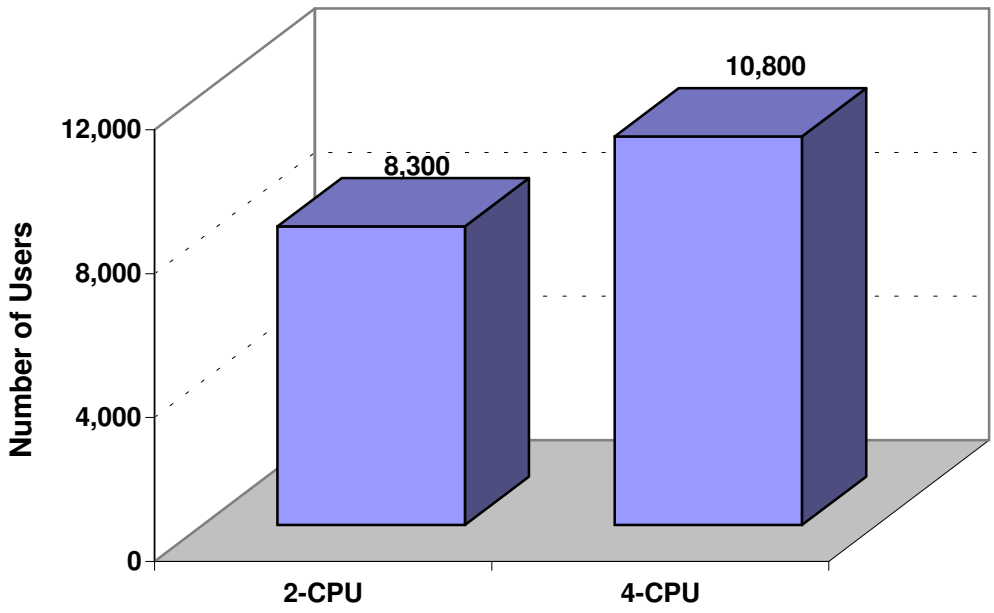
Performance Flash

Digital Equipment Corporation's DIGITAL Server 7105 sets a new Microsoft® Exchange LoadSim Benchmark for an Intel Four-Processor Server

The Digital Server 7105 is a four-processor 200-Megahertz Pentium Pro system with one megabyte of secondary cache. The newest member of the DIGITAL Server family of processors set a record of 10,800 LoadSim Medium users, based on new Microsoft Exchange 5.5 UPS (Users Per Server) Policy Guidelines V1.0. This document provides the guidelines for conducting benchmark UPS tests on Exchange server with the MAPI interface, and the main criteria Microsoft uses to validate these test results and enable customers to make valid comparisons when evaluating systems vendors.

These new guidelines specify procedures to test the messaging throughput of a single server, single site topology. Its purpose is to measure the maximum throughput of a Microsoft Exchange Server on this hardware configuration to provide a benchmark for comparing hardware and/or software products, but cannot be used as a deployment guide for production environments. For deployment specific information, contact DIGITAL or DIGITAL Messaging and Collaboration representatives, who are listed on the ***http://www.digital.com/messaging/mail.html*** web site. By standardizing testing protocols, Microsoft has made it easier to compare performance testing on a fair and consistent basis among vendors. DIGITAL is, therefore, especially pleased to announce the record setting results for an Intel-based four-processor system.

DIGITAL Server 7105



Conducting the Tests

Default settings were used for the LoadSim Medium user profile. The process adhered to the specific practices as described in the Load Simulator 5.5 User Guide for test setup, configuration, and monitoring. All testing was conducted using a steady state period of at least four hours. Steady state is defined as maintaining a consistent level of messaging traffic.

Testing was done using the following configurations:

SYSTEM	**DIGITAL Server 7105**	**DIGITAL Server 7105**
MS Exchange Build	V5.5	V5.5
LoadSim Version	5.5.2187	5.5.2187
NT Version	NTSEE V4.0 SP3	NTSEE V4.0 SP3
Number of CPUs	2	4
Number of Users	8,300	10,800
RAM (set by Optimizer)	830 megabytes	1 gigabyte
CPU Secondary Cache	1 Megabyte	1 Megabyte
DISKS (Total)	38	45
Internal Disks		
Adaptec AHA-3940	system & log	system & log
System Disk Type	RZ28D-VA	RZ28D-VA
Number of Log Disks	2	2
Log Disk Type	RZ29B-VA	RZ29B-VA
External Disks		
Controller for IS (wide)	3 Mylex DAC960P 2ch	3 Mylex DAC960P 2ch
Number of IS Disks	35	42
IS Disks Type	DS-RZ1CB-VW	DS-RZ1CB-VW
External Enclosures	Storage Works Cabinet	Storage Works Cabinet
Ethernet	10 Megabit	10 Megabit
CPU Utilization	91%	75%

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