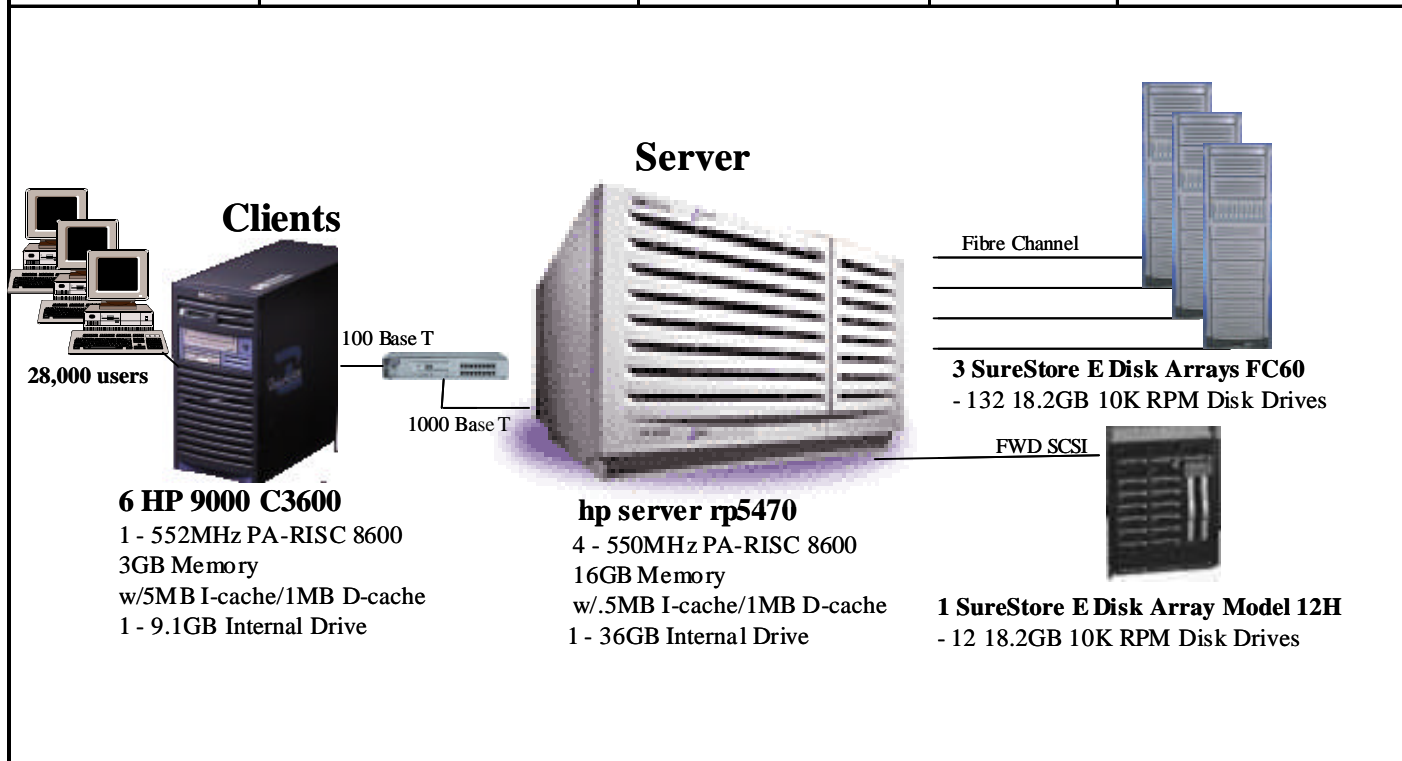
	<h1>hp server rp5470</h1>			TPC-C Revision 5
				Report Date: January 9, 2002
Total System Cost	TPC Throughput	Price/Performance		Availability Date
<b>\$523,368</b>	<b>34,288.77 tpmC</b>	<b>\$15.26/tpmC</b>		<b>December 1, 2000</b>
Processors	Database Manager	Operating System	Other Software	Number of Users
<b>4 PA-RISC 8600 550MHz</b>	<b>Sybase Adaptive Server Enterprise 12.0</b>	<b>HP-UX 11.0 64-bit Extension Pack 9911</b>	<b>TUXEDO 6.4</b>	<b>28,000</b>



System Components	Server (hp server rp5470)		Each Client (6 C3600)	
	Qty	Type	Qty	Type
<b>Processors</b>	4	550MHz PA-RISC 8600	1	552MHz PA-RISC 8600
<b>Cache Memory</b>	each	0.5 MB I-cache, 1 MB D-cache	each	0.5 MB I-cache/1 MB D-cache
<b>Memory</b>	16	GB	1	3 GB
<b>Disk Controllers</b>	6	HP-PCI Fibre Channel	1	FWD SCSI-2
<b>Disk Drives</b>	1	36GB Internal Drive	1	9.1 GB disk
	3	SureStore Disk Array FC60 with 132 18.2 10K RPM drives		
	1	SureStore Disk Array Model 12H with 12 18.2 10K RPM drives		
<b>Total Storage</b>	2,455	GB		
<b>Tape Drives</b>	1	DVD ROM		
<b>Terminals</b>	1	Console Terminal		



# hp server rp5470

TPC-C Rev 5

Report Date: January 9, 2002

Description	Part Number	Brand	Price Key	Unit Price	Qty	Extended Price	3 yr. Maint. Price
<b>Server Hardware</b>							
hp server xp5470	A6144B			15,050	1	15,050	7,879
Add'l 550 MHz PA-RISC 8600 CPUs	A6146A			5,900	4	23,600	9,100
Memory Carrier	A6155A			2,500	2	5,000	
2 GB Memory	A6115A			14,000	8	112,000	
Processor Support Module	A5796A			995	2	1,990	
Dual Port Ultra 2 SCSI	A5150 Opt. 0D1			1,680	1	1,680	
36 GB Internal Disk	A6737A			2,900	1	2,900	
Rack Installation Kit	A5170A, Opt. 0D1			410	1	410	
PCI Fibre Channel Adapter	A5158A, Opt. 0D1			2,240	6	13,440	
PCI 1000BT Lan Adapter	A4926A, Opt. 0D1			2,135	1	2,135	
HP Smart 2U Storage Enclosure	C4317A			450	1	450	
DVD-ROM	C4318SZ, Opt. 108			649	1	649	
.5m 68pin SCSI Terminator	C4318SZ, Opt. 001			99	1	99	
WSE 68pin SCSI Terminator	C4318SZ, Opt. 835			45	1	45	
HP-UX 11.0 Sys Media, CD-ROM	B3920EA, Opt. AAF			520	1	520	
6.5 kW HP UPS Rackmount	A6584A			8,799	2	17,598	
1.25m Field Integrted Cabinet	A4900A			2,110	1	2,110	
Auto Raid Array Model 12	A3700A			6,220	1	6,220	6,104
Two 96 MB controllers with Auto Raid	Opt. 203			18,760	1	18,760	
18.2 GB disk modules, 10K RPM	A3714A			2,000	12	24,000	
SureStore E Disk Array FC60	A5277A			5,160	3	15,480	25,578
HP Rack System/E33 Inc. Rear & Foot	A4901A			2,240	3	6,720	
Dual Controllers	A5277A, Opt 204			32,080	3	96,240	
SureStore E Disk System SC10	A5294A			6,400	17	108,800	
16m Fibre Channel Cable	A5277A, Opt AFY			160	6	960	
18.2GB 10K RPM Disk Drive	A6272A			1,600	132	211,200	
<b>Subtotal</b>						<b>688,056</b>	<b>48,661</b>
<b>Server Software</b>							
Sybase Enterprise Adaptive Server 12.0	Runtime				2		
						34,995	16,800
<b>Subtotal</b>						<b>34,995</b>	<b>16,800</b>
<b>Client Hardware</b>							
Hewlett Packard Model C3600 Workstation	A5992A			11,500	6	69,000	23,286
512 MB Memory Module	A4995A, Opt. OD1			695	6	4,170	
1GB Memory Module	A6016A, Opt. OD1			1,395	12	16,740	
700/96 Console	C1064GX			413	1	413	
100BaseT PCI Lan Adapter	B5509BA			273	6	1,638	
18GB LVD 10K RPM Disk	A4998A, Opt. 0D1			595	6	3,570	
<b>Subtotal</b>						<b>95,531</b>	<b>23,286</b>
<b>Client Software</b>							
HP C/ANSI C Compiler	B3901BA, Option AH0			1,600	1	1,600	339
BEA Tuxedo 6.4		Bea Sys.		2,850	3	17,100	12,420
<b>Subtotal</b>						<b>18,700</b>	<b>12,759</b>
<b>User Connectivity</b>							
HP ProCurve Switch 2524	J4813A			1,099	1	1,099	304
HP ProCurve Switch Gigabit-SX Module	J4113A			1,189	1	1,189	
<b>Subtotal</b>						<b>2,288</b>	<b>304</b>
Large Configuration Discount and Support Prepayment							
*All discounts are based on US list prices and for similar quantities and configurations							
<b>Total</b>						<b>446,976</b>	<b>76,392</b>

Notes: 1=HP, 2=Sybase  
3=BEA Systems

Audited by Lorna Livingree, Performance Metrics, Inc.

<b>Three Year Cost of Ownership:</b>	<b>\$523,368</b>
<b>tpmC Rating:</b>	<b>34,288.77</b>
<b>\$/tpmC:</b>	<b>\$15.26</b>

Prices used in TPC benchmarks reflect actual prices a customer would pay for a one-time purchase of the stated components. Individually negotiated discounts are not permitted. Special prices based on assumptions about past or future purchases are not permitted. All discounts reflect standard pricing policies for the listed components. For complete details, see the pricing sections of the TPC benchmark specifications. If you find that the stated prices are not available according to these terms, please inform the TPC at pricing@tpc.org. Thank you.

# Numerical Quantities Summary for hp server rp5470

**MQTH, Computed Maximum Qualified Throughput**

**34,288.77 tpmC**

**Response Times (in seconds)**

	90th %-ile	Maximum	Average
New-Order	1.48s	5.73s	0.93s
Payment	1.42s	5.59s	0.87s
Order-Status	1.47s	4.37s	0.91s
Delivery (interactive portion)	0.08s	0.17s	0.08s
Delivery (deferred portion)	1.81s	5.60s	1.25s
Stock-Level	1.76s	5.65s	1.01s
Menu	0.10s	0.54s	0.002s

**Transaction Mix, in percent of total transactions**

New-Order	44.80%
Payment	43.03%
Order-Status	4.07%
Delivery	4.06%
Stock-Level	4.04%

**Keying/Think Times**

	Keying Time			Think Time		
	Min	Avg	Max	Min	Avg	Max
New-Order	18.02s	18.03s	18.08s	0.01s	12.12s	158.51s
Payment	3.01s	3.02s	3.07s	0.01s	12.07s	160.33s
Order-Status	2.01s	2.02s	2.03s	0.01s	10.2s	131.59s
Delivery (interactive)	2.01s	2.02s	2.05s	0.01s	5.05s	65.88s
Stock-Level	2.01s	2.02s	2.07s	0.01s	5.08s	76.21s

**Test Duration**

Ramp up time	32 minutes
Measurement interval	30 minutes
Transactions during measurement interval	2,296,275
Ramp down time	4.34 minutes

**Checkpointing**

Number of checkpoints in measurement interval	2
Checkpoint Interval	30 minutes

**Reproducibility Run**

Throughput	33,666.83 tpmC
Relative to MQTH	-1.81%