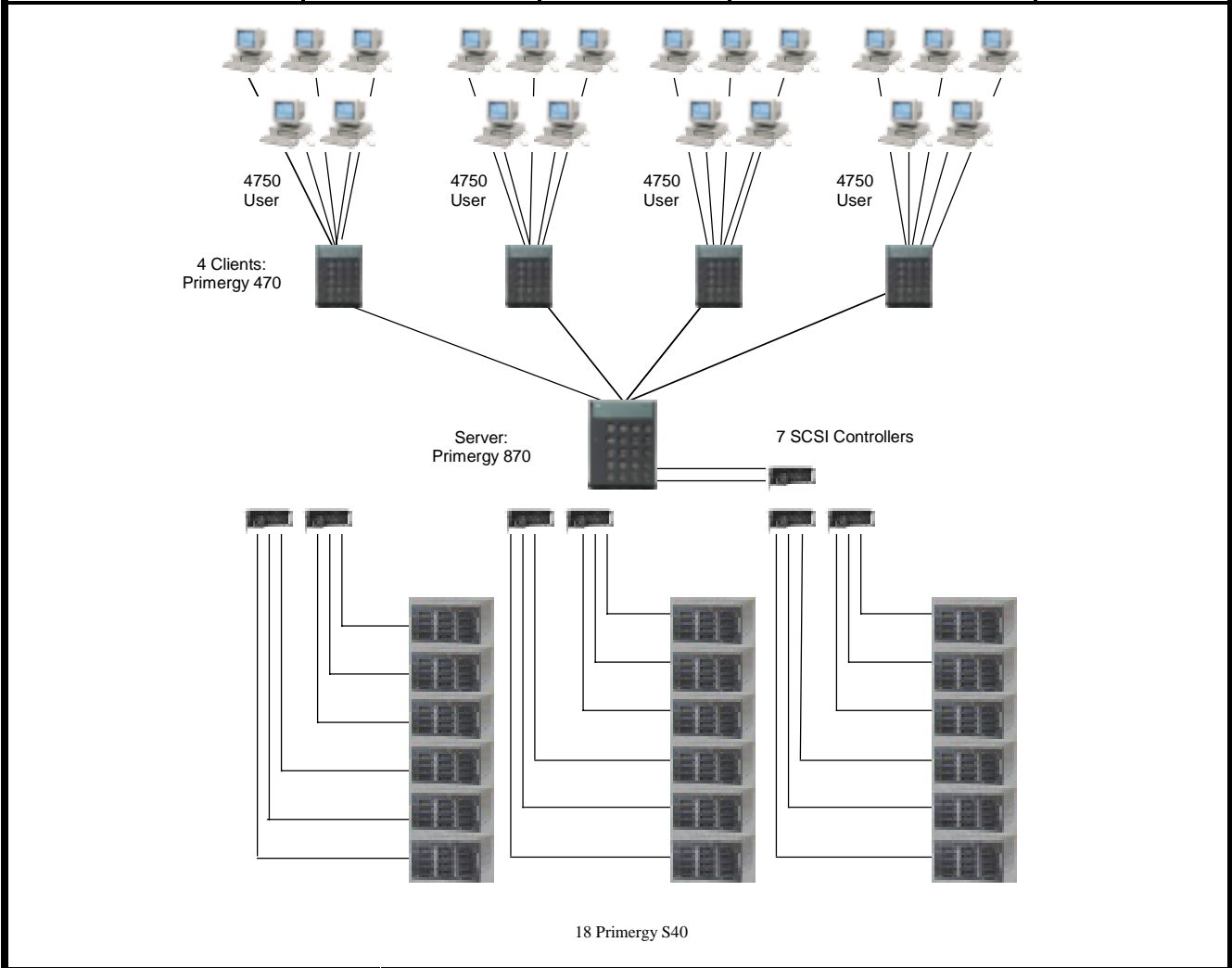


SIEMENS	Primergy 870-40 Client/Server		TPC-C REV 3.4 EXECUTIVE SUMMARY
			Report Date: March 18, 1999

Total System Cost	TPC-C Throughput	Price/Performance	Availability Date
\$ 551,727	23,570.33 tpmC	\$23.41/tpmC	April 26, 1999

Processors	Database Manager	Operating-System	Other Software	Number of Users
4 Intel Pentium® III Xeon 500 MHz	Microsoft SQL Server 7.0 Enterprise Edition	Microsoft Windows NT 4.0 Enterprise Edition	Microsoft Internet Information Server BEA TUXEDO 6.4 CFS	19,000



System Components	Qty/Srv.	1 Primergy 870-40	Qty/Client	4 Primergy 470
Processors	4	Intel Pentium® III Xeon 500 MHz 2 MB SLC	2	Intel Pentium® II 450 MHz 512 KB SLC
Memory	4	GB	384	MB
Disk Controller	7	SCSI Controllers	1	SCSI Controller
Disk Drives	193	9 GB	1	4 GB
	8	18 GB		
Total GB of Storage	1	1772 GB	1	4 GB

SIEMENS

Primergy 870-40

TPC-C REV 3.4
EXECUTIVE SUMMARY

Client/Server

Report Date: March 18, 1999

Description	Part Number	Third Party	Unit Price	Qty.	Extended Price	5yr Maint. Price
		Brand Pricing				
Base System	SNP:SY-K504V103-P		\$11.911	1	\$11.911	
Pentium III Xeon Processor 500MHZ/2MB	SNP:SY-F1824E403-P		\$7.911	4	\$31.644	
2. Memory Board	SNP:SY-F1825E1-P		\$800	1	\$800	
Memory 512MB EDO-DIMM	SNP:SY-F1549E543-P		\$2.311	8	\$18.488	
DAT Drive DDS-3 12GB, SE-SCSI	SNP:SY-F1730E1-P		\$1.156	1	\$1.156	
9GB/10K LVD-SCSI, Hot Plug	SNP:SY-F1899E109-P		\$933	1	\$933	
Power Supply (add.)	SNP:PS-F234E1-P		\$489	1	\$489	
Keyboard	S26381-K271-V310		\$25	1	\$25	
Country Pack	SNP:SY-F1699B213-P		\$36	1	\$36	
Monitor MCM 1510	S26361-K494-V150		\$191	1	\$191	
Server Hardware Subtotal				1	\$65.673	
RAID-Controller,3 Chan.,32Mb, LVD	SNP:SY-F1960E32-P		\$2.133	7	\$14.931	
RAID-Controller,3 Chan.,32Mb, LVD (10% spares)	SNP:SY-F1960E32-P		\$2.133	2	\$4.266	
18GB/10K LVD, Hot Plug (incl. 10% spare)	SNP:SY-F1899L118-P		\$1.660	10	\$16.600	
APC Smart UPS 1400 (incl. 10% spare)	588203 APC		\$587	3	\$1.761	
9GB/10K LVD-SCSI, Hot Plug	SNP:SY-F1899E109-P		\$933	192	\$179.136	
9GB/10K LVD-SCSI, Hot Plug (10% spares)	SNP:SY-F1899L109-P		\$949	20	\$18.980	
Primergy S40 ES 1 channel stack	SNP:SY-K538V201-P		\$2.356	18	\$42.408	
SCSI Cacble UHD-HD LVD 5m	SNP:SY-F1947L50-P		\$156	18	\$2.808	
Storage Subtotal					\$280.890	
Maint. Server + Storage						\$23.296
Primergy 470, FS PII 450	SNP:SY-K482V714-A		\$2.289	4	\$9.156	
PII 450MHZ	SNP:SY-F1727E450-A		\$1.200	4	\$4.800	
Keyboard	S26381-K271-V310		\$25	4	\$100	
Country Pack International	SNP:SY-F1699B153-A		\$36	4	\$144.00	\$8.000
Memory 128 MB SDRAM 100MHZ	SNP:SY-F1867E503-A		\$578	4	\$2.312	
Memory 256 MB SDRAM 100MHZ	SNP:SY-F1867E504-A		\$1.289	4	\$5.156	
HD 4GB, SCSI-3, Hot Plug	S26361-F1724-E40		\$489	4	\$1.956	
Fast-Ether-Express-Pro/100+ Server (PCI)	SNP:SY-F1868E501-A		\$111	24	\$2.664	
Monitor MCM 1510	S26361-K494-V150		\$191	4	\$764	\$871
Client Hardware Subtotal				1	\$27.052	
Microsoft Windows NT-Server, Enterprise Edition 4.0, incl 25 CALs	Microsoft	2	\$3.999	1	\$3.999	
MS SQL-Server 7.0 Enterp.Edition unlim. License	Mirosoft	2	\$28.999	1	\$28.999	
Server Software Subtotal					\$32.998	\$10.475
Microsoft Windows NT-Server 4.0, incl. 5 CALs	Microsoft	2	\$809	4	\$3.236	
Tuxedo 6.4 Core Functionality Services for NT	BEA	4	\$3.000	4	\$12.000	\$9.000
Microsoft Visual C++ Professional 5.0	Microsoft	2	\$499	1	\$499	
Client Software Subtotal					\$15.735	
Complex 8-port 10BaseT Hub (8+1) ports (incl.10%)	Z85094 Compex	5	\$29,00	2618	\$75.922	
Kingston Switch 8 port 10/100 incl. 10% spare	732084 Kingston	5	\$605	3	\$1.815	
User Connectivity Subtotal					\$77.737	
Total					\$500.085	\$51.642

Five-Year Cost of Ownership \$551,727
tpmC 23570,33
\$/tpmC \$23,41

1=Siemens, 2=Microsoft, 4=BEA Systems, 5=Software House

Prices used in TPC benchmarks reflect the 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 section of the TPC benchmark pricing 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.

Five-Year Cost of Ownership: \$551,727
tpmC Rating: 23,570.33
\$/tpmC: 23.41

Note: The benchmark results and test methodology were audited by Francois Raab of Information Paradigm, assisted by Larry Fontana

Numerical Quantities Summary

MQTh, computed Maximum Qualified Throughput		23,570.33 tpmC	
% throughput difference, reported & reproducibility runs		0.22 %	
Response Times (in seconds)	90th percentile	Average	Maximum
- New-Order	0.53	0.36	6.83
- Payment	0.94	0.49	38.46
- Order-Status	0.42	0.30	3.94
- Delivery (interactive portion)	0.32	0.30	0.85
- Delivery (deferred portion)	1.08	0.63	4.34
- Stock-Level	2.82	2.17	5.66
- Menu	0.32	0.20	0.93
Transaction Mix, in percent of total transactions			
- New-Order			44.88 %
- Payment			43.04 %
- Order-Status			4.03 %
- Delivery			4.04 %
- Stock-Level			4.02 %
Emulation Delay (in seconds)		Response Time	Menu
- New-Order		0.1	0.1
- Payment		0.1	0.1
- Order-Status		0.1	0.1
- Delivery (interactive)		0.1	0.1
- Stock-Level		0.1	0.1
Keying/Think Times (in seconds)	Minimum	Average	Maximum
- New-Order	18.00/0.00	18.01/12.02	18.07/120.50
- Payment	3.00/0.00	3.01/12.04	3.06/120.50
- Order-Status	2.00/0.00	2.01/10.02	2.05/100.49
- Delivery (interactive)	2.00/0.00	2.01/ 5.03	2.05/ 50.50
- Stock-Level	2.00/0.00	2.01/ 5.06	2.05/ 50.50
Test Duration and Checkpointing			
- Ramp-up time		71 minutes	
- Measurement interval		30 minutes	
- Number of checkpoints		1	
- Checkpoint interval		30 minutes	
- Transactions during measurement interval (all types)		1,575,620	