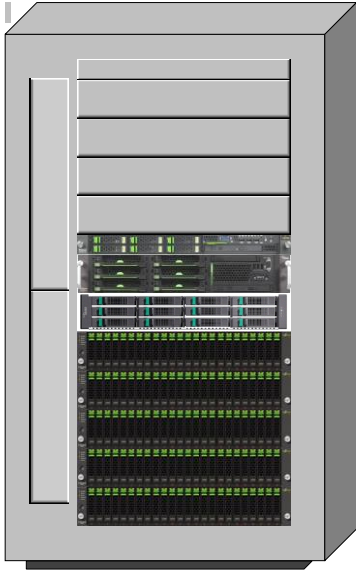
		PRIMERGY RX300 S6		TPC-E 1.12.0 TPC Pricing 1.5.0
				Report Date November 29, 2010
TPC-E Throughput 1,246.13 tpsE	Price/Performance \$ 191.48 USD per tpsE	Availability Date November 1, 2010	Total System Cost \$ 238,604	
Database Server Configuration				
Operating System Microsoft Windows Server 2008 R2 Enterprise x64 Edition	Database Manager Microsoft SQL Server 2008 R2 Enterprise x64 Edition	Processors/Cores/Threads 2/12/24	Memory 96 GB	
SUT				
		Tier A PRIMERGY RX200 S6 1x Intel Xeon E5640 2.66 GHz 6 GB Memory 1x 73 GB 15k rpm SAS Drive 2x onboard LAN 1 Gb/s 1x Dual Port LAN 1 Gb/s		
		Tier B PRIMERGY RX300 S6 2x Intel Xeon X5680 3.33 GHz 96 GB Memory 2x 73 GB 15k rpm SAS Drives 4x 146 GB 10k rpm SAS Drives 2x onboard LAN 1 Gb/s 1x onboard SAS RAID Controller 5x SAS RAID Controller		
		Storage 1x PRIMECENTER Rack 5x ETERNUS JX40 120x 64 GB SSD Drives 1x FibreCAT SX40 3x 750 GB 7.2k rpm SATA Drives		
		Initial Database Size 5,124 GB	Redundancy Level 1 RAID-5 data and RAID-10 log	Storage 120 x 64 GB SSD 3 x 750 GB 7.2k rpm HDD 4 x 146 GB 10k rpm HDD



PRIMERGY RX300 S6

TPC-E 1.12.0
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Description	Part Number	Price Source	Unit Price USD	Qty	Extended Price USD	3-yr. Maint. Price USD
Database Server Hardware						
FSCR3S6_S26361-K1344-V201_109064-01		1	11,565.95	1	11,565.95	
PY RX300S6 8x2.5 gold PSU	S26361-K1344-V201			1		
Intel Xeon X5680 6C/12T 3.33 GHz 12 MB	S26361-F3619-E333			2		
8 GB DDR3 1333 MHz PC3-10600 rg d	S26361-F3604-E515			12		
DVD-RW supermulti slimline SATA	S26361-F3269-E2			1		
HD SAS 6G 146GB 10K HOT PL 2.5" EP	S26361-F4482-E114			4		
HD SAS 6G 73GB 15K HOT PL 2.5" EP	S26361-F4482-E573			2		
RAID Ctrl SAS 6G 5/6 512MB (D2616)	S26361-F3554-E512			1		
Cable magmt. for 19" DC- PC- Rack	S26361-F2735-E7			1		
RMK-F1_1-2U Server	S26361-F2735-E101			1		
RAID Ctrl SAS 6G 8Port ex 512M FH/LP LSI	S26361-F3593-L501	1	529.55	5		2,647.75
PYRX300 S6 Warranty Uplift, 36 Months, Enhanced Plus Level, 24x7x365 Phone Support (Sev1 - Live Transfer), 24x7x365 Onsite and Parts (Sev1 Resp. Time - 4 Hours), Incl. Holidays, Prepaid billing	PYR3S6-U004361-0NA	1	949.00	1		949.00
PYRX300 S6 during normal business hours, Primergy installation, Low-end Server, w/o OS, One Time billing	PYR3S6-N039005-0NA	1	350.00	2		700.00
				Subtotal	11,565.95	4,296.75
Server Storage						
FSCPCTR_S26361-K826-V102_109065-01		1	1,899.75	1	1,899.75	
PRIMECENTER Rack 24 U, 1000 deep	S26361-K826-V102			1		
Dummy panel, plastics, 1U + assembly	S26361-F2735-E130			1		
Dummy panel, plastics, 2U + assembly	S26361-F2735-E131			6		
Socket strip 3phase 3x 8 sockets	S26361-F2262-L31	1	157.25	1	157.25	
PYPCTR Warranty Uplift, 36 Months, Enhanced Plus Level, 24x7x365 Phone Support (Sev1 - Live Transfer), 24x7x365 Onsite and Parts (Sev1 Resp. Time - 4 Hours), Incl. Holidays, Prepaid billing	PYPCTR-U004361-0NA	1	720.00	1		720.00
FSCJX40_FTS:ETJXS11BG_106605-02		1	2,611.20	5	13,056.00	
ETERNUS JX40	FTS:ETJXS11BG			5		
PRIMERGY Rackinstallation SX/DX ex works	D:FCSX-INPSR			5		
SSD SATA 3G 64GB SLC HOT PLUG 2.5" EP	S26361-F3298-L64	1	1,131.35	120	135,762.00	
PYJX40 Warranty Uplift, 12 Months, Enhanced Plus Level, 24x7x365 Phone Support (Sev1 - Live Transfer), 24x7x365 Onsite and Parts (Sev1 Resp. Time - 4 Hours), Incl. Holidays, Prepaid billing	PYJX40-U004121-0NA	1	609.00	5		3,045.00
PYJX40 Post Warranty, 24 Months, Enhanced Plus Level, 24x7x365 Phone Support (Sev1 - Live Transfer), 24x7x365 Onsite and Parts (Sev1 Resp. Time - 4 Hours), Incl. Holidays, Prepaid billing	PYJX40-P004241-0NA	1	1,218.00	5		6,090.00
PYJX40 during normal business hours, Primergy storage installation, One Time billing	PYJX40-N043005-0NA	1	450.00	5		2,250.00
FSCSX40_S26361-K1122-V200_109069-01		1	2,271.00	1	2,271.00	
FibreCAT SX40 SAS Disk Subsystem	S26361-K1122-V200			1		
HD SATA 3Gb/s 750GB 7.2k hot p 3.5" SX40	S26361-F3245-E750			3		
Rack installation ex works, SX10, 1U Nod	S26361-F1647-E302			1		
PYSX40 Warranty Uplift, 36 Months, Enhanced Plus Level, 24x7x365 Phone Support (Sev1 - Live Transfer), 24x7x365 Onsite and Parts (Sev1 Resp. Time - 4 Hours), Incl. Holidays, Prepaid billing	PYSX40-U004361-0NA	1	1,827.00	1		1,827.00
PYSX40 during normal business hours, Primergy storage installation, One Time billing	PYSX40-N043005-0NA	1	450.00	1		450.00
SAS Cable 6Gb 1x SFF 8088-1x SFF 8088 2m	D:KBSAS6G-1S-1S-2M	1	85.00	5	425.00	
SAS CBL EXT 2m 8088-8470	S26361-F3246-L203	1	62.90	1	62.90	
				Subtotal	153,633.90	14,382.00



PRIMERGY RX600 S5

TPC-E 1.12.0
TPC Pricing 1.5.0

Report Date
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Availability Date
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Server Software					
SQL Server 2008 R2 Enterprise Edition Per Processor License	810-08529	2	23,370.00	2	46,740.00
Windows Server 2008 R2 Enterprise Edition	P72-03868	2	2,320.00	1	2,320.00
Microsoft Problem Resolution Services	n/a	2	259.00	1	259.00
				Subtotal	49,060.00
Tier A Client Hardware					
FSCR2S6_S26361-K1342-V101_109116-01		1	2,981.80	1	2,981.80
PY RX200 S6, 6HD-bays 2.5"	S26361-K1342-V101			1	
Intel Xeon E5640 4C/8T 2.66 GHz 12 MB	S26361-F4419-E266			1	
Performance Mode Installation	S26361-F3284-E2			1	
SP 6GB 3x2 DDR3 1333 MHz PC3-10600 rg s	S26361-F3604-E533			1	
DVD-RW supermulti slimline SATA	S26361-F3269-E2			1	
HD SAS 6G 73GB 15K HOT PLUG 2.5" EP	S26361-F4006-E573			1	
RAID 0/1 SAS based on LSI MegaRAID 4Port	S26361-F3257-E4			1	
Eth Ctrl 2x1Gbit PCIe x4 D2735 Cu lp	S26361-F3610-E201			1	
RMK-P_1-2U servers (new)	S26361-F2735-E110			1	
Power Supply Module 450W gold hp	S26113-F570-E1			1	
PYRX200 S6 Warranty Uplift, 36 Months, Enhanced Plus Level, 24x7x365 Phone Support (Sev1 - Live Transfer), 24x7x365 Onsite and Parts (Sev1 Resp. Time - 4 Hours), Incl. Holidays, Prepaid billing	PYR2S6-U004361-ONA	1	550.00	1	550.00
PYRX200 S6 during normal business hours, Primergy installation, Low-end Server, w/o OS, One Time billing	PYR2S6-N039005-ONA	1	200.00	1	200.00
				Subtotal	2,981.80
Tier A Client Software					
Windows Server 2008 R2 Standard Edition	P73-04754	2	1,029.00	1	1,029.00
Infrastructure or Connectivity					
DISPLAY A19-5 ECO (incl. 2 spares)	S26361-K1339-V140	1	125.80	4	503.20
KB400 USB US (incl. 2 spares)	S26381-K550-L402	1	15.30	4	61.20
Mini Optical Mouse (incl. 2 spares)	S26381-K452-L100	1	11.05	4	44.20
LAN-CAT 5 Enhanced, l=3m	S26361-F3417-L3	1	18.70	2	37.40
				Total	218,916.65
					19,687.75

Notes:	Three-Year Cost of Ownership USD	\$238,604
Price Source: 1=Fujitsu 1-408-746-7802 http://www.fujitsu.com/us/, 2=Microsoft Corporation	TPC-E Throughput	1,246.13
	\$ USD/tpsE	\$191.48

The benchmark results and test methodology were audited by Francois Raab for InfoSizing Inc. (www.sizing.com)

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.



PRIMERGY RX300 S6

TPC-E 1.12.0
TPC Rev 1.5.0

Report Date
November 29, 2010

Availability Date
November 1, 2010

Numerical Quantities Summary

Reported Throughput:		1,246.13 tpsE		Configured Customers:		640,000	
Response Times (in seconds)		Minimum	Average	90th%tile	Maximum		
Broker Volume		0.00	0.04	0.06	1.22		
Customer Position		0.00	0.05	0.07	2.35		
Market Feed		0.00	0.04	0.08	9.78		
Market Watch		0.00	0.03	0.06	1.66		
Security Detail		0.00	0.02	0.04	1.28		
Trade Lookup		0.00	0.15	0.23	1.48		
Trade Order		0.00	0.11	0.15	2.89		
Trade Result		0.00	0.13	0.18	2.29		
Trade Status		0.00	0.03	0.05	1.42		
Trade Update		0.02	0.17	0.25	1.29		
Data Maintenance		0.02	0.13	N/A	2.26		
Transaction Mix			Transaction Count		Mix %		
Broker Volume			4,396,020		4.900%		
Customer Position			11,662,928		13.000%		
Market Feed			897,224		1.000%		
Market Watch			16,148,682		18.000%		
Security Detail			12,560,242		14.000%		
Trade Lookup			7,176,923		8.000%		
Trade Order			9,060,982		10.100%		
Trade Result			8,972,174		10.001%		
Trade Status			17,046,358		19.000%		
Trade Update			1,794,268		2.000%		
Data Maintenance			120		N/A		
Test Duration and Timings							
Ramp-up Time (hh:mm:ss)			00:22:00				
Measurement Interval (hh:mm:ss)			02:00:00				
Business Recovery Time (hh:mm:ss)			00:18:38				
Total Number of Transactions Completed in Measurement Interval			89,715,801				