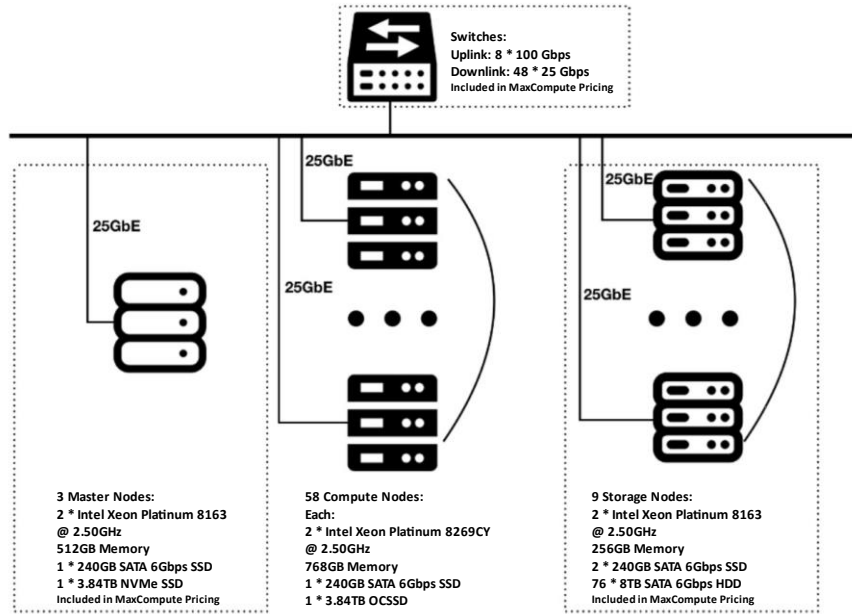
		Alibaba Cloud MaxCompute		TPCx-BB Rev. v1.5.0 TPC-Pricing Rev. v2.7.0	
				Report Date: August 18, 2021	
Total System Cost		TPCx-BB Performance Metric		Price/Performance	
3,664,590 USD		46,059.27 BBQpm@100000		79.57 USD \$/BBQpm@100000	
Framework	Operating System	Other Software	Availability Date	Scale Factor	Streams
MaxCompute v3.37	Alibaba Group Enterprise Linux Server 7.2 (Paladin)	None	August 1, 2021	100000	4

System Configuration



Physical Storage/Scale Factor: 57.25

Scale Factor/Physical Memory: 2.07

Servers: 3x Admin Nodes / 58x Compute Node / 9x Storage Node
 Total Processors/Cores/Threads 140/3,592/7,184

3x Master Node:
 2x Intel® Xeon® Platinum 8163 CPU @ 2.50GHz
 512 GiB
 Onboard SATA Controller
 1x 240 GB SATA 6 Gbps SSD
 1x 3.84 TB NVMe SSD
 Mellanox MT27710 ConnectX-4 Lx

58x Compute Node (Compute):
 2x Intel(R) Xeon(R) Platinum 8269CY CPU @ 2.50GHz
 768 GiB
 Onboard SATA Controller
 1x 240 GB SATA 6 Gbps SSD
 1x 3.84 TB OCSSD
 Mellanox MT27710 ConnectX-4 Lx

9x Storage Node (Storage):
 2x Intel(R) Xeon(R) Platinum 8163 CPU @ 2.50GHz
 256 GiB
 Onboard SATA Controller
 2x 240 GB SATA 6 Gbps SSD
 76x 8 TB SATA 6 Gbps HDD
 Mellanox MT27710 ConnectX-4 Lx

Connectivity: Network Switch (8x 100 Gbps Up; 48x 25 Gbps Down)



Alibaba Cloud MaxCompute

TPCx-BB Rev. v1.5.0
TPC-Pricing Rev. v2.7.0

Report Date:
August 18, 2021

Description	Part Number	Source	Unit Price	Qty	Ext. Price	3-Year Maint.
License Compute and Software Services						
<u>MaxCompute Annual Subscription (6,000 CU)</u>	Asia Pacific SE 1 (Singapore)	1	\$1,584,000.00	3	\$4,752,000.00	
Master Node				3		
Intel® Xeon® Platinum 8163 @ 2.50 GHz				2		
32 GB Memory				16		
240 GB SATA 6 Gbps SSD				1		
3.84 TB NVMe SSD				1		
Compute Node				58		
Intel® Xeon® Platinum 8269CY @ 2.50 GHz				2		
32 GB Memory				24		
240 GB SATA 6 Gbps SSD				1		
3.84 TB OCSSD				1		
Storage Node				9		
Intel® Xeon® Platinum 8163 @ 2.50 GHz				2		
32 GB Memory				8		
240 GB SATA 6 Gbps SSD				2		
8 TB SATA 6 Gbps HDD				76		
Network Switches (8x100Gbps Up; 48x25Gbps Down)				NA		
1-Year Annual Subscription Discount (30%)			-\$475,200.00	3	-\$1,425,600.00	
<u>MaxCompute Storage for 1 year</u>		1	\$4,686.74	3	\$14,060.22	
100000 Scale Factor (20.90 TB compressed)						
<u>MaxCompute Enterprise Service for 1 year</u>		1	\$106,744.08	3		\$320,232.24
24x7, 4 hour response						
License Compute and Software Services Sub-Total					\$3,340,460.22	\$320,232.24
Other Components						
13-inch MacBook Pro 1.4GHz (includes 2 spares)		2	\$1,299.00	3	\$3,897.00	
Other Components Sub-Total					\$3,897.00	\$0.00

Pricing: 1 = Alibaba; 2 = Apple.com

⁽¹⁾ All discounts are based on US list prices and for similar quantities and configurations. The discounts are based on the overall specific components pricing from respective vendors in this single quotation. Discounts for similarly sized configurations will be similar to those quoted here, but may vary based on the components in the configuration.

Audited by Doug Johnson, InfoSizing

Three-Year Cost of Ownership \$3,664,590

BBQpm@100000 46,059.27

\$/BBQpm@100000 \$ 79.57

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 sections of the TPC benchmark specifications. If you find that the stated prices are not available according to these terms, please inform at pricing@tpc.org. Thank you.

Numerical Quantities

Scale Factor	100000
Streams	4
SUT Validation Test	PASS

Performance Run (Run 1)

Overall Run Start Time	2021-07-25 10:50:43.451
Overall Run End Time	2021-07-25 17:39:23.742
Overall Run Elapsed Time	24,520.291
Load Test Start Time	2021-07-25 10:50:43.452
Load Test End Time	2021-07-25 12:06:37.186
Load Test Elapsed Time	4,553.734
Power Test Start Time	2021-07-25 12:06:37.188
Power Test End Time	2021-07-25 14:14:07.715
Power Test Elapsed Time	7,650.527
Throughput Test Start Time	2021-07-25 14:14:07.715
Throughput Test End Time	2021-07-25 17:39:23.742
Throughput Test Elapsed Time	12,316.027
Performance Metric (BBQpm@ 100000)	46,059.27

Repeatability Run (Run 2)

Overall Run Start Time	2021-07-25 20:12:43.107
Overall Run End Time	2021-07-26 02:46:40.529
Overall Run Elapsed Time	23,637.422
Load Test Start Time	2021-07-25 20:12:43.108
Load Test End Time	2021-07-25 21:13:40.809
Load Test Elapsed Time	3,657.701
Power Test Start Time	2021-07-25 21:13:40.811
Power Test End Time	2021-07-25 23:00:08.340
Power Test Elapsed Time	6,387.529
Throughput Test Start Time	2021-07-25 23:00:08.340
Throughput Test End Time	2021-07-26 02:46:40.528
Throughput Test Elapsed Time	13,592.188
Performance Metric (BBQpm@ 100000)	47,385.53

Performance Run Report (Run 1)

TPCx-BB

Result

v1.5.0

INFO: T_LOAD = 4553.734

INFO: T_LD = 0.1 * T_LOAD: 455.3734

INFO: T_PT = 3871.6012115828

INFO: T_T_PUT = 12316.027

INFO: T_TT = 3079.00675

INFO: === Checking validity of the final result ===

INFO: OK: All required BigBench phases were performed.

INFO: OK: All 30 queries were running in the power test.

INFO: OK: All 30 queries were running in the first throughput test.

INFO: OK: Pretend mode was inactive. All commands were executed.

INFO: === Final result ===

INFO: VALID BBQpm@100000 = 46059.2701226814

Repeatability Run Report (Run 2)

TPCx-BB

Result

v1.5.0

INFO: T_LOAD = 3657.701

INFO: T_LD = 0.1 * T_LOAD: 365.7701

INFO: T_PT = 3468.02375756023

INFO: T_T_PUT = 13592.188

INFO: T_TT = 3398.047

INFO: === Checking validity of the final result ===

INFO: OK: All required BigBench phases were performed.

INFO: OK: All 30 queries were running in the power test.

INFO: OK: All 30 queries were running in the first throughput test.

INFO: OK: Pretend mode was inactive. All commands were executed.

INFO: === Final result ===

INFO: VALID BBQpm@100000 = 47385.5399634586

Summary details of the run reports are shown above. For the complete run reports, see the Support Files Archive.