

Qualification Vendor List 1.1											
Intel CPU											
Product Name	Code Name	Q-Spec	Stepping	Cache	System Bus	# of Cores	Processor Base Frequency	Max Turbo Frequency	TDP	Memory Types	Note
IceLake											
Intel® Xeon® Processor Gold 6314U	IceLake	OWMB	D1	42MB	N/A	32	1.8 GHz	3.4 GHz	205W	DDR4-3200	
Intel® Xeon® Processor Gold 6330	IceLake	OWMC	D1	42MB	11.2GT/s	28	2 GHz	3.1 GHz	205W	DDR4-3200	
Intel® Xeon® Processor Gold 6330N	IceLake	OWLP	D1	42MB	11.2GT/s	28	2.2 GHz	3.4 GHz	165W	DDR4-2667	
Intel® Xeon® Processor Gold 6338	IceLake	OWN3	D1	48MB	11.2GT/s	32	2 GHz	3.2 GHz	205W	DDR4-3200	
Intel® Xeon® Processor Gold 6338N	IceLake	OWM6	D1	48MB	11.2GT/s	32	2.2 GHz	3.5 GHz	185W	DDR4-3200	
Intel® Xeon® Processor Gold 6346	IceLake	OWMD	D1	36MB	11.2GT/s	16	3.1 GHz	3.6 GHz	205W	DDR4-3200	
Intel® Xeon® Processor Platinum 8351N	IceLake	OWMW	D1	54MB	N/A	36	2.4 GHz	3.5 GHz	225W	DDR4-2933	
Intel® Xeon® Processor Platinum 8352V	IceLake	OWM3	D1	48MB	11.2GT/s	32	2.2 GHz	3.4 GHz	205W	DDR4-3200	
Intel® Xeon® Processor Platinum 8358P	IceLake	OXCM	D1	48MB	11.2GT/s	32	2.6 GHz	3.4 GHz	240W	DDR4-3200	
Intel® Xeon® Processor Platinum 8360V	IceLake	QXBZ	D1	54MB	11.2GT/s	36	2.4 GHz	3.5 GHz	250W	DDR4-3200	
Intel® Xeon® Processor Platinum 8368	IceLake	OWLL	D1	57MB	11.2GT/s	38	2.4 GHz	3.4 GHz	270W	DDR4-3200	
Intel® Xeon® Processor Platinum 8380	IceLake	OXCO	D1	60MB	11.2GT/s	40	2.3 GHz	3.4 GHz	270W	DDR4-3200	
Intel® Xeon® Processor Platinum 8362	IceLake	OXTL	D2	48MB	11.2GT/s	32	2.80 GHz	3.60 GHz	265 W	DDR4-3200	
Intel® Xeon® Processor Platinum 8352V	IceLake	SRK32	D2	54MB	11.2GT/s	36	2.10 GHz	3.50 GHz	195 W	DDR4-2933	
Intel® Xeon® Processor Platinum 8352M	IceLake	QXZ0	D2	48MB	11.2GT/s	32	2.30 GHz	3.50 GHz	185W	DDR4-3200	
Intel® Xeon® Processor Gold 6342	IceLake	QXRU	M1	36MB	11.2GT/s	24	2.80 GHz	3.50 GHz	230 W	DDR4-3200	
Intel® Xeon® Processor Gold 6338T	IceLake	QXS3	M1	36MB	11.2GT/s	24	2.10 GHz	3.40 GHz	165 W	DDR4-3200	
Intel® Xeon® Processor Gold 6336V	IceLake	QXRV	M1	36MB	11.2GT/s	24	2.40 GHz	3.60 GHz	185 W	DDR4-3200	
Intel® Xeon® Processor Gold 6334	IceLake	QXRQ	M1	18MB	11.2GT/s	8	3.60 GHz	3.70 GHz	165 W	DDR4-3200	
Intel® Xeon® Processor Gold 6326	IceLake	QXS7	M1	24MB	11.2GT/s	16	2.90 GHz	3.50 GHz	185 W	DDR4-3200	
Intel® Xeon® Processor Gold 6312U	IceLake	QXRW	M1	36MB	N/A	24	2.40 GHz	3.60 GHz	185 W	DDR4-3200	
Intel® Xeon® Processor Gold 5320T	IceLake	QXS6	M1	30MB	11.2GT/s	20	2.30 GHz	3.50 GHz	150 W	DDR4-2993	
Intel® Xeon® Processor Gold 5320	IceLake	QXRT	M1	39MB	11.2GT/s	26	2.20 GHz	3.40 GHz	185 W	DDR4-2933	
Intel® Xeon® Processor Gold 5318Y	IceLake	QXS2	M1	36MB	11.2GT/s	24	2.10 GHz	3.40 GHz	165 W	DDR4-2933	
Intel® Xeon® Processor Gold 5318S	IceLake	QXRK	M1	36MB	11.2GT/s	24	2.10 GHz	3.40 GHz	165 W	DDR4-2933	
Intel® Xeon® Processor Gold 5318N	IceLake	QXS4	M1	36MB	11.2GT/s	24	2.10 GHz	3.40 GHz	150 W	DDR4-2667	
Intel® Xeon® Processor Gold 5317	IceLake	QXRM	M1	18MB	11.2GT/s	12	3.00 GHz	3.60 GHz	150 W	DDR4-2933	
Intel® Xeon® Processor Gold 5315Y	IceLake	QXRR	M1	12MB	11.2GT/s	8	3.20 GHz	3.60 GHz	140 W	DDR4-2933	
Intel® Xeon® Processor Silver 4316	IceLake	QXS5	M1	30MB	10.4GT/s	20	2.30 GHz	3.40 GHz	150 W	DDR4-2667	
Intel® Xeon® Processor Silver 4314	IceLake	QXS8	M1	24MB	11.2GT/s	16	2.40 GHz	3.40 GHz	135 W	DDR4-2667	
Intel® Xeon® Processor Silver 4310T	IceLake	QXRP	M1	15MB	11.2GT/s	10	2.30 GHz	3.40 GHz	105 W	DDR4-2667	
Intel® Xeon® Processor Silver 4310	IceLake	QXRN	M1	18MB	10.4GT/s	12	2.10 GHz	3.30 GHz	120 W	DDR4-2667	
Intel® Xeon® Processor Silver 4309Y	IceLake	QXRS	M1	12MB	11.2GT/s	8	2.80 GHz	3.60 GHz	105 W	DDR4-2667	
Candidate											
Intel® Xeon® W-3375	IceLake	QXZL	M1	57MB	11.2GT/s	38	2.5 GHz	4.0 GHz	270W	DDR4-3200	
Intel® Xeon® W-3365	IceLake	QXZK	M1	48MB	11.2GT/s	32	2.7 GHz	4.0 GHz	270W	DDR4-3200	
Intel® Xeon® W-3345	IceLake	QXZJ	M1	36MB	11.2GT/s	24	3.0 GHz	4.0 GHz	250W	DDR4-3200	
Intel® Xeon® W-3335	IceLake	QXQS	M1	24MB	11.2GT/s	16	3.4 GHz	4.0 GHz	250W	DDR4-3200	
Intel® Xeon® W-3323	IceLake	QXQQ	M1	21MB	11.2GT/s	12	3.5 GHz	3.9 GHz	220W	DDR4-3200	
Memory											
Product Name	Memory Type	Module Supplier	Size	Chip Brand	Rank	Voltage	Data Transfer Rate	Error Correction	CAS Latency	Pins	Note
LRDIMM											
M386A8K40DM2-CWELQ	DDR4	Samsung	64GB	Samsung-DT	4RxD4	1.2v	3200MHz	ECC Registered	22	288-pin	
RDIMM											
AD4R3200716G22-BHYA	DDR4	ADATA	16GB	SKhynix-Montage	1Rx8	1.2v	3200MHz	ECC Registered	22	288-pin	
KSM32RS816MER	DDR4	Kingston	16GB	Micron-Rambus	1Rx8	1.2v	3200MHz	ECC Registered	22	288-pin	
KSM32RS432MER	DDR4	Kingston	32GB	Micron-Rambus	1Rx4	1.2v	3200MHz	ECC Registered	22	288-pin	
MTA36ASF4G72P2-3G2J3UJ	DDR4	Micron	32GB	Micron-Rambus	2Rx4	1.2v	3200MHz	ECC Registered	22	288-pin	
M393A4K40DB3-CWEGQ	DDR4	Samsung	32GB	Samsung-Rambus	2Rx4	1.2v	3200MHz	ECC Registered	22	288-pin	
M393A4K40DB3-CWEEQ	DDR4	Samsung	32GB	Samsung-IDT	2Rx4	1.2v	3200MHz	ECC Registered	22	288-pin	
M393A4K40DB3-CWECQ	DDR4	Samsung	32GB	Samsung-Montage	2Rx4	1.2v	3200MHz	ECC Registered	22	288-pin	
M393A8G40AB2-CWEEQ	DDR4	Samsung	64GB	Samsung-IDT	2Rx4	1.2v	3200MHz	ECC Registered	22	288-pin	
HMAA8GR7DJR4N-XN T4	DDR4	SKhynix	32GB	SKhynix-Montage	2Rx4	1.2v	3200MHz	ECC Registered	22	288-pin	
HMAA8GR7CJR4N-XN T4	DDR4	SKhynix	64GB	SKhynix-Montage	2Rx4	1.2v	3200MHz	ECC Registered	22	288-pin	
HMAA8GR7CJR4N-XN TG	DDR4	SKhynix	64GB	SKhynix-IDT	2Rx4	1.2v	3200MHz	ECC Registered	22	288-pin	
HMAA8GR7CJR4N-XN T8	DDR4	SKhynix	64GB	SKhynix-Rambus	2Rx4	1.2v	3200MHz	ECC Registered	22	288-pin	
SATA/SAS HDD											
Product Name	Type	Vendor	Form Factor	Format	Capacity	Interface Speed	Series	Cache	RPM	Enctrption	FW
SATA											
ST2000NX0243	SATA	Seagate	2.5"	4Kn	2TB	6Gb/s	Exos T2000 (Enterprise Capacity V.3)	128MB	7200	N/A	
ST1000NM0016	SATA	Seagate	3.5"	512e	10TB	6Gb/s	Exos X10 (Enterprise Capacity V.6)	256MB	7200	N/A	
ST14000NM0018	SATA	Seagate	3.5"	512e	14TB	6Gb/s	Exos X14 (Enterprise Capacity)	256MB	7200	N/A	
ST16000NM001G	SATA	Seagate	3.5"	512e/4Kn	16TB	6Gb/s	EXOS X16	256MB	7200	N/A	
MG07ACA14TE	SATA	Toshiba	3.5"	512e	14TB	6Gb/s	Capacity	256MB	7200	N/A	
WU5721010A1E6L4	SATA	WD	3.5"	512e	10TB	6Gb/s	Ultrastar® DC HC330	256MB	7200	N/A	
WUH721818A1E6L4	SATA	WD	3.5"	512e	18TB	6Gb/s	Ultrastar DC HC550	512MB	7200	N/A	
SATA/SAS SSD											
Product Name	Type	Vendor	Form Factor	Interface	Capacity	Interface Speed	Note				
SATA											
SSDSC2K6019T8 D3-S4510 Series	SSD	Intel	2.5"	SATA	1.92TB	6Gb/s					
SSDSC2K6019T8 D3-S4610 Series	SSD	Intel	2.5"	SATA	1.92TB	6Gb/s					
SSDSC2K6019T8 D3-S4610 Series	SSD	Intel	2.5"	SATA	1.92TB	6Gb/s					
MTFDDAK1T9TDS-1AW1ZABYY (5300 PRO)	SSD	Micron	2.5"	SATA	1.92TB	6Gb/s					
MTFDDAK3T8TDS-1AW1ZABYY (5300 PRO)	SSD	Micron	2.5"	SATA	3.84TB	6Gb/s					
SRE 100-480G00210000	SSD	Phison	2.5"	SATA	480GB	6Gb/s					
SRE 100-960G00210000	SSD	Phison	2.5"	SATA	960GB	6Gb/s					
MZ-7LH1T9NE 883 DCT Series	SSD	Samsung	2.5"	SATA	1.92TB	6Gb/s					
MZ-7LH1T9NE 883 DCT Series	SSD	Samsung	2.5"	SATA	1.92TB	6Gb/s					
XA480LE10063	SSD	Seagate	2.5"	SATA	480GB	6Gb/s					
XA480LE10063	SSD	Seagate	2.5"	SATA	480GB	6Gb/s					
XA960LE10063	SSD	Seagate	2.5"	SATA	960GB	6Gb/s					
XA960LE10063	SSD	Seagate	2.5"	SATA	960GB	6Gb/s					
KHK61RSE960G	SSD	Toshiba	2.5"	SATA	960GB	6Gb/s					
M.2											
Product Name	Type	Vendor	Form Factor	Interface	Capacity	Interface Speed	Note				
M.2											
MZ-1LB1T9N 983 DCT Series	M.2	Samsung	22110	PCIe(NVMe)	1.92TB	6Gb/s					
IM2P33F8-S12GD	M.2	ADATA	NVME		512GB	PCIe Gen 3.0x4					
IM2P33F8-S12GD1	M.2	ADATA	2280	PCIe(NVMe)	512GB	PCIe Gen3 x4					
MTFDHBA960TDF 960GB 7300 Pro Series	M.2	Micron	2280	PCIe(NVMe)	960GB	PCIe Gen3 x4					
MZ-1LB1T9N 983 DCT Series	M.2	Samsung	22110	PCIe(NVMe)	1.92TB	PCIe Gen3 x4					
PCIe SSD											
Product Name	Type	Vendor	Form Factor	Interface	Capacity	Interface Speed	Note				
PCIe											
Samsung PM1725b MZPLL3T2HAJQ PCIe Gen3 x8 3.2TB	PCIe	Samsung	PCI-E 3.0	PCIe(NVMe)	3.2TB	PCIe Gen3 x8					
Samsung PM1725a MZPLL1T8HEHP PCIe Gen3 x8 1.6TB	PCIe	Samsung	PCI-E 3.0	PCIe(NVMe)	1.6TB	-					
SSDPEDKX040T701 P4500 Series PCIe Gen3 x4 4TB	PCIe	Intel	PCI-E 3.0	PCIe(NVMe)	4TB	-					
SSDPEDKX040T701 P4500 Series PCIe Gen3 x4 4TB	PCIe	Intel	PCI-E 3.0	PCIe(NVMe)	4TB	PCIe Gen3 x4					
RAID Card											
Product Name	RAID-on-Chip Controller	Vendor	Host Bus Type	Internal Ports	Internal Connectors	External Ports	External Connectors	Data Transfer Rate	Note		
Broadcom											
MegaRAID 9560-16i	SAS3916 Tri-Mode	Broadcom	x8 PCIe 4.0	16	2 SFF-8654 (SlimSAS)						
Broadcom											
P411W-32P	PEX88048	Broadcom	x16 PCIe 4.0		16 x SFF-8654						
GIGABYTE											
CRA3338	LSI SAS 3008	Gigabyte	PCIe-x8 Gen3 x8 bus	8	2 x Mini-SAS HD for 8x SAS	-	-	-	-	12Gb/s ports	
CRA3338	LSI SAS 3008	GIGABYTE	PCIe Gen3 x8	8	2 x Mini-SAS HD SFF-8643	-	-	-	-	Up to 12Gb/s per port	
CRA4448	LSI SAS 3108	Gigabyte	PCIe-x8 Gen3 x8 bus	8	2 x internal Mini-SAS HD SFF8643	-	-	-	-	12Gb/s ports	

GRA4448	LSI SAS 3108	GIGABYTE	PCIe Gen3 x8	8	2 x Mini-SAS HD SFF-8643	-	-	Up to 12Gb/s per port			
CSA3548	LSI SAS 3008	Gigabyte	PCIe- x8 Gen3 x8 bus	-	-	8	2 x external Mini-SAS HD SFF8644	12Gb/s ports			
CSA3548	LSI SAS 3008	GIGABYTE	PCIe Gen3 x8	-	-	8	2 x Mini-SAS HD SFF-8644	Up to 12Gb/s per port			
LSI											
LSI SAS 9400-16i	SAS3416	LSI	PCIe Gen3 x8	16	4 x Mini-SAS HD SFF-8643	-	-	Up to 12Gb/s per port			
LSI SAS 9400-16i	SAS3416	LSI	x8 lane PCI Express 3.1	16	4 x Mini-SAS HD SFF-8643	-	-	12Gb/s SAS 3.0			
LSI SAS 9500-16i	SAS3816	LSI	x8 PCIe 4.0	16	2 x8 SFF-8654 (SlimSAS)	-	-				
LSI SAS 9500-16i	SAS3816	LSI	PCIe Gen4 x8	16	2 x8 SlimSAS SFF-8654	-	-	Up to 12Gb/s per port			
MegaRAID 9560-16i	SAS3916 Tri-Mode RAID-on-Chip (ROC)	LSI	PCIe Gen4 x8	16	2 x8 SlimSAS SFF-8654	-	-	Up to 12Gb/s per port			
MegaRAID 9560-16i without Tri-mode	SAS3916 Tri-Mode RAID-on-Chip (ROC)	LSI	PCIe Gen4 x8	16	2 x8 SlimSAS SFF-8654	-	-	Up to 12Gb/s per port			
MegaRAID SAS 9460-16i	SAS3516 dual-core RAID-on-Chip (ROC)	LSI	x8 lane PCI Express 3.1	8	4 x Mini-SAS HD SFF-8643	-	-	12Gb/s SAS 3.0			
P411W-32P	PEX88048	LSI	PCIe Gen4 x16	8 x4, 16 x2, or 32 x1 NVMe SSD connect	4 x8 SlimSAS SFF-8654	-	-				
Microsemi											
SmartHBA 2100-8i	PM8222	Microsemi	PCIe Gen3 x8	8	2 x Mini-SAS HD SFF-8643	-	-	Up to 12Gb/s per port			
SmartHBA 2100-8i	PM8222	Microsemi	8-Lane PCIe Gen3	8	2 x Internal, SFF-8643	-	-	12 Gb/s per port			
SmartRAID 3154-16i	PM8236	Microsemi	8-Lane PCIe Gen3	16	4 x Internal, SFF-8643	-	-	12 Gb/s per port			
SmartRAID 3154-16i	PM8236	Microsemi	PCIe Gen3 x8	16	4 x Mini-SAS HD SFF-8643	-	-	Up to 12Gb/s per port			
Storage-PCIe											
Product Name	Type	Vendor	Form Factor	Format	Capacity	Interface Speed	Series	Cache	RPM	Encription	FW
PCIe											
SSDPEDKX040T701 P4500 Series PCIe Gen3 x4 4TB	PCIe	Intel	PCI-E 3.0	PCIe(NVMe)	4TB	PCIe Gen3 x4					
SSDPEDKX040T701 P4500 Series PCIe Gen3 x4 4TB	PCIe	Intel	PCI-E 3.0	PCIe(NVMe)	4TB	-					
Samsung PM1725b MZPLL3T2HAJQ PCIe Gen3 x8 3.2TB	PCIe	Samsung	PCI-E 3.0	PCIe(NVMe)	3.2TB	PCIe Gen3 x8					
Samsung PM1725a MZPLL1T6HEHP PCIe Gen3 x8 1.6TB	PCIe	Samsung	PCI-E 3.0	PCIe(NVMe)	1.6TB	-					
LAN Card											
Product Name	Connector	Vendor	System InterfaceType	# of Ports	Data Rate	Note					
Broadcom											
BCM957412A4120AC	SFP+	Broadcom	PCIe Gen3 x8	Dual	10Gb/s per port	BCM57412					
BCM957414A4142CC	SFP28	Broadcom	PCIe Gen3 x8	Dual	25Gb/s per port	BCM57414					
BCM957416A4160C	RJ-45	Broadcom	PCIe Gen3 x8	Dual	10Gb/s per port	BCM5741 (P210TP)					
BCM957508-P2100G	QSFP56	Broadcom	PCIe Gen4 x16	Dual	100Gb/s per port	BCM57508					
LPe32002-M2	SFP+	Broadcom	PCIe Gen3 x8	Dual	32Gb/s per port	XE501 controller					
GIGABYTE											
CLN4121	RJ-45	GIGABYTE	PCIe Gen3 x4	Single	10Gb/s per port	INTEL X550-AT					
CLN4222	RJ-45	GIGABYTE	PCIe Gen3 x4	Dual	10Gb/s per port	INTEL X550-AT2					
CLN4224	RJ-45	GIGABYTE	PCIe Gen3 x4	Quad	10Gb/s per port	INTEL X550-AT2					
CLN4312	RJ-45	GIGABYTE	PCIe Gen2 x4	Dual	1Gb/s per port	INTEL I350-AM2					
CLN4314	RJ-45	GIGABYTE	PCIe Gen2 x4	Quad	1Gb/s per port	INTEL I350-AM4					
CLN4752	QSFP+	GIGABYTE	PCIe Gen3 x8	Dual	40Gb/s per port	INTEL XL710					
CLN4831	SFP+	GIGABYTE	PCIe Gen2 x8	Single	10Gb/s per port	INTEL 82599EN					
CLN4832	SFP+	GIGABYTE	PCIe Gen2 x8	Dual	10Gb/s per port	INTEL 82599ES					
CLN4M32	SFP28	GIGABYTE	PCIe Gen3 x16	Dual	10Gb/s per port	Mellanox ConnectX-4					
CLN4M34	SFP28	GIGABYTE	PCIe Gen3 x16	Quad	10Gb/s per port	Mellanox ConnectX-4					
Intel											
Intel® Ethernet Converged Network Adapter X520-DA2	SFP+	Intel	PCIe Gen2 x8	Dual	10Gb/s per port	This card should be tested in DVT stage when onboa					
Intel® Ethernet Converged Network Adapter X550-T2	RJ-45	Intel	PCIe Gen3 x4	Dual	10Gb/s per port						
Intel® Ethernet Converged Network Adapter X710-T4	RJ-45	Intel	PCIe Gen3 x8	Quad	10Gb/s per port						
Intel® Ethernet Converged Network Adapter XL710-QD	QSFP+	Intel	PCIe Gen3 x8	Dual	40Gb/s per port						
Intel® Ethernet Network Adapter E810-CQDA2	QSFP28	Intel	PCIe Gen4 x16	Dual	100Gb/s per port						
Intel® Ethernet Network Adapter E810-XXVDA4	SFP28	Intel	PCIe Gen4 x16	Quad	25Gb/s per port						
Intel® Ethernet Network Adapter X722-DA4	SFP+	Intel	PCIe Gen3 x8	Quad	10Gb/s per port						
Intel® Ethernet Network Adapter XXV710-DA2	SFP28	Intel	PCIe Gen3 x8	Dual	25Gb/s per port						
Mellanox											
MCX516A-CCAT	QSFP28	Mellanox	PCIe Gen3 x16	Dual	100Gb/s per port	Mellanox ConnectX-5 EN					
MCX555A-ECAT	QSFP28	Mellanox	PCIe Gen3 x16	Single	100Gb/s per port	Mellanox ConnectX-5 VPI (InfiniBand)					
MCX613106A-VDAT	QSFP56	Mellanox	PCIe Gen4 x16	Dual	200Gb/s per port	Mellanox ConnectX-5 EN					
MCX623106AN-CDAT	QSFP56	Mellanox	PCIe Gen4 x16	Dual	100Gb/s per port	ConnectX®-6 Dx No Crypto, No Secure Boot					
MCX653105A-ECAT	QSFP56	Mellanox	PCIe Gen4 x16	Single	100Gb/s per port	Mellanox ConnectX-6 Ex VPI (InfiniBand)					
MCX653106A-HDAT	QSFP56	Mellanox	PCIe Gen4 x16	Dual	200Gb/s per port	Mellanox ConnectX-6 Ex VPI (InfiniBand)					
Qlogic											
QL41132HLCU-SP	SFP28	Qlogic	PCIe Gen3 x8	Dual	10Gb/s per port						
QL45611HLCU	QSFP28	Qlogic	PCIe Gen3 x16	Single	100Gb/s per port						
QLE3442-CU-CK	SFP+	Qlogic	PCIe Gen3 x8	Dual	10Gb/s per port						
QLE3442-RJ-CK	RJ-45	Qlogic	PCIe Gen3 x8	Dual	10Gb/s per port						