

**"G242-Z11-A00" Qualification Vender List**

| AMD CPU                 |           |         |          |          |                      |                           |                                |             |                     |              |
|-------------------------|-----------|---------|----------|----------|----------------------|---------------------------|--------------------------------|-------------|---------------------|--------------|
| Product Name            | Code Name | Package | Stepping | L3 Cache | # of Cores / Threads | Processor Base Freq (GHz) | Processor Boost Max Freq (GHz) | Default TDP | cTDP Min / cTDP Max | Memory Types |
| AMD 7H12 100-000000055  | ROME      | SP3     | B0 PR    | 256MB    | 64 / 128             | 2.60                      | 3.30                           | 240W        | 240W/280W           | DDR4-3200    |
| AMD 7742 100-000000053  | ROME      | SP3     | B0 PR    | 256MB    | 64 / 128             | 2.25                      | 3.40                           | 225W        | 225W/240W           | DDR4-3200    |
| AMD 7702 100-000000038  | ROME      | SP3     | B0 PR    | 256MB    | 64 / 128             | 2.00                      | 3.35                           | 200W        | 165W/200W           | DDR4-3200    |
| AMD 7662 100-000000137  | ROME      | SP3     | B0 PR    | 256MB    | 64 / 128             | 2.00                      | 3.30                           | 225W        | 225W/240W           | DDR4-3200    |
| AMD 7642 100-000000074  | ROME      | SP3     | B0 PR    | 192MB    | 48 / 96              | 2.30                      | 3.40                           | 225W        | 225W/240W           | DDR4-3200    |
| AMD 7552 100-000000076  | ROME      | SP3     | B0 PR    | 192MB    | 48 / 96              | 2.20                      | 3.30                           | 200W        | 165W/200W           | DDR4-3200    |
| AMD 7542 100-000000075  | ROME      | SP3     | B0 PR    | 128MB    | 32 / 64              | 2.90                      | 3.40                           | 225W        | 225W/240W           | DDR4-3200    |
| AMD 7532 100-000000136  | ROME      | SP3     | B0 PR    | 256MB    | 32 / 64              | 2.40                      | 3.30                           | 200W        | 180W/200W           | DDR4-3200    |
| AMD 7502 100-000000054  | ROME      | SP3     | B0 PR    | 128MB    | 32 / 64              | 2.50                      | 3.35                           | 180W        | 165W/200W           | DDR4-3200    |
| AMD 7452 100-000000057  | ROME      | SP3     | B0 PR    | 128MB    | 32 / 64              | 2.35                      | 3.35                           | 155W        | 155W/180W           | DDR4-3200    |
| AMD 7F72 100-000000141  | ROME      | SP3     | PD       | 192MB    | 24 / 48              | 3.20                      |                                | 240W        | 225W/240W           | DDR4-3200    |
| AMD 7F52 100-000000140  | ROME      | SP3     | PD       | 256MB    | 16 / 32              | 3.50                      | 3.90                           | 240W        | 225W/240W           | DDR4-3200    |
| AMD 7402 100-000000046  | ROME      | SP3     | B0 PR    | 128MB    | 24 / 48              | 2.80                      | 3.35                           | 180W        | 165W/200W           | DDR4-3200    |
| AMD 7352 100-000000077  | ROME      | SP3     | B0 PR    | 128MB    | 24 / 48              | 2.30                      | 3.20                           | 155W        | 155W/180W           | DDR4-3200    |
| AMD 7302 100-000000043  | ROME      | SP3     | B0 PR    | 128MB    | 16 / 32              | 3.00                      | 3.30                           | 155W        | 155W/180W           | DDR4-3200    |
| AMD 7282 100-000000078  | ROME      | SP3     | B0 PR    | 64MB     | 16 / 32              | 2.80                      | 3.20                           | 120W        | 120W/150W           | DDR4-2666    |
| AMD 7272 100-000000079  | ROME      | SP3     | B0 PR    | 64MB     | 12 / 24              | 2.90                      | 3.20                           | 120W        | 120W/150W           | DDR4-3200    |
| AMD 7F32 100-000000139  | ROME      | SP3     | B0 PR    | 128MB    | 8 / 16               | 3.70                      | 3.90                           | 180W        | 165W/200W           | DDR4-3200    |
| AMD 7262 100-000000041  | ROME      | SP3     | B0 PR    | 128MB    | 8 / 16               | 3.20                      | 3.40                           | 155W        | 155W/180W           | DDR4-3200    |
| AMD 7252 100-000000080  | ROME      | SP3     | B0 PR    | 64MB     | 8 / 16               | 3.10                      | 3.20                           | 120W        | 120W/150W           | DDR4-2666    |
| AMD 7702P 100-000000047 | ROME      | SP3     | B0 PR    | 256MB    | 64 / 128             | 2.00                      | 3.35                           | 200W        | 165W/200W           | DDR4-3200    |
| AMD 7502P 100-000000045 | ROME      | SP3     | B0 PR    | 128MB    | 32 / 64              | 2.50                      | 3.35                           | 180W        | 165W/200W           | DDR4-3200    |
| AMD 7402P 100-000000048 | ROME      | SP3     | B0 PR    | 128MB    | 24 / 48              | 2.80                      | 3.35                           | 180W        | 165W/200W           | DDR4-3200    |
| AMD 7302P 100-000000049 | ROME      | SP3     | B0 PR    | 128MB    | 16 / 32              | 3.00                      | 3.30                           | 155W        | 155W/180W           | DDR4-3200    |
| AMD 7232P 100-000000081 | ROME      | SP3     | B0 PR    | 32MB     | 8 / 16               | 3.10                      | 3.20                           | 120W        | 120W/150W           | DDR4-3200    |
| Product Name            | Code Name | Package | Stepping | L3 Cache | # of Cores / Threads | Processor Base Freq (GHz) | Processor Boost Max Freq (GHz) | Default TDP | cTDP Min / cTDP Max | Memory Types |
| AMD 7763 100-000000312  | Milan     | SP3     | PR       | 256MB    | 64 / 128             | 2.45                      | 3.50                           | 280W        | 225W/280W           | DDR4-3200    |
| AMD 7713 100-000000344  | Milan     | SP3     | PR       | 256MB    | 64 / 128             | 2.00                      | 3.675                          | 225W        | 225W/240W           | DDR4-3200    |
| AMD 7663 100-000000318  | Milan     | SP3     | PR       | 256MB    | 56 / 112             | 2.00                      | 3.50                           | 240W        | 225W/240W           | DDR4-3200    |
| AMD 7643 100-000000326  | Milan     | SP3     | PR       | 256MB    | 48 / 96              | 2.30                      | 3.60                           | 225W        | 225W/240W           | DDR4-3200    |
| AMD 75F3 100-000000313  | Milan     | SP3     | PR       | 256MB    | 32 / 64              | 2.95                      | 4.00                           | 280W        | 225W/280W           | DDR4-3200    |
| AMD 7543 100-000000345  | Milan     | SP3     | PR       | 256MB    | 32 / 64              | 2.80                      | 3.70                           | 225W        | 225W/240W           | DDR4-3200    |
| AMD 7513 100-000000334  | Milan     | SP3     | PR       | 128MB    | 32 / 64              | 2.60                      | 3.65                           | 200W        | 165W/200W           | DDR4-3200    |
| AMD 74F3 100-000000317  | Milan     | SP3     | PR       | 256MB    | 24 / 48              | 3.20                      | 4.00                           | 240W        | 225W/240W           | DDR4-3200    |
| AMD 7443 100-000000340  | Milan     | SP3     | PR       | 128MB    | 24 / 48              | 2.85                      | 4.00                           | 200W        | 165W/200W           | DDR4-3200    |
| AMD 7413 100-000000323  | Milan     | SP3     | PR       | 128MB    | 24 / 48              | 2.65                      | 3.60                           | 180W        | 165W/200W           | DDR4-3200    |
| AMD 73F3 100-000000321  | Milan     | SP3     | PR       | 256MB    | 16 / 32              | 3.50                      | 4.00                           | 240W        | 225W/240W           | DDR4-3200    |
| AMD 7343 100-000000338  | Milan     | SP3     | PR       | 128MB    | 16 / 32              | 3.20                      | 3.90                           | 190W        | 165W/200W           | DDR4-3200    |
| AMD 7313 100-000000329  | Milan     | SP3     | PR       | 128MB    | 16 / 32              | 3.00                      | 3.70                           | 155W        | 155W/180W           | DDR4-3200    |
| AMD 72F3 100-000000327  | Milan     | SP3     | PR       | 256MB    | 8 / 16               | 3.70                      | 4.10                           | 180W        | 165W/200W           | DDR4-3200    |
| AMD 7713P 100-000000337 | Milan     | SP3     | PR       | 256MB    | 64 / 128             | 2.00                      | 3.675                          | 225W        | 225W/240W           | DDR4-3200    |
| AMD 7543P 100-000000341 | Milan     | SP3     | PR       | 256MB    | 32 / 64              | 2.80                      | 3.70                           | 225W        | 225W/240W           | DDR4-3200    |
| AMD 7443P 100-000000342 | Milan     | SP3     | PR       | 128MB    | 24 / 48              | 2.85                      | 4.00                           | 200W        | 165W/200W           | DDR4-3200    |

| AMD 7313P 100-000000339  | Milan       | SP3             | PR   | 128MB           | 16 / 32 | 3.00    | 3.70               | 155W             | 155W/180W   | DDR4-3200 |
|--|-------------|-----------------|------|-----------------|---------|---------|--------------------|------------------|-------------|-----------|
| <b>Memory (Memory actually maximum frequency will follow memory controller's spec of CPU you used)</b> |             |                 |      |                 |         |         |                    |                  |             |           |
| Product Name   | Memory Type | Module Supplier | Size | Chip Brand      | Rank    | Voltage | Data Transfer Rate | Error Correction | CAS Latency | Pins      |
| RDIMM  |             |                 |      |                 |         |         |                    |                  |             |           |
| KSM32RS4/32MER   | DDR4        | Kingston        | 32GB | Micron-Rambus   | 1Rx4    | 1.2v    | 3200MHz            | ECC Registered   | 22          | 288-pin   |
| KSM32RS8/16MER   | DDR4        | Kingston        | 16GB | Micron-Rambus   | 1Rx8    | 1.2v    | 3200MHz            | ECC Registered   | 22          | 288-pin   |
| M393A2K43CB2-CVFBQ   | DDR4        | Samsung         | 16GB | Samsung-IDT     | 2Rx8    | 1.2v    | 2933MHz            | ECC Registered   | 21          | 288-pin   |
| M393A4K40CB2-CVFBQ   | DDR4        | Samsung         | 32GB | Samsung-IDT     | 2Rx4    | 1.2v    | 2933MHz            | ECC Registered   | 21          | 288-pin   |
| M393A8G40MB2-CVFBY   | DDR4        | Samsung         | 64GB | Samsung-IDT     | 2Rx4    | 1.2v    | 2933MHz            | ECC Registered   | 21          | 288-pin   |
| CT32G4RFD4293-2G9E2.001  | DDR4        | CRUCIAL         | 32GB | Micron          | 2Rx4    | 1.2v    | 2933MHz            | ECC Registered   | 21          | 288-pin   |
| CT32G4RFD4293.36FE2  | DDR4        | CRUCIAL         | 32GB | Micron          | 2Rx4    | 1.2v    | 2933MHz            | ECC Registered   | 21          | 288-pin   |
| MTA36ASF4G72PZ.2G9E2TG   | DDR4        | Micron          | 32GB | Micron-Montage  | 2Rx4    | 1.2v    | 2933MHz            | ECC Registered   | 21          | 288-pin   |
| MTA36ASF4G72PZ.2G9E2VG   | DDR4        | Micron          | 32GB | Micron-IDT      | 2Rx4    | 1.2v    | 2933MHz            | ECC Registered   | 21          | 288-pin   |
| MTA36ASF4G72PZ.2G9E2UG   | DDR4        | Micron          | 32GB | Micron-Rambus   | 2Rx4    | 1.2v    | 2933MHz            | ECC Registered   | 21          | 288-pin   |
| HMA84GR7CJR4N-WM TG  | DDR4        | SKhynix         | 32GB | SKhynix-IDT     | 2Rx4    | 1.2v    | 2933MHz            | ECC Registered   | 21          | 288-pin   |
| HMAA8GR7MJR4N-WM T4  | DDR4        | SKhynix         | 64GB | SKhynix-Montage | 2Rx4    | 1.2v    | 2933MHz            | ECC Registered   | 21          | 288-pin   |
| KSM29RD4/32MEI   | DDR4        | Kingston        | 32GB | Micron-IDT      | 2Rx4    | 1.2v    | 2933MHz            | ECC Registered   | 21          | 288-pin   |
| CT64G4RFD4293-2G9B2.001  | DDR4        | Crucial         | 64GB | Micron-IDT      | 2Rx4    | 1.2v    | 2933MHz            | ECC Registered   | 21          | 288-pin   |
| MTA36ASF8G72PZ-2G9B2VI   | DDR4        | Crucial         | 64GB | Micron-IDT      | 2Rx4    | 1.2v    | 2933MHz            | ECC Registered   | 21          | 288-pin   |
| HMA81GR7CJR8N-XN TG  | DDR4        | SKhynix         | 8GB  | SKhynix-IDT     | 1Rx8    | 1.2v    | 3200MHz            | ECC Registered   | 22          | 288-pin   |
| HMA82GR7CJR8N-XN T4  | DDR4        | SKhynix         | 16GB | SKhynix         | 2Rx8    | 1.2v    | 3200MHz            | ECC Registered   | 22          | 288-pin   |
| HMA82GR7CJR8N-XN T8  | DDR4        | SKhynix         | 16GB | SKhynix         | 2Rx8    | 1.2v    | 3200MHz            | ECC Registered   | 22          | 288-pin   |
| HMA82GR7CJR8N-XN TG  | DDR4        | SKhynix         | 16GB | SKhynix         | 2Rx8    | 1.2v    | 3200MHz            | ECC Registered   | 22          | 288-pin   |
| HMA84GR7CJR4N-XN T8  | DDR4        | SKhynix         | 32GB | SKhynix         | 2Rx4    | 1.2v    | 3200MHz            | ECC Registered   | 22          | 288-pin   |
| HMA84GR7CJR4N-XN T4  | DDR4        | SKhynix         | 32GB | SKhynix         | 2Rx4    | 1.2v    | 3200MHz            | ECC Registered   | 22          | 288-pin   |
| HMA84GR7CJR4N-XN TG  | DDR4        | SKhynix         | 32GB | SKhynix         | 2Rx4    | 1.2v    | 3200MHz            | ECC Registered   | 22          | 288-pin   |

|  |      |         |      |                                 |      |      |         |                |    |         |
|--|------|---------|------|---------------------------------|------|------|---------|----------------|----|---------|
| HMAA8GR7AJR4N-XN TG  | DDR4 | SKhynix | 64GB | SKhynix-IDT                     | 2Rx4 | 1.2v | 3200MHz | ECC Registered | 22 | 288-pin |
| CT8G4RFS832A.9FE1  | DDR4 | Crucial | 8GB  | Micron                          | 1Rx8 | 1.2v | 3200MHz | ECC Registered | 22 | 288-pin |
| CT8G4RFS832A-3G2E1.001   | DDR4 | Crucial | 8GB  | Micron                          | 1Rx8 | 1.2v | 3200MHz | ECC Registered | 22 | 288-pin |
| MTA9ASF1G72PZ.3G2E1VG  | DDR4 | Micron  | 8GB  | Micron                          | 1Rx8 | 1.2v | 3200MHz | ECC Registered | 22 | 288-pin |
| CT16G4RFD832A.18FE1  | DDR4 | Crucial | 16GB | Micron-IDT                      | 2Rx8 | 1.2v | 3200MHz | ECC Registered | 22 | 288-pin |
| MTA18ASF2G72PDZ.3G2E1VG  | DDR4 | Micron  | 16GB | Micron-IDT                      | 2Rx8 | 1.2v | 3200MHz | ECC Registered | 22 | 288-pin |
| CT16G4RFS432A.18FE1  | DDR4 | Crucial | 16GB | Micron-IDT                      | 1Rx4 | 1.2v | 3200MHz | ECC Registered | 22 | 288-pin |
| CT16G4RFS432A-3G2E1.001  | DDR4 | Crucial | 16GB | Micron-IDT                      | 1Rx4 | 1.2v | 3200MHz | ECC Registered | 22 | 288-pin |
| MTA18ASF2G72PZ.3G2E1VG   | DDR4 | Micron  | 16GB | Micron-IDT                      | 1Rx4 | 1.2v | 3200MHz | ECC Registered | 22 | 288-pin |
| CT16G4RFD832A-3G2E1.001  | DDR4 | Crucial | 16GB | Micron-Rambus                   | 2Rx8 | 1.2v | 3200MHz | ECC Registered | 22 | 288-pin |
| MTA18ASF2G72PDZ-3G2E1UK  | DDR4 | Micron  | 16GB | Micron-Rambus                   | 2Rx8 | 1.2v | 3200MHz | ECC Registered | 22 | 288-pin |
| CT32G4RFD432A.36FE2<br><b>(3200MHz only support on 1DPC)</b>     | DDR4 | Crucial | 32GB | Micron-Montage                  | 2Rx4 | 1.2v | 3200MHz | ECC Registered | 22 | 288-pin |
| CT32G4RFD432A-3G2E2.001<br><b>(3200MHz only support on 1DPC)</b> | DDR4 | Crucial | 32GB | Micron-Montage                  | 2Rx4 | 1.2v | 3200MHz | ECC Registered | 22 | 288-pin |
| MTA36ASF4G72PZ.3G2E2TG<br><b>(3200MHz only support on 1DPC)</b>  | DDR4 | Micron  | 32GB | Micron-Montage                  | 2Rx4 | 1.2v | 3200MHz | ECC Registered | 22 | 288-pin |
| CT32G4RFD432A-3G2E7.001  | DDR4 | Crucial | 32GB | Micron-Montage or<br>Micron-IDT | 2Rx4 | 1.2v | 3200MHz | ECC Registered | 22 | 288-pin |
| CT32G4RFD432A.36FE7  | DDR4 | Crucial | 32GB | Micron-Montage or<br>Micron-IDT | 2Rx4 | 1.2v | 3200MHz | ECC Registered | 22 | 288-pin |
| MTA36ASF4G72PZ.3G2E7VI   | DDR4 | Micron  | 32GB | Micron-IDT                      | 2Rx4 | 1.2v | 3200MHz | ECC Registered | 22 | 288-pin |
| MTA36ASF4G72PZ.3G2E7TI   | DDR4 | Micron  | 32GB | Micron-Montage                  | 2Rx4 | 1.2v | 3200MHz | ECC Registered | 22 | 288-pin |
| M393A2K40DB2-CWEBQ<br><b>(3200MHz only support on 1DPC)</b>      | DDR4 | Samsung | 16GB | Samsung-IDT                     | 1Rx4 | 1.2v | 3200MHz | ECC Registered | 22 | 288-pin |
| M393A2K43DB2-CWEBQ<br><b>(3200MHz only support on 1DPC)</b>      | DDR4 | Samsung | 16GB | Samsung-IDT                     | 2Rx8 | 1.2v | 3200MHz | ECC Registered | 22 | 288-pin |
| M393A2K43DB3-CWEBQ   | DDR4 | Samsung | 16GB | Samsung-IDT                     | 2Rx8 | 1.2v | 3200MHz | ECC Registered | 22 | 288-pin |
| M393A2K40DB3-CWEGQ   | DDR4 | Samsung | 16GB | Samsung-Rambus                  | 1Rx4 | 1.2v | 3200MHz | ECC Registered | 22 | 288-pin |
| M393A2K40DB3-CWEBQ   | DDR4 | Samsung | 16GB | Samsung-IDT                     | 1Rx4 | 1.2v | 3200MHz | ECC Registered | 22 | 288-pin |
| M393A2K40DB3-CWECQ   | DDR4 | Samsung | 16GB | Samsung-                        | 1Rx4 | 1.2v | 3200MHz | ECC Registered | 22 | 288-pin |
| M393A4K40DB2-CWEBQ<br><b>(3200MHz only support on 1DPC)</b>      | 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 |

|                         |      |          |      |                 |      |      |         |                |    |         |
|-------------------------|------|----------|------|-----------------|------|------|---------|----------------|----|---------|
| M393A4K40DB3-CWEBQ      | DDR4 | Samsung  | 32GB | Samsung-IDT     | 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 |
| M393A8G40AB2-CWEBQ      | DDR4 | Samsung  | 64GB | Samsung-IDT     | 2Rx4 | 1.2v | 3200MHz | ECC Registered | 22 | 288-pin |
| TR416G32S422-XNC        | DDR4 | V-color  | 16GB | SKhynix-Rambus  | 1Rx4 | 1.2v | 3200MHz | ECC Registered | 22 | 288-pin |
| KSM32RD8/16MEI          | DDR4 | Kingston | 16GB | Micron-IDT      | 2Rx8 | 1.2v | 3200MHz | ECC Registered | 22 | 288-pin |
| KSM32RD4/32MEI          | DDR4 | Kingston | 32GB | Micron-IDT      | 2Rx4 | 1.2v | 3200MHz | ECC Registered | 22 | 288-pin |
| AD4R3200316G22-BSSC     | DDR4 | ADATA    | 16GB | Samsung-IDT     | 2Rx8 | 1.2v | 3200MHz | ECC Registered | 22 | 288-pin |
| CT64G4RFD432A-3G2B2.001 | DDR4 | Crucial  | 64GB | Micron          | 2Rx4 | 1.2v | 3200MHz | ECC Registered | 22 | 288-pin |
| MTA36ASF8G72PZ.3G2B2TI  | DDR4 | Micron   | 64GB | Micron          | 2Rx4 | 1.2v | 3200MHz | ECC Registered | 22 | 288-pin |
| MTA18ASF4G72PDZ.3G2B2TI | DDR4 | Micron   | 32GB | Micron-Montage  | 2Rx8 | 1.2v | 3200MHz | ECC Registered | 22 | 288-pin |
| HMA82GR7DJR8N-XN T8     | DDR4 | SKhynix  | 16GB | SKhynix-Rambus  | 2Rx8 | 1.2v | 3200MHz | ECC Registered | 22 | 288-pin |
| HMA84GR7DJR4N-XN T4     | DDR4 | SKhynix  | 32GB | SKhynix-Montage | 2Rx4 | 1.2v | 3200MHz | ECC Registered | 22 | 288-pin |
| MTA36ASF4G72PZ-3G2J3UI  | DDR4 | Micron   | 32GB | Micron-Rambus   | 2Rx4 | 1.2v | 3200MHz | ECC Registered | 22 | 288-pin |
| KSM32R58/8MEI           | DDR4 | Kingston | 8GB  | MICRON-IDT      | 1Rx8 | 1.2v | 3200MHz | ECC Registered | 22 | 288-pin |
| MTA18ASF4G72PDZ-3G2E1UI | DDR4 | Micron   | 32GB | Micron-Rambus   | 2Rx8 | 1.2v | 3200MHz | ECC Registered | 22 | 288-pin |
| MTA18ASF4G72PDZ-3G2E1TI | DDR4 | Micron   | 32GB | Micron-Montage  | 2Rx8 | 1.2v | 3200MHz | ECC Registered | 22 | 288-pin |
| MTA18ASF4G72PDZ-3G2E1V1 | DDR4 | Micron   | 32GB | Micron          | 2Rx8 | 1.2v | 3200MHz | ECC Registered | 22 | 288-pin |
| MTA36ASF8G72PZ-3G2E1VI  | DDR4 | Micron   | 64GB | Micron-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 |
| 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 |
| AD4R3200716G22-BHYA     | DDR4 | ADATA    | 16GB | SKhynix-Montage | 1Rx8 | 1.2v | 3200MHz | ECC Registered | 22 | 288-pin |

LRDIMM

|                    |      |         |       |             |       |      |         |                |    |         |
|--------------------|------|---------|-------|-------------|-------|------|---------|----------------|----|---------|
| M386A8K40CM2-CVFBY | DDR4 | Samsung | 64GB  | Samsung-IDT | 4DRx4 | 1.2v | 2933MHz | ECC Registered | 21 | 288-pin |
| M386A8K40DM2-CWELQ | DDR4 | Samsung | 64GB  | Samsung-IDT | 4DRx4 | 1.2v | 3200MHz | ECC Registered | 22 | 288-pin |
| M386AAG40MMB-CVFC0 | DDR4 | Samsung | 128GB | Samsung     | 4DRx4 | 1.2v | 2933MHz | ECC Registered | 21 | 288-pin |

Seagate HDD (SAS HDD may need RAID Card support)

| Product Name | Type | Vendor | Form Factor | Format | Capacity | Interface Speed | Series | Cache | RPM | Encryption |
|--------------|------|--------|-------------|--------|----------|-----------------|--------|-------|-----|------------|
|--------------|------|--------|-------------|--------|----------|-----------------|--------|-------|-----|------------|

Seagate Enterprise Capacity 2.5 HDD

|   |      |         |             |               |          |                 |  |       |      |            |
|---|------|---------|-------------|---------------|----------|-----------------|--|-------|------|------------|
| ST2000NX0243  | SATA | Seagate | 2.5"        | 4Kn           | 2TB      | 6Gb/s           | Exos 7E2000<br>(Enterprise Capacity V.3) | 128MB | 7200 | N/A        |
| Seagate Enterprise Capacity 3.5 HDD                     |      |         |             |               |          |                 |  |       |      |            |
| ST8000NM000A  | SATA | Seagate | 3.5"        | 512e          | 8TB      | 6Gb/s           | EXOS 7E8                                 | 256MB | 7200 | N/A        |
| ST10000NM0016   | SATA | Seagate | 3.5"        | 512e          | 10TB     | 6Gb/s           | Exos X10<br>(Enterprise Capacity V.6)    | 256MB | 7200 | N/A        |
| ST14000NM0018   | SATA | Seagate | 3.5"        | 512e          | 14TB     | 6Gb/s           | Exos X14<br>(Enterprise Capacity)        | 256MB | 7200 | N/A        |
| ST16000NM001G   | SATA | Seagate | 3.5"        | 512e/4Kn      | 16TB     | 6Gb/s           | EXOS X16                                 | 256MB | 7200 | N/A        |
| <b>WD HDD(SAS HDD may need RAID Card support)</b>       |      |         |             |               |          |                 |  |       |      |            |
| Product Name  | Type | Vendor  | Form Factor | Format        | Capacity | Interface Speed | Series                                   | Cache | RPM  | Encryption |
| Enterprise Hard Drives                                  |      |         |             |               |          |                 |  |       |      |            |
| WUS721010ALE6L4   | SATA | WD      | 3.5"        | 512e          | 10TB     | 6Gb/s           | Ultrastar® DC HC330                      | 256MB | 7200 | N/A        |
| WUH721818ALE6L4   | SATA | WD      | 3.5"        | 512e          | 18TB     | 6Gb/s           | Ultrastar DC HC550                       | 512MB | 7200 | N/A        |
| <b>Toshiba HDD (SAS HDD may need RAID Card support)</b> |      |         |             |               |          |                 |  |       |      |            |
| Product Name  | Type | Vendor  | Form Factor | Format        | Capacity | Interface Speed | Series                                   | Cache | RPM  | Encryption |
| Enterprise Hard Drives                                  |      |         |             |               |          |                 |  |       |      |            |
| MG07ACA14TE   | SATA | Toshiba | 3.5"        | 512e          | 14TB     | 6Gb/s           | Capacity                                 | 256MB | 7200 | N/A        |
| <b>SATA/SAS SSD</b>                                     |      |         |             |               |          |                 |  |       |      |            |
| Product Name  | Type | Vendor  | Form Factor | Interface     | Capacity | Interface Speed | FW                                       | Note  |      |            |
| SATA/SAS SSD  |      |         |             |               |          |                 |  |       |      |            |
| MTFDDAK1T9TDN-1AT1ZABYY (5200 MAX)                      | SSD  | Micron  | 2.5"        | SATA          | 1.92TB   | 6Gb/s           |  |       |      |            |
| MZ-7LH1T9NE 883 DCT Series                              | SSD  | Samsung | 2.5"        | SATA          | 1.92TB   | 6Gb/s           |  |       |      |            |
| SSDSC2KB019T8 D3-S4510 Series                           | SSD  | Intel   | 2.5"        | SATA          | 1.92TB   | 6Gb/s           |  |       |      |            |
| XA960LE10063  | SSD  | Seagate | 2.5"        | SATA          | 960GB    | 6Gb/s           |  |       |      |            |
| XA480LE10063  | SSD  | Seagate | 2.5"        | SATA          | 480GB    | 6Gb/s           |  |       |      |            |
| KHK61RSE960G  | SSD  | Toshiba | 2.5"        | SATA          | 960GB    | 6Gb/s           |  |       |      |            |
| SSB1K9GTLCG-D2-SME520GBT SME520 Series                  | SSD  | Phison  | 2.5"        | SATA          | 1.92TB   | 6Gb/s           |  |       |      |            |
| <b>PCIe SSD</b>   |      |         |             |               |          |                 |  |       |      |            |
| Product Name  | Type | Vendor  | Form Factor | Interface     | Capacity | Interface Speed | Note                                     |       |      |            |
| PCIe SSD  |      |         |             |               |          |                 |  |       |      |            |
| SSDPEDKX040T701 P4500 Series PCIe Gen3 x4 4TB           | PCIe | Intel   | PCI-E 3.0   | PCIe(NVMe)    | 4TB      | Gen3 x4         |  |       |      |            |
| Samsung PM1725b MZPLL3T2HAJQ PCIe Gen3 x8 3.2TB         | PCIe | Samsung | PCI-E 3.0   | PCIe(NVMe)    | 3.2TB    | Gen3 x8         |  |       |      |            |
| <b>U.2</b>  |      |         |             |               |          |                 |  |       |      |            |
| Product Name  | Type | Vendor  | Form Factor | Interface     | Capacity | Interface Speed | Note                                     |       |      |            |
| U.2   |      |         |             |               |          |                 |  |       |      |            |
| SSDPE2KE032T801 P4610 Series                            | U.2  | Intel   | 2.5"        | SFF8639(NVMe) | 3.2TB    | Gen3 x4         |  |       |      |            |
| SSDPE2KX020T801 P4510 Series                            | U.2  | Intel   | 2.5"        | SFF8639(NVMe) | 2TB      | Gen3 x4         |  |       |      |            |
| MZWLL3T2HAJQ PM1725b Series                             | U.2  | Samsung | 2.5"        | SFF8639(NVMe) | 3.2TB    | Gen3 x4         |  |       |      |            |
| MZQLW1T9HMJP PM963 Series                               | U.2  | Samsung | 2.5"        | SFF8639(NVMe) | 1.92TB   | Gen3 x4         |  |       |      |            |
| MTFDHAL3T2TCU 9200 Series                               | U.2  | Micron  | 2.5"        | SFF8639(NVMe) | 3.2TB    | Gen3 x4         |  |       |      |            |
| KCD51LUG960G CD5 Series                                 | U.2  | Toshiba | 2.5"        | SFF8639(NVMe) | 960GB    | Gen3 x4         |  |       |      |            |
| MTFDHBE3T8TDF 7300 Pro Series                           | U.2  | Micron  | 2.5"        | SFF8639(NVMe) | 3.84TB   | Gen3 x4         |  |       |      |            |
| MTFDHBE960TDF 7300 Pro Series                           | U.2  | Micron  | 2.5"        | SFF8639(NVMe) | 960GB    | Gen3 x4         | MTFDHBE960TDF-1AW4ZABYY                  |       |      |            |
| PWFX100 3.2TB   | U.2  | PHISON  | 2.5"        | SFF8639(NVMe) | 3.2TB    | PCIe Gen3 x4    |  |       |      |            |

|  |                                      |                           |                |                                  |                     |                                  |                                  |                               |  |
|--|--------------------------------------|---------------------------|----------------|----------------------------------|---------------------|----------------------------------|----------------------------------|-------------------------------|--|
| MZQL23T8HCLS PM9A3 Series  | U.2                                  | Samsung                   | 2.5"           | SFF8639(NVMe)                    | 3.84TB              | PCIe Gen4 x4                     |                                  |                               |  |
| U.3  |                                      |                           |                |                                  |                     |                                  |                                  |                               |  |
| KCM61RUL3T84 CM6-R Series  | U.3                                  | KIOXIA                    | 2.5"           | SFF8639(NVMe)                    | 3.84TB              | PCIe Gen4 x4                     |                                  |                               |  |
| <b>GPGPU Card (GPGPU server only)</b>  |                                      |                           |                |                                  |                     |                                  |                                  |                               |  |
| Product Name   | Processor Cores                      | Memory Bandwidth (GB/sec) | VRAM           | OpenGL                           | Microsoft DirectX   | Graphics Card Power (W)          | NVIDIA SLI / AMD CrossFire Ready | Note                          |  |
| NVIDIA Tesla ( <a href="http://www.nvidia.com/object/tesla-supercomputing-solutions.html">http://www.nvidia.com/object/tesla-supercomputing-solutions.html</a> ) |                                      |                           |                |                                  |                     |                                  |                                  |                               |  |
| V100 (VOLTA) 16GB  | 5120                                 | 900 GB/s                  | 16GB           |                                  |                     | 250 W                            |                                  | (Maximum support 4pcs GPGPU ) |  |
| T4 (TURING)  | 2560                                 | 320 GB/s                  | 16GB           |                                  |                     | 70 W                             | -                                | (Maximum support 4pcs GPGPU ) |  |
| V100S (VOLTA) 32GB   | 5120                                 | 1134 GB/s                 | 32GB           |                                  |                     | 250 W                            |                                  | (Maximum support 4pcs GPGPU ) |  |
| A100 (Ampere)  | 6912                                 | 1555 GB/s                 | 40GB           |                                  |                     | 250 W                            |                                  | (Maximum support 4pcs GPGPU ) |  |
| NVIDIA Quadro ( <a href="https://www.nvidia.com/zh-tw/design-visualization/quadro/">https://www.nvidia.com/zh-tw/design-visualization/quadro/</a> )              |                                      |                           |                |                                  |                     |                                  |                                  |                               |  |
| RTX 6000 passive   | 4608                                 | 624 GB/s                  | 24GB           |                                  |                     | 250 W                            | -                                | h                             |  |
| AMD Radeon Instinct  |                                      |                           |                |                                  |                     |                                  |                                  |                               |  |
| Mi50 (Vega20) 16GB   | 3840                                 | 1024GB/s                  | 16GB           |                                  |                     | 300 W                            |                                  | (Maximum support 4pcs GPGPU ) |  |
| Mi50 (Vega20) 32GB   | 3840                                 | 1024GB/s                  | 32GB           |                                  |                     | 300 W                            |                                  | (Maximum support 4pcs GPGPU ) |  |
| Mi100 (CDNA)   | 7680                                 | 1228.8GB/s                | 32GB           |                                  |                     | 300 W                            |                                  | (Maximum support 4pcs GPGPU ) |  |
| <b>RAID Cards</b>  |                                      |                           |                |                                  |                     |                                  |                                  |                               |  |
| Model  | RAID-on-Chip Controller              | Host Bus Type             | Internal Ports | Internal Connectors              | External Ports      | External Connectors              | Data Transfer Rates              | Note                          |  |
| GIGABYTE Storage Cards   |                                      |                           |                |                                  |                     |                                  |                                  |                               |  |
| CRA3338  | LSI SAS 3008                         | PCIe- x8 Gen3 x8 bus      | 8              | 2 xMini-SAS HD for 8x SAS        | -                   | -                                | 12Gb/s ports                     |                               |  |
| CSA3548  | LSI SAS 3008                         | PCIe- x8 Gen3 x8 bus      | -              | -                                | 8                   | 2 x external Mini-SAS HD SFF8644 | 12Gb/s ports                     |                               |  |
| CRA4448  | LSI SAS 3108                         | PCIe- x8 Gen3 x8 bus      | 8              | 2 x internal Mini-SAS HD SFF8643 | -                   | -                                | 12Gb/s ports                     |                               |  |
| LSI RAID Controller Cards  |                                      |                           |                |                                  |                     |                                  |                                  |                               |  |
| MegaRAID SAS 9460-16i  | SAS3516 dual-core RAID-on-Chip (ROC) | x8 lane PCI Express® 3.1  | 8              | 4 x Mini-SAS HD SFF-8643         | -                   | -                                | 12Gb/s SAS 3.0                   |                               |  |
| LSI Host Bus Adapters (HBAs)   |                                      |                           |                |                                  |                     |                                  |                                  |                               |  |
| LSI SAS 9400-16i   | SAS3416                              | x8 lane PCI Express® 3.1  | 16             | 4 x Mini-SAS HD SFF-8643         | -                   | -                                | 12Gb/s SAS 3.0                   |                               |  |
| Microsemi RAID Cards   |                                      |                           |                |                                  |                     |                                  |                                  |                               |  |
| SmartRAID 3154-16i   | PM8236                               | 8-Lane PCIe Gen3          | 16             | 4 x Internal, SFF-8643           | -                   | -                                | 12 Gb/s per port                 |                               |  |
| Microsemi Host Bus Adapters  |                                      |                           |                |                                  |                     |                                  |                                  |                               |  |
| SmartHBA 2100-8i   | PM8222                               | 8-Lane PCIe Gen3          | 8              | 2 x Internal, SFF-8643           | -                   | -                                | 12 Gb/s per port                 |                               |  |
| <b>LAN Cards</b>   |                                      |                           |                |                                  |                     |                                  |                                  |                               |  |
| Product Name   | Connector                            | System Interface Type     | # of Ports     | Data Rate                        | Note                |                                  |                                  |                               |  |
| GIGABYTE LAN Cards   |                                      |                           |                |                                  |                     |                                  |                                  |                               |  |
| CLN4752  | QSFP+                                | PCIe x8 Gen3 x8           | Dual           | 40Gb/s per port                  | INTEL XL710         |                                  |                                  |                               |  |
| CLN4224  | RJ-45                                | PCIe x8 Gen3 x4           | Quad           | 10Gb/s per port                  | INTEL X550-AT2      |                                  |                                  |                               |  |
| CLN4M34  | SFP28                                | PCIe Gen3 x16             | Quad           | 10Gb/s per port                  | Mellanox ConnectX-4 |                                  |                                  |                               |  |

|  |        |                          |          |                  |   |
|--|--------|--------------------------|----------|------------------|---|
| Intel_10GbE  |        |                          |          |                  |   |
| Intel® Ethernet Network Adapter X722-DA4             | SFP+   | PCIe v3.0 (8.0 GT/s)     | Quad     | 10Gb/s per port  |   |
| Intel_25GbE  |        |                          |          |                  |   |
| Intel® Ethernet Network Adapter XXV710-DA2           | SFP28  | PCIe v3.0 (8.0 GT/s)     | Dual     | 25Gb/s per port  |   |
| Intel_40GbE  |        |                          |          |                  |   |
| Intel® Ethernet Converged Network Adapter XL710-QDA2 | QSFP+  | PCIe v3.0 (8.0 GT/s)     | Dual     | 40Gb/s per port  |   |
| Intel_100GbE   |        |                          |          |                  |   |
| Intel® Ethernet Network Adapter E810-CQDA2 for OCP   | QSFP28 | <b>OCP</b> PCIe Gen4 x16 | Dual     | 100Gb/s per port | Support OCP 3.0                             |
| Mellanox ConnectX                                    |        |                          |          |                  |   |
| MCX566A-CDAI   | QSFP28 | <b>OCP PCIe 4.0</b> x16  | Dual     | 100Gb/s per port | Mellanox ConnectX-5 Ex EN / Support OCP 3.0 |
| MCX516A-CCAT   | QSFP28 | PCIe Gen3 x16            | Dual     | 100Gb/s per port | Mellanox ConnectX-5 EN                      |
| MCX515A-CCAT   | QSFP28 | PCIe Gen3 x16            | Single   | 100Gb/s per port | Mellanox ConnectX-5 EN                      |
| MCX4121A-ACAT  | SFP28  | PCIe Gen3 x8             | Dual     | 25Gb/s per port  | Mellanox ConnectX-4 Lx EN                   |
| Mellanox VPI Adapter Cards                           |        |                          |          |                  |   |
| MCX653106A-HDAT                                      | QSFP56 | <b>PCIe 4.0</b> x16      | Dual     | 200Gb/s per port | Mellanox ConnectX-6 Ex VPI (InfiniBand)     |
| MCX653105A-ECAT                                      | QSFP56 | <b>PCIe 4.0</b> x16      | Single   | 100Gb/s per port | Mellanox ConnectX-6 Ex VPI (InfiniBand)     |
| MCX555A-ECAT   | QSFP28 | PCIe 3.0 x16             | Single   | 100Gb/s per port | Mellanox ConnectX-5 VPI (InfiniBand)        |
| Qlogic LAN Adapters                                  |        |                          |          |                  |   |
| QL45611HLCU  | QSFP28 | PCIe x16 Gen3 x16        | Single   | 100Gb/s per port |   |
| QLE3442-RJ-CK  | RJ-45  | PCIe x8 Gen3 x8          | Dual     | 10Gb/s per port  |   |
| Broadcom (Emulex) Ethernet Networking Adapters       |        |                          |          |                  |   |
| BCM957414A4142CC                                     | SFP28  | PCIe 3.0 x8              | Dual     | 25Gb/s per port  | BCM57414                                    |
| BCM957414N4140C                                      | SFP28  | <b>OCP</b> PCIe 3.0 x8   | Dual     | 25Gb/s per port  | BCM57414 / Support <b>OCP 3.0</b>           |
| BCM957416N4160C                                      | RJ-45  | <b>OCP</b> PCIe 3.0 x8   | Dual     | 10Gb/s per port  | BCM57416 / Support <b>OCP 3.0</b>           |
| <b>USB Device</b>                                    |        |                          |          |                  |   |
| Product Name   | Type   | Vendor                   | Capacity | Note             |   |
| USB 3.0  |        |                          |          |                  |   |
| PURE CLASSIC X176B1FWBO75                            | HDD    | Gigabyte                 | 500G     |                  |   |
| GoFlex STAA500305                                    | HDD    | Seagate                  | 500G     |                  |   |
| TOSHIBA CANVIO BASIC                                 | HDD    | Toshiba                  | 500G     |                  |   |
| NA317U+  | Device | ineo                     |          |                  |   |
| SST-TS13   | Device | Silver Stone             |          |                  |   |
| S1-DS3-Plus  | Device | CyberSLIM                |          |                  |   |
| MB981U3-1S   | Device | ICYDOCK                  |          |                  |   |
| i310-SB3(6G)   | Device | STARDOM                  |          |                  |   |