

Qualified Vendors List (QVL), Model Name: H310M S2P 2.0

| Module Supplier | Density | # of Banks<br>x DRAM<br>devices | Module P.N.                  | SS/DS | Chip Brand | Chip P.N. | Timing      | Voltage | Memory socket support |   | XMP | Native |
|-----------------|---------|---------------------------------|------------------------------|-------|------------|-----------|-------------|---------|-----------------------|---|-----|--------|
|                 |         |                                 |                              |       |            |           |             |         | 1                     | 2 |     |        |
| DDR4 2666MHz    |         |                                 |                              |       |            |           |             |         |                       |   |     |        |
| HyperX          | 4GB     | 1Rx8                            | HX426C15FBK4/16              | SS    | SKhynix    |           | CL15        | 1.2v    | v                     | v | v   | 2666   |
| HyperX          | 4GB     | 1Rx8                            | HX426C15FBK2/8               | SS    | SKhynix    |           | CL15        | 1.2v    | v                     | v | v   | 2666   |
| HyperX          | 4GB     | 1Rx8                            | HX426C15FB/4                 | SS    | SKhynix    |           | CL15        | 1.2v    | v                     | v | v   | 2666   |
| HyperX          | 4GB     | 1Rx8                            | HX426C15FBK4/16              | SS    | Micron     |           | CL15        | 1.2v    | v                     | v | v   | 2666   |
| HyperX          | 4GB     | 1Rx8                            | HX426C15FBK2/8               | SS    | Micron     |           | CL15        | 1.2v    | v                     | v | v   | 2666   |
| HyperX          | 4GB     | 1Rx8                            | HX426C15FB/4                 | SS    | Micron     |           | CL15        | 1.2v    | v                     | v | v   | 2666   |
| HyperX          | 8GB     | 2Rx8                            | HX426C15FBK4/32              | DS    | Micron     |           | CL15        | 1.2v    | v                     | v | v   | 2666   |
| HyperX          | 8GB     | 2Rx8                            | HX426C15FBK2/16              | DS    | Micron     |           | CL15        | 1.2v    | v                     | v | v   | 2666   |
| HyperX          | 8GB     | 2Rx8                            | HX426C15FB/8                 | DS    | Micron     |           | CL15        | 1.2v    | v                     | v | v   | 2666   |
| HyperX          | 8GB     | 1Rx8                            | HX426C16FB2K4/32             | SS    | Hynix      |           | CL16        | 1.2v    | v                     | v | v   | 2666   |
| HyperX          | 8GB     | 1Rx8                            | HX426C16FB2K2/16             | SS    | Hynix      |           | CL16        | 1.2v    | v                     | v | v   | 2666   |
| HyperX          | 8GB     | 1Rx8                            | HX426C16FB2/8                | SS    | Hynix      |           | CL16        | 1.2v    | v                     | v | v   | 2666   |
| HyperX          | 8GB     | 1Rx8                            | HX426C16FB2K4/32             | SS    | Micron     |           | CL16        | 1.2v    | v                     | v | v   | 2666   |
| HyperX          | 8GB     | 1Rx8                            | HX426C16FB2K2/16             | SS    | Micron     |           | CL16        | 1.2v    | v                     | v | v   | 2666   |
| HyperX          | 8GB     | 1Rx8                            | HX426C16FB2/8                | SS    | Micron     |           | CL16        | 1.2v    | v                     | v | v   | 2666   |
| HyperX          | 8GB     | 1Rx8                            | HX426C13PB3K4/32             | SS    | Hynix      |           | CL13        | 1.35    | v                     | v | v   | 2400   |
| HyperX          | 8GB     | 1Rx8                            | HX426C13PB3K2/16             | SS    | Hynix      |           | CL13        | 1.35    | v                     | v | v   | 2400   |
| HyperX          | 8GB     | 1Rx8                            | HX426C13PB3/8                | SS    | Hynix      |           | CL13        | 1.35    | v                     | v | v   | 2400   |
| HyperX          | 16GB    | 2Rx8                            | HX426C16FBK4/64              | DS    | Hynix      |           | CL16        | 1.2v    | v                     | v | v   | 2666   |
| HyperX          | 16GB    | 2Rx8                            | HX426C16FBK2/32              | DS    | Hynix      |           | CL16        | 1.2v    | v                     | v | v   | 2666   |
| HyperX          | 16GB    | 2Rx8                            | HX426C16FBK/16               | DS    | Hynix      |           | CL16        | 1.2v    | v                     | v | v   | 2666   |
| HyperX          | 16GB    | 2Rx8                            | HX426C16FWK4/64              | DS    | Hynix      |           | CL16        | 1.2v    | v                     | v | v   | 2666   |
| HyperX          | 16GB    | 2Rx8                            | HX426C16FWK2/32              | DS    | Hynix      |           | CL16        | 1.2v    | v                     | v | v   | 2666   |
| HyperX          | 16GB    | 2Rx8                            | HX426C16FWK/16               | DS    | Hynix      |           | CL16        | 1.2v    | v                     | v | v   | 2666   |
| HyperX          | 16GB    | 2Rx8                            | HX426C13PB3K4/64             | DS    | Hynix      |           | CL13        | 1.35    | v                     | v | v   | 2400   |
| HyperX          | 16GB    | 2Rx8                            | HX426C13PB3K2/32             | DS    | Hynix      |           | CL13        | 1.35    | v                     | v | v   | 2400   |
| HyperX          | 16GB    | 2Rx8                            | HX426C13PB3/16               | DS    | Hynix      |           | CL13        | 1.35    | v                     | v | v   | 2400   |
| Kingston        | 8GB     | 1Rx8                            | KVR26N19S8/8                 | SS    | Micron     |           | CL19        | 1.2v    | v                     | v | v   | 2666   |
| Kingston        | 8GB     | 1Rx8                            | KVR26N19S8/8                 | SS    | Micron     |           | CL19        | 1.2v    | v                     | v | v   | 2666   |
| Kingston        | 16GB    | 2Rx8                            | KVR26N19D8/16                | DS    | Micron     |           | CL19        | 1.2v    | v                     | v | v   | 2666   |
| Kingston        | 16GB    | 2Rx8                            | KVR26N19D8/16                | DS    | Micron     |           | CL19        | 1.2v    | v                     | v | v   | 2666   |
| CORSAIR         | 4GB     | 1Rx8                            | CMDB9X4M2A2666C15            | SS    |            |           | 15-17-17-35 | 1.2v    | v                     | v | v   | 2133   |
| CORSAIR         | 4GB     | 1Rx8                            | CMK16GX4M4A2666C16 ver 3.21  | SS    | Micron     |           | 16-18-18-35 | 1.2v    | v                     | v | v   | 2133   |
| CORSAIR         | 4GB     | 1Rx8                            | CMK16GX4M4A2666C16B ver 3.21 | SS    | Micron     |           | 16-18-18-35 | 1.2v    | v                     | v | v   | 2133   |
| CORSAIR         | 4GB     | 1Rx8                            | CMK16GX4M4A2666C16R ver 3.21 | SS    | Micron     |           | 16-18-18-35 | 1.2v    | v                     | v | v   | 2133   |
| CORSAIR         | 4GB     | 1Rx8                            | CMK16GX4M4A2666C12 ver 5.20  | SS    | Hynix      |           | 12-14-14-35 | 1.2v    | v                     | v | v   | 2133   |
| CORSAIR         | 4GB     | 1Rx8                            | CMV4GX4M1A2666C18            | SS    |            |           | 18-18-18-43 | 1.2v    | v                     | v | v   | 2666   |
| CORSAIR         | 4GB     | 1Rx8                            | CMK8GX4M2A2666C16 ver3.22    | SS    | Micron     |           | 16-18-18-35 | 1.2v    | v                     | v | v   | 2133   |
| CORSAIR         | 8GB     | 2Rx8                            | CMK32GX4M4A2666C15           | DS    | Samsung    |           | 15-17-17-35 | 1.2v    | v                     | v | v   | 2133   |
| CORSAIR         | 8GB     | 2Rx8                            | CMK32GX4M4A2666C15           | DS    | Samsung    |           | 15-17-17-35 | 1.2v    | v                     | v | v   | 2133   |
| CORSAIR         | 8GB     | 2Rx8                            | CMK32GX4M4A2666C16           | DS    | Samsung    |           | 16-18-18-35 | 1.2v    | v                     | v | v   | 2133   |
| CORSAIR         | 8GB     | 2Rx8                            | CMK16GX4M2A2666C16 ver4.23   | DS    | Samsung    |           | 16-18-18-35 | 1.2v    | v                     | v | v   | 2133   |
| CORSAIR         | 8GB     | 2Rx8                            | CMK16GX4M2A2666C16R ver4.23  | DS    | Samsung    |           | 16-18-18-35 | 1.2v    | v                     | v | v   | 2133   |
| CORSAIR         | 8GB     | 2Rx8                            | CMK16GX4M2A2666C16W ver4.23  | DS    | Samsung    |           | 16-18-18-35 | 1.2v    | v                     | v | v   | 2133   |
| CORSAIR         | 8GB     | 2Rx8                            | CMK16GX4M2A2666C16 ver4.23   | DS    | Samsung    |           | 15-17-17-35 | 1.2v    | v                     | v | v   | 2133   |
| CORSAIR         | 8GB     | 2Rx8                            | CMK64GX4M8A2666C16           | DS    | Samsung    |           | 16-18-18-35 | 1.2v    | v                     | v | v   | 2133   |
| CORSAIR         | 8GB     | 2Rx8                            | CMU32GX4M4A2666C16 ver3.21   | DS    | Micron     |           | 16-18-18-35 | 1.2v    | v                     | v | v   | 2133   |
| CORSAIR         | 8GB     | 2Rx8                            | CMU32GX4M4A2666C16R ver3.21  | DS    | Micron     |           | 16-18-18-35 | 1.2v    | v                     | v | v   | 2133   |
| CORSAIR         | 8GB     | 2Rx8                            | CMK32GX4M4A2666C16 ver3.21   | DS    | Micron     |           | 16-18-18-35 | 1.2v    | v                     | v | v   | 2133   |
| CORSAIR         | 8GB     | 2Rx8                            | CMK32GX4M4A2666C16B ver3.21  | DS    | Micron     |           | 16-18-18-35 | 1.2v    | v                     | v | v   | 2133   |
| CORSAIR         | 8GB     | 2Rx8                            | CMK32GX4M4A2666C16R ver .21  | DS    | Micron     |           | 16-18-18-35 | 1.2v    | v                     | v | v   | 2133   |
| CORSAIR         | 8GB     | 2Rx8                            | CMK32GX4M4A2666C16W ver3.21  | DS    | Micron     |           | 16-18-18-35 | 1.2v    | v                     | v | v   | 2133   |
| CORSAIR         | 8GB     | 1Rx8                            | CMU32GX4M4A2666C16 ver5.30   | SS    | Hynix      |           | 16-18-18-35 | 1.2v    | v                     | v | v   | 2133   |
| CORSAIR         | 8GB     | 1Rx8                            | CMU32GX4M4A2666C16R ver5.30  | SS    | Hynix      |           | 16-18-18-35 | 1.2v    | v                     | v | v   | 2133   |
| CORSAIR         | 8GB     | 1Rx8                            | CMK32GX4M4A2666C16 ver5.30   | SS    | Hynix      |           | 16-18-18-35 | 1.2v    | v                     | v | v   | 2133   |
| CORSAIR         | 8GB     | 1Rx8                            | CMK32GX4M4A2666C16B ver5.30  | SS    | Hynix      |           | 16-18-18-35 | 1.2v    | v                     | v | v   | 2133   |
| CORSAIR         | 8GB     | 1Rx8                            | CMK32GX4M4A2666C16R ver5.30  | SS    | Hynix      |           | 16-18-18-35 | 1.2v    | v                     | v | v   | 2133   |
| CORSAIR         | 8GB     | 1Rx8                            | CMK32GX4M4A2666C16W ver5.30  | SS    | Hynix      |           | 16-18-18-35 | 1.2v    | v                     | v | v   | 2133   |
| CORSAIR         | 8GB     | 1Rx8                            | CMK16GX4M2A2666C16 ver5.30   | DS    | Hynix      |           | 16-18-18-35 | 1.2v    | v                     | v | v   | 2133   |
| CORSAIR         | 8GB     | 1Rx8                            | CMK16GX4M2A2666C16R ver5.30  | DS    | Hynix      |           | 16-18-18-35 | 1.2v    | v                     | v | v   | 2133   |
| CORSAIR         | 8GB     | 1Rx8                            | CMK16GX4M2A2666C16W ver5.30  | DS    | Hynix      |           | 16-18-18-35 | 1.2v    | v                     | v | v   | 2133   |
| CORSAIR         | 8GB     | 1Rx8                            | CMR64GX4M8A2666C16 ver5.30   | SS    | Hynix      |           | 16-18-18-35 | 1.2v    | v                     | v | v   | 2133   |
| CORSAIR         | 8GB     | 1Rx8                            | CMR64GX4M8A2666C16 ver5.30   | SS    | Hynix      |           | 16-18-18-35 | 1.2v    | v                     | v | v   | 2133   |
| CORSAIR         | 8GB     | 1Rx8                            | CMK16GX4M2D2666C16 ver4.21   | SS    | Samsung    |           | 16-18-18-35 | 1.2v    | v                     | v | v   | 2133   |
| CORSAIR         | 8GB     | 1Rx8                            | CMV8GX4M1A2666C18            | SS    |            |           | 18-18-18-43 | 1.2v    | v                     | v | v   | 2666   |
| CORSAIR         | 16GB    | 2Rx8                            | CMK32GX4M4A2666C16           | DS    |            |           | 16-18-18-35 | 1.2v    | v                     | v | v   | 2133   |
| CORSAIR         | 16GB    | 2Rx8                            | CMK32GX4M4A2666C16R          | DS    |            |           | 16-18-18-35 | 1.2v    | v                     | v | v   | 2133   |
| CORSAIR         | 16GB    | 2Rx8                            | CMK32GX4M4A2666C16W          | DS    |            |           | 16-18-18-35 | 1.2v    | v                     | v | v   | 2133   |
| CORSAIR         | 16GB    | 2Rx8                            | CMK64GX4M8A2666C16 ver 4.31  | DS    | Samsung    |           | 16-18-18-35 | 1.2v    | v                     | v | v   | 2133   |
| CORSAIR         | 16GB    | 2Rx8                            | CMK64GX4M8A2666C16W ver 4.31 | DS    | Samsung    |           | 16-18-18-35 | 1.2v    | v                     | v | v   | 2133   |
| CORSAIR         | 16GB    | 2Rx8                            | CMK128GX4M8A2666C15          | DS    | Samsung    |           | 15-17-17-35 | 1.2v    | v                     | v | v   | 2133   |
| CORSAIR         | 16GB    | 2Rx8                            | CMK32GX4M2A2666C16R          | DS    |            |           | 16-18-18-35 | 1.2v    | v                     | v | v   | 2133   |
| CORSAIR         | 16GB    | 2Rx8                            | CMU64GX4M4A2666C16           | DS    |            |           | 16-18-18-35 | 1.2v    | v                     | v | v   | 2133   |
| CORSAIR         | 16GB    | 2Rx8                            | CMK64GX4M8A2666C15           | DS    |            |           | 15-17-17-35 | 1.2v    | v                     | v | v   | 2133   |
| CORSAIR         | 16GB    | 2Rx8                            | CMK64GX4M8A2666C16 ver3.31   | DS    | Micron     |           | 16-18-18-35 | 1.2v    | v                     | v | v   | 2133   |
| CORSAIR         | 16GB    | 2Rx8                            | CMK64GX4M8A2666C16W ver3.31  | DS    | Micron     |           | 16-18-18-35 | 1.2v    | v                     | v | v   | 2133   |
| CORSAIR         | 16GB    | 2Rx8                            | CMK16GX4M1A2666C16 ver5.39   | DS    | Hynix      |           | 16-18-18-35 | 1.2v    | v                     | v | v   | 2133   |
| CORSAIR         | 16GB    | 2Rx8                            | CMK128GX4M8A2666C16 ver5.39  | DS    | Hynix      |           | 16-18-18-35 | 1.2v    | v                     | v | v   | 2133   |
| CORSAIR         | 16GB    | 2Rx8                            | CMV16GX4M1A2666C18           | DS    |            |           | 18-18-18-43 | 1.2v    | v                     | v | v   | 2666   |
| CORSAIR         | 16GB    | 2Rx8                            | CMK128GX4M8A2666C16 ver3.32  | DS    | Micron     |           | 16-18-18-35 | 1.2v    | v                     | v | v   | 2133   |
| G.SKILL         | 4GB     | 1Rx8                            | F4-2666C15Q-16GRR            | SS    |            |           | 15-15-15-35 | 1.2v    | v                     | v | v   | 2133   |
| G.SKILL         | 8GB     | 2Rx8                            | F4-2666C15Q-32GRR            | DS    | Hynix      |           | 15-15-15-35 | 1.2v    | v                     | v | v   | 2133   |
| ADATA           | 4GB     | 1Rx8                            | AX4U2666W4G16-BRZ            | SS    | Hynix      |           | 16-16-16    | 1.2v    | v                     | v | v   | 2133   |
| ADATA           | 4GB     | 1Rx8                            | AX4U2666W4G16-DRZ            | SS    | Hynix      |           | 16-16-16    | 1.2v    | v                     | v | v   | 2133   |
| ADATA           | 4GB     | 1Rx8                            | AX4U2666W4G16-QRZ            | SS    | Hynix      |           | 16-16-16    | 1.2v    | v                     | v | v   | 2133   |
| ADATA           | 4GB     | 1Rx8                            | AD4U2666W4G19-B              | SS    | spectek    |           | C19         | 1.2v    | v                     | v | v   | 2666   |
| ADATA           | 8GB     | 2Rx8                            | AX4U2666W8G16-BRZ            | DS    | Hynix      |           | 16-16-16    | 1.2v    | v                     | v | v   | 2133   |
| ADATA           | 8GB     | 2Rx8                            | AX4U2666W8G16-DRZ            | DS    | Hynix      |           | 16-16-16    | 1.2v    | v                     | v | v   | 2133   |
| ADATA           | 8GB     | 2Rx8                            | AX4U2666W8G16-QRZ            | DS    | Hynix      |           | 16-16-16    | 1.2v    | v                     | v | v   | 2133   |
| ADATA           | 8GB     | 1Rx8                            | AX4U266638G16-BRS            | SS    | Hynix      |           | 16-16-16    | 1.2v    | v                     | v | v   | 2133   |
| ADATA           | 8GB     | 1Rx8                            | AX4U266638G16-SRS            | SS    | Hynix      |           | 16-16-16    | 1.2v    | v                     | v | v   | 2133   |
| ADATA           | 8GB     | 1Rx8                            | AX4U266638G16-DRS            | SS    | Hynix      |           | 16-16-16    | 1.2v    | v                     | v | v   | 2133   |
| ADATA           | 8GB     | 1Rx8                            | AX4U266638G16-QRS            | SS    | Hynix      |           | 16-16-16    | 1.2v    | v                     | v | v   | 2133   |
| ADATA           | 8GB     | 1Rx8                            | AD4U266638G19-B              | SS    |            |           | C19         | 1.2v    | v                     | v | v   | 2666   |
| ADATA           | 16GB    | 2Rx8                            | AD4U2666316G19-B             | SS    |            |           | C19         | 1.2v    | v                     | v | v   | 2666   |
| Apacer          | 4GB     | 1Rx8                            | AHU04GGB26CDT6H              | SS    |            |           |             |         |                       |   |     |        |

|      |      |      |                        |    |  |  |             |      |   |   |   |      |
|------|------|------|------------------------|----|--|--|-------------|------|---|---|---|------|
| Team | 8GB  | 2Rx8 | TLRED432G2666HC15BQC01 | DS |  |  | 15-17-17-35 | 1.2v | v | v | v | 2133 |
| Team | 8GB  | 2Rx8 | TGDED432G2666HC15BQC01 | DS |  |  | 15-17-17-35 | 1.2v | v | v | v | 2133 |
| Team | 8GB  | 2Rx8 | THRD432G2666HC15BQC01  | DS |  |  | 15-17-17-35 | 1.2v | v | v | v | 2133 |
| Team | 8GB  | 2Rx8 | THWD432G2666HC15BQC01  | DS |  |  | 15-17-17-35 | 1.2v | v | v | v | 2133 |
| Team | 8GB  | 2Rx8 | TLRED416G2666HC15BDC01 | DS |  |  | 15-17-17-35 | 1.2v | v | v | v | 2133 |
| Team | 8GB  | 2Rx8 | TGDED416G2666HC15BDC01 | DS |  |  | 15-17-17-35 | 1.2v | v | v | v | 2133 |
| Team | 8GB  | 2Rx8 | THRD416G2666HC15BDC01  | DS |  |  | 15-17-17-35 | 1.2v | v | v | v | 2133 |
| Team | 8GB  | 2Rx8 | THWD416G2666HC15BDC01  | DS |  |  | 15-17-17-35 | 1.2v | v | v | v | 2133 |
| Team | 8GB  | 2Rx8 | THBD416G2666HC15BDC01  | DS |  |  | 15-17-17-35 | 1.2v | v | v | v | 2133 |
| Team | 8GB  | 1Rx8 | TED432G2666C19QC01     | SS |  |  | 19-19-19-43 | 1.2v | v | v |   | 2666 |
| Team | 8GB  | 1Rx8 | TED416G2666C19DC01     | SS |  |  | 19-19-19-43 | 1.2v | v | v |   | 2666 |
| Team | 8GB  | 1Rx8 | TED48G2666C1901        | SS |  |  | 19-19-19-43 | 1.2v | v | v |   | 2666 |
| Team | 16GB | 2Rx8 | THRD464G2666HC15BQC01  | DS |  |  | 15-17-17-35 | 1.2v | v | v | v | 2133 |
| Team | 16GB | 2Rx8 | THWD464G2666HC15BQC01  | DS |  |  | 15-17-17-35 | 1.2v | v | v | v | 2133 |
| Team | 16GB | 2Rx8 | THBD464G2666HC15BQC01  | DS |  |  | 15-17-17-35 | 1.2v | v | v | v | 2133 |
| Team | 16GB | 2Rx8 | THBD432G2666HC15BDC01  | DS |  |  | 15-17-17-35 | 1.2v | v | v | v | 2133 |
| Team | 16GB | 2Rx8 | THWD432G2666HC15BDC01  | DS |  |  | 15-17-17-35 | 1.2v | v | v | v | 2133 |
| Team | 16GB | 2Rx8 | THBD432G2666HC15BDC01  | DS |  |  | 15-17-17-35 | 1.2v | v | v | v | 2133 |
| Team | 16GB | 2Rx8 | TED464G2666C19QC01     | DS |  |  | 19-19-19-43 | 1.2v | v | v |   | 2666 |
| Team | 16GB | 2Rx8 | TED432G2666C19DC01     | DS |  |  | 19-19-19-43 | 1.2v | v | v |   | 2666 |
| Team | 16GB | 2Rx8 | TED416G2666C1901       | DS |  |  | 19-19-19-43 | 1.2v | v | v |   | 2666 |

DDR4 2400MHz

| Module Supplier | Density | # of Ranks x DRAM devices | Module P.N.                   | SS/DS | Chip Brand | Chip P.N. | Timing      | Voltage | XMP |   | Native |        |
|-----------------|---------|---------------------------|-------------------------------|-------|------------|-----------|-------------|---------|-----|---|--------|--------|
|                 |         |                           |                               |       |            |           |             |         | 1   | 2 |        |        |
| HyperX          | 8GB     | 2Rx8                      | HX424C15FB/8                  | DS    | SKhynix    |           | C15         | 1.2v    | v   | v | v      | 2133   |
| HyperX          | 8GB     | 1Rx8                      | HX424C15FB2K4/32              | SS    |            |           | C15         | 1.2v    | v   | v | v      | 2133   |
| HyperX          | 8GB     | 1Rx8                      | HX424C15FB2K2/16              | SS    |            |           | C15         | 1.2v    | v   | v | v      | 2133   |
| HyperX          | 8GB     | 1Rx8                      | HX424C15FB2/8                 | SS    |            |           | C15         | 1.2v    | v   | v | v      | 2133   |
| HyperX          | 8GB     | 1Rx8                      | HX424C12PB3K4/32              | SS    | Hynix      |           | CL12        | 1.35    | v   | v | v      | 2400   |
| HyperX          | 8GB     | 1Rx8                      | HX424C12PB3K2/16              | SS    | Hynix      |           | CL12        | 1.35    | v   | v | v      | 2400   |
| HyperX          | 8GB     | 1Rx8                      | HX424C12PB3/8                 | SS    | Hynix      |           | CL12        | 1.35    | v   | v | v      | 2400   |
| HyperX          | 16GB    | 2Rx8                      | HX424C15FBK4/64               | DS    |            |           | C15         | 1.2v    | v   | v | v      | 2133   |
| HyperX          | 16GB    | 2Rx8                      | HX424C15FBK2/32               | DS    |            |           | C15         | 1.2v    | v   | v | v      | 2133   |
| HyperX          | 16GB    | 2Rx8                      | HX424C15FB/16                 | DS    |            |           | C15         | 1.2v    | v   | v | v      | 2133   |
| HyperX          | 16GB    | 2Rx8                      | HX424C12PB3K4/64              | DS    | Hynix      |           | CL12        | 1.35    | v   | v | v      | 2400   |
| HyperX          | 16GB    | 2Rx8                      | HX424C12PB3K2/32              | DS    | Hynix      |           | CL12        | 1.35    | v   | v | v      | 2400   |
| HyperX          | 16GB    | 2Rx8                      | HX424C12PB3/16                | DS    | Hynix      |           | CL12        | 1.35    | v   | v | v      | 2400   |
| Kingston        | 4GB     | 1Rx8                      | KVR24N1758/4                  | SS    | Micron     |           | CL17        | 1.2v    | v   | v |        | 2400   |
| Kingston        | 8GB     | 2Rx8                      | KVR24N17D8/8                  | DS    | Micron     |           | CL17        | 1.2v    | v   | v |        | 2400   |
| Kingston        | 8GB     | 1Rx8                      | KVR24N1758/8                  | SS    | Micron     |           | CL17        | 1.2v    | v   | v |        | 2400   |
| Kingston        | 16GB    | 2Rx8                      | KVR24N17D8/16                 | DS    | Micron     |           | CL17        | 1.2v    | v   | v |        | 2400   |
| CORSAIR         | 4GB     | 1Rx8                      | CMK16GX4M4A2400C14            | SS    | Samsung    |           | 14-16-16-31 | 1.2v    | v   | v | v      | 2133   |
| CORSAIR         | 4GB     | 1Rx8                      | CMK16GX4M4A2400C14B           | SS    | Samsung    |           | 14-16-16-31 | 1.2v    | v   | v | v      | 2133   |
| CORSAIR         | 4GB     | 1Rx8                      | CMK16GX4M4A2400C14R           | SS    | Samsung    |           | 14-16-16-31 | 1.2v    | v   | v | v      | 2133   |
| CORSAIR         | 4GB     | 1Rx8                      | CMD16GX4M4A2400C14            | SS    | Samsung    |           | 14-16-16-31 | 1.2v    | v   | v | v      | 2133   |
| CORSAIR         | 4GB     | 1Rx8                      | CMK8GX4M2D2400C14 ver3.11     | SS    | Micron     |           | 14-16-16-31 | 1.2v    | v   | v | v      | 2133   |
| CORSAIR         | 8GB     | 2Rx8                      | CMK32GX4M4A2400C14            | DS    | Samsung    |           | 14-16-16-31 | 1.2v    | v   | v | v      | 2133   |
| CORSAIR         | 8GB     | 2Rx8                      | CMK32GX4M4A2400C14B           | DS    | Samsung    |           | 14-16-16-31 | 1.2v    | v   | v | v      | 2133   |
| CORSAIR         | 8GB     | 2Rx8                      | CMK32GX4M4A2400C14R           | DS    | Samsung    |           | 14-16-16-31 | 1.2v    | v   | v | v      | 2133   |
| CORSAIR         | 8GB     | 1Rx8                      | CMD64GX4M8A2400C14 ver4.24    | SS    | Samsung    |           | 14-16-16-31 | 1.2v    | v   | v | v      | 2133   |
| CORSAIR         | 8GB     | 2Rx8                      | CMK64GX4M8A2400C14            | DS    |            |           | 14-16-16-31 | 1.2v    | v   | v | v      | 2133   |
| CORSAIR         | 8GB     | 2Rx8                      | CMK32GX4M4A2400C16            | SS    |            |           | 16-16-16-39 | 1.2v    | v   | v | v      | 2133   |
| CORSAIR         | 8GB     | 2Rx8                      | CMK32GX4M4A2400C16R           | SS    |            |           | 16-16-16-39 | 1.2v    | v   | v | v      | 2133   |
| CORSAIR         | 8GB     | 1Rx8                      | CMK16GX4M2A2400C16            | SS    |            |           | 16-16-16-39 | 1.2v    | v   | v | v      | 2133   |
| CORSAIR         | 8GB     | 1Rx8                      | CMK16GX4M2A2400C16R           | SS    |            |           | 16-16-16-39 | 1.2v    | v   | v | v      | 2133   |
| CORSAIR         | 8GB     | 2Rx8                      | CMD32GX4M4A2400C12            | DS    |            |           | 12-14-14-28 | 1.2v    | v   | v | v      | 2133   |
| CORSAIR         | 8GB     | 2Rx8                      | CMK32GX4M4A2400C12            | DS    |            |           | 12-14-14-28 | 1.2v    | v   | v | v      | 2133   |
| CORSAIR         | 8GB     | 1Rx8                      | CMK16GX4M2Z2400C16 ver3.31    | SS    | Micron     |           | 16-16-16-39 | 1.2v    | v   | v |        | 2133   |
| CORSAIR         | 8GB     | 1Rx8                      | CMK16GX4M2A2400C16 ver5.30    | SS    | Hynix      |           | 16-16-16-39 | 1.2v    | v   | v | v      | 2133   |
| CORSAIR         | 8GB     | 1Rx8                      | CMK32GX4M4A2400C14 ver3.31    | SS    | Micron     |           | 14-16-16-31 | 1.2v    | v   | v | v      | 2133   |
| CORSAIR         | 8GB     | 1Rx8                      | CMK16GX4M2D2400C14 ver4.21    | SS    | Samsung    |           | 14-16-16-31 | 1.2v    | v   | v | v      | 2133   |
| CORSAIR         | 16GB    | 2Rx8                      | CMK128GX4M8A2400C14           | DS    |            |           | 14-16-16-31 | 1.2v    | v   | v | v      | 2133   |
| CORSAIR         | 16GB    | 2Rx8                      | CMK64GX4M4A2400C14            | DS    |            |           | 14-16-16-31 | 1.2v    | v   | v | v      | 2133   |
| CORSAIR         | 16GB    | 2Rx8                      | CMD128GX4M8A2400C14           | DS    |            |           | 14-16-16-31 | 1.2v    | v   | v | v      | 2133   |
| CORSAIR         | 16GB    | 2Rx8                      | CMK128GX4M8A2400C14 ver5.30   | DS    | Hynix      |           | 14-16-16-31 | 1.2v    | v   | v | v      | 2133   |
| CORSAIR         | 16GB    | 2Rx8                      | CMK64GX4M4A2400C16 ver3.32    | DS    | Micron     |           | 16-16-16-39 | 1.2v    | v   | v | v      | 2133   |
| G.SKILL         | 4GB     | 1Rx8                      | F4-2400C15Q-16GRR             | SS    | Micron     |           | 15-15-15-35 | 1.2v    | v   | v | v      | 2133   |
| G.SKILL         | 8GB     | 2Rx8                      | F4-2400C15Q-32GRR             | DS    | Micron     |           | 15-15-15-35 | 1.2v    | v   | v | v      | 2133   |
| G.SKILL         | 8GB     | 2Rx8                      | F4-2400C15Q2-64GRK            | DS    |            |           | 15-15-15-35 | 1.2v    | v   | v | v      | 2133   |
| G.SKILL         | 8GB     | 1Rx8                      | F4-2400C17S-8GBD              | SS    |            |           | 17-17-17-39 | 1.2v    | v   | v |        | 2400   |
| G.SKILL         | 16GB    | 2Rx8                      | F4-2400C15Q2-128GRK           | DS    |            |           | 15-15-15-35 | 1.2v    | v   | v | v      | 2133   |
| ADATA           | 4GB     | 1Rx8                      | AD4U2400W4G17-B               | SS    | Hynix      |           |             | 1.2v    | v   | v |        | 2400   |
| ADATA           | 8GB     | 2Rx8                      | AD4U2400W8G17-B               | DS    | Hynix      |           |             | 1.2v    | v   | v |        | 2400   |
| ADATA           | 8GB     | 2Rx8                      | AX4U2400W8G16-BRD             | DS    | Hynix      |           | 16-16-16    | 1.2v    | v   | v | v      | 2133   |
| ADATA           | 8GB     | 2Rx8                      | AX4U2400W8G16-DRD             | DS    | Hynix      |           | 16-16-16    | 1.2v    | v   | v | v      | 2133   |
| ADATA           | 8GB     | 2Rx8                      | AX4U2400W8G16-QRD             | DS    | Hynix      |           | 16-16-16    | 1.2v    | v   | v | v      | 2133   |
| ADATA           | 8GB     | 1Rx8                      | AX4U240038G16-BRZ             | SS    | Hynix      |           | 16-16-16    | 1.2v    | v   | v | v      | 2133   |
| ADATA           | 8GB     | 1Rx8                      | AX4U240038G16-DRZ             | SS    | Hynix      |           | 16-16-16    | 1.2v    | v   | v | v      | 2133   |
| ADATA           | 8GB     | 1Rx8                      | AX4U240038G16-QRZ             | SS    | Hynix      |           | 16-16-16    | 1.2v    | v   | v | v      | 2133   |
| ADATA           | 8GB     | 2Rx8                      | AX4U2400W8G16-BRZ             | DS    |            |           | 16-16-16    | 1.2v    | v   | v | v      | 2133   |
| ADATA           | 8GB     | 2Rx8                      | AX4U2400W8G16-DRZ             | DS    |            |           | 16-16-16    | 1.2v    | v   | v | v      | 2133   |
| ADATA           | 8GB     | 2Rx8                      | AX4U2400W8G16-QRZ             | DS    |            |           | 16-16-16    | 1.2v    | v   | v | v      | 2133   |
| ADATA           | 16GB    | 2Rx8                      | AX4U2400316G16-BRZ            | DS    | Hynix      |           | 16-16-16    | 1.2v    | v   | v | v      | 2133   |
| ADATA           | 16GB    | 2Rx8                      | AX4U2400316G16-DRZ            | DS    | Hynix      |           | 16-16-16    | 1.2v    | v   | v | v      | 2133   |
| ADATA           | 16GB    | 2Rx8                      | AX4U2400316G16-QRZ            | DS    | Hynix      |           | 16-16-16    | 1.2v    | v   | v | v      | 2133   |
| ADATA           | 16GB    | 2Rx8                      | AX4U2400316G16-BRD            | DS    | Hynix      |           | 16-16-16    | 1.2v    | v   | v | v      | 2133   |
| ADATA           | 16GB    | 2Rx8                      | AX4U2400316G16-DRD            | DS    | Hynix      |           | 16-16-16    | 1.2v    | v   | v | v      | 2133   |
| ADATA           | 16GB    | 2Rx8                      | AX4U2400316G16-QRD            | DS    | Hynix      |           | 16-16-16    | 1.2v    | v   | v | v      | 2133   |
| Apacer          | 8GB     | 2Rx8                      | AU08GB24CETBGC                | DS    |            |           | CL17        | 1.2v    | v   | v |        | 2400   |
| Apacer          | 8GB     | 1Rx8                      | AHU08GB24CDU7G                | SS    |            |           | 16-16-16-36 | 1.2v    | v   | v | v      | 2133   |
| Apacer          | 8GB     | 1Rx8                      | AU08GB24CEYBGC                | SS    |            |           | CL17        | 1.2v    | v   | v | v      | 2400   |
| Apacer          | 8GB     | 1Rx8                      | AHU08GB24CDU7S (EK.08G2T.GEJ) | SS    |            |           | 16-16-16-36 | 1.2v    | v   | v | v      | 2400   |
| Apacer          | 16GB    | 2Rx8                      | AHU16GB24CDU7V                | DS    |            |           | 16-16-16-36 | 1.2v    | v   | v | v      | 2133   |
| Antec           | 8GB     | 1Rx8                      | AMD4U2124001508G-3S           | SS    | Samsung    |           | 15-15-15-39 | 1.2v    | v   | v |        | 2400   |
| CRUCIAL         | 4GB     | 1Rx8                      | BLS4G4D240FSB.8FADG           | SS    | Micron     |           | 16-16-16-39 | 1.2v    | v   | v | v      | 2400   |
| CRUCIAL         | 8GB     | 2Rx8                      | BLS8G4D240FSB.16FARG          | DS    | Micron     |           | 16-16-16-39 | 1.2v    | v   | v | v      | 2400   |
| CRUCIAL         | 8GB     | 2Rx8                      | BLS8G4D240FSA.16FARG          | DS    | Micron     |           | 16-16-16-39 | 1.2v    | v   | v | v      | 2400   |
| CRUCIAL         | 8GB     | 1Rx8                      | CT8G4DFS824A.8FB1             | SS    | Micron     |           | CL17        | 1.2v    | v   | v |        | 2400   |
| CRUCIAL         | 8GB     | 2Rx8                      | CT8G4WFD824A.18FB1            | DS    | Micron     |           | CL17        | 1.2v    | v   | v |        | 2400   |
| CRUCIAL         | 8GB     | 2Rx8                      | BLS8G4D240FSB.16FAR           | DS    | Micron     |           | 16-16-16-39 | 1.2v    | v   | v | v      | 2400   |
| CRUCIAL         | 16GB    | 2Rx8                      | BLS16G4D240FSB.16FAD          | DS    | Micron     |           | 16-16-16-39 | 1.2v    | v   | v | v      | 2400   |
| CRUCIAL         | 16GB    | 2Rx8                      | CT16G4DFD824A.16FB1           | DS    | Micron     |           | CL17        | 1.2v    | v   | v |        | 2400   |
| CRUCIAL         | 16GB    | 2Rx8                      | CT16G4WFD824A.18FB1           | DS    | Micron     |           | CL17        | 1.2v    | v   | v |        | 2400   |
| GEIL            | 4GB     | 1Rx8                      | GPR48GB2400C16DC              | SS    |            |           | 16-16-16-36 | 1.2v    | v   | v | v      | 2133   |
| GEIL            | 8GB     | 2Rx8                      | GPR432GB2400C15QC             | DS    |            |           | 15-15-15-35 | 1.2v    | v   | v | v      | 2133   |
| GEIL            | 8GB     | 1Rx16                     | GLR432GB2400C15QC             | DS    |            |           | C15         | 1.2v    | v   | v | v      | 2400   |
| GEIL            | 8GB     | 1Rx16                     | GLW432GB2400C15QC             | DS    |            |           | C15         | 1.2v    | v   | v | v      | 2400   |
| GEIL            | 8GB     | 1Rx16                     | GLB416GB2400C15DC             | DS    |            |           | C15         | 1.2v    | v   | v | v      | 2400   |
| GEIL            | 8GB     | 1Rx16                     | GPR48GB2400C15SC              | DS    |            |           | C15         | 1.2v    | v   | v | v      | 2400   |
| GEIL            | 8GB     | 1Rx16                     | GFY416GB2400C16DC             | SS    |            |           | 16-16-16-36 | 1.2v    | v   | v | v      | 2133   |
| GEIL            | 8GB     | 1Rx8                      | GAPB416GB2400C16DC            | SS    |            |           | 16-16-16-36 | 1.2v    | v   | v | v      | 2133   |
| GEIL            | 8GB     | 1Rx8                      | GLS416GB2400C16DC             | SS    |            |           | 16-16-16-36 | 1.2v    | v   | v | v      | 2133   |
| GEIL            | 16GB    | 2Rx8                      | GPR432GB2400C16QC             | DS    |            |           | 16-16-16-36 | 1.2v    | v   | v | v      | 2133   |
| GALAX           | 4GB     | 1Rx8                      | GAM4BXLBS240016JE164C         | SS    |            |           | 16-16-16-36 | 1.2v    | v   | v | v      | 2133</ |

| Module   | Capacity | Rank  | Module P/N             | SS/DS | Chip Brand | Chip P/N | Timing      | Voltage | 1 | 2 | XMP | Native |
|----------|----------|-------|------------------------|-------|------------|----------|-------------|---------|---|---|-----|--------|
| PATRIOT  | 4GB      | 1Rx8  | PVE48G240C5KRD         | SS    |            |          | CL15        | 1.2v    | v | v | v   | 2133   |
| PATRIOT  | 8GB      | 1Rx8  | PVE416G240C5KRD        | SS    |            |          | CL15        | 1.2v    | v | v | v   | 2133   |
| PATRIOT  | 8GB      | 1Rx8  | PSD48G2400081          | SS    |            |          | CL17        | 1.2v    | v | v | v   | 2400   |
| PATRIOT  | 16GB     | 2Rx8  | PSD416G24002           | DS    |            |          | CL17        | 1.2v    | v | v | v   | 2400   |
| Team     | 4GB      | 1Rx8  | TDRD416G2400HC15AQC01  | SS    |            |          | 15-15-15-35 | 1.2v    | v | v | v   | 2133   |
| Team     | 4GB      | 1Rx8  | TDW416G2400HC15AQC01   | SS    |            |          | 15-15-15-35 | 1.2v    | v | v | v   | 2133   |
| Team     | 4GB      | 1Rx8  | TDW416G2400HC15AQC01   | SS    |            |          | 15-15-15-35 | 1.2v    | v | v | v   | 2133   |
| Team     | 4GB      | 1Rx8  | TDTRD48G2400HC15ADC01  | SS    |            |          | 15-15-15-35 | 1.2v    | v | v | v   | 2133   |
| Team     | 4GB      | 1Rx8  | TDW48G2400HC15ADC01    | SS    |            |          | 15-15-15-35 | 1.2v    | v | v | v   | 2133   |
| Team     | 4GB      | 1Rx8  | TDW48G2400HC15ADC01    | SS    |            |          | 15-15-15-35 | 1.2v    | v | v | v   | 2133   |
| Team     | 8GB      | 2Rx8  | TD432G2400C16QC01      | DS    |            |          | 16-16-16-39 | 1.2v    | v | v | v   | 2400   |
| Team     | 8GB      | 2Rx8  | TPRD432G2400HC16QC01   | DS    |            |          | 16-16-16-39 | 1.2v    | v | v | v   | 2400   |
| Team     | 8GB      | 2Rx8  | TPD432G2400HC16QC01    | DS    |            |          | 16-16-16-39 | 1.2v    | v | v | v   | 2400   |
| Team     | 8GB      | 2Rx8  | TPD416G2400C16DC01     | DS    |            |          | 16-16-16-39 | 1.2v    | v | v | v   | 2400   |
| Team     | 8GB      | 2Rx8  | TPRD416G2400HC16DC01   | DS    |            |          | 16-16-16-39 | 1.2v    | v | v | v   | 2400   |
| Team     | 8GB      | 2Rx8  | TPD416G2400HC16DC01    | DS    |            |          | 16-16-16-39 | 1.2v    | v | v | v   | 2400   |
| Team     | 8GB      | 2Rx8  | TPR48G2400C1601        | DS    |            |          | 16-16-16-39 | 1.2v    | v | v | v   | 2400   |
| Team     | 8GB      | 2Rx8  | TPRD48G2400HC1601      | DS    |            |          | 16-16-16-39 | 1.2v    | v | v | v   | 2400   |
| Team     | 8GB      | 2Rx8  | TPD48G2400HC1601       | DS    |            |          | 16-16-16-39 | 1.2v    | v | v | v   | 2400   |
| Team     | 8GB      | 2Rx8  | TDTRD416G2400HC15ADC01 | DS    |            |          | 15-15-15-35 | 1.2v    | v | v | v   | 2133   |
| Team     | 8GB      | 2Rx8  | TDW416G2400HC15ADC01   | DS    |            |          | 15-15-15-35 | 1.2v    | v | v | v   | 2133   |
| Team     | 8GB      | 2Rx8  | TDW416G2400HC15ADC01   | DS    |            |          | 15-15-15-35 | 1.2v    | v | v | v   | 2133   |
| Team     | 8GB      | 2Rx8  | TDTRD416G2400HC15ADC01 | DS    |            |          | 15-15-15-35 | 1.2v    | v | v | v   | 2133   |
| Team     | 8GB      | 2Rx8  | TDTRD48G2400HC15A01    | DS    |            |          | 15-15-15-35 | 1.2v    | v | v | v   | 2133   |
| Team     | 8GB      | 2Rx8  | TDW48G2400HC15A01      | DS    |            |          | 15-15-15-35 | 1.2v    | v | v | v   | 2133   |
| Team     | 8GB      | 2Rx8  | TDW48G2400HC15A01      | DS    |            |          | 15-15-15-35 | 1.2v    | v | v | v   | 2133   |
| Team     | 8GB      | 1Rx8  | TLGD432G2400HC14QC01   | SS    |            |          | 14-16-16-31 | 1.2v    | v | v | v   | 2133   |
| Team     | 8GB      | 1Rx8  | TLRED432G2400HC14QC01  | SS    |            |          | 14-16-16-31 | 1.2v    | v | v | v   | 2133   |
| Team     | 8GB      | 1Rx8  | TLGD416G2400HC14DC01   | SS    |            |          | 14-16-16-31 | 1.2v    | v | v | v   | 2133   |
| Team     | 8GB      | 1Rx8  | TLRED416G2400HC14DC01  | SS    |            |          | 14-16-16-31 | 1.2v    | v | v | v   | 2133   |
| Team     | 8GB      | 1Rx8  | TLGD48G2400HC1401      | SS    |            |          | 14-16-16-31 | 1.2v    | v | v | v   | 2133   |
| Team     | 8GB      | 1Rx8  | TLRED48G2400HC1401     | SS    |            |          | 14-16-16-31 | 1.2v    | v | v | v   | 2133   |
| Team     | 16GB     | 2Rx8  | TED464G2400C16QC01     | DS    |            |          | 16-16-16-39 | 1.2v    | v | v | v   | 2400   |
| Team     | 16GB     | 2Rx8  | TPRD464G2400HC16QC01   | DS    |            |          | 16-16-16-39 | 1.2v    | v | v | v   | 2400   |
| Team     | 16GB     | 2Rx8  | TPD464G2400HC16QC01    | DS    |            |          | 16-16-16-39 | 1.2v    | v | v | v   | 2400   |
| Team     | 16GB     | 2Rx8  | TED432G2400C16DC01     | DS    |            |          | 16-16-16-39 | 1.2v    | v | v | v   | 2400   |
| Team     | 16GB     | 2Rx8  | TPRD432G2400HC16DC01   | DS    |            |          | 16-16-16-39 | 1.2v    | v | v | v   | 2400   |
| Team     | 16GB     | 2Rx8  | TPD432G2400HC16DC01    | DS    |            |          | 16-16-16-39 | 1.2v    | v | v | v   | 2400   |
| Team     | 16GB     | 2Rx8  | TED416G2400C1601       | DS    |            |          | 16-16-16-39 | 1.2v    | v | v | v   | 2400   |
| Team     | 16GB     | 2Rx8  | TPRD416G2400HC1601     | DS    |            |          | 16-16-16-39 | 1.2v    | v | v | v   | 2400   |
| Team     | 16GB     | 2Rx8  | TPD416G2400HC1601      | DS    |            |          | 16-16-16-39 | 1.2v    | v | v | v   | 2400   |
| Team     | 16GB     | 2Rx8  | TDTRD464G2400HC15BQC01 | DS    |            |          | 15-17-17-35 | 1.2v    | v | v | v   | 2133   |
| Team     | 16GB     | 2Rx8  | TDW464G2400HC15BQC01   | DS    |            |          | 15-17-17-35 | 1.2v    | v | v | v   | 2133   |
| Team     | 16GB     | 2Rx8  | TDW464G2400HC15BQC01   | DS    |            |          | 15-17-17-35 | 1.2v    | v | v | v   | 2133   |
| Team     | 16GB     | 2Rx8  | TDTRD464G2400HC15BQC01 | DS    |            |          | 15-17-17-35 | 1.2v    | v | v | v   | 2133   |
| Team     | 16GB     | 2Rx8  | TDTRD432G2400HC15BDC01 | DS    |            |          | 15-17-17-35 | 1.2v    | v | v | v   | 2133   |
| Team     | 16GB     | 2Rx8  | TDW432G2400HC15BDC01   | DS    |            |          | 15-17-17-35 | 1.2v    | v | v | v   | 2133   |
| Team     | 16GB     | 2Rx8  | TDW432G2400HC15BDC01   | DS    |            |          | 15-17-17-35 | 1.2v    | v | v | v   | 2133   |
| Team     | 16GB     | 2Rx8  | TDTRD432G2400HC15BDC01 | DS    |            |          | 15-17-17-35 | 1.2v    | v | v | v   | 2133   |
| Panram   | 8GB      | 1Rx8  | PUD42400C158G4NJW      | SS    |            |          | CL15        | 1.2v    | v | v | v   | 2400   |
| Samsung  | 4GB      | 1Rx16 | M378A5244CB0-CRC       | SS    |            |          |             | 1.2v    | v | v | v   | 2400   |
| innodisk | 8GB      | 2Rx8  | M4C0-8GSSMCSJ          | DS    | Samsung    |          |             | 1.2v    | v | v | v   | 2400   |
| V-Color  | 8GB      | 2Rx8  | TD8G16C17-UH           | DS    |            |          | CL17        | 1.2v    | v | v | v   | 2400   |
| V-Color  | 8GB      | 1Rx8  | TC48G24S817            | SS    |            |          | CL17        | 1.2v    | v | v | v   | 2400   |

#### DDR4 2133MHz

| Module Supplier | Density | # of Ranks x DRAM devices | Module P/N                   | SS/DS | Chip Brand | Chip P/N         | Timing      | Voltage | 1 | 2 | XMP | Native |
|-----------------|---------|---------------------------|------------------------------|-------|------------|------------------|-------------|---------|---|---|-----|--------|
| HyperX          | 8GB     | 1Rx8                      | HX421C14FB2K4/32             | SS    |            |                  | CL14        | 1.2v    | v | v | v   | v      |
| HyperX          | 8GB     | 1Rx8                      | HX421C14FB2K2/16             | SS    |            |                  | CL14        | 1.2v    | v | v | v   | v      |
| HyperX          | 8GB     | 1Rx8                      | HX421C14FB2/8                | SS    |            |                  | CL14        | 1.2v    | v | v | v   | v      |
| HyperX          | 16GB    | 2Rx8                      | HX421C14FBK4/64              | DS    |            |                  | CL14        | 1.2v    | v | v | v   | v      |
| HyperX          | 16GB    | 2Rx8                      | HX421C14FBK2/32              | DS    |            |                  | CL14        | 1.2v    | v | v | v   | v      |
| HyperX          | 16GB    | 2Rx8                      | HX421C14FB/16                | DS    |            |                  | CL14        | 1.2v    | v | v | v   | v      |
| Kingston        | 4GB     | 1Rx8                      | KVR21N1558/4                 | SS    | SKhynix    |                  | CL15        | 1.2v    | v | v | v   | v      |
| Kingston        | 4GB     | 1Rx8                      | KVR21E1558/4                 | SS    | SKhynix    |                  | CL15        | 1.2v    | v | v | v   | v      |
| Kingston        | 8GB     | 2Rx8                      | KVR21N15D8/8                 | DS    | SKhynix    |                  | CL15        | 1.2v    | v | v | v   | v      |
| Kingston        | 8GB     | 2Rx8                      | KVR21E15D8/8HA               | DS    | SKhynix    |                  | CL15        | 1.2v    | v | v | v   | v      |
| Kingston        | 8GB     | 1Rx8                      | KVR21N1558/8                 | DS    | Micron     |                  | CL15        | 1.2v    | v | v | v   | v      |
| Kingston        | 16GB    | 2Rx8                      | KVR21N15D8/16                | DS    | Micron     |                  | CL15        | 1.2v    | v | v | v   | v      |
| CORSAIR         | 4GB     | 1Rx8                      | CMK16GX4MMA2133C13           | SS    |            |                  | 13-15-15-28 | 1.2v    | v | v | v   | v      |
| CORSAIR         | 4GB     | 1Rx8                      | CMK16GX4MMA2133C13B          | SS    |            |                  | 13-15-15-28 | 1.2v    | v | v | v   | v      |
| CORSAIR         | 4GB     | 1Rx8                      | CMK16GX4MMA2133C13R          | SS    |            |                  | 13-15-15-28 | 1.2v    | v | v | v   | v      |
| CORSAIR         | 4GB     | 1Rx8                      | CMD16GX4MMA2133C10           | SS    |            |                  | 10-12-12-31 | 1.35v   | v | v | v   | v      |
| CORSAIR         | 8GB     | 2Rx8                      | CMK8GX4MMA2133C13            | DS    |            |                  | 13-15-15-28 | 1.2v    | v | v | v   | v      |
| CORSAIR         | 8GB     | 1Rx8                      | CMV8GX4M1A2133C15-ESS        | SS    | Samsung    |                  | C15         | 1.2v    | v | v | v   | v      |
| CORSAIR         | 8GB     | 2Rx8                      | CMD32GX4MMA2133C10           | DS    |            |                  | 10-12-12-31 | 1.35v   | v | v | v   | v      |
| CORSAIR         | 16GB    | 2Rx8                      | CMV16GX4M1A2133C15           | DS    |            |                  | C15         | 1.2v    | v | v | v   | v      |
| CORSAIR         | 16GB    | 2Rx8                      | CMK32GX4MMA2133C13           | DS    |            |                  | 13-15-15-28 | 1.2v    | v | v | v   | v      |
| CORSAIR         | 16GB    | 2Rx8                      | CMK128GX4MMA2133C13          | DS    |            |                  | 13-15-15-28 | 1.2v    | v | v | v   | v      |
| G.SKILL         | 4GB     | 1Rx8                      | F4-2133C15Q-16GRR            | SS    | Micron     |                  | 15-15-15-35 | 1.2v    | v | v | v   | v      |
| G.SKILL         | 8GB     | 2Rx8                      | F4-2133C15Q-32GRR            | DS    | Micron     |                  | 15-15-15-35 | 1.2v    | v | v | v   | v      |
| G.SKILL         | 8GB     | 1Rx8                      | F4-2133C15S-8GIS             | SS    |            |                  | 15-15-15-35 | 1.2v    | v | v | v   | v      |
| Apacer          | 4GB     | 1Rx8                      | AU04GGB13CDTBGH              | SS    |            |                  | CL15        | 1.2v    | v | v | v   | v      |
| Apacer          | 8GB     | 2Rx8                      | AU08GGB13CDYBGH              | DS    |            |                  | CL15        | 1.2v    | v | v | v   | v      |
| CRUCIAL         | 4GB     | 1Rx8                      | CT4G4DFS8213.C8FAR1          | SS    | Micron     |                  | CL15        | 1.2v    | v | v | v   | v      |
| CRUCIAL         | 4GB     | 1Rx8                      | CT4G4WFS8213.9FA1            | SS    | Micron     |                  | CL15        | 1.2v    | v | v | v   | v      |
| CRUCIAL         | 4GB     | 1Rx8                      | CT4G4DFS8213.8FA2            | SS    | Micron     |                  | CL15        | 1.2v    | v | v | v   | v      |
| CRUCIAL         | 8GB     | 2Rx8                      | CT8G4WFD8213                 | DS    | Micron     |                  | CL15        | 1.2v    | v | v | v   | v      |
| CRUCIAL         | 8GB     | 2Rx8                      | CT8G4DFD8213.16FA2           | DS    | Micron     |                  | CL15        | 1.2v    | v | v | v   | v      |
| CRUCIAL         | 8GB     | 2Rx8                      | CT8G4DFD8213.C16FAR11        | DS    | Micron     |                  | CL15        | 1.2v    | v | v | v   | v      |
| CRUCIAL         | 8GB     | 1Rx8                      | CT8G4DFS8213.8FB1            | SS    | Micron     |                  | CL15        | 1.2v    | v | v | v   | v      |
| CRUCIAL         | 16GB    | 2Rx8                      | CT16G4DFD8213.16FB1          | DS    | Micron     |                  | CL15        | 1.2v    | v | v | v   | v      |
| GEIL            | 4GB     | 1Rx8                      | GPR416GB2133C15QC            | SS    |            |                  | 15-15-15-36 | 1.2v    | v | v | v   | v      |
| GLOWAY          | 4GB     | 1Rx8                      | 4G-2133                      | SS    |            |                  | 15-15-15-35 | 1.2v    | v | v | v   | v      |
| Silicon POWER   | 4GB     | 1Rx8                      | SP004GBLFU213N01             | SS    | Samsung    |                  | CL15        | 1.2v    | v | v | v   | v      |
| Silicon POWER   | 8GB     | 2Rx8                      | SP008GBLFU213N01             | DS    | Samsung    |                  | CL15        | 1.2v    | v | v | v   | v      |
| KLEVV           | 4GB     | 1Rx8                      | KM4B4GX1N-2133-15-15-15-35-0 | SS    |            |                  | 15-15-15-35 | 1.2v    | v | v | v   | v      |
| KLEVV           | 8GB     | 1Rx8                      | KM4B8GX1N-2133-15-15-15-35-0 | SS    |            |                  | 15-15-15-35 | 1.2v    | v | v | v   | v      |
| KLEVV           | 16GB    | 2Rx8                      | KM4B16X1N-2133-15-15-15-35-0 | DS    |            |                  | 15-15-15-35 | 1.2v    | v | v | v   | v      |
| Team            | 8GB     | 2Rx8                      | TED432G2133C15QC01           | DS    | SKhynix    | H5AN4G8NMFR 523V | 15-15-15-36 | 1.2v    | v | v | v   | v      |
| Team            | 8GB     | 2Rx8                      | TPRD432G2133HC15QC01         | DS    | SKhynix    | H5AN4G8NMFR 523V | 15-15-15-36 | 1.2v    | v | v | v   | v      |
| Team            | 8GB     | 2Rx8                      | TPD432G2133HC15QC01          | DS    | SKhynix    | H5AN4G8NMFR 523V | 15-15-15-36 | 1.2v    | v | v | v   | v      |
| Team            | 8GB     | 2Rx8                      | TED416G2133C15DC01           | DS    | SKhynix    | H5AN4G8NMFR 523V | 15-15-15-36 | 1.2v    | v | v | v   | v      |
| Team            | 8GB     | 2Rx8                      | TPRD416G2133HC15DC01         | DS    | SKhynix    | H5AN4G8NMFR 523V | 15-15-15-36 | 1.2v    | v | v | v   | v      |
| Team            | 8GB     | 2Rx8                      | TPD416G2133HC15DC01          | DS    | SKhynix    | H5AN4G8NMFR 523V | 15-15-15-36 | 1.2v    | v | v | v   | v      |
| Team            | 8GB     | 2Rx8                      | TED48G2133C1501              | DS    | SKhynix    | H5AN4G8NMFR 523V | 15-15-15-36 | 1.2v    | v | v | v   | v      |
| Team            | 8GB     | 2Rx8                      | TPRD48G2133HC1501            | DS    | SKhynix    | H5AN4G8NMFR 523V | 15-15-15-36 | 1.2v    | v | v | v   | v      |
| Team            | 8GB     | 2Rx8                      | TPD48G2133HC1501             | DS    | SKhynix    | H5AN4G8NMFR 523V | 15-15-15-36 | 1.2v    | v | v | v   | v      |
| Team            | 16GB    | 2Rx8                      | TED464G2133C15QC01           | DS    | SKhynix    | H5AN4G8NMFR 523V | 15-15-15-36 | 1.2v    | v | v | v   | v      |
| Team            | 16GB    | 2Rx8                      | TPRD464G2133HC15QC01         | DS    | SKhynix    | H5AN4G8NMFR 523V | 15-15-15-36 | 1.2v    | v | v | v   | v      |
| Team            | 16GB    | 2Rx8                      | TPD464G2133HC15QC01          | DS    | SKhynix    | H5AN4G8NMFR 523V | 15-15-15-36 | 1.2v    | v | v | v   | v      |
| Team            | 16GB    | 2Rx8                      | TED432G2133C15DC01           | DS    | SKhynix    | H5AN4G8NMFR 523V | 15-15-15-36 | 1.2v    | v | v | v   | v      |
| Team            | 16GB    | 2Rx8                      | TPRD432G2133HC15DC01         | DS    | SKhynix    | H5AN4G8NMFR 523V | 15-15-15-36 | 1.2v    | v | v | v   | v      |
| Team            | 16GB    | 2Rx8                      | TPD432G2133HC15DC01          | DS    | SKhynix    | H5AN4G8NMFR 523V | 15-15-15-36 | 1.2v    | v | v | v   | v      |
| Team            | 16GB    | 2Rx8                      | TED416G2133C1501             | DS    | SKhynix    | H5AN4G8NMFR 523V | 15-15-15-36 | 1.2v    | v | v | v   | v      |
| Team            | 16GB    | 2Rx8                      | TPRD416G2133HC1501           | DS    | SKhynix    | H5               |             |         |   |   |     |        |