

# Intel Platform Memory Operations

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### DDR3L 1600 SoDIMM Validation Results

Listed below are the results from a small sample of DDR3L 1600 SoDIMM modules tested on Intel reference mobile platforms based on Intel® 4<sup>th</sup> Gen Intel® Core™ i7 processors (codename Haswell). We are providing this information as a guide to module performance with Intel® reference platforms. This testing is not intended to replace the normal OEM component qualification process. For results on specific Intel® motherboards or OEM production motherboards, please refer to the OEM's list of qualified memory suppliers.

#### DDR3L-1600 (11-11-11) SoDIMM, 1DIMM/ch, 2 channels, tested at 1.35V Vdd

DIMM Supplier	DIMM Part Number	DIMM Size	Native Voltage	Raw Card	DRAM Supplier	DRAM Part Number	DRAM Density	DRAM Width	DRAM DateCode	Tested Speed
Crucial	CT102464BF160B.16FED	8GB	DDR3L	F	Micron	MT41K512M8RH-125:E	4Gb	x8	1242	1600 CL11
Crucial	CT51264BF160BJ.8FED	4GB	DDR3L	B	Micron	MT41K512M8RH-125:E	4Gb	x8	1242	1600 CL11
Crucial	CT25664BT160BJ.4FED	2GB	DDR3L	C	Micron	MT41K256M16HA-125 M:E	4Gb	x16	1242	1600 CL11
Crucial	CT25664BF160BJ.4FED	2GB	DDR3L	C	Micron	MT41K256M16HA-125:E	4Gb	x16	1242	1600 CL11
Elpida	EBJ81UG8EFU0-GNL-F	8GB	DDR3L	F	Elpida	EDJ4208EFBG-GNL-F	4Gb	x8	1242	1600 CL11
Elpida	EBJ81UG8EFU0-GN-F	8GB	DDR3L	F	Elpida	EDJ4208EFBG-GN-F	4Gb	x8	1228	1600 CL11
Elpida	EBJ41UG6EFU0-GNL-F	4GB	DDR3L	A	Elpida	EDJ4216EFBG-GNL-F	4Gb	x16	1251	1600 CL11

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DIMM Supplier	DIMM Part Number	DIMM Size	Native Voltage	Raw Card	DRAM Supplier	DRAM Part Number	DRAM Density	DRAM Width	DRAM DateCode	Tested Speed
Elpida	EBJ41UG6EFU0-GN-F	4GB	DDR3L	A	Elpida	EDJ4216EFBG-GN-F	4Gb	x16	1228	1600 CL11
Elpida	EBJ40UG8EFU0-GNL-F	4GB	DDR3L	B	Elpida	EDJ4208EFBG-GNL-F	4Gb	x8	1242	1600 CL11
Elpida	EBJ40UG8EFU0-GN-F	4GB	DDR3L	B	Elpida	EDJ4208EFBG-GN-F	4Gb	x8	1229	1600 CL11
Kingston	KVR16LS11/8	8GB	DDR3L	F	SK hynix	H5TC4G83AFR-PBA	4Gb	x8	1246	1600 CL11
Kingston	KVR16LS11S8/4	4GB	DDR3L	B	SK hynix	H5TC4G83AFR-PBA	4Gb	x8	1246	1600 CL11
Micron	MT16KTF1G64HZ-1G6N1	8GB	DDR3L	F	Micron	MT41K512M8RG-107:N	4Gb	x8	1408	1600 CL11
Micron	MT16MTF1G64HZ-1G6E1	8GB	DDR3L	F	Micron	MT41K512M8RH-125 M:E	4Gb	x8	1244	1600CL11
Micron	MT16KTF1G64HZ-1G6E1	8GB	DDR3L	F	Micron	MT41K512M8RH-125:E	4Gb	x8	1242	1600 CL11
Micron	MT8KTF51264HZ-1G6N1	4GB	DDR3L	B	Micron	MT41K512M8RG-107:N	4Gb	x8	1408	1600 CL11
Micron	MT8KTF51264HZ-1G6E1	4GB	DDR3L	B	Micron	MT41K512M8RH-125:E	4Gb	x8	1242	1600 CL11
Micron	MT8MTF51264HZ-1G6E1	4GB	DDR3L	B	Micron	MT41K512M8RH-125 M:E	4Gb	x8	1228	1600CL11
Micron	MT4MTF25664HZ-1G6E1	2GB	DDR3L	C	Micron	MT41K256M16HA-125 M:E	4Gb	x16	1242	1600 CL11
Micron	MT4KTF25664HZ-1G6E1	2GB	DDR3L	C	Micron	MT41K256M16HA-125:E	4Gb	x16	1242	1600 CL11
Micron	MT8KTF25664HZ-1G6K1	2GB	DDR3L	B	Micron	MT41K256M8DA-125:K	2Gb	x8	1248	1600 CL11
Samsung	M471B1G73EB0-YK0	8GB	DDR3L	F	Samsung	K4B4G0846E-BYK0	4Gb	x8	1406	1600 CL11

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DIMM Supplier	DIMM Part Number	DIMM Size	Native Voltage	Raw Card	DRAM Supplier	DRAM Part Number	DRAM Density	DRAM Width	DRAM DateCode	Tested Speed
Samsung	M471B1G73QH0-YK0	8GB	DDR3L	F	Samsung	K4B4G0846Q-HYK0	4Gb	x8	1349	1600 CL11
Samsung	M471B1G73DB0-YK0	8GB	DDR3L	F	Samsung	K4B4G0846D-BYK0	4Gb	x8	1313	1600 CL11
Samsung	M471B1G73CB0-YK0	8GB	DDR3L	F	Samsung	K4B4G0846C-BYK0	4Gb	x8	1234	1600 CL11
Samsung	M471B5173CB0-YK0	4GB	DDR3L	B	Samsung	K4B4G0846C-BYK0	4Gb	x8	1234	1600 CL11
Samsung	M471B5173DB0-YK0	4GB	DDR3L	B	Samsung	K4B4G0846D-BYK0	4Gb	x8	1316	1600 CL11
Samsung	M471B5173QH0-YK0	4GB	DDR3L	B	Samsung	K4B4G0846Q-HYK0	4Gb	x8	1349	1600 CL11
Samsung	M471B5173EB0-YK0	4GB	DDR3L	B	Samsung	K4B4G0846E-BYK0	4Gb	x8	1404	1600 CL11
Samsung	M471B5773EB0-YK0	2GB	DDR3L	B	Samsung	K4B2G0846E-BYK0	2Gb	x8	1246	1600 CL11
Samsung	M471B5674QH0-YK0	2GB	DDR3L	C	Samsung	K4B4G1646Q-HYK0	4Gb	x16	1349	1600 CL11
SK hynix	HMT41GS6BFR8A-PB	8GB	DDR3L	F	SK hynix	H5TC4G83BFR-PBA	4Gb	x8	1430	1600 CL11
SK hynix	HMT41GS6AFR8A-PB	8GB	DDR3L	F	SK hynix	H5TC4G83AFR-PBA	4Gb	x8	1244	1600 CL11
SK hynix	HMT351S6EFR8A-PB	4GB	DDR3L	F	SK hynix	H5TC2G83EFR-PBA	2Gb	x8	1224	1600 CL11
SK hynix	HMT451S6AFR6R-PB	4GB	DDR3L	A	SK hynix	H5TC4G63AFR-PBR	4Gb	x16	1246	1600 CL11
SK hynix	HMT451S6AFR6A-PB	4GB	DDR3L	A	SK hynix	H5TC4G63AFR-PBA	4Gb	x16	1244	1600 CL11
SK hynix	HMT451S6BFR8A-PB	4GB	DDR3L	B	SK hynix	H5TC4G83BFR-PBA	4Gb	x8	1430	1600 CL11

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DIMM Supplier	DIMM Part Number	DIMM Size	Native Voltage	Raw Card	DRAM Supplier	DRAM Part Number	DRAM Density	DRAM Width	DRAM DateCode	Tested Speed
SK hynix	HMT451S6AFR8R-PB	4GB	DDR3L	B	SK hynix	H5TC4G83AFR-PBR	4Gb	x8	1246	1600 CL11
SK hynix	HMT451S6AFR8A-PB	4GB	DDR3L	B	SK hynix	H5TC4G83AFR-PBA	4Gb	x8	1244	1600 CL11
SK hynix	HMT425S6AFR6R-PB	2GB	DDR3L	C	SK hynix	H5TC4G63AFR-PBR	4Gb	x16	1246	1600 CL11
SK hynix	HMT425S6AFR6A-PB	2GB	DDR3L	C	SK hynix	H5TC4G63AFR-PBA	4Gb	x16	1244	1600 CL11
SK hynix	HMT325S6EFR8A-PB	2GB	DDR3L	B	SK hynix	H5TC2G83EFR-PBA	2Gb	x8	1301	1600 CL11

Created on Sep 4<sup>th</sup>, 2014

### Approved test labs

The following test labs have the capability of performing DDR3L SoDIMM system-level testing. For further information, please contact:

### Advanced Validation Labs

Attn: Rhonda Duda, Program Manager  
 17665B Newhope Street  
 Fountain Valley, CA 92708  
 USA Phone: 714-438-2787  
[rduda@validationlabs.com](mailto:rduda@validationlabs.com)



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