

MT46H64M32LFBQ-48IT:C Vs AS4C64M32MD1A-5BIN

Datasheet Comparison

Description	MT46H64M32LFBQ-48IT	AS4C64M32MD1A-5BIN	Compare result
Manufacturer	Micron	Alliance	
Product Description	2Gb LPDDR SDRAM	2Gb LPDDR SDRAM	Same
Organization	(16Meg x 32 x 4 banks)	(16Meg x 32 x 4 banks)	Same
Row Address	A[0:13]	A[0:13]	Same
Column Address	A[0:9]	A[0:9]	Same
Core Voltage range	1.8V (1.70 to 1.95V)	1.8V (1.70 to 1.95V)	Same
IO Voltage range	1.8V (1.70 to 1.95V)	1.8V (1.70 to 1.95V)	Same
Operating Temp	-40C to 85C	-40C to 85C	Same
Clock Freq. range (MHz)	83.3Mhz @ CL2 208Mhz (Max) @ CL3	83.3Mhz @ CL2 200Mhz (Max) @ CL3	Same
Absolute Maximum Rating	VDD/Q=2.4V	VDD/Q=2.7V	Gap
Storage Temperature	-55C ~ 150C	-55C ~ 150C	Same
VIH(Min.)/VIL(Max.)	Address: 0.8VDDQ/0.2VDDQ Data Pins: 0.7VDDQ/0.3VDDQ	Address: 0.8VDDQ/0.2VDDQ Data Pins: 0.7VDDQ/0.3VDDQ	Same
VOH(Min.) / VOL(Max.)	0.9VDDQ/0.1VDDQ @ +/-0.1ma	0.9VDDQ/0.1VDDQ @ +/-0.1ma	Same
Input / Output Capacitance	DQ/DQS = 2.5pf (Max.)	DQ/DQS = 4.5pf (Max.)	Gap
tRC	52.8ns (Min.)	55ns (Min.)	Gap
tRCD	14.4ns (Min.)	15ns (Min.)	Gap
tREF	64ms (Max.)	64ms (Max.)	Same
IDD0	75mA	70mA	Gap
IDD2P/2PS	900uA	1.0mA	Gap
IDD2N/2NS	15mA / 9mA	8mA / 4mA	Gap
IDD3P / 3PS	5mA	6mA / 5mA	Gap
IDD3N/3NS	17mA / 14mA	15mA/10mA	Gap
IDD4R/4W	90mA	100mA / 90mA	Gap
IDD5	170mA (@tRFC=138ns)	250mA (@tRFC=140ns)	Gap
Self-Refresh Current IDD6	2000uA (Full Array @ 85C) 1450uA (1/2 Array @ 85C) 1230uA (1/4 Array @ 85C)	2000uA (Full Array @ 85C) 1400uA (1/2 Array @ 85C) 1200uA (1/4 Array @ 85C)	Gap
IDD8	15uA	10uA	Gap
Package	90ball VFBGA	90ball FPBGA	Same
Package dimensions (mm)	8mm x 13mm	8mm x 13mm	Same
Pin to Pin Compatible	Yes	Yes	Same