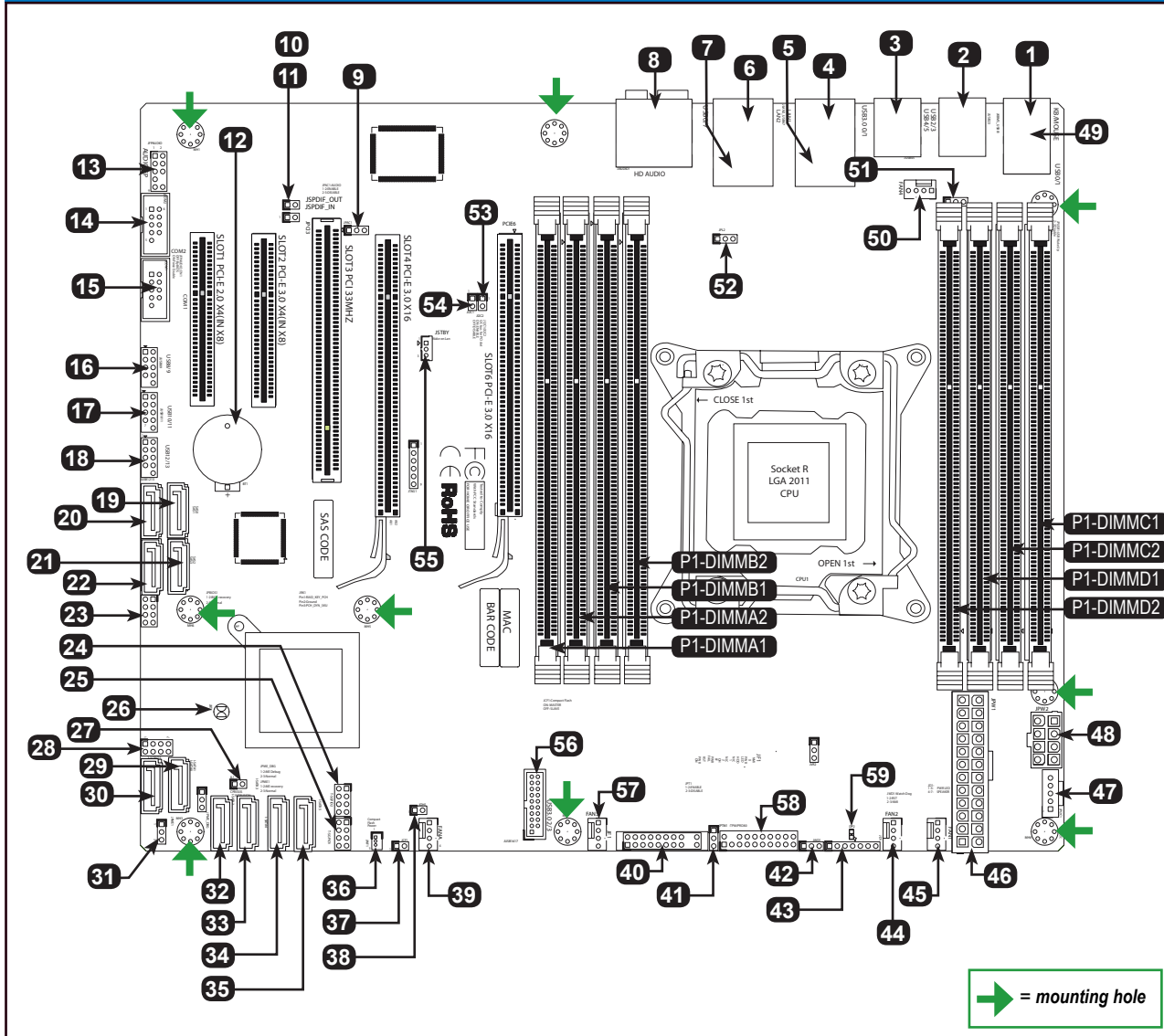


Motherboard Layout and Features



Jumpers, Connectors and LED Indicators

Jumpers			
9	JPAC1	Audio Enable	Pins 1-2 (Enabled)
31	JPME1	Intel ME Mode Select	Pins 1-2 (Normal)
26	JBT1	CMOS Clear	Short contact pads to reset CMOS
37	JCF1	CF Card Master/Slave Select	On (Master)
41	JPT1	TPM Enable	Pins 1-2 (Enabled)
42	JWD1	Watch Dog Reset	Pins 1-2 (Reset)
51	JPUSB1	USB Wake-up Enable	Pins 1-2 (Enabled)
52	JPL2	LAN2 Enable/Disable	Pins 1-2 (Enabled)
53,54	JI2C2/JI2C1	SMB to PCI Slots	On (Enabled)

Connectors		
1	JKBMS1	Combination PS/2 Keyboard/Mouse Port
2,3,7,49	USB 0/1, 2/3, 4/5, 6/7, 0/1	Back Panel USB 2.0 Ports
4,6	LAN1, LAN2	Gb Ethernet LAN Ports (LAN1 & LAN2)
5	USB 3.0 0/1	Back Panel USB 3.0 Ports
8	HD Audio	High Definition (HD) Audio output jacks
10,11	JSPDIF OUT/IN	SP/DIF Audion In/Out Headers
12	BT1	System Battery
13	AUDIO FP	Front Panel Audio Header
14,15	COM2, COM1	COM1 & COM2 Serial Port Headers
16,17,18	USB 8/9, 10/11, 12/13	USB 2.0 Headers for front panel access
19,20,21,22	SAS0-SAS3	SATA 2.0 (3Gb/sec)
23,28	3-SGPIO1, 3-SGPIO2	Serial General Purpose I/O Headers for SAS
24,25	T-SGPIO2, T-SGPIO1	Serial Link General Purpose I/O Headers
27	JL1	Chassis Intrusion Header
29,30	I-SATA1, I-SATA0	Serial ATA ports (SATA 3.0), 6Gb/s
32,33,34,35	I-SATA2-5	Serial ATA ports (SATA 2.0), 3Gb/s
36	JWF1	SATA DOM (Disk On Module) Power Connector
38	JOH1	Overheat LED/Fan Fail
39,45,44,50,57	FAN A,1,2,4,3	Internal Fan Headers
40	JF1	Front Panel Control Header
43	JD1	Power LED / Speaker Header (Pins 4-7: External Speaker)
46	JPW1	24-pin Main ATX Power Connector
47	JPI2C1	Power Supply SMBus I2C Header
48	JPW2	8-pin Secondary Power Connector
55	JSTBY	Legacy Wake On LAN Header
56	JUSB2/3 (USB 3.0)	USB 3.0 Header for USB 2/3
58	JTPM1	Trusted Platform Module (TPM) Header

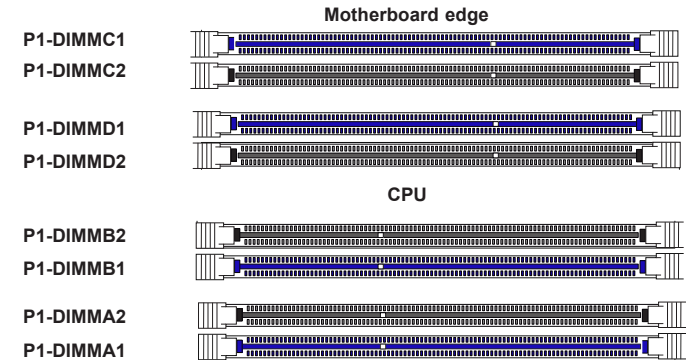
LED Indicators			
59	DP2	Power On LED	Green: Solid On System is On

Memory Support

The X9SRA motherboard series supports up to 256GB of 1600/1066/1333 MHz ECC/Non-ECC DDR3 DIMMs in eight (8) memory slots (UDIMM/RDIMM).

Note: For memory optimization, use only DIMM modules that have been validated by Supermicro. For the latest memory updates, please refer to our website at <http://www.supermicro.com/products/motherboard>.

DIMM Memory Installation



Memory Population Guidelines

When installing memory modules, the DIMM slots should be populated in the following order: P1-DIMMA1, P1-DIMMB1, P1-DIMMC1, P1-DIMMD1 then P1-DIMMA2, P1-DIMMB2, P1-DIMMC2, P1-DIMMD2.

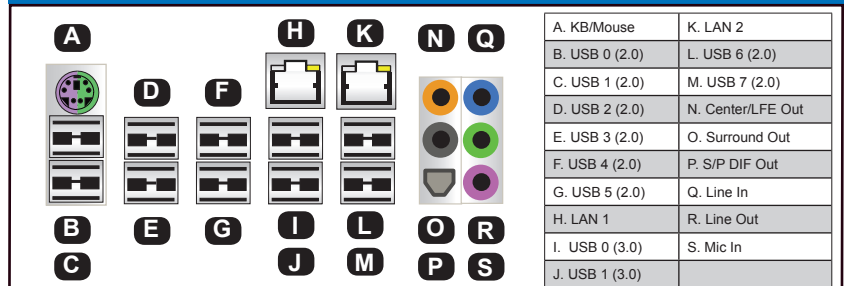
- Always use DDR3 DIMM modules of the same size, type and speed.
- Mixed DIMM speeds can be installed. However, all DIMMs will run at the speed of the slowest DIMM.
- The motherboard will support odd-numbered modules installed (1, 3, 5, or 7 modules). However, for best memory performance, install DIMM modules in pairs.

Recommended Population (Balanced)

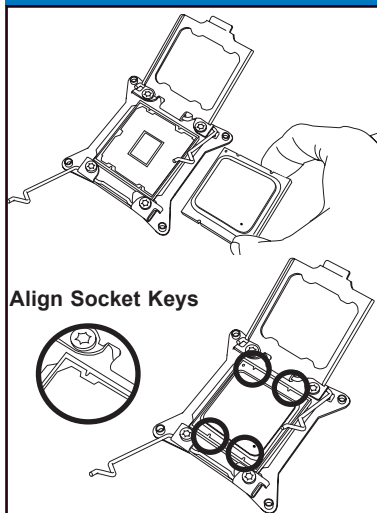
P1-DIMMA1	P1-DIMMB1	P1-DIMMC1	P1-DIMMD1	P1-DIMMA2	P1-DIMMB2	P1-DIMMC2	P1-DIMMD2	Total
2GB	2GB							4GB
2GB	2GB	2GB	2GB					8GB
2GB	2GB	2GB	2GB	2GB	2GB			12GB
2GB	2GB	2GB	2GB	2GB	2GB	2GB	2GB	16GB
4GB	4GB							8GB
4GB	4GB	4GB	4GB					16GB
4GB	4GB	4GB	4GB	4GB	4GB			24GB
4GB	4GB	4GB	4GB	4GB	4GB	4GB	4GB	32GB

Note: Up to 256GB of memory are supported. See chapter 2 of the User Manual for complete memory population information.

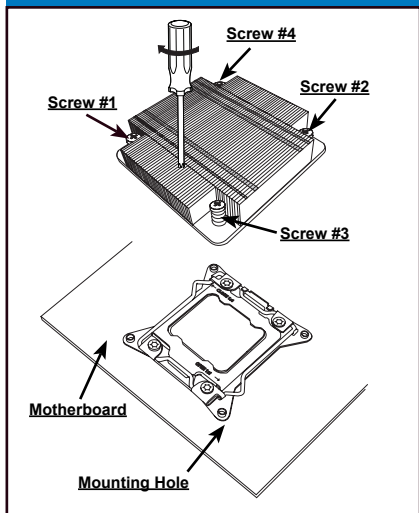
Back Panel IO Connectors



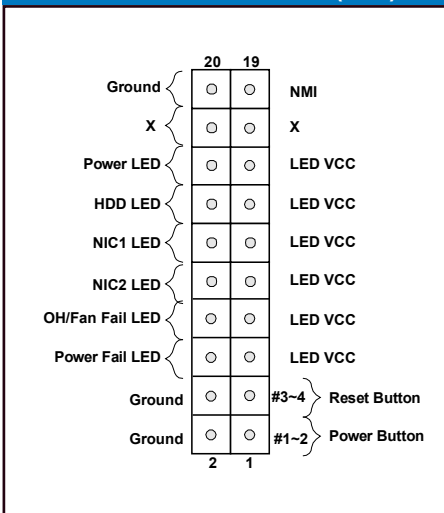
CPU Installation



Heatsink Installation



Front Panel Control (JF1)



Note: Graphics shown in this quick reference guide are for illustration only. Your components may or may not look exactly the same as drawings shown in this guide.

Note: Refer to Chapter 2 of the User Manual for detailed information on jumpers, connectors, and LED indicators.

Note: Refer to Chapter 2 of the User Manual for detailed information on memory support and CPU/motherboard installation instructions.