SUPERMICRO®

X11DPH-i/T/Tq

Quick Reference Guide Rev. 1.0c

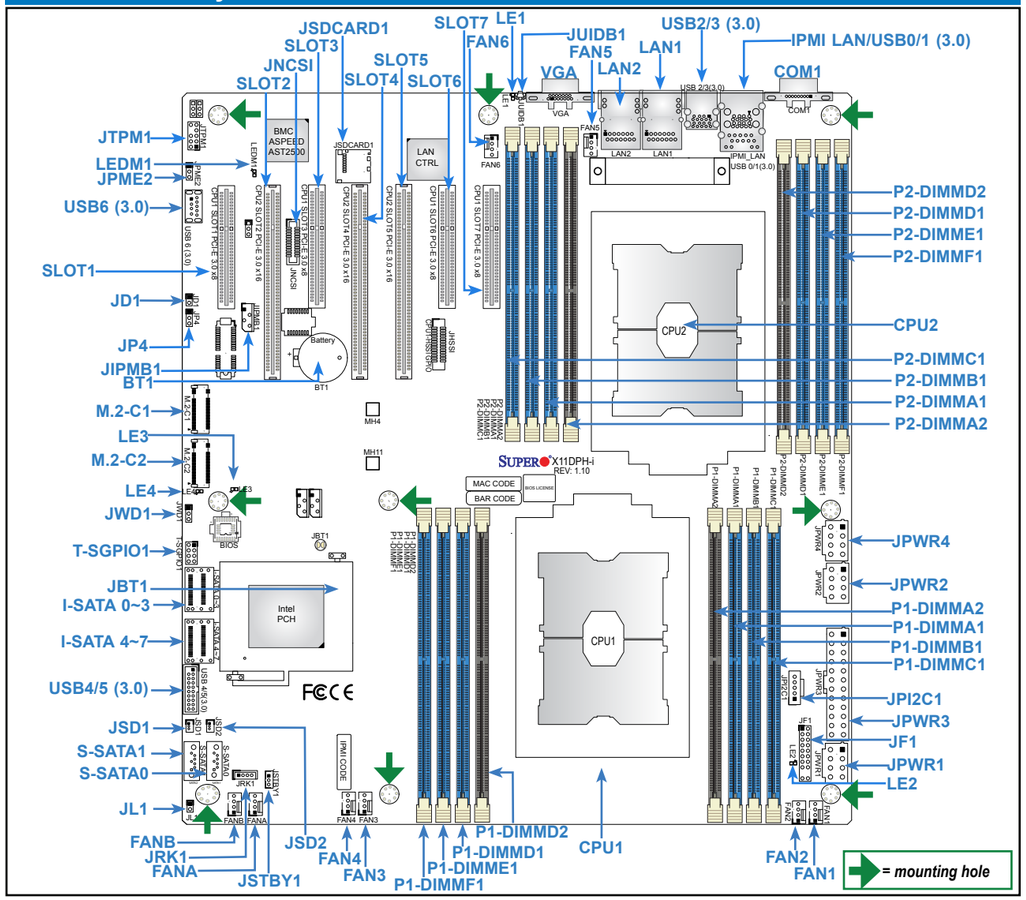
Contact Information
- Website: www.supermicro.com
- General Information: marketing@supermicro.com
- Technical Support: support@supermicro.com
- Phone: +1 (408) 503-8000, Fax: +1 (408) 503-8008

For your system to work properly, please download appropriate drivers/images/user's manual from the links below:
- Manuals: http://www.supermicro.com/support/manuals
- Drivers & Utilities: http://www.supermicro.com/wftp
- Safety: http://www.supermicro.com/about/policies/safety_information.cfm

Package Contents
- One (1) Supermicro Motherboard
- Two (2) SATA Cables CBL-0044L (x2)
- One (1) I/O Shield MCP-260-00042-ON

WARNING: This product can expose you to chemicals including lead, known to the State of California to cause cancer and birth defects or other reproductive harm. For more information, go to www.P65Warnings.ca.gov.

Motherboard Layout and Features



Jumpers/Connectors/LED Indicators

Jumper	Description	Default Setting
JBT1	CMOS Clear	Open (Normal)
JPME2	ME Manufacturing Mode	Pins 1-2 (Normal)
JWD1	Watch Dog Timer Enable	Pins 1-2 (Reset)

Component	Description
BT1	Onboard CMOS battery
COM1	COM port on the I/O back panel
FAN1~6, FANA/FANB	System/cooling fan headers
IPMI_LAN	Dedicated IPMI LAN port
I-SATA0~3, I-SATA4~7	SATA 3.0 ports supported by the Intel PCH
JD1	Speaker/buzzer header (used in conjunction with an external speaker/buzzer) (optional)
JF1	Front control panel header
JIPMB1	4-pin external I²C header (for an IPMI card)
JL1	Chassis intrusion header (**Note:** Please connect a cable from the Chassis Intrusion header at JL1 to the chassis to receive an alert via IPMI.)
JNCSI	Network Controller Sideband Interface (NCSI) header
JPI²C1	Power I²C System Management Bus (SMBus) header
JPWR1, JPWR2, JPWR4	8-pin power supply connectors
JPWR3	24-pin ATX main power supply connector
JRK1	Intel VROC RAID key for NVMe SSD
JSD1, JSD2	SATA DOM (Device-on-Module) power connectors
JSDCARD1	Micro SD card slot
JSTBY1	Standby power header
JTPM1	Port 80 connector for Trusted Platform Module (TPM)
JUIDB1	Unit Identifier (UID) switch
LAN1, LAN2	10GbE LAN ports (for the X11DPH-T(q)) and Gigabit LAN ports (for the X11DPH-i)
M.2-C1, M.2-C2	PCIE M.2 slots
MH4, MH11	M.2 mounting holes
SLOTS 1/3/6/7	PCI-Express 3.0 x8 slots supported by CPU1
SLOTS 2/4/5	PCI-Express 3.0 x16 slots supported by CPU2
S-SATA0, S-SATA1	Powered SATA 3.0 ports with support of Supermicro SuperDOM (Disk-On-Module) devices
T-SGPIO1	Serial_Link General Purpose I/O (GPI/O) port
USB0/1, USB2/3	Back Panel Universal Serial Bus (USB) 3.0 ports
USB4/5	Internal USB 3.0 header with two USB (USB4/5) connections supported for front access
USB6	Type A USB 3.0 header for front access
VGA	VGA port

LED	Description	LED Status
LE1	UID (Unit Identifier) LED	Solid Blue: Unit identified
LE2	Onboard Power LED	On: Onboard power on
LE3	M.2-C1 Drive Activity Signal	Solid Green: Device Present
LE4	M.2-C2 Drive Activity Signal	Solid Green: Device Present
LEDM1	BMC Heartbeat LED	Blinking Green: BMC normal

CPU Support

This motherboard supports dual Intel Xeon Scalable-SP or 2nd Gen Intel Xeon Scalable-SP series processors with support of 3 UltraPath Interconnect (UPI) of 10.4GT/s.

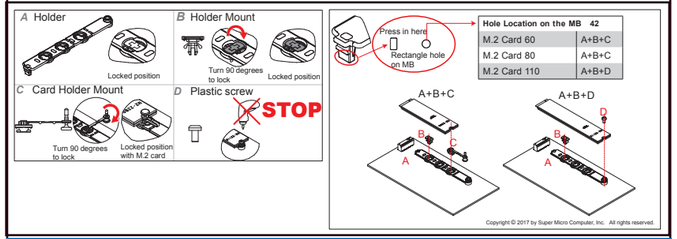
Memory Support

This motherboard supports up to 4TB of 3DS LRDIMM, LRDIMM, 3DS RDIMM, RDIMM, NV-DIMM DDR4 (288-pin) ECC 2933/2666/2400/2133 MHz memory modules in 16 slots. (**Notes**: **1**. Up to 5TB is supported with (L)RDIMM and DCPMM populated in a balanced memory configuration. **2**. 2933 MHz memory is supported by 2nd Gen Intel Xeon Scalable-SP(82xx/62xx) series processors only. **3**. Unbalanced memory configuration decreases memory performance and is not recommended.)

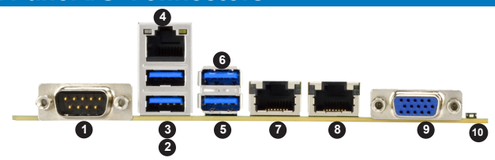
DIMM Population Table

When 1 CPU is used:	Memory Population Sequence
1 CPU & 1 DIMM	CPU1: P1-DIMMA1
1 CPU & 2 DIMMs	CPU1: P1-DIMMA1/P1-DIMMD1
1 CPU & 3 DIMMs	CPU1: P1-DIMMC1/P1-DIMMB1/P1-DIMMA1
1 CPU & 4 DIMMs	CPU1: P1-DIMMB1/P1-DIMMA1/P1-DIMMD1/P1-DIMME1
1 CPU & 5 DIMMs (Unbalanced: not recommended)	CPU1: P1-DIMMC1/P1-DIMMB1/P1-DIMMA1/P1-DIMMD1/P1-DIMME1
1 CPU & 6 DIMM	CPU1: P1-DIMMC1/P1-DIMMB1/P1-DIMMA1/P1-DIMMD1/P1-DIMME1/P1-DIMMF1
1 CPU & 7 DIMMs (Unbalanced: not recommended)	CPU1:P1-DIMMC1/P1-DIMMB1/P1-DIMMA1/P1-DIMMA2/P1-DIMMD1/P1-DIMME1/P1-DIMMF1
1 CPU & 8 DIMMs (Unbalanced: not recommended)	CPU1: P1-DIMMC1/P1-DIMMB1/P1-DIMMA1/P1-DIMMA2/P1-DIMMD2/P1-DIMMD1/P1-DIMME1/P1-DIMMF1
When 2 CPUs are used:	**Memory Population Sequence**
2 CPUs & 2 DIMMs	CPU1: P1-DIMMA1 CPU2: P2-DIMMA1
2 CPUs & 4 DIMMs	CPU1: P1-DIMMA1/P1-DIMMD1 CPU2: P2-DIMMA1/P2-DIMMD1
2 CPUs & 6 DIMMs	CPU1: P1-DIMMC1/P1-DIMMB1/P1-DIMMA1 CPU2: P2-DIMMC1/P2-DIMMB1/P2-DIMMA1
2 CPUs & 8 DIMMs	CPU1: P1-DIMMB1/P1-DIMMA1/P1-DIMMD1/P1-DIMME1 CPU2: P2-DIMMB1/P2-DIMMA1/P2-DIMMD1/P2-DIMME1
2 CPUs & 10 DIMMs	CPU1: P1-DIMMC1/P1-DIMMB1/P1-DIMMA1/P1-DIMMD1/P1-DIMME1/P1-DIMMF1 CPU2: P2-DIMMB1/P2-DIMMA1/P2-DIMMD1/P2-DIMME1
2 CPUs & 12 DIMMs	CPU1: P1-DIMMC1/P1-DIMMB1/P1-DIMMA1/P1-DIMMD1/P1-DIMME1/P1-DIMMF1 CPU2: P2-DIMMC1/P2-DIMMB1/P2-DIMMA1/P2-DIMMD1/P2-DIMME1/P2-DIMMF1
2 CPUs & 14 DIMMs (Unbalanced: not recommended)	CPU1: P1-DIMMC1/P1-DIMMB1/P1-DIMMA1/P1-DIMMA2/P1-DIMMD1/P1-DIMME1/P1-DIMMF1 CPU2: P2-DIMMC1/P2-DIMMB1/P2-DIMMA1/P2-DIMMA2/P2-DIMMD1/P2-DIMME1/P2-DIMMF1
2 CPUs & 16 DIMMs (Unbalanced: not recommended)	CPU1: P1-DIMMC1/P1-DIMMB1/P1-DIMMA1/P1-DIMMA2/P1-DIMMD2/P1-DIMMD1/P1-DIMME1/P1-DIMMF1 CPU2: P2-DIMMC1/P2-DIMMB1/P2-DIMMA1/P2-DIMMA2/P2-DIMMD2/P2-DIMMD1/P2-DIMME1/P2-DIMMF1

PCI-E M.2 Slot Installation

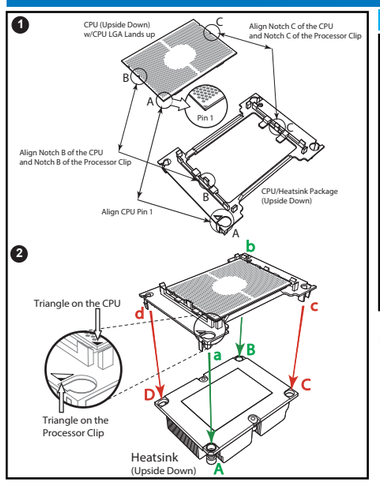


Back Panel I/O Connectors

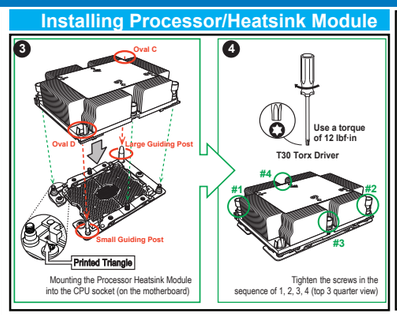


Back Panel I/O Ports			
1.	COM1	6.	USB 3 (USB 3.0)
2.	USB 0 (USB 3.0)	7.	GLAN1 (X11DPi-N), 10G_LAN1 (X11DPi-T/X11DPH-Tq)
3.	USB 1 (USB 3.0)	8.	GLAN2 (X11DPi-N), 10G_LAN2 (X11DPi-T/X11DPH-Tq)
4.	IPMI LAN	9.	VGA
5.	USB 2 (USB 3.0)	10.	Unit Identifier Switch (UID)

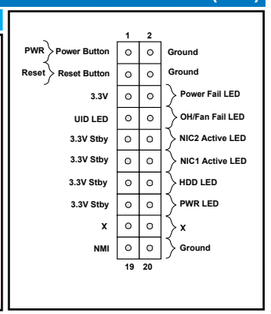
CPU/Heatsink Installation



Installing Processor/Heatsink Module



Front Control Panel (JF1)



***Notes**: 1. Please refer to Chapter 2 of the user's manual for detailed instructions of CPU/Heatsink and memory installation. 2. Please refer to our website at www.supermicro.com for CPU/Memory support updates. 3. All graphics shown in this quick reference guide are for illustration only. Your components may or may not look the same as the graphics shown in this quick reference guide.*

MNL-1912-QRG-10c