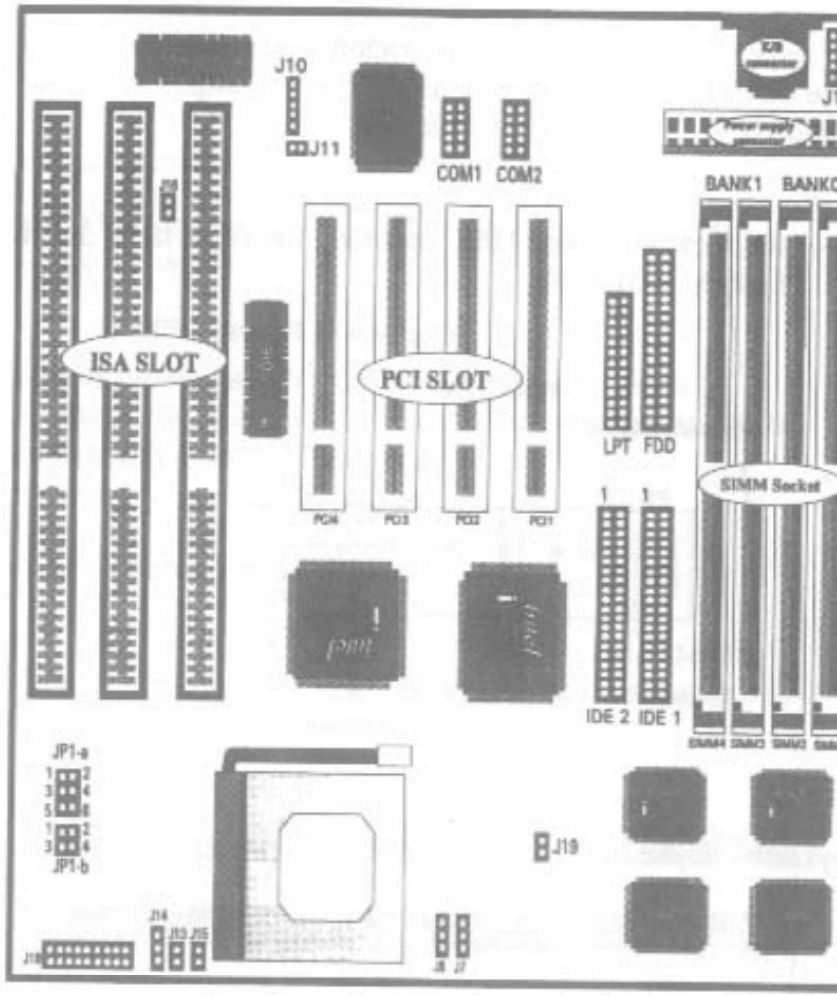
e A-5VX30S supports minimum of 8MB of system memory and
ximum of 128MB while L2 Cache can be 256KB/512KB
chronous SRAM Onboard with the COAST 3.0 "Cache-On-A-
ck" solution to increase system performance. (refer to Page
Cache Memory Configuration for the details.)

e A-5VX30S supports standard Fast Page, EDO(Extended Data
t or Hyper Page Mode) or synchronous DRAM. The A-5VX30S
vides four 72-pins SIMM sites for memory expansion. The
cket support 1M x 32 (4MB), 2M x32 (8MB), 4M x 32(16MB),
d 8M x 32(32MB) single-sided or double-sided memory
dules. The memory timing requires 70 ns Fast Page devices
60 ns EDO DRAM. Memory parity generation and checking is
supported. (DRAM Modules may be parity (x 36) or non-
ity (x32)).

e A-5VX30S supports Onboard two PCI IDE connectors, and
ects IDE harddisk type by BIOS utility automatic.

e A-5VX30S supports Award Plug & Play BIOS for the ISA and
I cards. The BIOS can be located in Flash EPROM . The
vantage of having Flash EPROM is much easier to replace BIOS
de if necessary.



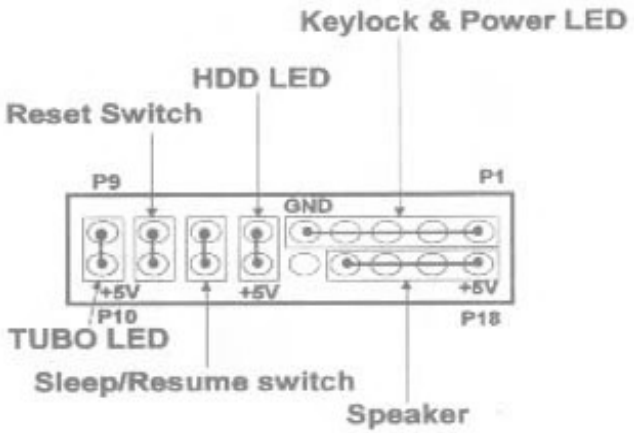
* The housing of IDE 1 & COM1 is white.
* The housing of IDE2 & COM2 is black

A-5VX30S Mainboard Layout

2 Connectors and Jumpers

is section describes all of the connectors and jumpers equipped the motherboard. Please refer to board layout page 5 for actual cation of each connector and jumper

8 - Keylock & Power LED, Speaker, Reset Switch, SMM Switch, HDD LED



eyLock - Keyboard lock switch & Power LED connector.

Pin	Description
1	Power LED(+)
2	N/C
3	GND
4	Keylock
5	GND

Speaker - Connect to the system's speaker for beeping

Pin	Description
1	Speaker
2	N/C
3	GND
4	GND

HDD LED indicator - LED ON when Onboard PCI IDE Harddisks activities.

Sleep/Resume switch - Close to enter sleep mode. A keystrobe or mouse movement (mouse driver exists). T system will instantly "wake up"

Reset - Close to restart system

Turbo LED indicator - LED ON when higher speed is selecte

J16

Description	J16
Close, CLK/4	
Open, CLK/3	

3 & J15

Description	J10
1.5x	
2.0x	
2.5x	
3.0x	
3.5x	

& J8 & J19

Description	J7,J8,J19
50 MHz	
55 MHz	
60 MHz	
66 MHz	
75 MHz	
83 MHz	

J1 - PS/2 Mouse Connector:

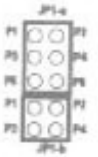
Pin	Description
1	RED wire
2	NC
3	Green wire
4	Yellow Wire
5	Blue Wire

J10 - IRDA/ASK IR Connector:

Pin	Description
1	VCC
2	NC
3	IRRX
4	GND
5	IRTX

J11 - CMOS Clean Jumper

JP1-a & JP1-b Voltage Select



	JP1-a, JP1-b	
Close		
3.6V	2-1	for AMD, Cyrix CPU
3.52V	4-3	for AMD, Cyrix CPU
3.3V	6-5	for P54C CPU
2.9V	2-1	for P55C, 6x86L, M2 CPU (MM
2.8V	4-3	for P55C, 6x86L, M2 CPU (MM

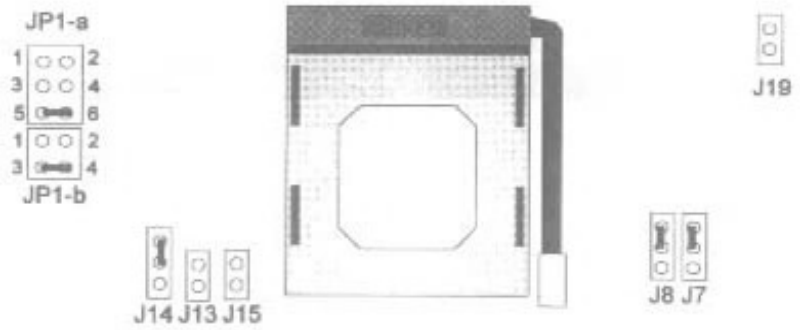
J6 - Power Connector

Description		Pin	Description
1	Power Good	7	Ground
2	+5V DC	8	Ground
3	+12V DC	9	-5V DC
4	-12V DC	10	+5V DC
5	Ground	11	+5V DC
6	Ground	12	+5V DC

ntel Pentium Processor Installation

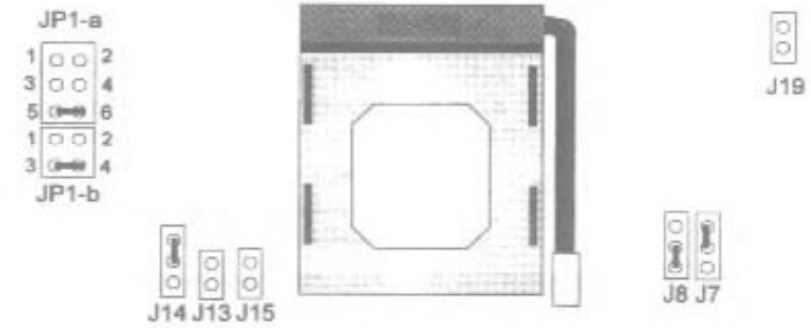
NTEL(P54C) 75 MHz CPU:

External Speed : 50MHz
Frequency Ratio : 1.5x



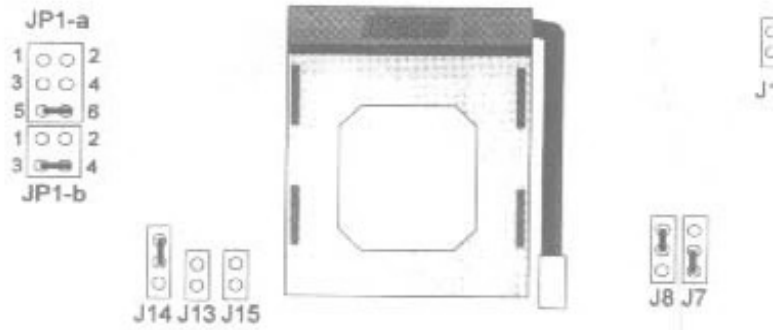
NTEL(P54C) 90 MHz CPU:

External Speed : 60MHz
Frequency Ratio : 1.5x



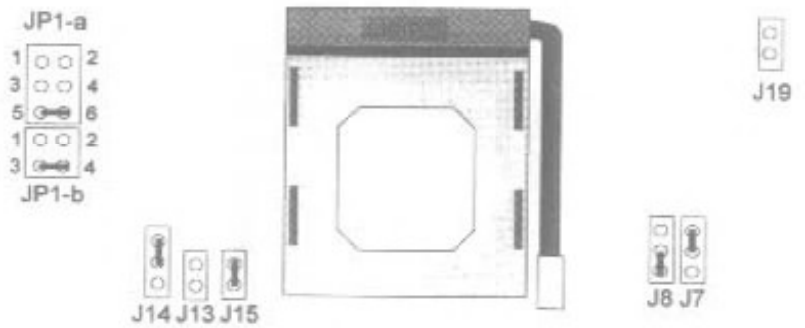
INTEL(P54C) 100 MHz CPU:

External Speed : 66MHz
Frequency Ratio : 1.5x



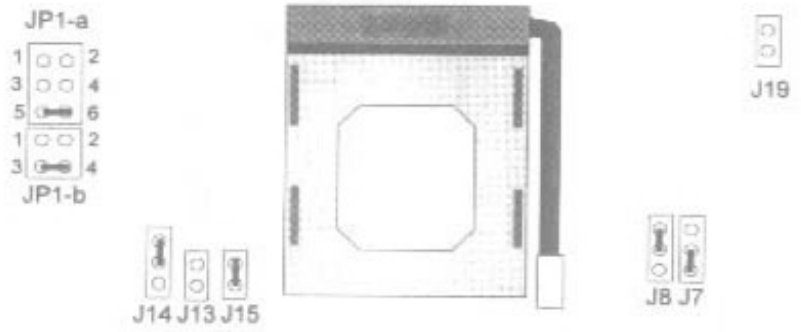
INTEL(P54C) 120 MHz CPU:

External Speed : 60MHz
Frequency Ratio : 2.0x



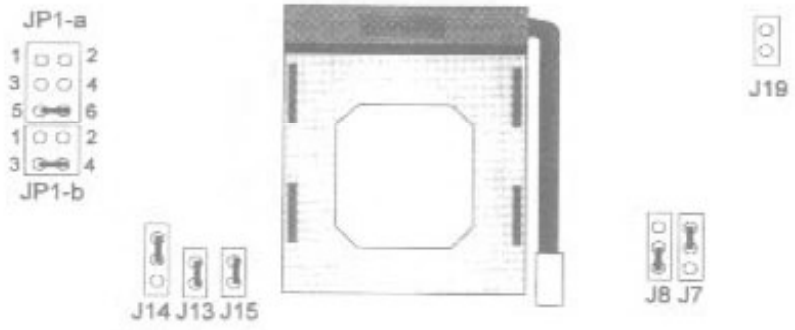
NTEL(P54C) 133 MHz CPU:

External Speed : 66MHz
Frequency Ratio : 2.0x



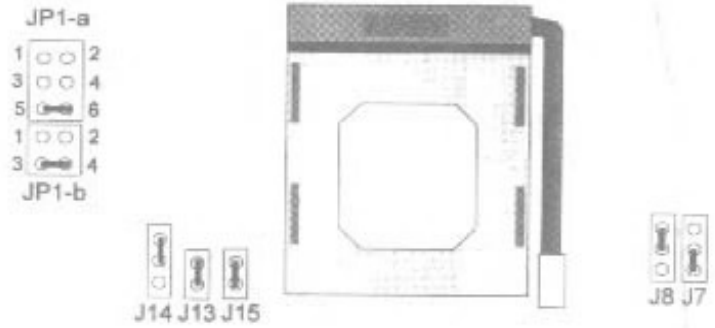
NTEL(P54C) 150 MHz CPU:

External Speed : 60MHz
Frequency Ratio : 2.5x



INTEL(P54C) 166 MHz CPU:

External Speed : 66MHz
Frequency Ratio : 2.5x

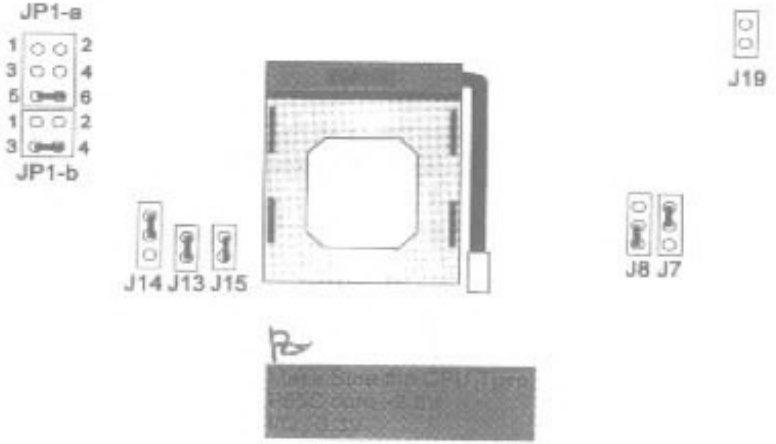


INTEL(P54C) 200 MHz CPU:

External Speed : 66MHz
Frequency Ratio : 3.0x

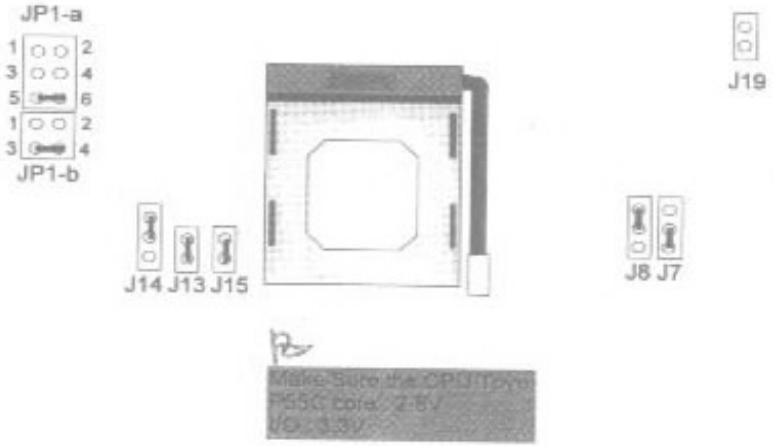
INTEL(P55C) 150 MHz CPU:

External Speed : 60MHz
Frequency Ratio : 2.5x



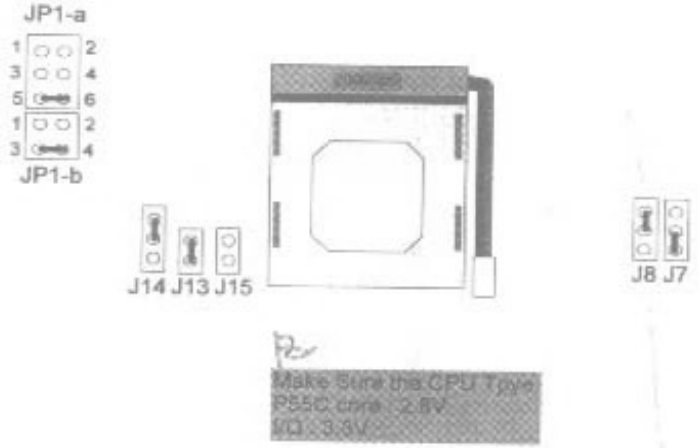
INTEL(P55C) 166 MHz CPU:

External Speed : 66MHz
Frequency Ratio : 2.5x



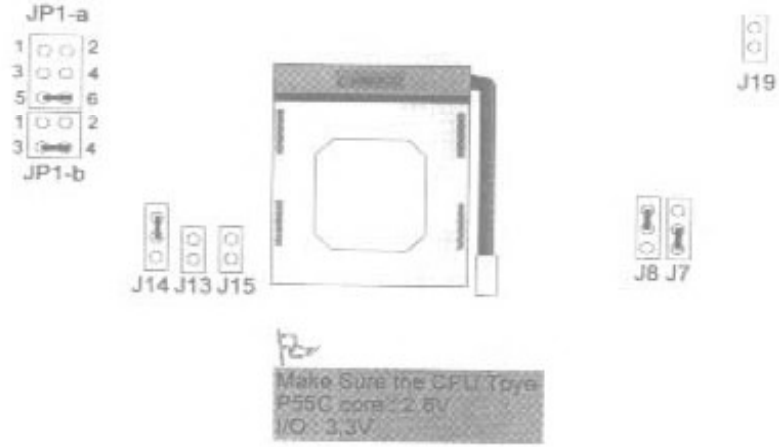
INTEL(P55C) 200 MHz CPU:

External Speed : 66MHz
Frequency Ratio : 3.0x



INTEL(P55C) 233 MHz CPU:

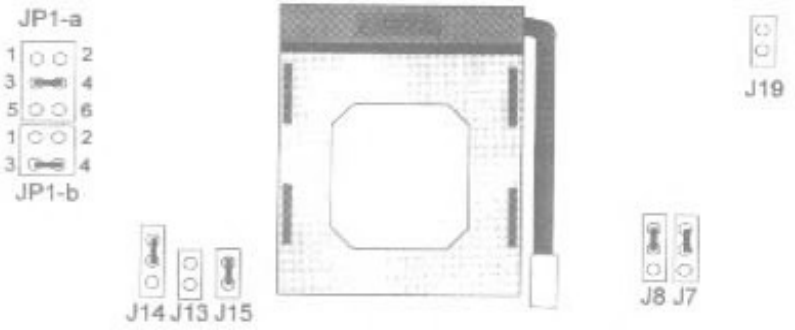
External Speed : 66MHz
Frequency Ratio : 3.5x



Cyrix (6x86) Installation:

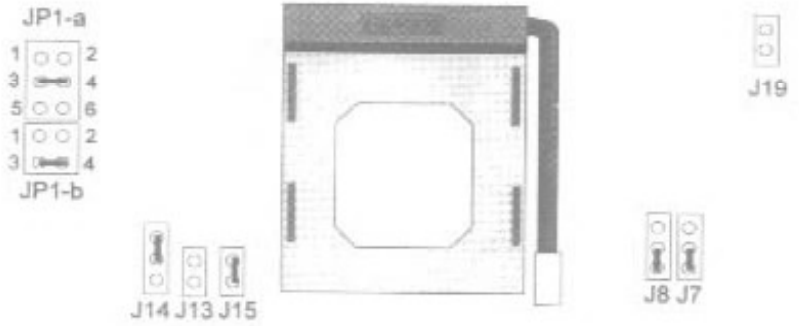
Cyrix (P120+) : 100 MHz

External Speed : 50MHz
Frequency Ratio : 2.0x



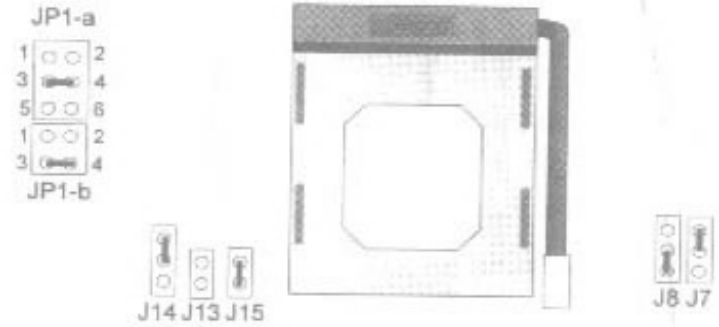
Cyrix (P133+) : 110MHz

External Speed : 55MHz
Frequency Ratio : 2.0x



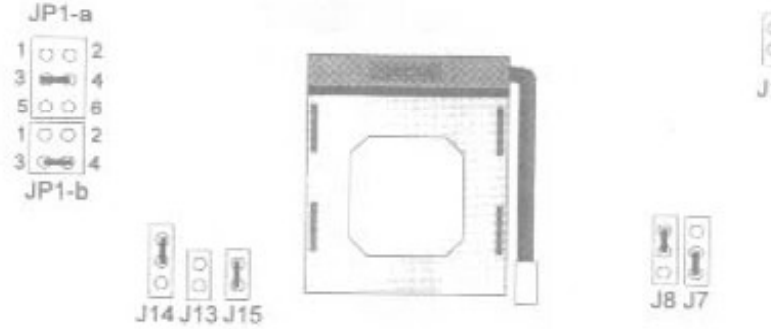
Cyrix (P150+) : 120MHz

External Speed : 60MHz
Frequency Ratio : 2.0x



Cyrix (P166+) : 133MHz

External Speed : 66MHz
Frequency Ratio : 2.0x

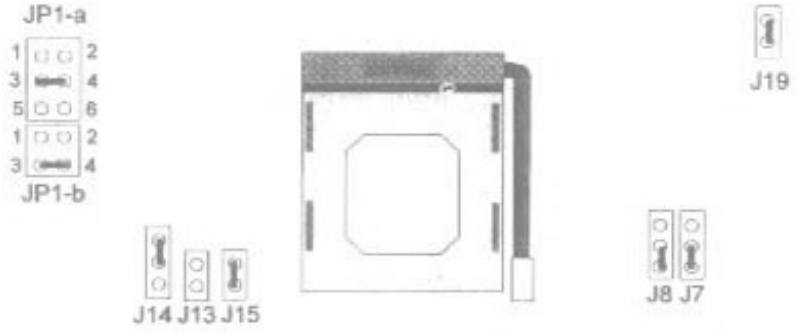


Cyrix (6x86) Installation:

Cyrix (P200+) : 150 MHz

External Speed : 75MHz

Frequency Ratio : 2.0x

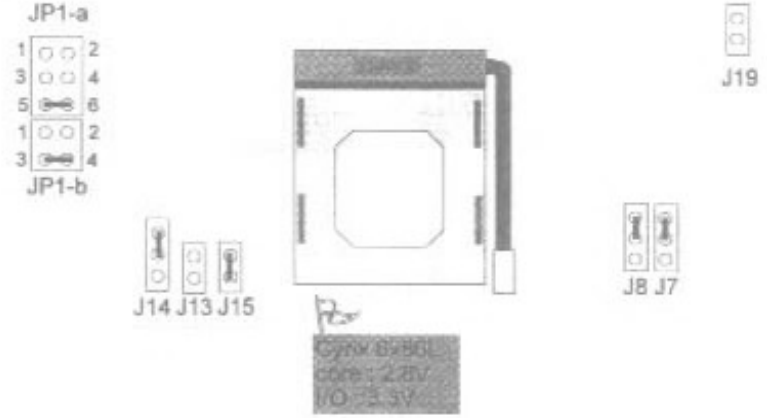


Cyrix (6x86L)Installation:

Cyrix (P120+) : 100MHz 6x86L

External Speed : 50MHz

Frequency Ratio : 2.0x

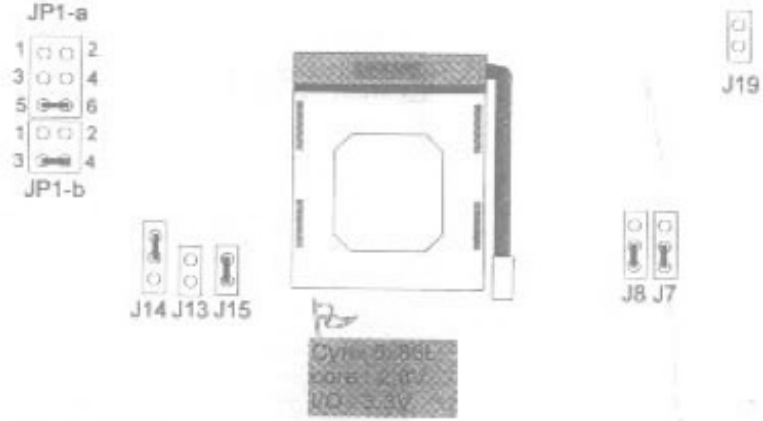


Cyrix (6x86L)Installation:

Cyrix (P133+) : 110MHz 6x86L

External Speed : 55MHz

Frequency Ratio : 2.0x

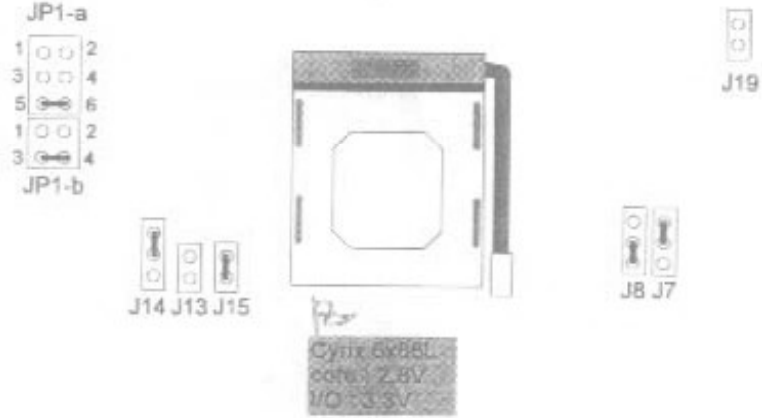


Cyrix (6x86L)Installation:

Cyrix (P150+) : 120MHz 6x86L

External Speed : 60MHz

Frequency Ratio : 2.0x

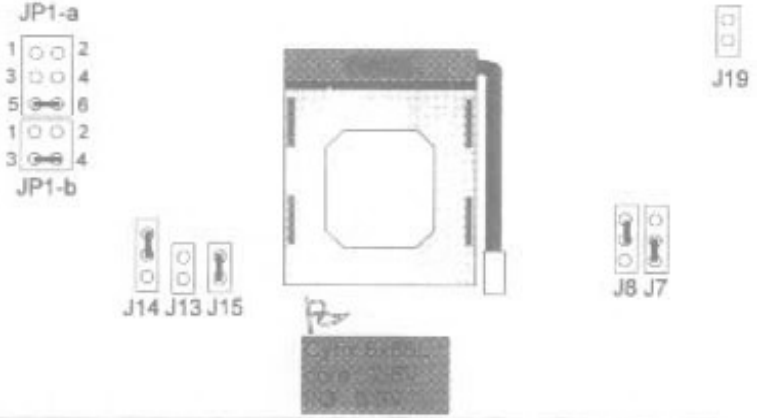


Cyrix (6x86L)Installation:

Cyrix (P166+) : 133MHz 6x86L

External Speed : 66MHz

Frequency Ratio : 2.0x

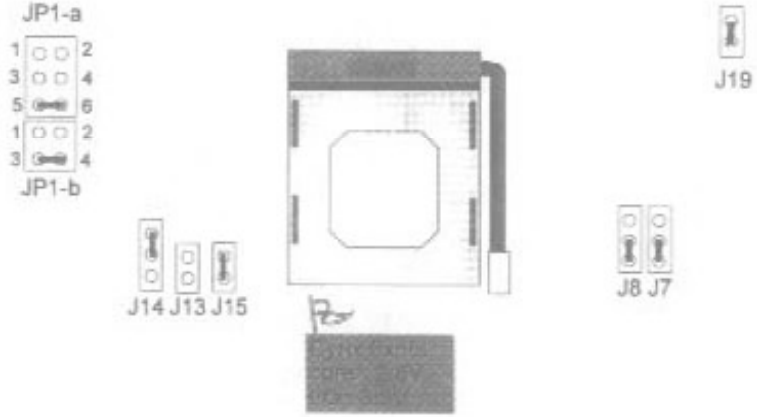


Cyrix (6x86L)Installation:

Cyrix (P200+) : 150MHz 6x86L

External Speed : 75MHz

Frequency Ratio : 2.0x

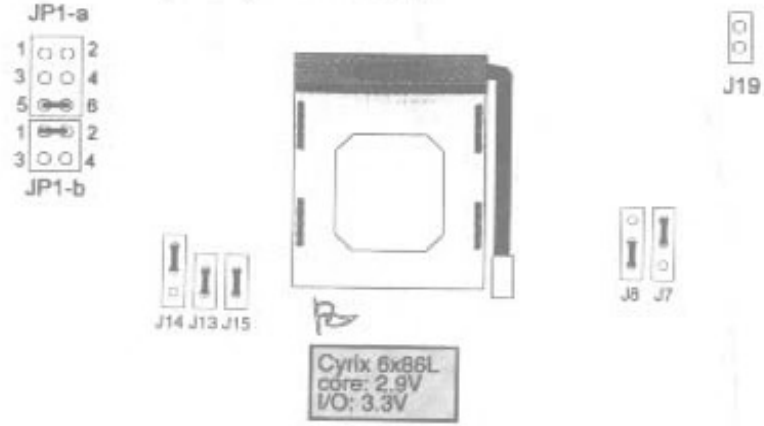


Cyrix M2(6x86L) Installation:

Cyrix (P166+) : 150MHz 6x86L

External Speed : 60MHz

Frequency Ratio : 2.5x

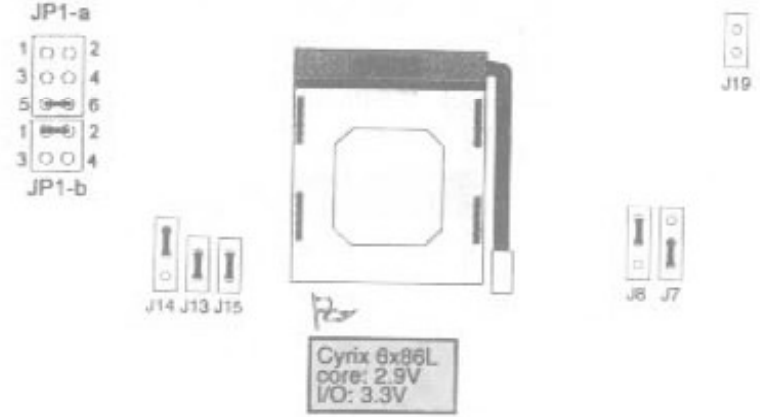


Cyrix M2(6x86L) Installation:

Cyrix (P200+) : 166MHz 6x86L

External Speed : 66MHz

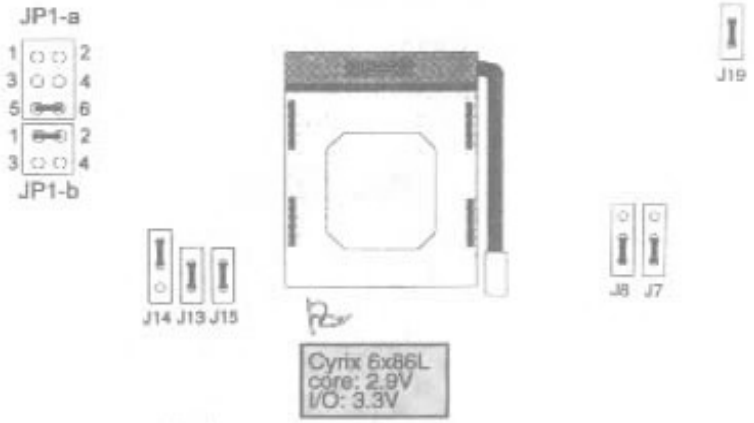
Frequency Ratio : 2.5x



Cyrix M2(6x86L) Installation:

Cyrix (P233+) : 188MHz 6x86L

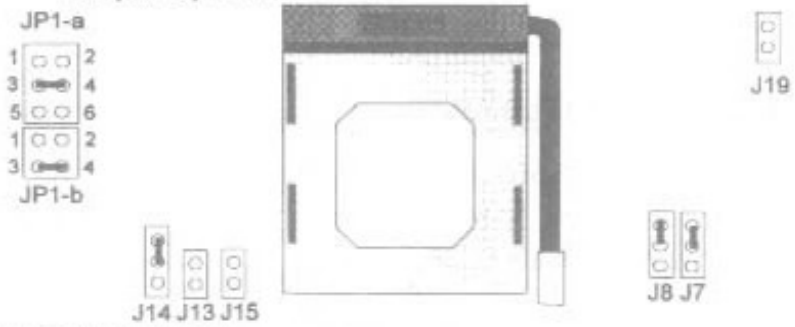
External Speed : 75MHz
Frequency Ratio : 2.5x



AMD (5k86) Installation

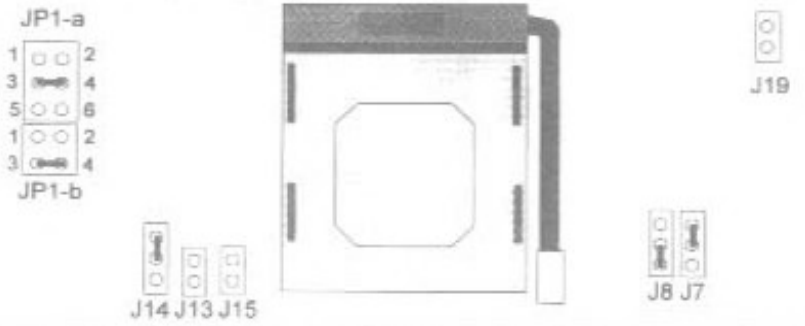
AMD 75 MHz CPU

External Speed : 50MHz
Frequency Ratio : 1.5x



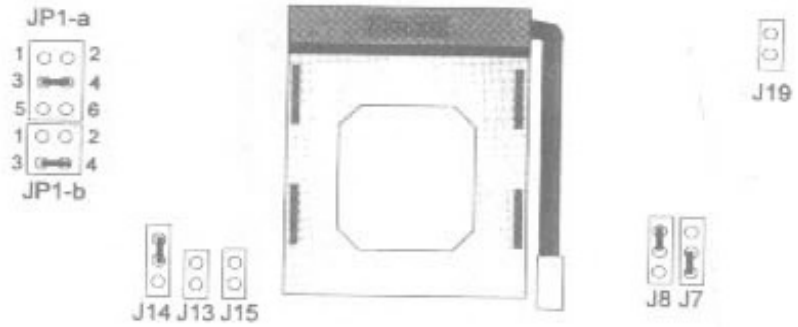
AMD 90 MHz CPU

External Speed : 60MHz
Frequency Ratio : 1.5x



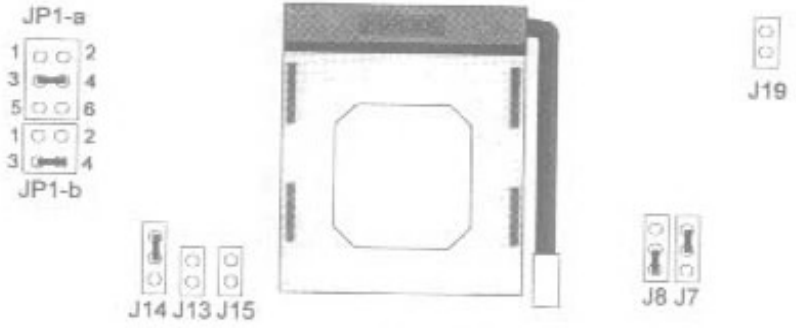
AMD 100 MHz CPU

External Speed : 66MHz
Frequency Ratio : 1.5x



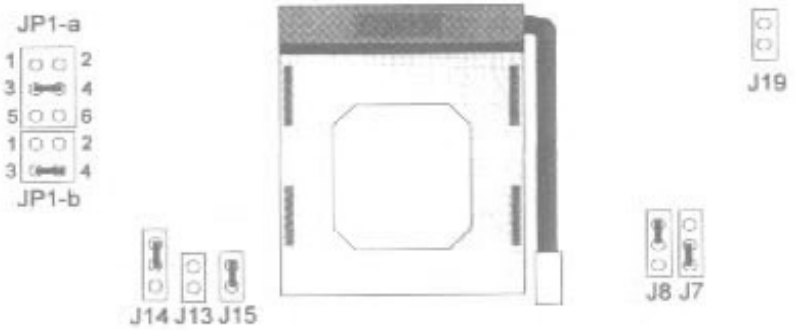
AMD 120 MHz CPU

External Speed : 60MHz
Frequency Ratio : 1.5x



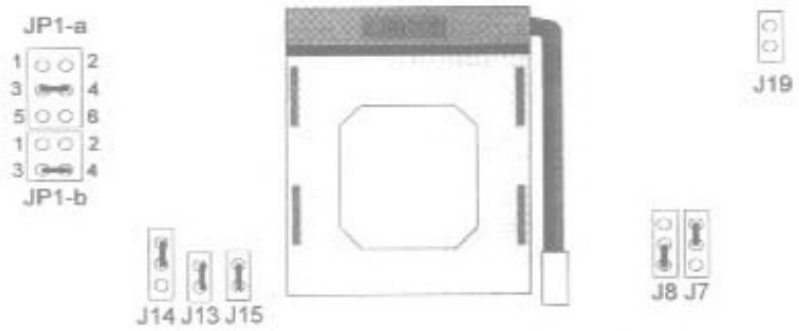
AMD 133 MHz CPU

External Speed : 66MHz
Frequency Ratio : 2.0x



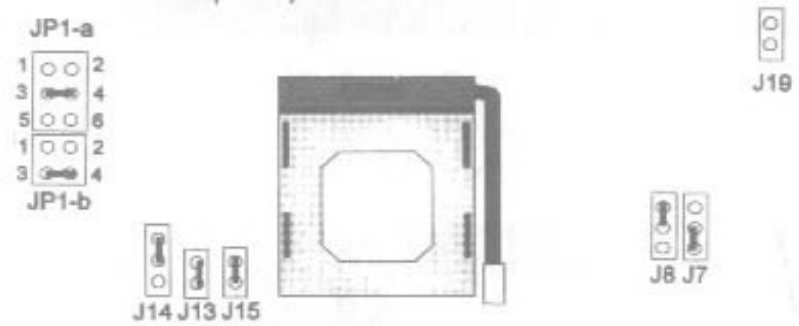
AMD 150 MHz CPU

External Speed : 60MHz
Frequency Ratio : 2.5x



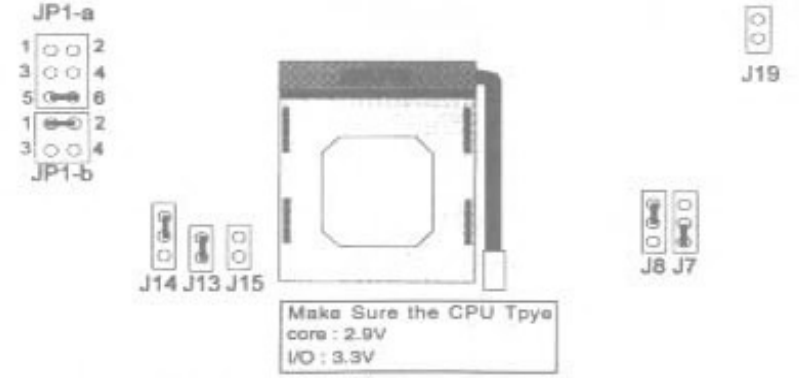
AMD K5 166 MHz CPU

External Speed : 66MHz
Frequency Ratio : 2.5x



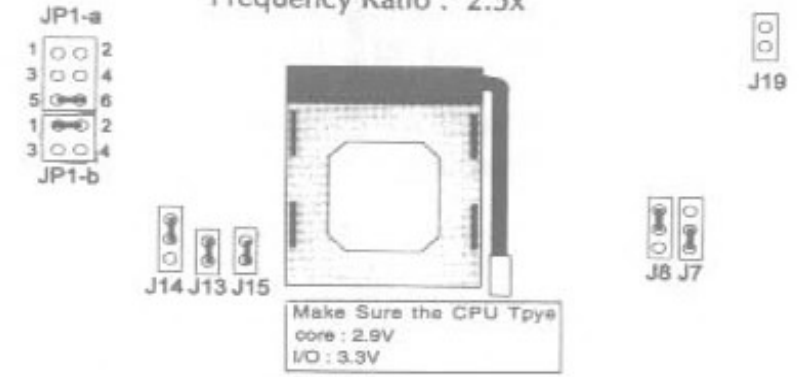
AMD K6 200 MHz CPU

External Speed : 66MHz
Frequency Ratio : 3.0x



AMD K6 166 MHz CPU

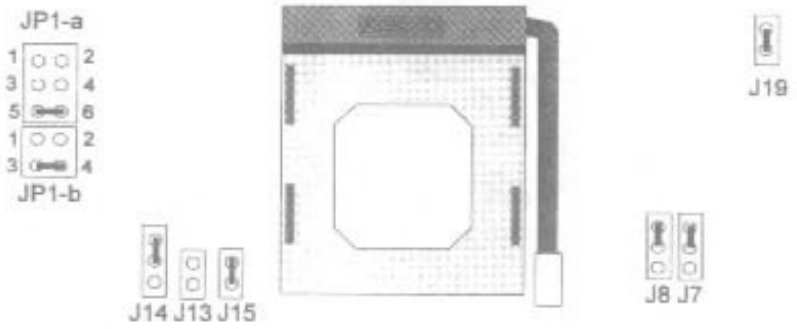
External Speed : 66MHz
Frequency Ratio : 2.5x



You could try another jumper setting to increase the performance
if your PCI Card (ex: vga, scsi, net card) support high-speed PCI clock)

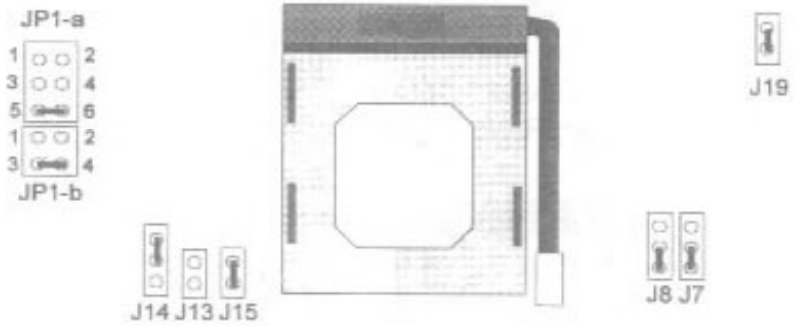
INTEL(P54C) 166 MHz CPU:

External Speed : 83MHz
Frequency Ratio : 2.0x



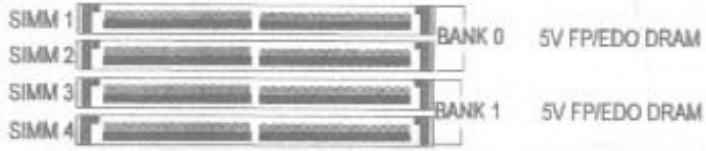
INTEL(P54C) 150 MHz CPU:

External Speed : 75MHz
Frequency Ratio : 2.0x



2-3 System Memory Configuration

The A-5VX30S supports different type of settings for the syst
memory. There is no jumper nor connector needed for mem
configuration. Following figures provides all possible mem
cominations.



SIMM 1,2	SIMM 3,4	DIMM 1	DIMM 2	STATUS
BANK 0	BANK1	BANK0	BANK1	
Installed	None	None	None	OK
None	Installed	None	None	OK
None	None	Installed	None	OK
None	None	None	Installed	OK
Installed	Installed	None	None	OK
None	Installed	Installed	None	OK
Installed	None	None	Installed	OK
*Installed	None	Installed	None	Not Allowed Not
*Installed	Installed	Installed	Installed	Not Allowed Not

Note:

1 A-5VX30S supports both Fast Page DRAM and EDO DRAM SIMMs, but they can not be mixed in the same memory bank.

***2. Because the SIMM1, 2 occupies the same memory block(Bank 0). So they cannot be installed at the same time.**

-4 Cache Memory Configuration

ne second level (L2) of cache is installed in the motherboard to crease the system performance. The A-5VX30S supports different pe of combinations for the cache installation. The COAST 2.1 Cache-On-A-STick. The cache modules has a TAG SRAM.) olution provides onboard flexibility, allowing Onboard and odules to accomodate 256KB/512KB burst and piplined burst nchronous SRAM.

SYN.Cache	On Board	On Module	U13
Size	U21, U22	B1	Tag RAM
256KB	256KB	None	8Kx8
256KB	None	256KB	No
512KB	256KB	256KB	16Kx8
512KB	512KB	None	16Kx8
512KB	None	512KB	No

2-5 Integrated PCI Bridge

The A-5VX30S utilizes Intel's 430VX PCIset chipset to supp Intel Pentium Processor PCI/ISA system . The Intel 82430VX PCI chipset consists of the 82437VX system controller (TSC), tw 82438VX Data Path (TDP) devices, and one 82371SB PCI IS IDE Accelerator (PIIX3) bridge chip. It provides an interface whi translates CPU cycle into PCI bus cycle, and PCI burst read/wr capability. In addition, it provides high performance PCI arbit to support three PCI Masters, Rotating Priority Mechanism, a Hidden Arbitration Scheme Minimizes Arbitration Overhead

There are four interrupts in each PCI slot:INTA#, INTB INTC#,and INTD#. Since the A-5VX30S adapts the PCI aut configuration with the system BIOS Setup utility. When the syste is turned on after adding a PCI add-in card, the BIOS automatica configure interrupts, DMA channels, I/O space, and oth paramaters. You do not have to configure jumpers or wor potential resource conflicts. Because PCI cards use the sam interrupt resource as ISA cards, you must specify the interru used by ISA add-in cards in the BIOS Setup utility.
If however, a "Legacy card" (such as plug paddle card and cab into the ISA slot.) is plugged in the system, modification in t ROM SETUP UTILITY become necessary. First, enter P CONFIGURATION SETUP utility from ROM SETUP UTILIT main menu to set the "PCI IDE IRQ MAP TO:ISA"

Secondly, you must enter CHIPSET FEATURES SETUP UTILIT from ROM SETUP UTILITY main menu and set the "Onboa Primary PCI IDE: Disabled and Onboard Secondary PCI ID Disabled. "When you plugg the PCI/ISA IDE card into the syster You should Disabled Onboard Primary and Secondary PCI ID from CHIPSET FEATURES SETUP UTILITY too.

Some "Legacy card (no paddle card and cable.) you can set t system interrupt request (IRQ) on the "Legacy card" (refer