

Appendix C

Jumper Table Summary

Setting the CPU Voltage

<u>S4</u>	<u>S5</u>	<u>S6</u>	<u>S7</u>	<u>S8</u>	<u>CPU Core Voltage</u>
ON	ON	ON	ON	OFF	3.52V (Cyrix 6x86 or AMD K5)
OFF	ON	ON	ON	OFF	3.45V (Intel P54C or IDT C6)
OFF	OFF	ON	ON	OFF	3.2V (AMD K6-233)
ON	OFF	OFF	ON	OFF	2.9V (K6-166/200 or M2)
OFF	OFF	OFF	ON	OFF	2.8V (Intel P55C)
OFF	ON	OFF	OFF	OFF	2.2V (AMD K6-266/300)
OFF	ON	OFF	ON	ON	1.8V (For future use)

<u>JP12</u>	<u>I/O Voltage (Vio)</u>
1-2	3.45V (default)
3-4	3.52V



Warning: Please make sure that you have installed CPU fan properly if Intel PP/MT-233 or AMD K6-200/233 is being selected to use. It may cause your system unstable if you can not meet the heat dissipation requirement from above CPU type. It is recommended to adopt larger fan on these CPU for better air flow in the system.



Tip: Normally, for single voltage CPU, V_{cpuio} (CPU I/O Voltage) is equal to V_{core} , but for CPU that needs dual voltage such as PP/MT (P55C) or Cyrix 6x86L, V_{cpuio} is different from V_{core} and must be set to V_{io} (PBSRAM and Chipset Voltage). The single or dual voltage CPU is automatically detected by hardware circuit.

CPU	Type	S4	S5	S6	S7	S8	Vcore
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Jumper Table Summary

INTEL P54C	Single Voltage	OFF	ON	ON	ON	OFF	3.45V
INTEL MMX P55C	Dual Voltage	OFF	OFF	OFF	ON	OFF	2.8V
AMD K5	Single Voltage	ON	ON	ON	ON	OFF	3.52V
AMD K6-166/200	Dual Voltage	ON	OFF	OFF	ON	OFF	2.9V
AMD K6-233	Dual Voltage	OFF	OFF	ON	ON	OFF	3.2V
AMD K6-266/300	Dual Voltage	OFF	ON	OFF	OFF	OFF	2.2V
Cyrix 6x86	Single Voltage	ON	ON	ON	ON	OFF	3.52V
Cyrix 6x86L	Dual Voltage	OFF	OFF	OFF	ON	OFF	2.8V
Cyrix M2	Dual Voltage	ON	OFF	OFF	ON	OFF	2.9V
IDT C6	Single Voltage	OFF	ON	ON	ON	OFF	3.45V

Selecting the CPU Frequency

<u>S1</u>	<u>S2</u>	<u>S3</u>	<u>CPU Frequency Ratio</u>	<u>JP4</u>	<u>JP5</u>	<u>JP6</u>	<u>CPU External Clock</u>
OFF	OFF	OFF	1.5x (3.5x)	1-2	2-3	1-2	60MHz
ON	OFF	OFF	2x	2-3	1-2	1-2	66MHz
ON	ON	OFF	2.5x (1.75x)	1-2	2-3	2-3	75MHz
OFF	ON	OFF	3x	2-3	1-2	2-3	83.3MHz
ON	OFF	ON	4x				
ON	ON	ON	4.5x				
OFF	ON	ON	5x				



Note: Intel PP/MT MMX 233MHz is using 1.5x jumper setting for 3.5x frequency ratio, and AMD PR166 is using 2.5x setting for 1.75x frequency ratio.



Warning: INTEL TX chipset supports only 60/66MHz external CPU bus clock, the 75/83.3MHz settings are for internal test only, set to 75/83.3MHz exceeds the specification of TX chipset, which may cause serious system damage.



Warning: Cyrix 6x86 P200+ uses 75MHz external clock, the jumper setting shown on the table below is for user's convenient. It may cause serious system damage to use 75MHz clock.



Warning: Although you may set 75MHz x 2 for Cyrix MX-PR200 and 83.3MHz x 2 for Cyrix MX-PR233, note that 75/83.3MHz settings may probably cause serious system damage.

INTEL Pentium	CPU Core Frequency	Ratio	External Bus Clock	S1	S2	S3	JP4 & JP5 & JP6
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Jumper Table Summary

P54C 90	90MHz =	1.5x	60MHz	OFF	OFF	OFF	1-2 & 2-3 & 1-2
P54C 100	100MHz =	1.5x	66MHz	OFF	OFF	OFF	2-3 & 1-2 & 1-2
P54C 120	120MHz =	2x	60MHz	ON	OFF	OFF	1-2 & 2-3 & 1-2
P54C 133	133MHz =	2x	66MHz	ON	OFF	OFF	2-3 & 1-2 & 1-2
P54C 150	150MHz =	2.5x	60MHz	ON	ON	OFF	1-2 & 2-3 & 1-2
P54C 166	166MHz =	2.5x	66MHz	ON	ON	OFF	2-3 & 1-2 & 1-2
P54C 200	200MHz =	3x	66MHz	OFF	ON	OFF	2-3 & 1-2 & 1-2

INTEL Pentium MMX	CPU Core Frequency	Ratio	External Bus Clock	S1	S2	S3	JP4 & JP5 & JP6
PP/MT 150	150MHz =	2.5x	60MHz	ON	ON	OFF	1-2 & 2-3 & 1-2
PP/MT 166	166MHz =	2.5x	66MHz	ON	ON	OFF	2-3 & 1-2 & 1-2
PP/MT 200	200MHz =	3x	66MHz	OFF	ON	OFF	2-3 & 1-2 & 1-2
PP/MT 233	233MHz =	3.5x	66MHz	OFF	OFF	OFF	2-3 & 1-2 & 1-2

Cyrix 6x86 & 6x86L	CPU Core Frequency	Ratio	External Bus Clock	S1	S2	S3	JP4 & JP5 & JP6
P150+	120MHz =	2x	60MHz	ON	OFF	OFF	1-2 & 2-3 & 1-2
P166+	133MHz =	2x	66MHz	ON	OFF	OFF	2-3 & 1-2 & 1-2
P200+	150MHz =	2x	75MHz	ON	OFF	OFF	1-2 & 2-3 & 2-3

Cyrix M2	CPU Core Frequency	Ratio	External Bus Clock	S1	S2	S3	JP4 & JP5 & JP6
MX-PR166	150MHz =	2.5x	60MHz	ON	ON	OFF	1-2 & 2-3 & 1-2
MX-PR200	166MHz =	2.5x	66MHz	ON	ON	OFF	2-3 & 1-2 & 1-2
	150MHz =	2x	75MHz	ON	OFF	OFF	1-2 & 2-3 & 2-3
MX-PR233	200MHz =	3x	66MHz	OFF	ON	OFF	2-3 & 1-2 & 1-2
	166MHz =	2x	83.3MHz	ON	OFF	OFF	2-3 & 1-2 & 2-3
MX-PR266	233MHz =	3.5x	66MHz	OFF	OFF	OFF	2-3 & 1-2 & 1-2

AMD K5	CPU Core Frequency	Ratio	External Bus Clock	S1	S2	S3	JP4 & JP5 & JP6
PR90	90MHz =	1.5x	60MHz	OFF	OFF	OFF	1-2 & 2-3 & 1-2

Jumper Table Summary

AMD K5	CPU Core Frequency	Ratio	External Bus Clock	S1	S2	S3	JP4 & JP5 & JP6
PR100	100MHz =	1.5x	66MHz	OFF	OFF	OFF	2-3 & 1-2 & 1-2
PR120	90MHz =	1.5x	60MHz	OFF	OFF	OFF	1-2 & 2-3 & 1-2
PR133	100MHz =	1.5x	66MHz	OFF	OFF	OFF	2-3 & 1-2 & 1-2
PR166	116MHz =	1.75x	66MHz	ON	ON	OFF	2-3 & 1-2 & 1-2

AMD K6	CPU Core Frequency	Ratio	External Bus Clock	S1	S2	S3	JP4 & JP5 & JP6
PR2-166	166MHz =	2.5x	66MHz	ON	ON	OFF	2-3 & 1-2 & 1-2
PR2-200	200MHz =	3x	66MHz	OFF	ON	OFF	2-3 & 1-2 & 1-2
PR2-233	233MHz =	3.5x	66MHz	OFF	OFF	OFF	2-3 & 1-2 & 1-2
PR2-266	266MHz =	4x	66MHz	ON	OFF	ON	2-3 & 1-2 & 1-2
PR2-300	300MHz =	4.5x	66MHz	ON	ON	ON	2-3 & 1-2 & 1-2

IDT C6	CPU Core Frequency	Ratio	External Bus Clock	S1	S2	S3	JP4 & JP5 & JP6
C6-150	150MHz =	2x	75MHz	ON	OFF	OFF	1-2 & 2-3 & 2-3
C6-180	180MHz =	3x	60MHz	OFF	ON	OFF	1-2 & 2-3 & 1-2
C6-200	200MHz =	3x	66MHz	OFF	ON	OFF	2-3 & 1-2 & 1-2

Clear CMOS

JP14	Clear CMOS
1-2	Normal operation (default)
2-3	Clear CMOS