experiment3

For 8255 chip

Addr8 = 1

Addr7 = 0

Addr6 $\sim$ 4 = 000 $\sim$ 111 ($Y_0 \sim Y_7$)

Addr3 $\sim$ 0 = 0000 $\sim$ 1111

Since 8255 is Y_2, its address range is 120H~127H.

Register	A_1	A_0	Addr ($D_0 \sim D_7$)	Addr ($D_8 \sim D_{15}$)
PortA	0	0	120H	121H
PortB	0	1	122H	123H
PortC	1	0	124H	125H
CtrlPT	1	1	126H	127H

Register	Usage
$PA_0 \sim PA_3$	control which digit to display
$PA_4 \sim PA_7$	control four LED lights
$PB_0 \sim PB_7$	control which number to display
$PC_0 \sim PC_7$	correspond to switches

For 8253 chip

Since 8253 is Y_0, its address range is 100H~107H.

Register	A_1	A_0	Addr ($D_0 \sim D_7$)	Addr ($D_8 \sim D_{15}$)
Timer0	0	0	100H	101H
Timer1	0	1	102H	103H
Timer2	1	0	104H	105H
CtrlRegister	1	1	106H	107H