

MP LAB TEST

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IBM15PS210

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MODEL SMALL
CODE.

MOV AL, 02H
MOV DX, 0E03H
OUT DX, AL
CALL CLR_ALL_FLR

AHA1: CALL CHEIM_FLR
CMP AL, OFFH.
JE AHA1
SHR AL, 01
JC M01
CALL DELAY.
CALL CLR_GF.
JMP FINISH.

M01: SIRAL, 01
JC M02
MOV AL, 0F0H
MOV CX, 03
CALL DELAY.
CALL DELAY.
CALL CLR_GF.
MOV CX, 03
CALL MOVE_DOWN.
JMP FINISH

M02 : SHR AL, 01
JC M03
MOV AL, 0F0H
MOV CX, 06
CALL MOVE_UP
CALL DELAY
CALL CLR_SF
MOV CX, 06
CALL MOVE_DOWN
JMP FINISH.

M03 : MOV AL, 0F0H
MOV CX, 09
CALL MOVE_UP.
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CALL DELAY .
CALL DELAY
CALL CLR_TF
MOV AL CX,09H
CALL MOVE_DOWN
PUSH AX
CALL CLR_ALL_PLR.
MOV AH,4CH
INT 21H.
MOVE_UP PROC NEAR.
MOV DX,0E800H.
L1 : INC AL
CALL DELAY .
OUT DX,AL
LOOP L1
CALL DELAY
CALL DELAY .
RET
MOVE_UP ENDP .

MOVE_DOWN PROC NEAR
MOV DX,0E800H.
L2 : DEC AL
CALL DELAY
OUT DX,AL
LOOP L2
CALL DELAY .
CALL DELAY .
RET
MOVE_DOWN ENDP.

CHECK_FLR PROC NEAR .
MOV DX,0E801H,
IN AL,DX
OR AL,0F0H
RET
CHECK_FLR ENDP.

CLR_ALL_FLR PROC NEAR .
MOV AL,0F0H
MOV DX,0E800H
OUT DX,AL
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RET
CLR_ALL - PROC NEAR.
CLR_GF PROC NEAR.
MOV DX, 0E800H
AND AL, 0FH
OR AL, 0E0H
OUT DX, AL
RET
CLR_GF ENDP
CLR_FF PROC NEAR
MOV DX, 0E800H
AND AL, 0FH
OR AL, 0B0H
OUT DX, AL
RET
CLR_FF ENDP
CLR_SF PROC NEAR.
MOV DX, 0E800H
AND AL, 0FH
OR AL, 0B0H
OUT DX, AL
RET.
CLR_SF ENDP
CLR_TF PROC NEAR
MOV DX, 0E800H
AND AL, 0FH
OR AL, 07H
OUT DX, AL
RET
CLR_TF ENDP
DELAY PROC NEAR
PUSH AX
PUSH DX
MOV CX, 3FFFH

L4 : MAX, OFFFFH .
L3 : DELAY
JN2 L3
LOOP L4
POP DX
POP CX
POP AX
RET
DELAY ENDP
END.

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