

EPROM PROGRAMMER CARD

FOR

PC/XT/AT

INSTRUCTION MANUAL

EPROM PROGRAMMER CARD

EP-105 . EP-102

FOR IBM PC XT/AT

DOS means IBM PC DOS or compatible DOS .

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Preface

The new Eprom Writer Card is designed for IBM PC XT/AT. Read the instruction manual in details, before using this card, and be sure that you have saved a copy of the source disk at a safety place.

The diskette supplied include 7 utility files:

- 1.ROM.EXE : this is the main file to be executed.
- 2.HELP.ME : This file contains 7 manufacturers' Eprom data: Advanced Micro Devices, Fujitsu, Hitachi, Intel, Mitsubishi, National Semiconductor, NEC, Toshiba.

Program execution:

- 1.Power off the computer.
- 2.Plug the Eprom Writer Card into any of the expansion slot.
- 3.Connect the Eprom Writer Card and the Programmer unit with the connecting cable.
- 4.Bootig your system with the DOS disk.

5. Execute the ROM.EXE program.

then the function menu will be displayed on the screen.

EPROM PROGRAMMER model:EP-105 V1.10 (C) Copyright 1987 by TRANSDATA CO.,LTD.

=====

Please select a function.....

- (B) Blank check.
- (E) Edit memory buffer.
- (T) Type Eprom.
- (1) PC type.
- (2) Program speed.

- (L) Load obj file to memory buffer.
- (S) Save memory buffer to disk.

- (R) Read.

- (P) Program.
- (A) Auto: (B) & (P).

- (V) Verify.
- (C) Compare: (V) & display error.

- (Q) Quit: return to DOS.

TYPE:27(c)32/25V.
Prog speed : 1ms

I/O Address : 2B0H-2B3H
PC type --- : XT/4.77M

FUNCTION DESCRIPTION

The function menu will be displayed on the screen after executing ROM.EXE .

Details are described below.

Function B: Blank check

To check whether the chips are blank or not. The first address that is not blank will be displayed.

Press 'Y' to check , 'N' to return to main menu, 'A' to address change.

```
TYPE:27(c)256/12.5V
Prog speed : 1ms

...BLANK CHECK...
      Ready. (Y/N/A)?-

Chip      start addr :0000
Chip      end   addr :7FFF

[S1] OK
[S2] .....no Eprom
[S3] OK
[S4] .....no Eprom
[S5] OK
```

I/O Address : 2B0H-2B3H
PC type --- : XT/4.77M

Function E: Edit memory buffer

To debug , modify and print your memory buffer.

This function includes four commands:

- 1.Display command -- to display the Memory Buffer contents.

D< start address >.< end address>

Example : D0100.0200<CR>

.....press <space bar> to stop the display command .

- 2.Print command -- to print out the Memory Buffer contents .

P<start address>.<end address>

.....press <space bar> to stop the print command .

- 3.Modify command -- to modify the Memory Buffer contents .

M<start address>.....press <CR> to advance to the next byte .

.....press Q<CR> to stop the modify command .

- 4.Quit -- press Q<CR> to stop the modify command .

Function T: Type Eprom and manufacturer,

To select the Eprom type . After selection of Eprom type , the byte and programming voltage are set automatically.

The Eprom type and programming voltage are referred to INTEL's Eprom . When you don't know the programming voltage of other manufacture's , you can select the lower voltage to try (i.e. 12.5v) , if it doesn't work , then try the higher one (i.e. 21v) . Of course , you also can refer to 'HELP.ME' file of this disk .

TYPE:27(c)256/12.5V
Prog speed : 1ms

- (1) 27(c)16___25V
- (2) 27(c)32___25V
- (3) 2732A___21V
- (4) 2732B___12.5V
- (5) 27(c)64___21V
- (6) 2764A___12.5V
- (7) 27(c)128___21V
- (8) 27128A___12.5V
- (9) 27(c)256___21V
- (A) 27(c)256___12.5V
- (B) 27(c)512___21V
- (C) 27(c)512___12.5V

Which one ?

I/O Address : 2B0H-2B3H
PC type --- : XT/4.77M

Function 1: PC type

Function 2: Program speed

To select the PC type about your computer system , and the programming algorithm .

TYPE:27(c)256/12.5V
Prog speed : 1ms

...PC type.....

- (1) XT/4.77M
- (2) XT/6M
- (3) XT/8M
- (4) XT/10M
- (5) AT/6M
- (6) AT/8M
- (7) AT/10M
- (8) AT/12M

Which one -----

I/O Address : 2B0H-2B3H
PC type --- : XT/4.77M

TYPE:27(c)256/12.5V
Prog speed : 1ms

...Program speed....

- (1) 50ms---normal
- (2) 10ms---normal
- (3) 5ms---normal
- (4) 1ms-intelligent
- (5) 0.5ms-interactive

Which one -----

I/O Address : 2B0H-2B3H
PC type --- : XT/4.77M

Function L: Load obj file to memory buffer

To load data from disk file into memory buffer . You may specify the file name and the buffer starting address to be loaded .

The address number must not be less than 4 digits , otherwise it will stop the function execution and return to main menu .

TYPE:27(c)256/12.5V
Prog speed : 1ms

....LOAD DISK.....

file name_B:ROM.OBJ

Buffer start addr :0000

Disk read ok !!

I/O Address : 2B0H-2B3H
PC type --- : XT/4.77M

Function S: Save memory buffer to disk

To save data from memory buffer into disk file . You may specify the file name , the buffer starting address and ~~total bytes~~ *buffer end address*.

xSuppose you want to store 1K

xbytes just key in 0400 .

xRefer to the following table:

Xbyte to store key in length

x1K	.....	0400
x2K	.....	0800
x3K	.....	0C00
x4K	.....	1000
x5K	.....	1400
x8K	.....	2000
x16K	.....	4000
x32K	.....	8000
x64K	.....	0000

TYPE:27(c)256/12.5V

Prog speed : 1ms

....SAVE DISK.....

file name_B:ROM.OBJ

***file already exist

---overwrite? (Y/N)_N

I/O Address : 2B0H-2B3H

PC type --- : XT/4.77M

Function R: Read

To read the data on the chip into the memory buffer .

Press 'Y' to read , 'N' to return to main menu , 'A' to address change.

The address number must not be less than 4 digits , otherwise the address change is in vain .
If you press the texttool bar but none chip on , the screen also show that the chip has be put on , and the contents of buffer will be 'FF' only .

```
TYPE:2764A/12.5V
Prog speed : 1ms

...READ.....
      Ready.(Y/N/A)?-

Buffer  check sum C:A000
Chip    start addr :0000

Buffer  start addr :0000

[S1] .....no Eprom
[S2] 0000 to 1FFF C:E000
[S3] 2000 to 3FFF C:E000
[S4] .....no Eprom
[S5] 4000 to 5FFF C:E000
All PROM check sum C:A000
```

```
I/O Address : 2B0H-2B3H
PC type --- : XT/4.77M
```

Function P: Program

To program the Chip ranged from 'Chip start address' to 'Chip end address' from the data in the memory buffer , starting at 'Buffer start address' .

It will Verify automatically after finishing program .

Press 'Y' to program , 'N' to return to main menu , 'A' to address change .

Function A: Auto

To do the Blank Check first then do the Function P .

TYPE:2764A/12.5V

Prog speed : 1ms

..PROGRAM

Ready. (Y/N/A)?-

Buffer check sum C:E000

Chip start addr :0000

Chip end addr :1FFF

Buffer start addr :0000

Buffer end addr :1FFF

[S1]no Eprom

[S2] OK

[S3] First error at 0000

[S4]no Eprom

[S5] OK

I/O Address : 2B0H-2B3H

PC type --- : XT/4.77M

Function V: Verify

To verify the data in the chips ranged from 'Chip start address' to 'Chip end address' with memory buffer, starting at 'Buffer start address'

The first error address of the chips will be displayed .

Press 'Y' to verify, 'N' to return to the main menu, 'A' to address change .

TYPE:2716/25V

Prog speed : 1ms

...VERIFY.....

Ready.(Y/N/A)?-

Buffer check sum C:2CED

Chip start addr :0000

Chip end addr :07FF

Buffer start addr :0000

Buffer end addr :07FF

[S1]no Eprom

[S2] OK

[S3]no Eprom

[S4]no Eprom

[S5] First error at 0001

I/O Address : 280H-283H

PC type --- : AT/6M

Function C: Compare

To compare the data in the chip ranged from 'Chip start address' to 'Chip end address' with memory buffer, starting at 'Buffer start address'

Press 'Y' to verify, 'N' to

return to the main menu., 'A'

to address change.

The difference are displayed

in the format :

Chip addr:Chip data--(Buffer
data)

1FFA:19 (29)

1FFB:1A (FB)

1FFC:1B (FC)

1FFD:1C (FD)

1FFE:1D (FE)

1FFF:1E (FF)

Verify End. --press any key to return to
main menu.

I/O address :

This card may be plugged into any slot of the PC . Some problems may happen while other card plugged on the computer has the same address as this card . The way to solve this problem is shown below .

step 1. : power off the PC .

step 2. : change the 3-position DIP SW to new I/O address .

step 3. : plug the card into the PC again .

step 4. : power on and run ROM.EXE again normally .

The I/O address map is as below.

Address	EP-105			EP-102		
	1	2	3	1	2	3
280-283H....	X	X	X	X	X	X
290-293H....	0	X	X	0	X	X
2A0-2A3H....	X	0	X	X	0	X
2B0-2B3H....	0	0	X	0	0	X
2C0-2C3H....	X	X	0	X	X	0
2D0-2D3H....	0	X	0	0	X	0
2E0-2E3H....	X	0	0	X	0	0
2F0-2F3H....	0	0	0	0	0	0

0 : ON X : OFF

