LAB 4:--

PROGRAM:

.MODEL SMALL

DISPLAY MACRO MSG

LEA DX,MSG

MOV AH,09H

INT 21H

ENDM

.DATA

MSG1 DB 0DH,0AH,"ENTER STRING:$"

MSG2 DB 0DH,0AH,"REVERSE STRING:$"

MSG3 DB 0DH,0AH,"INPUT STRING IS PALINDROME$"

MSG4 DB 0DH,0AH,"INPUT STRING IS NOT A PALINDROME$"

STRING DB 80H DUP(?)

RSTRING DB 80H DUP(?)

.CODE

START:MOV AX,@DATA

MOV DS,AX

DISPLAY MSG1

MOV SI,OFFSET STRING

XOR CL,CL

AGAIN: MOV AH,01H

INT 21H

CMP AL,0DH

JE NEXT

MOV [SI],AL

INC SI

INC CL

JMP AGAIN

NEXT: MOV [SI],BYTE PTR '$'

DEC SI

MOV CH,CL

MOV DI,OFFSET RSTRING

BACK: MOV AL,[SI]

MOV [DI],AL

DEC SI

INC DI

DEC CH

JNZ BACK

MOV [DI],BYTE PTR'$'

DISPLAY MSG2

DISPLAY RSTRING

MOV SI,OFFSET STRING

MOV DI,OFFSET RSTRING

AG: MOV AL,[SI]

CMP AL,[DI]

JNE FAIL

INC SI

INC DI

DEC CX

JZ SUCCESS

JMP AG

FAIL: DISPLAY MSG4

JMP FINAL

SUCCESS: DISPLAY MSG3

FINAL: MOV AH,4CH

INT 21H

END

SCREENSHOT:---



WRITTEN:--

