

AIDS MICROPROCESSOR LAB S21 BATCH (2023-24)

Experiment 12 Title: Assembly language programming to calculate the cube of given number using macro.

Name of student: Meet Raut Class Roll Number: 2201084

Date of Performance: 01/04/2024

Batch: S2-1 Timing: 3:00-5:00 Date of Submission: -01/04/2024

Assembly language code

DATA_SEG SEGMENT

number DW 5 #Variable to store the number

result DW ? #Variable to store the result

DATA_SEG ENDS

CODE_SEG SEGMENT

ASSUME CS:CODE_SEG, DS:DATA_SEG

cube_macro MACRO #Define a macro to calculate the square of a number

MOV AX,number #Copy contents of number into AX register

MOV BX,number #Copy contents of number into BX register

MUL AX #Multiply AX by itself (square)

MUL BX

ENDM

START:

MOV AX,DATA_SEG #Initialize the data segment

MOV DS,AX

cube_macro #Call the macro

MOV result,AX #Store the result

MOV AH,4Ch

#Exit to DOS

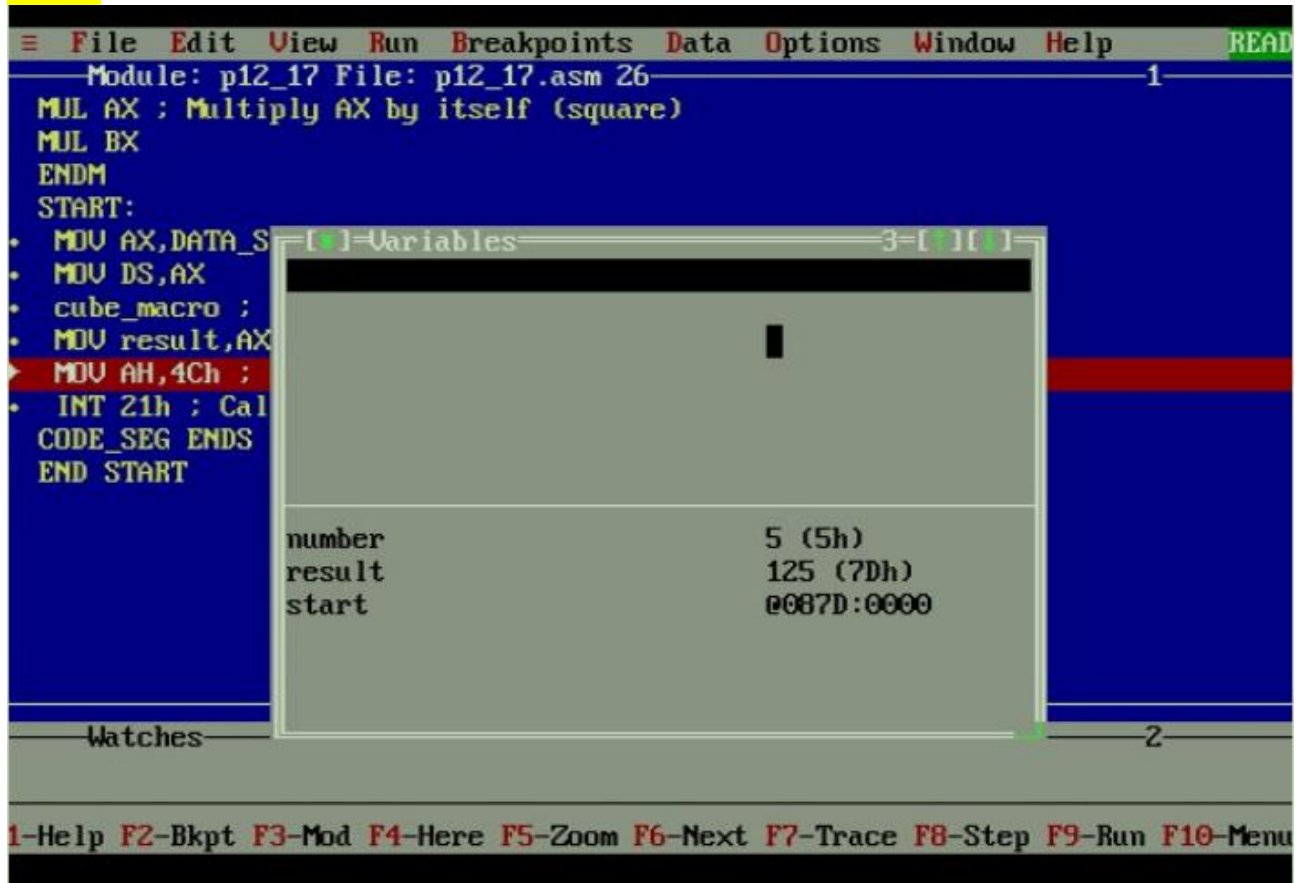
INT 21h

Call DOS interrupt

CODE_SEG ENDS

END START

Result:



CONCLUSION: LO 2, LO 3 mapped.

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