16-BIT SUBTRACTION

EXP NO: 6

AIM: To write an assembly language program to implement 16-bit subtraction using 8085 processor.

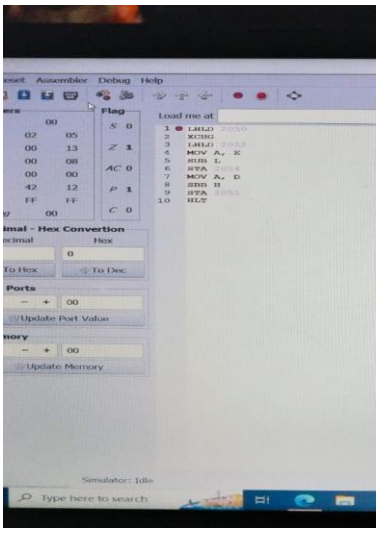
ALGORITHM:

1) Start the program by loading a register pair with address of 1st number.
2) Copy the data to another register pair.
3) Load the second number to first register pair.
4) Subtract the two register pair contents.
5) Check for borrow.
6) Store the value of difference and borrow in memory locations.
7) End.

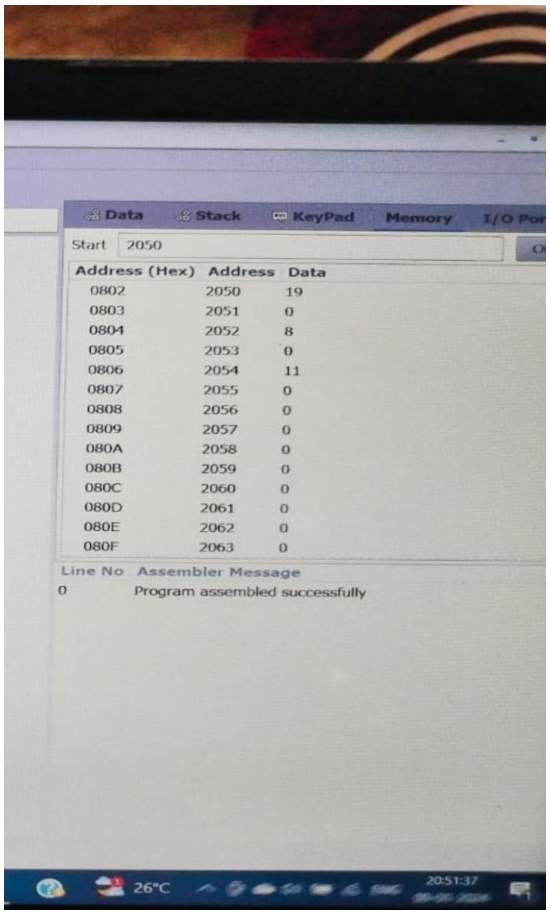
PROGRAM:

```
LHLD 2050
XCHG
LHLD 2052
MVI C,00
MOV A, E
SUB L
STA 2054
MOV A, D
SUB H
STA 2055
HLT
```

INPUT:



OUTPUT:



RESULT: Thus the program was executed successfully using 8085 processor simulator.