Practical-7

Aim: Write a program using 8085 & verify for:

1. Addition of Two 8-Bit Numbers.

```
;<Program title>

jmp start

;data


;code
start: nop

MVI C,00
LDA 4150
MOV B,A
LDA 4151
ADD B
JNC LOOP
INR C
LOOP: STA 4152
MOV A,C
STA 4153

hlt
```

Data | Stack | KeyPad | Memory | I/O Ports

Start 4150 OK

Address (Hex)	Address	Data
1036	4150	8
1037	4151	9
1038	4152	17
1039	4153	0
103A	4154	0
103B	4155	0
103C	4156	0
103D	4157	0
103E	4158	0
103F	4159	0
1040	4160	0
1041	4161	0
1042	4162	0
1043	4163	0

Line No	Assembler Message
0	Program assembled successfully

2. Addition of Two 16-Bit Numbers (With Carry):

```
;<Program title>

jmp start

;data


;code
start: nop

lhld  2050
xchg
lhld  2052
dad  d
shld  2054

hlt
```

Data | Stack | KeyPad | Memory | I/O Ports

Start 2050 OK

Address (Hex)	Address	Data
0802	2050	64
0803	2051	128
0804	2052	32
0805	2053	64
0806	2054	96
0807	2055	192
0808	2056	0
0809	2057	0
080A	2058	0
080B	2059	0
080C	2060	0
080D	2061	0
080E	2062	0
080F	2063	0

Line No	Assembler Message
0	Program assembled successfully