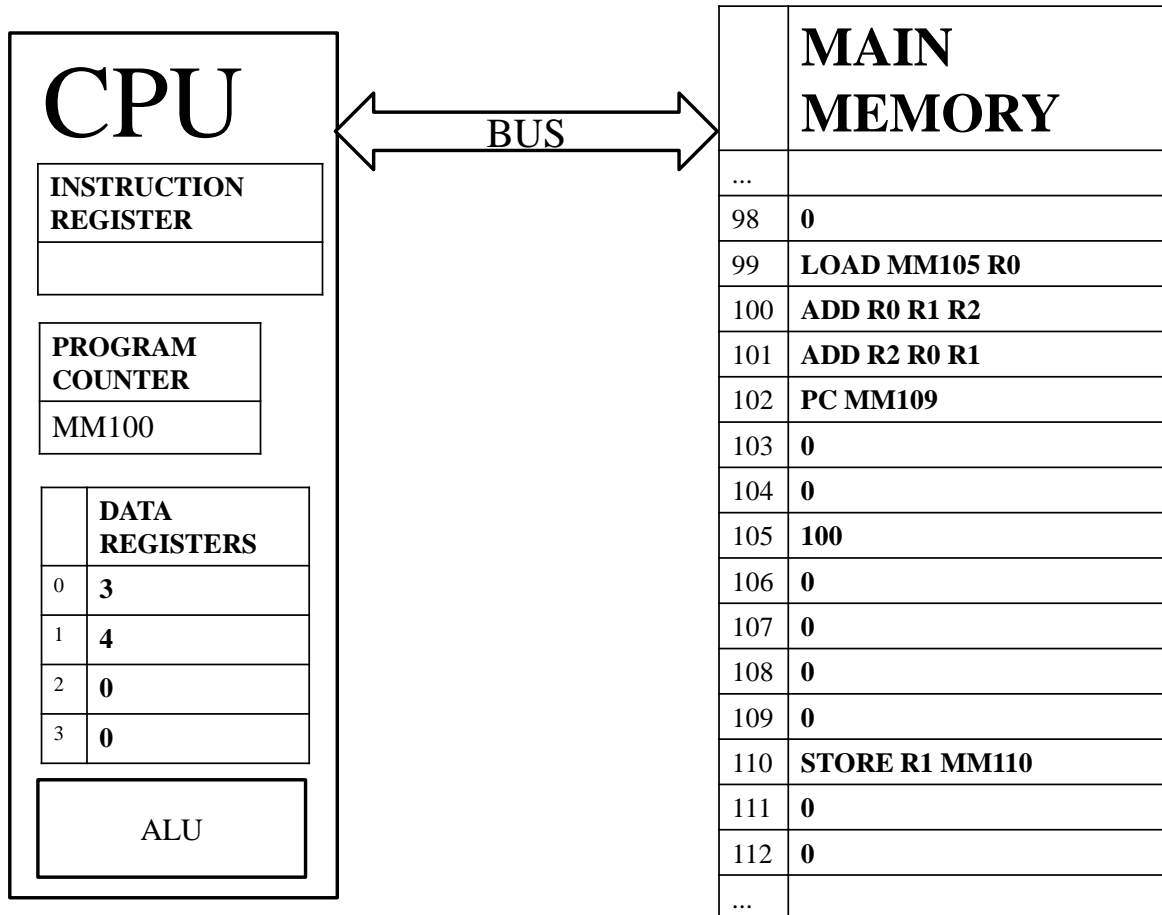Assume you start with the situation as shown here, and one instruction cycle has just ended. Explain in words what happens at each step of the next instruction cycle, starting with Fetch, for this **specific** situation. Diagrams are not required.

I am only asking about one instruction cycle. You do not need to add any more instructions. You do not need to add any more data. (Data may be modified by the program itself)

CPU	BUS	MAIN MEMORY	

CPU

INSTRUCTION REGISTER

PROGRAM COUNTER

MM100

	DATA REGISTERS
0	3
1	4
2	0
3	0

ALU

MAIN MEMORY

...	
98	**0**
99	**LOAD MM105 R0**
100	**ADD R0 R1 R2**
101	**ADD R2 R0 R1**
102	**PC MM109**
103	**0**
104	**0**
105	**100**
106	**0**
107	**0**
108	**0**
109	**0**
110	**STORE R1 MM110**
111	**0**
112	**0**
...	

Instruction Definitions:
LOAD MM105 R0
        copy the data from MM105 to register 0
ADD R0 R1 R2
        add the data in register 0 to the data in register 1 and put the result in register 2
ADD R2 R0 R1
        add the data in register 2 to the data in register 0 and put the result in register 1
PC MM109
        set the address in the program counter to main memory address 109
STORE R1 MM110
        copy the data from register 1 to main memory address 110.