**2.Write an embedded C program for blinking of LEDs of 8051.**

a) Turn ON all LEDs connected to Port, wait for a short delay, then turn OFF all LEDs.

#include <REG51.h>

void delay(int count)

{

int i, j;

for (i = 0; i < count; i++)

{

for (j = 0; j < 10000; j++);

}

}

void main()

{

while (1)

{

P2 = 0xFF; // Turn on all LEDs

delay(10);

P2 = 0x00; // Turn off all LEDs

delay(10);

}

}

b) Turn ON alternate LEDs, wait for a delay, then turn OFF all LEDs again.

#include <REG51.h>

void delay(int count)

{

int i, j;

for (i = 0; i < count; i++)

{

for (j = 0; j < 10000; j++);

}

}

void main()

{

while (1)

{

P2 = 0x55; // Binary: 01010101 - alternate LEDs ON

delay(10);

P2 = 0x00; // Turn OFF all LEDs

delay(10);

}

}