

POOJA-17

IBM19CS11,

8051

Lab program 14

- Display messages BANGALORE in rolling fashion on a 7-segment display interface for a suitable period of time.

```
#include <stdio.h>
```

```
#include <reg51.h>
```

```
char xdata CommW—at 0xe803;
```

```
char xdata port B—at 0xe801;
```

```
char xdata port C—at 0xe802;
```

```
char port[20] = {0xff, 0xff, 0xff, 0xff, 0x83, 0x88, 0xc8,  
0x88, 0xc8, 0x82, 0x88, 0xc7, 0xc0, 0xaf,  
0x86, 0x83, 0x83, 0x83};
```

```
delay()
```

```
{
```

```
long u;
```

```
for(u=0; u<4000; u++);
```

```
}
```

```
void main()
```

```
{
```

```
int d, b, j, m;
```

```
unsigned char k;
```

```
CommW=0x80;
```

```
do
```

```
{
```

```
i=0;
```

```
for(d=0; d<1; d++)
```

```
{
```

```
for (b = 13; b > 0; b--)
```

```
{
```

```
    delay();
```

```
    k = port[i++];
```

```
    for (j = 0; j < 8; j++)
```

```
    {
```

```
        m = k;
```

```
        k = k & 0x80;
```

```
    {
```

```
        if (k == 00)
```

```
            portB = 0x00;
```

```
        else
```

```
            portB = 0x01;
```

```
            portC = 0x01;
```

```
            portC = 0x00;
```

```
            k = m;
```

```
            k <<= 1;
```

```
        }
```

```
    }
```

```
    delay();
```

```
}
```

```
}
```

```
while(1);
```

```
}
```