

```
package com.mycompany.trafficlight;
import java.util.concurrent.TimeUnit;
public class RedLightThread extends Thread
{
    @Override
    public void run()
    {
        while(true)
        {
            try
            {
                System.out.println("Red Light");
                Thread.sleep(5000);
            }
            catch(InterruptedException e)
            {
                e.printStackTrace();
            }
        }
    }
}
```

```
package com.mycompany.trafficlight;
import java.util.concurrent.TimeUnit;
public class GreenLightThread extends Thread
{
    @Override
    public void run()
    {
        while(true)
        {
            try
            {
                System.out.println("Green Light");
                Thread.sleep(10000);
            }
            catch(InterruptedException e)
            {
                e.printStackTrace();
            }
        }
    }
}
```

```

package com.mycompany.trafficlight;
import java.util.concurrent.TimeUnit;
public class YellowLightThread extends Thread
{
    @Override
    public void run()
    {
        while(true)
        {
            try
            {
                System.out.println("Yellow Light");
                Thread.sleep(2000);
            }
            catch(InterruptedException e{
                e.printStackTrace();
            }
        }
    }
}

```

#### **Main class**

```

package com.mycompany.trafficlight;
public class TrafficLight
{
    public static void main(String[] args)
    {
        try
        {
            RedLightThread redThread =new RedLightThread();
            GreenLightThread greenThread =new GreenLightThread();
            YellowLightThread yellowThread =new YellowLightThread();

            redThread.start();
            greenThread.start();
            yellowThread.start();

            while(true)
            {
                //keep the thread running indefinitely
            }
        }
        catch(Exception e)
        {
            e.printStackTrace();
        }
    }
}

```