# Design a Traffic Controller System for a Junction

1. class:trafficLamp

```
private trafficLamp(string opposite, Boolean isLighted){

                }
 states:Boolean islighted, string opposite, string next
     string currentStatus=null;



behavior:void light(){
                this.lighted=true;
                system.out.println("this lamp is green, you can pass");

     }
          Void turnRed(){
                This.lighted=false;
                System.out.println("this lamp is red, please stop");


     }
```

---

2. class:road

```
states:List<string>vechicles=new vechicles;
       string name;
       string[]direction=new
trafficLamp{ S2N","S2W","E2W","E2S","N2S","N2E","W2N","S2E","E2N",
       "N2W","W2S"}
```

---

3. class: lampController

states:currentLamp

behavior:

```
void controlLamp(){
    List<trafficLamp> trafficLampList=trafficLamp(stringOppsite, Boolean islighted)
    For each(trafficLamp in trafficLampList){
        trafficLamp.turnGreen;
        Timer.counting;
        trafficLamp.turnRed;
    }
```

---

## 4. driver

Status: direction
Behavior:

```
Void run(){
};
```