```java
import java.util.Scanner;

public class Main {
    public static void main(String[] args){
        int choice = 0;
        Scanner input = new Scanner(System.in);

        choice = input.nextInt();

        Lever lever = new Lever(1);
        Dial dial = new Dial(1);
        Brush brush = new Brush(0);

        Agent agent = new Agent(lever,dial,brush);

        while(choice != 0){
            switch(choice){
            case 1://Lever up
                agent.getLever().leverUp();
                break;
            case 2://Lever down
                agent.getLever().leverDown();
                break;
            case 3://Dial up
                agent.getDial().dialUp();
                break;
            case 4://Dial down
                agent.getDial().dialDown();
                break;
            case 0://Terminate
                System.exit(0);
            }

            agent.dealSpeed();//Get brush's speed

            System.out.println(agent.getBrush().getSpeed());

            choice = input.nextInt();
        }

    }

}
```

```java
public class Lever {
    private int pos;//档位

    public Lever(){

    }

    public Lever(int pos){
        this.pos = pos;
    }

    public int getPos() {
        return pos;
    }

    //升档
    public void leverUp() {
        if(this.pos < 4){
            this.pos ++;
        }
    }

    //降档
    public void leverDown(){
        if(this.pos > 1){
            this.pos --;
        }
    }

}


public class Dial {
    private int pos;//刻度

    public Dial(){

    }

    public Dial(int pos){
        this.pos = pos;
    }

    public int getPos() {
        return pos;
```

```
    }

    //升刻度
    public void dialUp() {
        if(this.pos < 3){
            this.pos ++;
        }
    }

    //降刻度
    public void dialDown(){
        if(this.pos > 1){
            this.pos --;
        }
    }

}



public class Brush {
    private int speed;

    public Brush(){

    }

    public Brush(int speed){
        this.speed = speed;
    }

    public int getSpeed() {
        return speed;
    }

    public void setSpeed(int speed) {
        this.speed = speed;
    }
}

//为了减小实体类耦合性，采用中介模式，设计Agent代理类
public class Agent {
    //聚合型类设计
    private Lever lever;
    private Dial dial;
    private Brush brush;
```

```
    public Agent(){

    }



public Agent(Lever lever,Dial dial,Brush brush){
       this.lever = lever;
       this.dial = dial;
       this.brush = brush;
    }

    public Lever getLever() {
       return lever;
    }

    public void setLever(Lever lever) {
       this.lever = lever;
    }

    public Dial getDial() {
       return dial;
    }

    public void setDial(Dial dial) {
       this.dial = dial;
    }

    public Brush getBrush() {
       return brush;
    }

    public void setBrush(Brush brush) {
       this.brush = brush;
    }

    //主要业务逻辑：根据控制杆档位、刻度盘刻度计算雨刷摆动速度
    public void dealSpeed(){
       int speed = 0;

       switch(this.lever.getPos()){
       case 1://停止
          speed = 0;break;
       case 2://间歇
```

```
            switch(this.dial.getPos()){
            case 1://刻度1
                speed = 4;break;
            case 2://刻度2
                speed = 6;break;
            case 3://刻度3
                speed = 12;break;
            }
            break;
        case 3://低速
            speed = 30;break;
        case 4://高速
            speed = 60;break;
        }

        this.brush.setSpeed(speed);
    }

}
```