

Car self-stabilization mode

1. Experimental purpose

Drive the car in self-stabilization mode

2. Experimental path source code

Enter the car system, end the car program, enter "ip (ip is the car's ip): 8888" in the browser, enter the password "yahboom"



Password:

Then log in

Enter the path of **Rider-pi_class/3.Base Motion/5. Self stabilizing mode of the car** and run **car_selfstab.ipynb**.

3. Experimental phenomenon

After running the code, drag the slider to select the state of the car being self-stabilized or not. **The car cannot be in a stopped state (i.e. not in a standing balance state), otherwise it cannot move.**

Self-stabilizing state:



```
[2]: def set_balance(value):  
      g_car.rider_balance_roll(value)  
  
      #创建滑块开启自稳和不自稳  
      interact(set_balance, \  
               value=widgets.IntSlider(min=0,max=1,step=1,value=0));
```

value 1

4. Analysis of main source code parameters

```
def set_balance(value):  
    g_car.rider_balance_roll(value)  
  
    #Create a slider to enable self-stabilization and non-self-stabilization  
    interact(set_balance, \  
             value=widgets.IntSlider(min=0,max=1,step=1,value=0));
```

rider_balance_roll: This function turns on the car's self-stabilizing mode, 1: start, 0: stop.

