Prerequisites for the use of ROS driver：

1. Ubuntu16/ubuntu18/ubuntu20 Operation System
2. ROS1 has been installed in Ubuntu
3. Check whether CAN communication is available
   1. Connect the CAN adapter to the USB interface of the computer.
   2. Open terminal, input command “lsusb” , if sees the following contents in the output information, it means that the CAN can be used normally:

PEAK Sysrem PCAN-USB

2. Startup settings

2.1. Check whether there is an “rc.local” file under the /etc/ content. If not, please “sudo cp rc.local/etc”. If the “rc.local” file exists, add the following content to the “exit 0” of the rc.local file and save it:

sleep 2

sudo ip link set can0 type can bitrate 500000

sudo ip link set can0 up

2.2. Before startup or restart, the CAN adapter has been connected to the USB port of computer.

2.3. When you observe “RX” and “TX” lights on, the setting is successful.

3. Instant settings

3.1. After resetting the CAN adapter, execute the following command to enable the CAN adapter.

sudo ip link set can0 type can bitrate 500000

sudo ip link set can0 up

3.2. When RX and TX lights are on, it means the setting is successful.

1. Communication test
   1. Connect the CAN wire of the chassis to the CAN adapter. The red wire of the chassis is connected to the CANH on CAN adapter, and the black wire of the chassis is connected to the CANL.
   2. After correct connection, the blue receiving lamp of the CAN adapter flashes. If the blue lamp does not flash, check whether the chassis is powered on and whether the CAN wire is connected correctly. Attention (connect the CAN wire of the chassis directly to the CAN adapter, and connect the extension cable only after the communication is normal).
   3. After installing CAN utils (sudo apt get install can utils), open the terminal and enter “candump can0” can see that the CAN adapter receives the data from the chassis.
2. For the specific use of ROS driver package, please refer to the other documentation.