

Wristbit control Omni:bit car

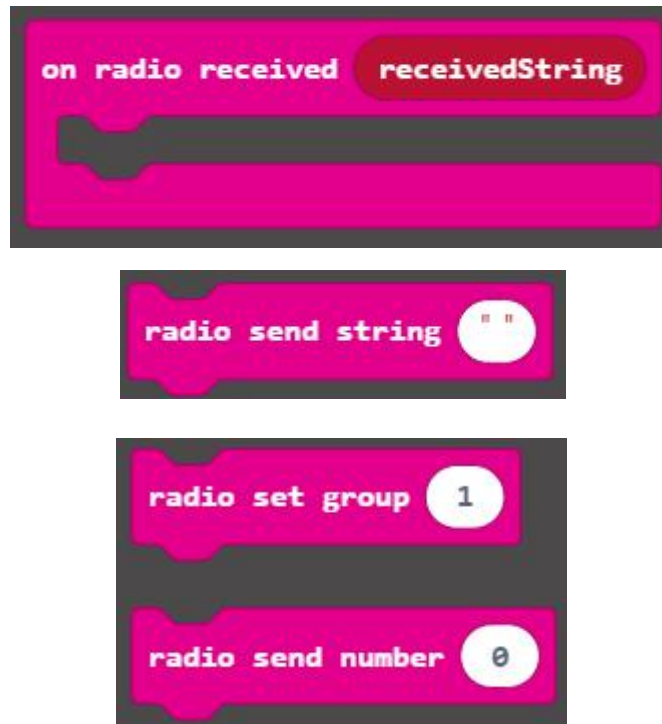
1. Learning goals

In this lesson, we will learn to use Wrist:bit control Omni:bit car.

2. Working principle

This course mainly uses the networking function of micro:bit to realize communication between two micro:bit motherboards. The two microbits need to be set in the same group, and the receivedStrings of the two receive the characters from the other to communicate.

In this course, we mainly use the building blocks shown in the figure below.



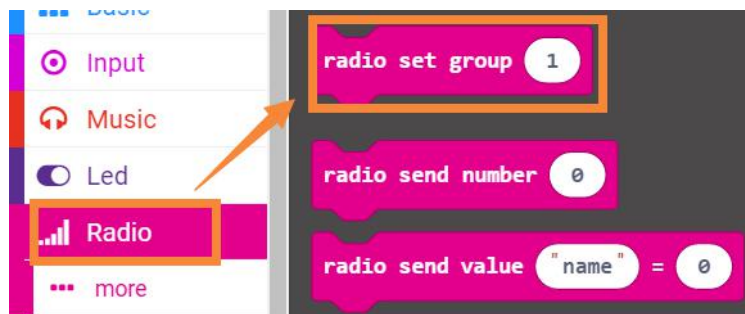
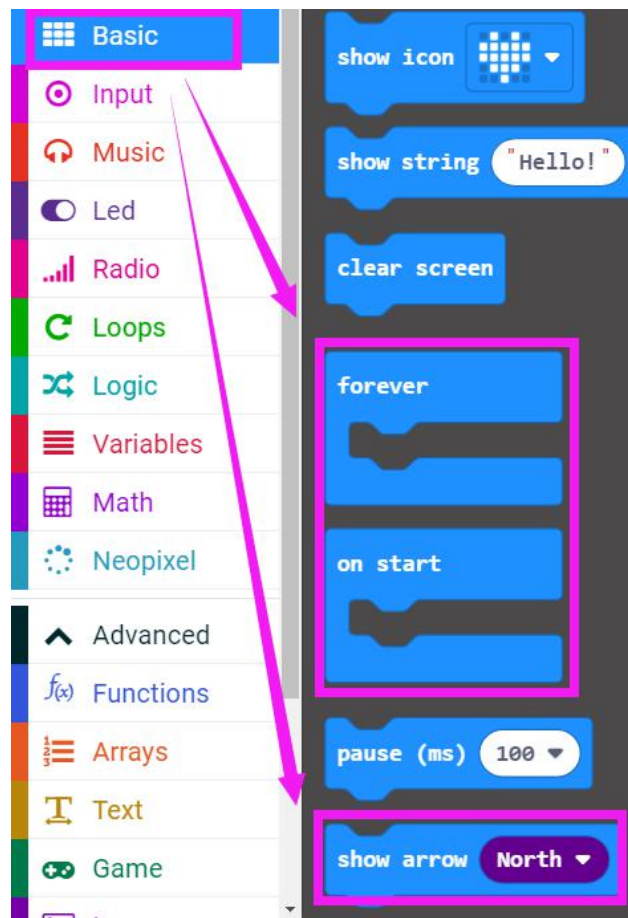
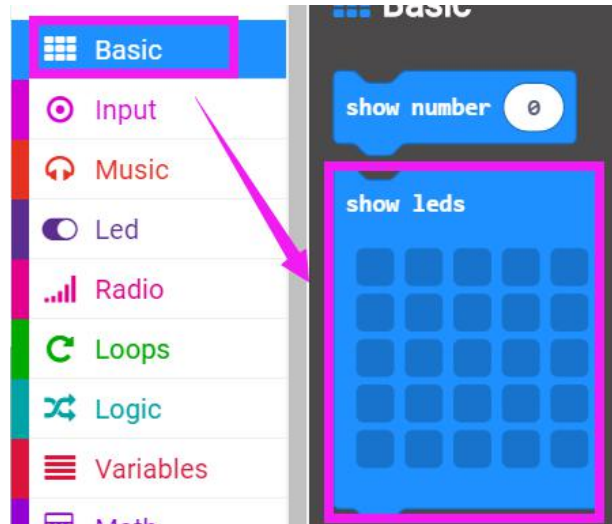
3. Programming method

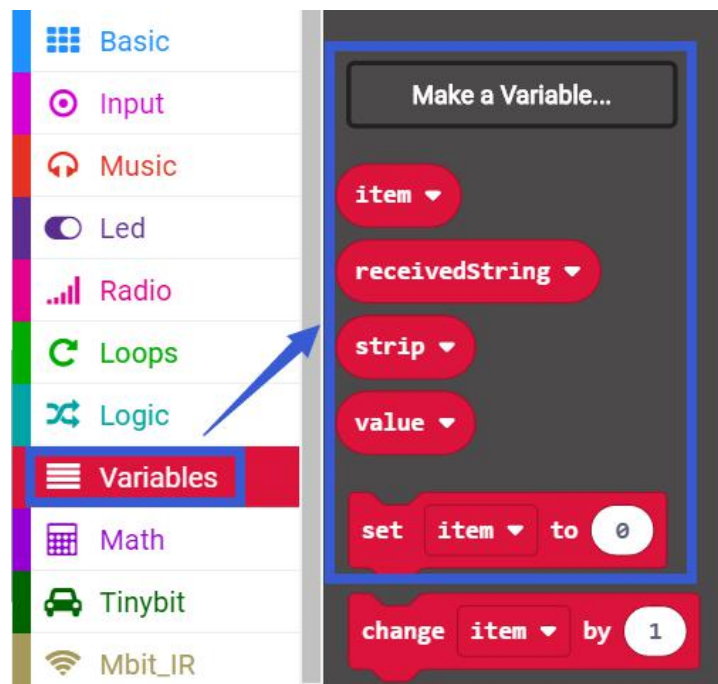
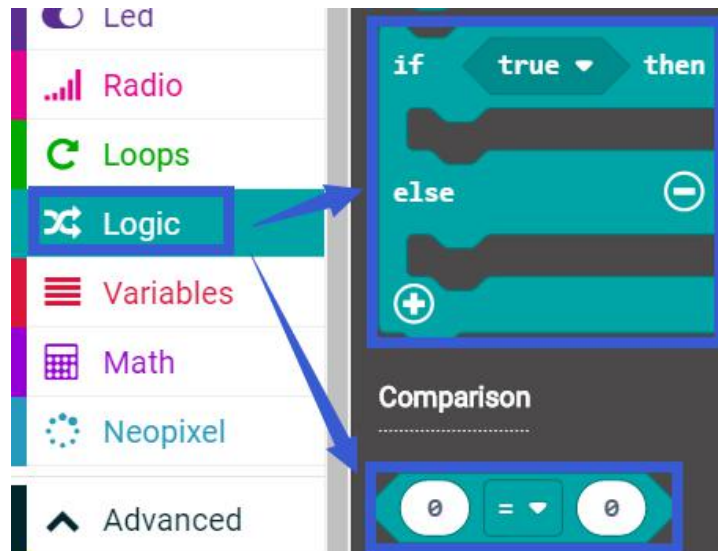
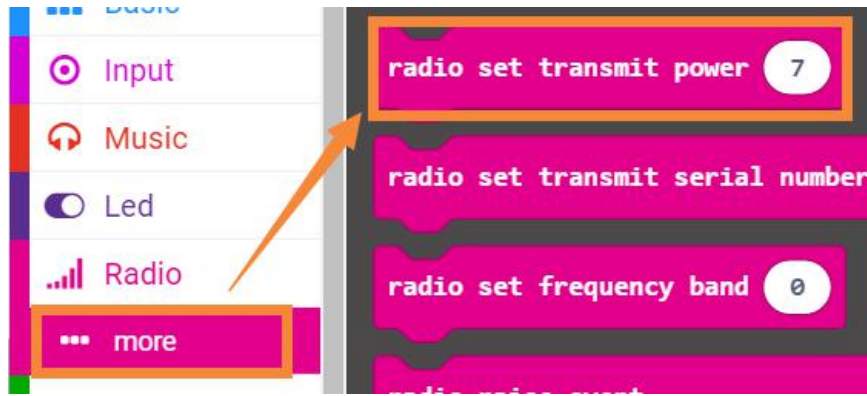
Mode 1 online programming: First, we need to connect the micro:bit to the computer by USB cable. The computer will pop up a USB flash drive and click on the URL in the USB flash drive: <http://microbit.org/> to enter the programming interface to program.

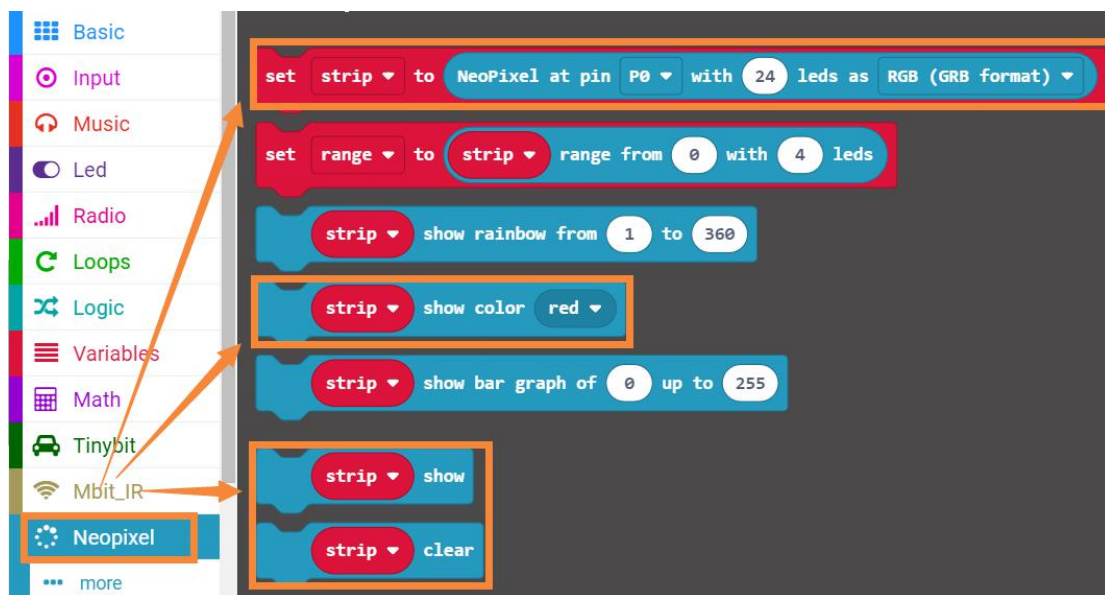
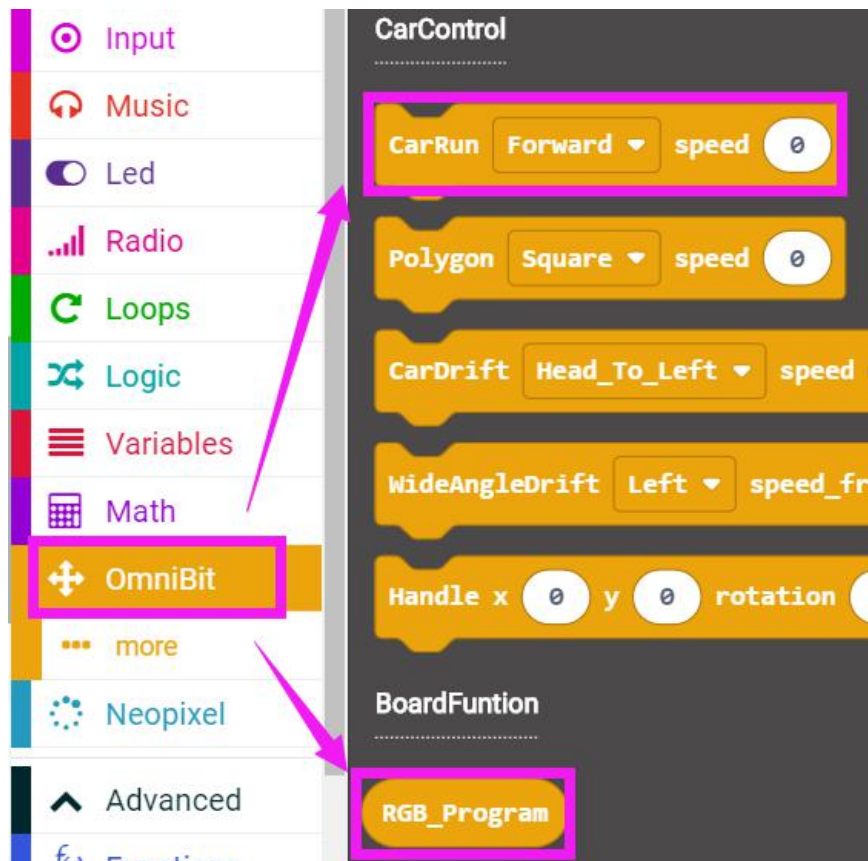
Mode 2 offline programming: We need to open the offline programming software. After the installation is complete, enter the programming interface, click 【New Project】 , you can program.

4. Looking for blocks

The following is the location of the building blocks required for this programming.



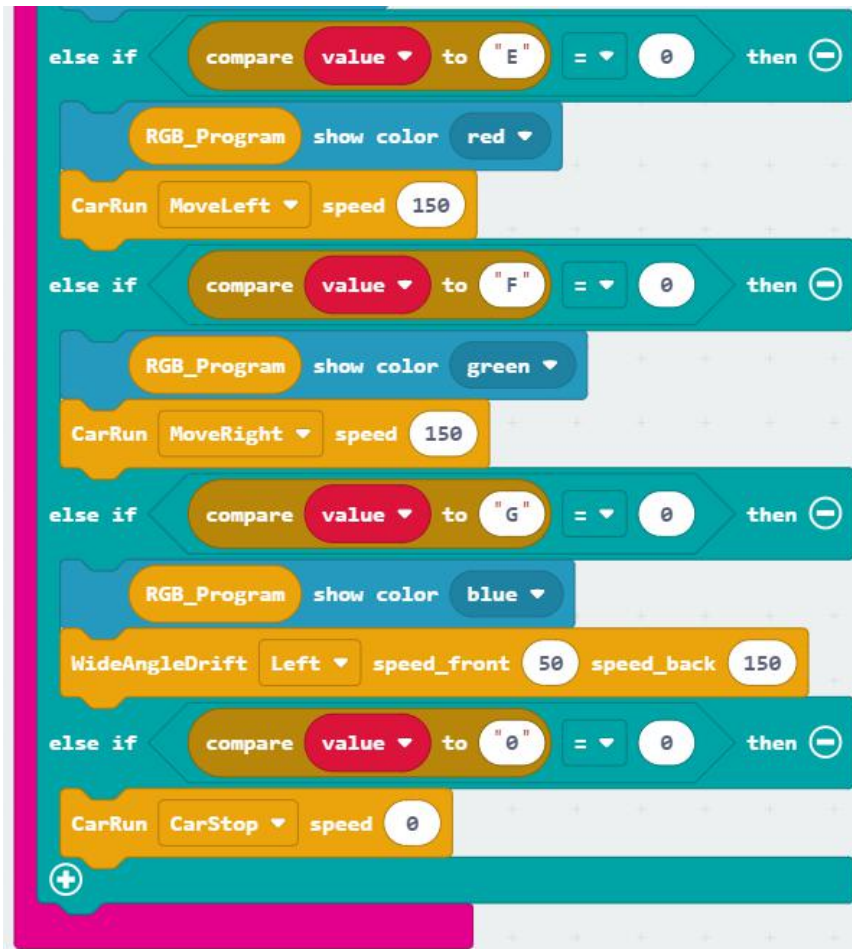




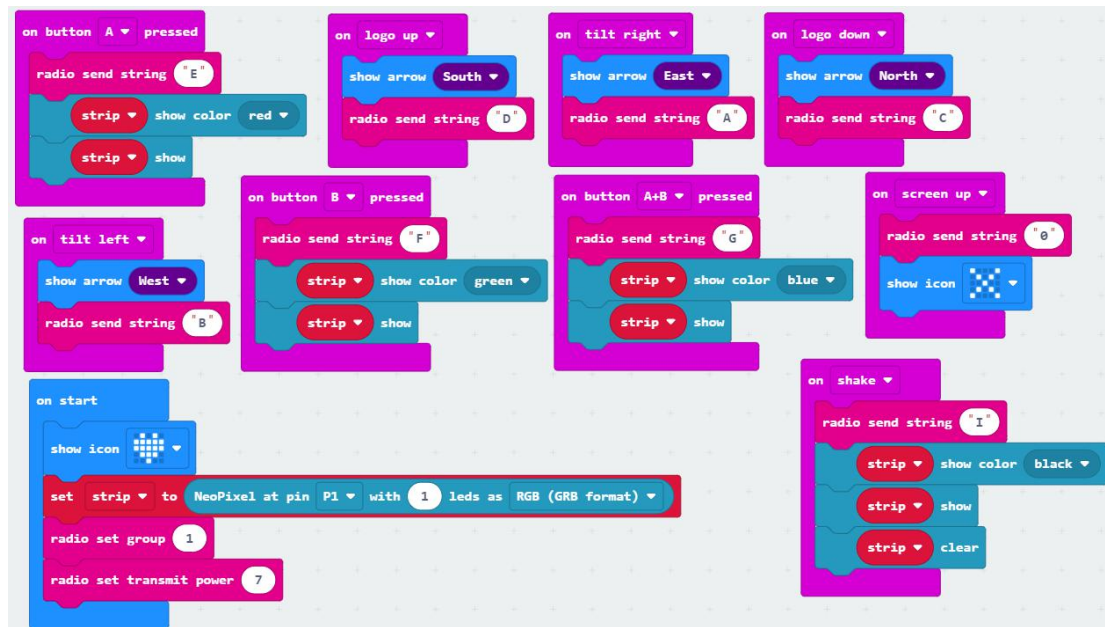
5. Combine block

Omni:bit car code as shown below.





Wrist:bit code code as shown below.

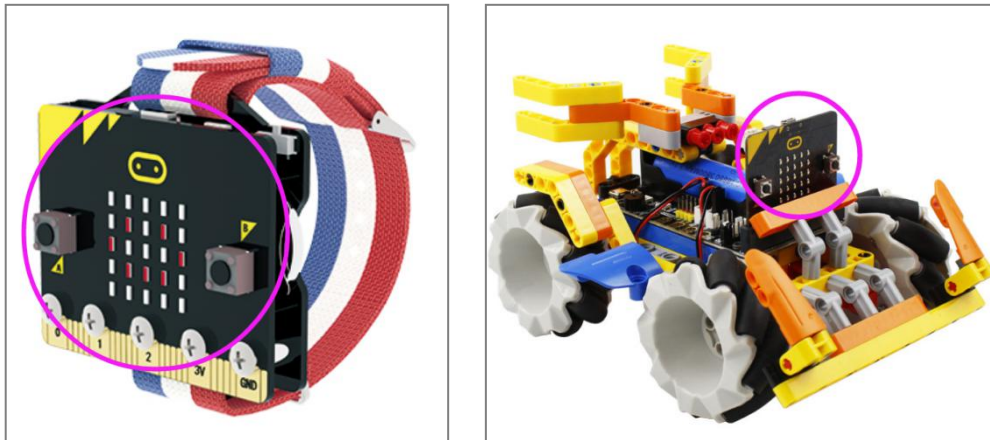


6. Experimental phenomena

We need to download microbit-Omnibit-code.hex file into micro:bit board of

Omni:bit car.

We need to download microbit-Wristbit-code.hex file into micro:bit board of Wristbit.



After the program is successfully downloaded. Take wrist:bit on your left wrist as shown below.



Omni:bit car dot matrix of will display a smile. Wrist:bit dot matrix will display a heart pattern.

if the wrist:bit is facing upward, car will stop;

if the micro:bit tilt left, the micro:bit dot matrix display arrow points to west, car will back;

if the micro:bit tilt right, the micro:bit dot matrix display arrow points to the east, car will advance;

If the micro:bit logo up, micro:bit dot matrix display points to the south, car will spin left;

if the micro:bit logo down, micro:bit dot matrix display points to the north, car will spin right;

if we press the button A, the RGB lights of the Wrist:bit and the car will become red. When we press button B, the RGB lights of the Wrist:bit and the car will become green.

if we press the A and B buttons at the same time, the RGB lights of the Wrist:bit and the car will become blue.

if we shaking the Wrist:bit, the RGB lights of Wrist:bit and the car will off.

