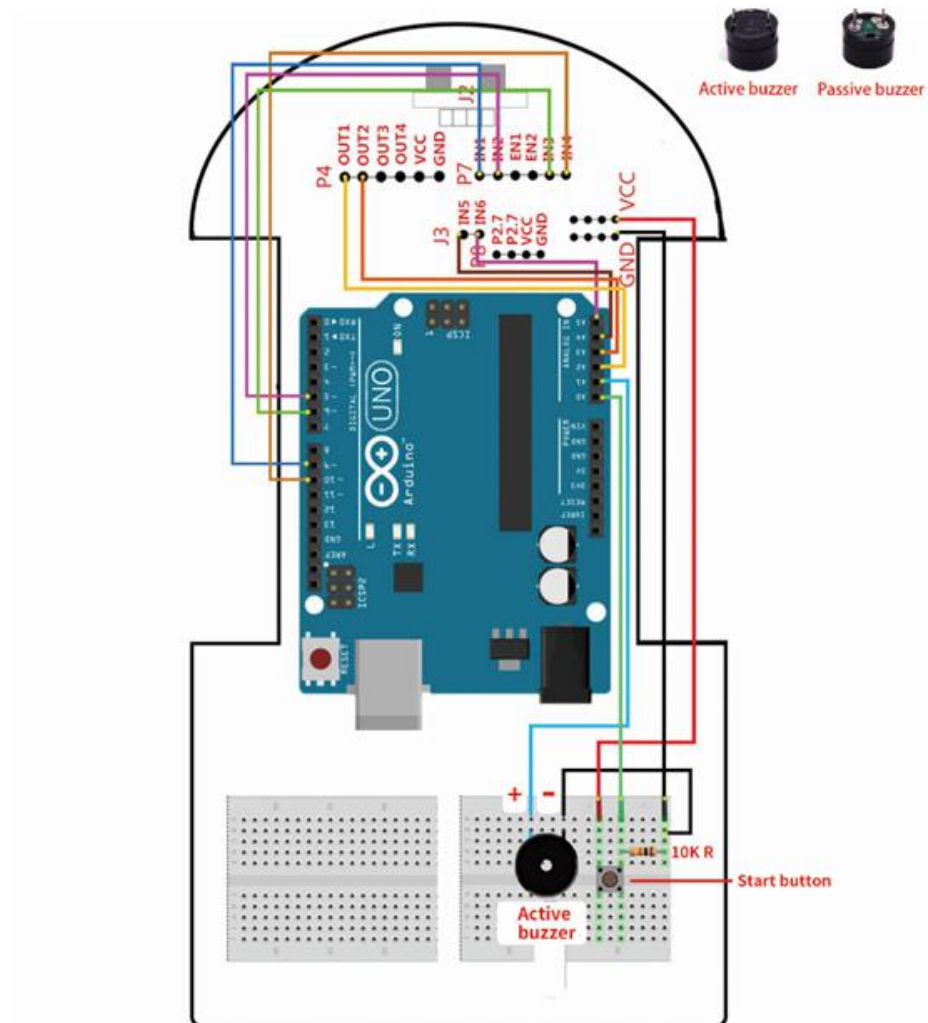


You need to follow the steps below to build blocks.



Material object wiring diagram:



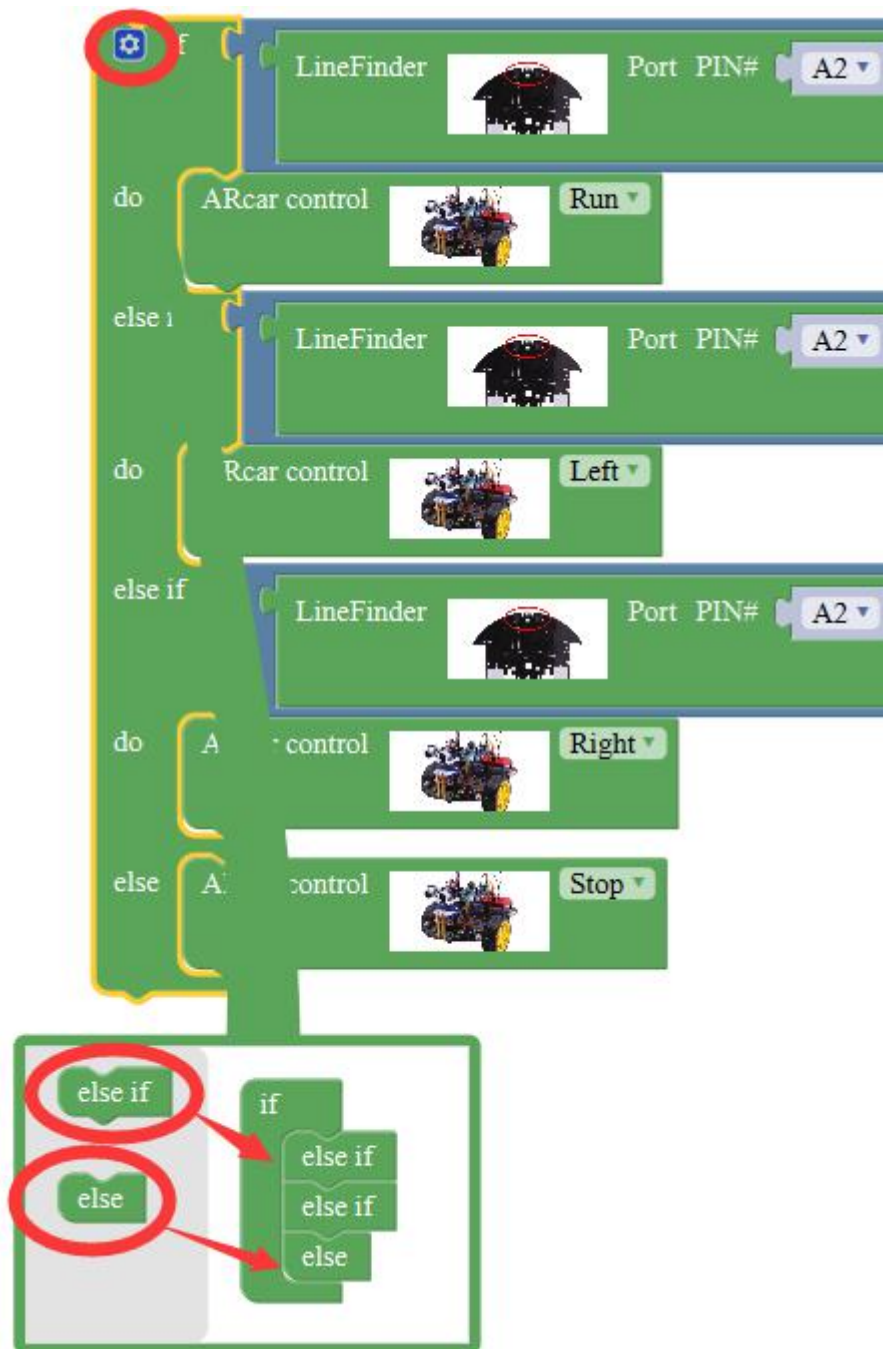
Note: At the J2 slot, insert the ultrasonic sensor as picture.

This experiment is a 2in1 comprehensive experiment. The car can detect the obstacles while tracking. When encountering an obstacle, the car stops waiting in place. After clearing obstacle, the car continues to track.

Steps of experiment:

1. You need to choose the building blocks which you need for this experiment, as shown in the figure below.





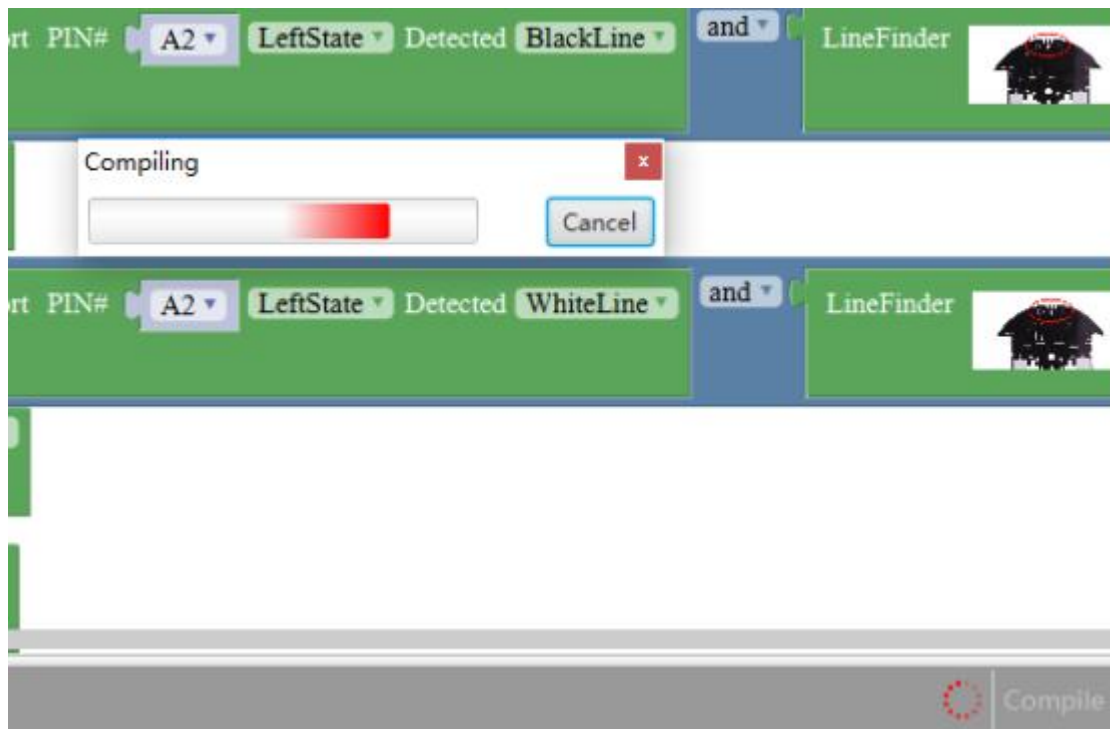
2.You need to combine the selected blocks, as shown in the figure below.



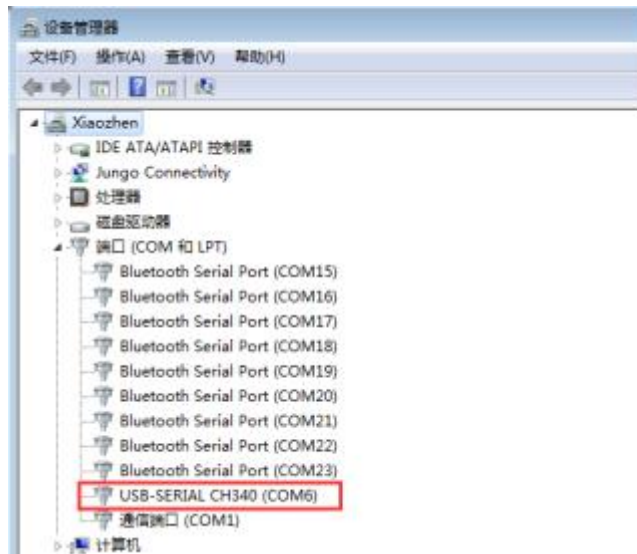
3. You need to click “**Compile**”. and wait for the completion of the compiler, the following box will prompt the compiler successfully, if prompt the compile failure is the problem of building block splicing.



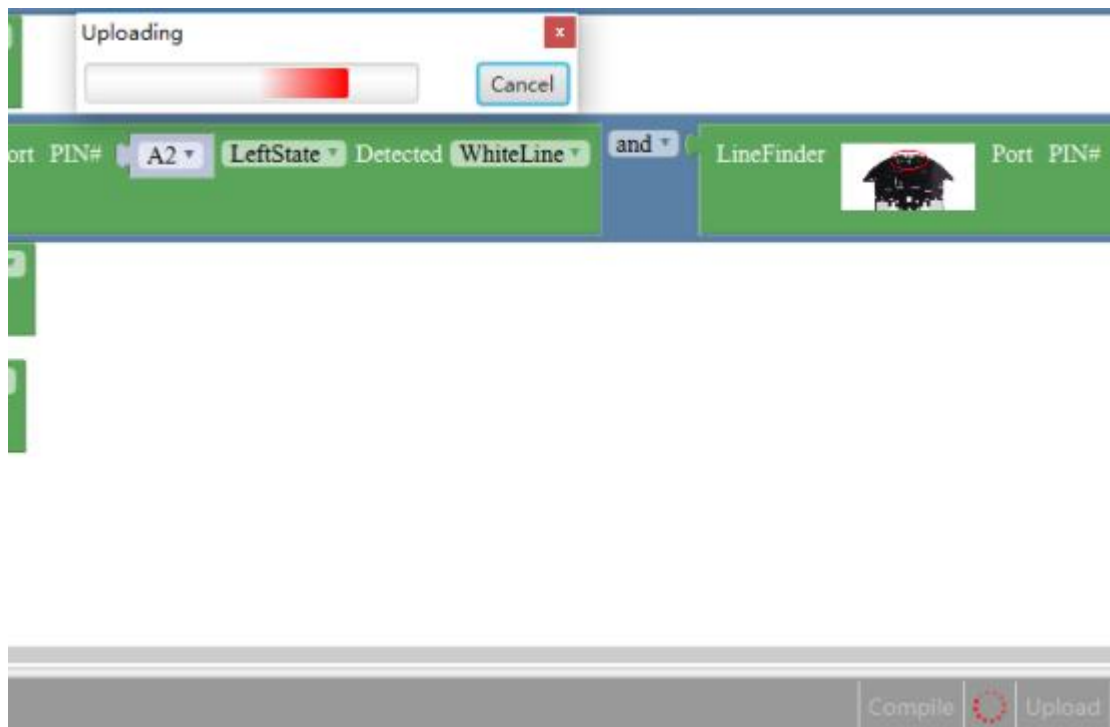
4. After the compilation is completed, the word "**Compile success!**" will appear in the lower left corner, indicating that you have successfully compiled the program.



5. In the menu bar of Mixly, we need to select the port that the serial number displayed by the device manager (for exmaple:COM6) and **Arduino/Genuino Uno**. As shown in the figure below.



6. After the selection is completed, you need to click “**Upload**” to upload the code to the Arduino UNO board. When the word “**Upload success**” appears in the lower left corner, the code has been successfully uploaded to the Arduino UNO board, as shown in the figure below.




```
New | Open | Save | Save as | Export | Import | Manager |
writing | ##### | 100% 0.26s

avrdude: 1782 bytes of flash written
avrdude: verifying flash memory against D:\YahBoom\mixlyBuild/testArduino.ino.hex:
avrdude: load data flash data from input file D:\YahBoom\mixlyBuild/testArduino.ino.hex:
avrdude: input file D:\YahBoom\mixlyBuild/testArduino.ino.hex contains 1782 bytes
avrdude: reading on-chip flash data:

Reading | ##### | 100% 0.22s

avrdude: verifying ...
avrdude: 1782 bytes of flash verified

avrdude done. Thank you.

Upload success!
```

7. After the code is uploaded, the car will drive along the black track.

The code of the experiment: [5. tracking.rar](#)