#include <AFMotor.h>

//initial motors pin

AF\_DCMotor motor1(1, MOTOR12\_1KHZ);

AF\_DCMotor motor2(2, MOTOR12\_1KHZ);

AF\_DCMotor motor3(3, MOTOR34\_1KHZ);

AF\_DCMotor motor4(4, MOTOR34\_1KHZ);

char command;

void setup()

{

Serial.begin(9600); //Set the baud rate to your Bluetooth module.

}

void loop(){

if(Serial.available() > 0){

command = Serial.read();

Stop(); //initialize with motors stoped

//Change pin mode only if new command is different from previous.

//Serial.println(command);

switch(command){

case 'F':

forward();

break;

case 'B':

back();

break;

case 'L':

left();

break;

case 'R':

right();

break;

}

}

}

void forward()

{

motor1.setSpeed(255); //Define maximum velocity

motor1.run(FORWARD); //rotate the motor clockwise

motor2.setSpeed(255); //Define maximum velocity

motor2.run(FORWARD); //rotate the motor clockwise

motor3.setSpeed(255);//Define maximum velocity

motor3.run(FORWARD); //rotate the motor clockwise

motor4.setSpeed(255);//Define maximum velocity

motor4.run(FORWARD); //rotate the motor clockwise

}

void back()

{

motor1.setSpeed(255); //Define maximum velocity

motor1.run(BACKWARD); //rotate the motor anti-clockwise

motor2.setSpeed(255); //Define maximum velocity

motor2.run(BACKWARD); //rotate the motor anti-clockwise

motor3.setSpeed(255); //Define maximum velocity

motor3.run(BACKWARD); //rotate the motor anti-clockwise

motor4.setSpeed(255); //Define maximum velocity

motor4.run(BACKWARD); //rotate the motor anti-clockwise

}

void left()

{

motor1.setSpeed(255); //Define maximum velocity

motor1.run(BACKWARD); //rotate the motor anti-clockwise

motor2.setSpeed(255); //Define maximum velocity

motor2.run(BACKWARD); //rotate the motor anti-clockwise

motor3.setSpeed(255); //Define maximum velocity

motor3.run(FORWARD); //rotate the motor clockwise

motor4.setSpeed(255); //Define maximum velocity

motor4.run(FORWARD); //rotate the motor clockwise

}

void right()

{

motor1.setSpeed(255); //Define maximum velocity

motor1.run(FORWARD); //rotate the motor clockwise

motor2.setSpeed(255); //Define maximum velocity

motor2.run(FORWARD); //rotate the motor clockwise

motor3.setSpeed(255); //Define maximum velocity

motor3.run(BACKWARD); //rotate the motor anti-clockwise

motor4.setSpeed(255); //Define maximum velocity

motor4.run(BACKWARD); //rotate the motor anti-clockwise

}

void Stop()

{

motor1.setSpeed(0); //Define minimum velocity

motor1.run(RELEASE); //stop the motor when release the button

motor2.setSpeed(0); //Define minimum velocity

motor2.run(RELEASE); //rotate the motor clockwise

motor3.setSpeed(0); //Define minimum velocity

motor3.run(RELEASE); //stop the motor when release the button

motor4.setSpeed(0); //Define minimum velocity

motor4.run(RELEASE); //stop the motor when release the button

}