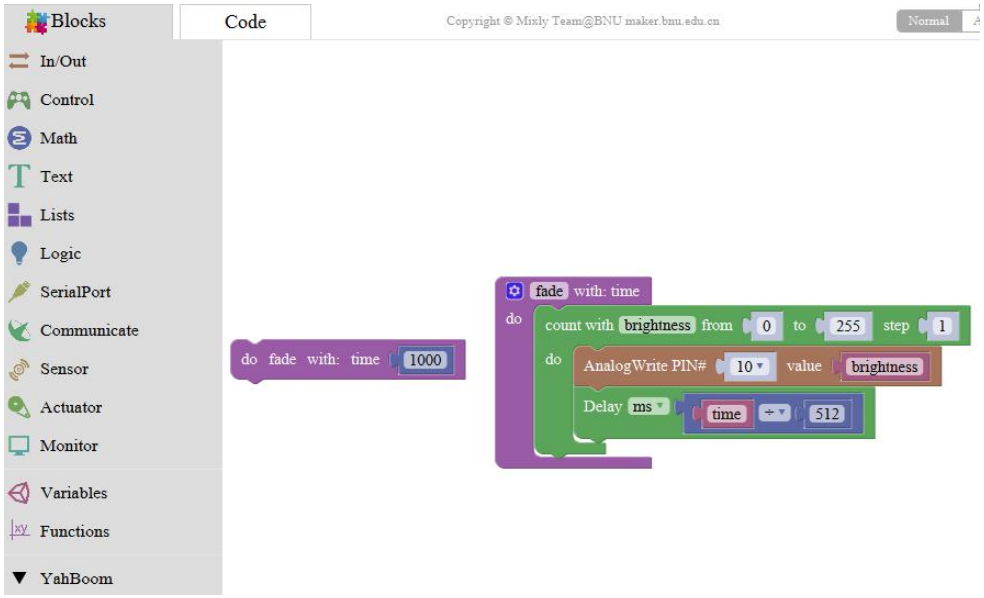
Course8--PWM dimming

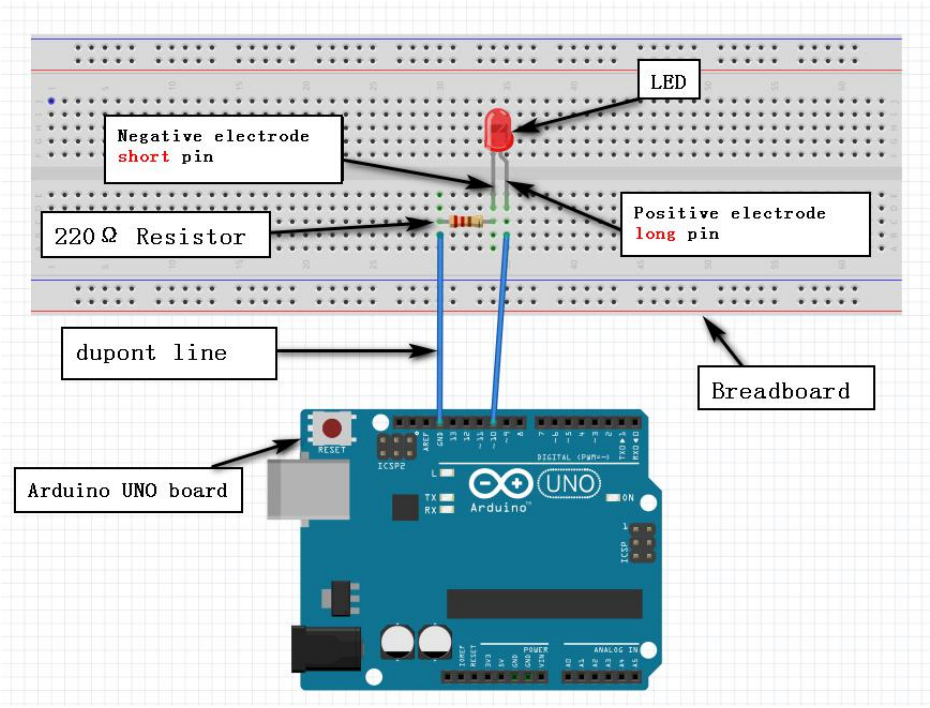
You need to follow the steps below to build blocks.



List of components required for the experiment:

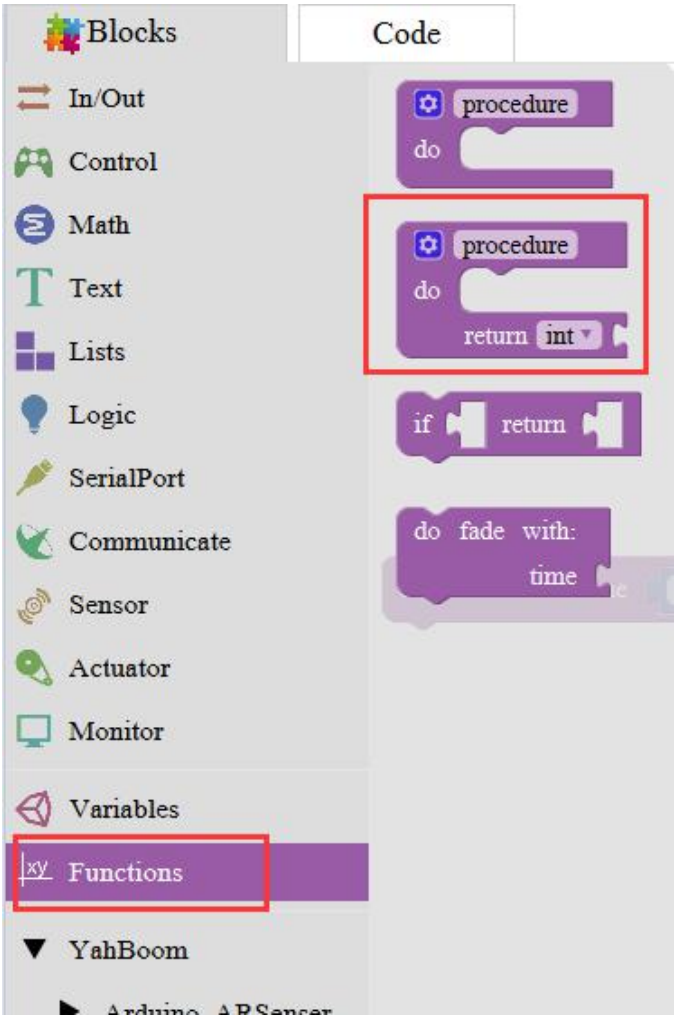
Arduino UNO board *1
USB cable *1
LED*1 (color random)
220Ω resistor *1
Breadboard *1
Dupont line *1 bunch

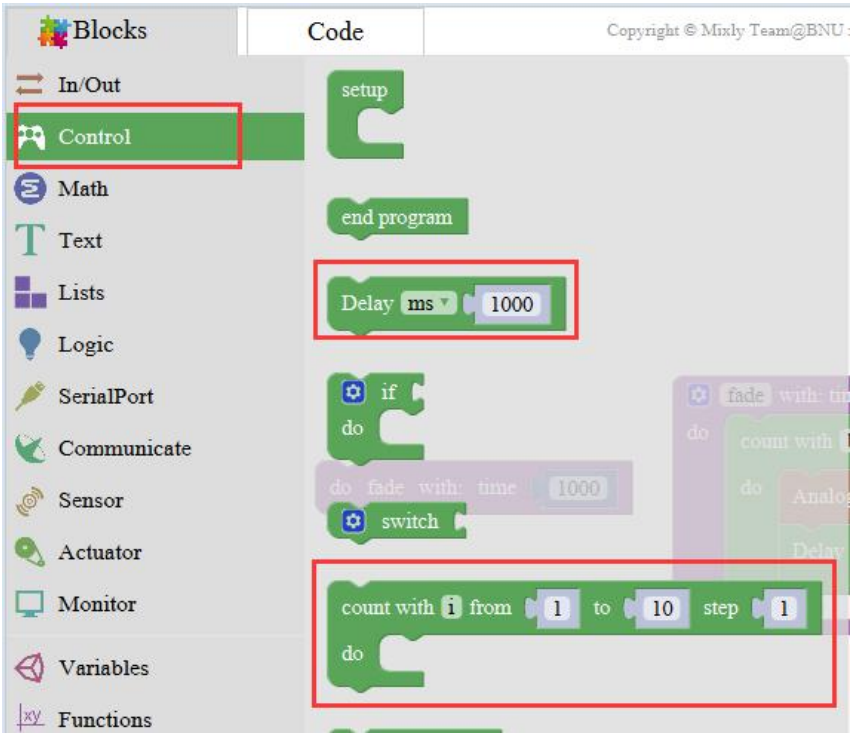
Actual object wiring diagram:

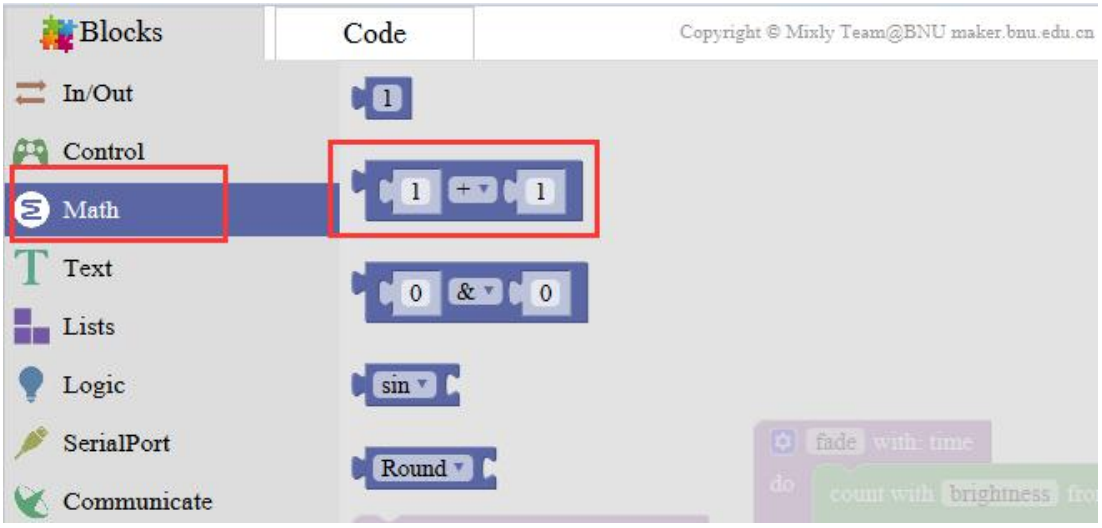


Steps of experiment:

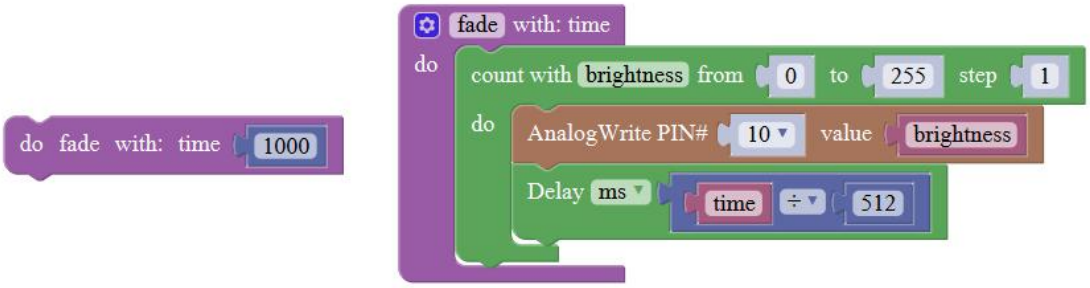
1.You need to choose the building blocks which you need for this experiment, as shown in the figure below.




Blocks
Code
Copyright © Mixly Team@BNU
In/Out
Control
Math
Text
Lists
Logic
SerialPort
Communicate
Sensor
Actuator
Monitor
Variables
Functions
setup
end program
Delay ms 1000
if
do
do fade with time 1000
switch
count with i from 1 to 10 step 1
do

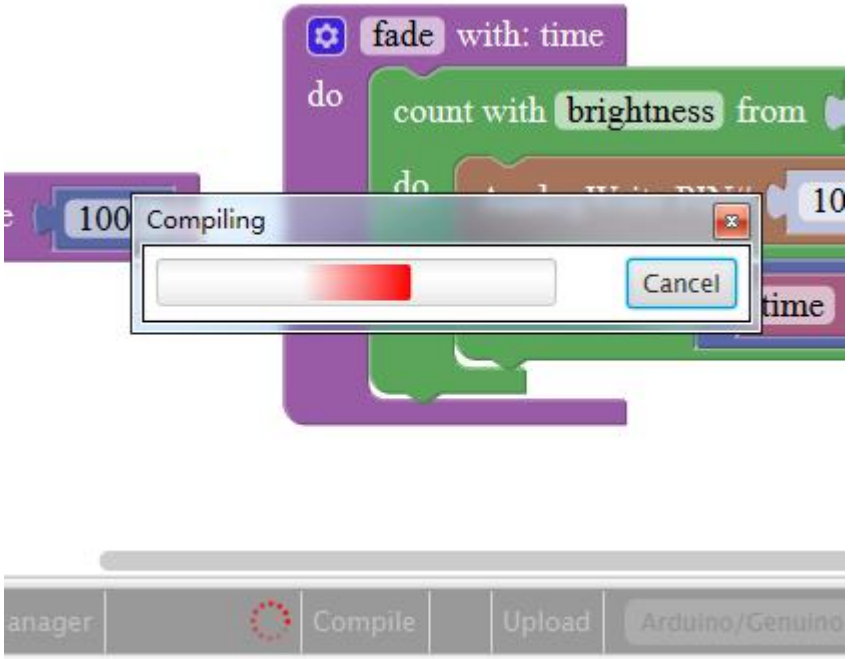

Blocks
Code
Copyright © Mixly Team@BNU maker.bnu.edu.cn
In/Out
Control
Math
Text
Lists
Logic
SerialPort
Communicate
1
1 + 1
0 & 0
sin
Round
fade with time
do
count with brightness

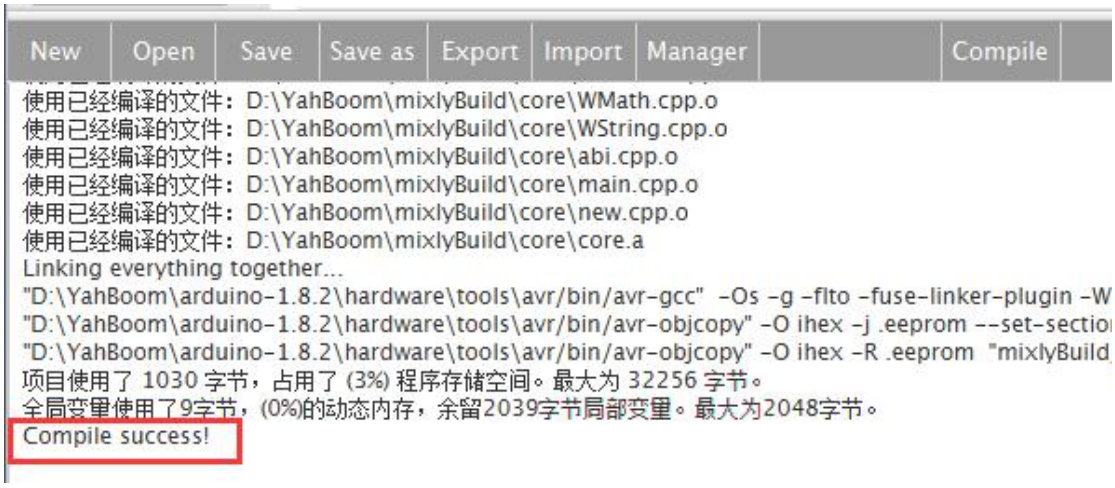
2.You need to combine the selected blocks, as shown in the figure below.



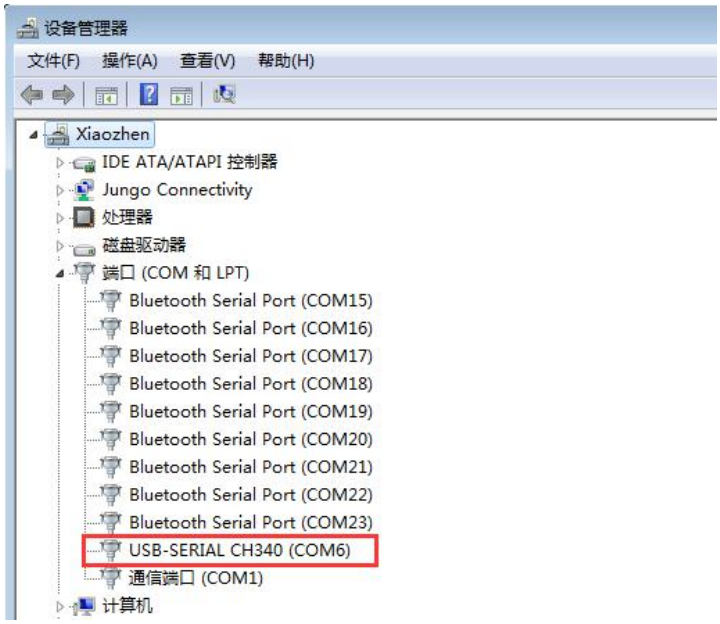
3.You need to you need to click "**Compile**". and wait for the completion of the compiler, the following box will prompt the compiler successfully, if prompt the compile failure is the problem of building block splicing.

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.

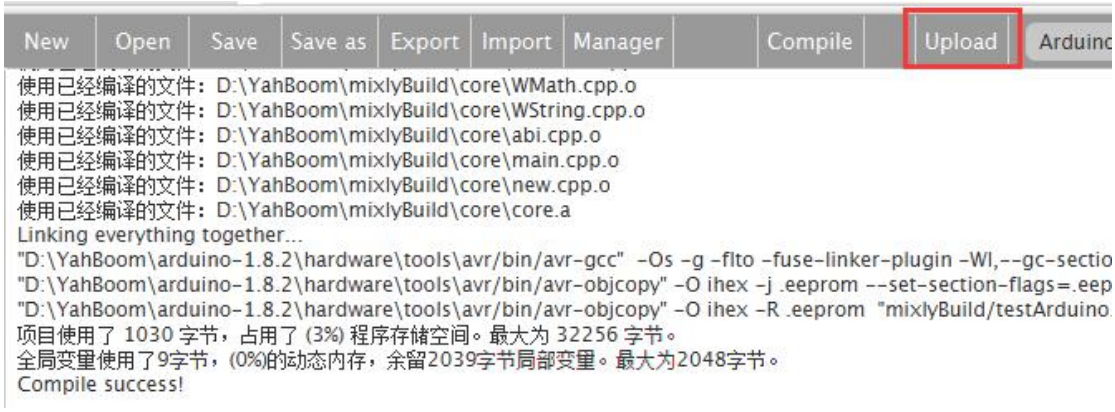


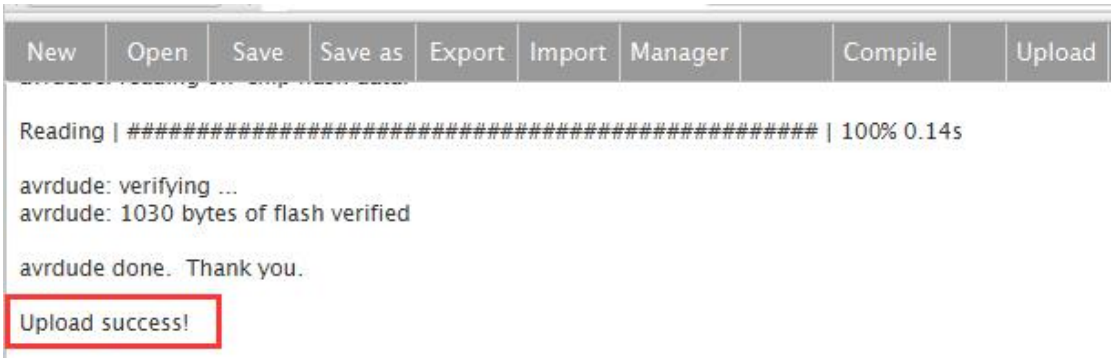


5. In the menu bar of Mixly, we need to select the port that the serial number displayed by the device manager (for exmaple:COM6) and **Arduino/Genuino Uno.** As shown in the figure below.



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.





7. 7.After the code is uploaded, we can see that the LED slowly cycles from dark to light to dark, and it keeps looping. As shown in the figure below.