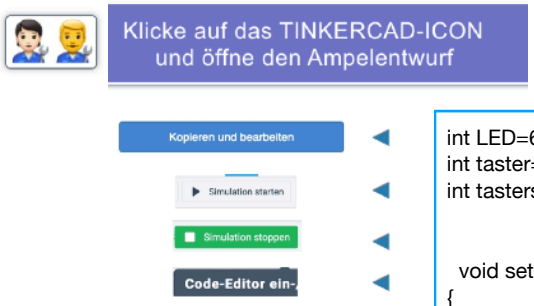
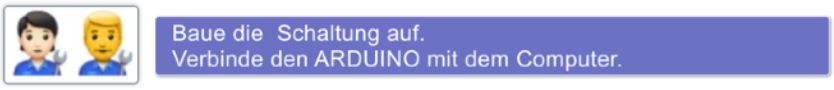
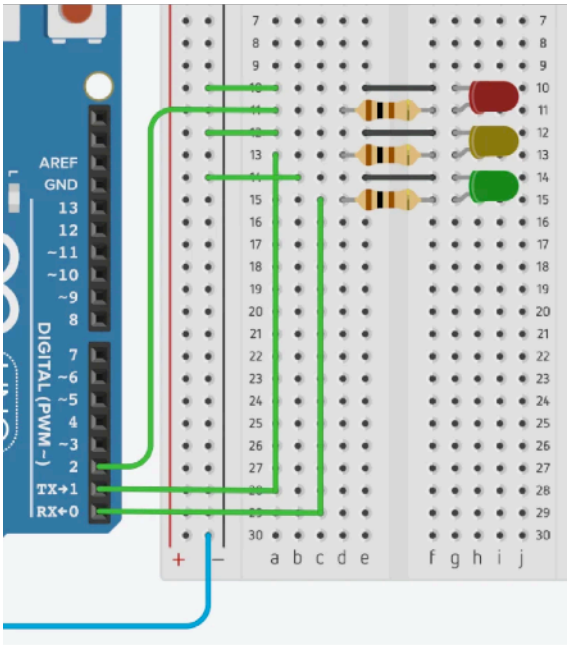
www.werken-technik.de/Arduino/ue20-ampelsteuerung-einfache-ampel.html

Programmierung einer einfachen Ampel



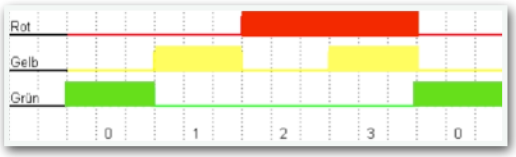
führe diese Schritte aus.
Verändere die Ampelzeiten!





- *Starte das ARDUINO Programmfenster und klicke auf neues Programmfenster:*

- *kopiere oben den Programm-Code*
- *Lade ihn hoch auf den ARDUINO.*
- *Verändere die Blinkzeiten im Programmcode lade den veränderten Code hoch*



Ampelphasen:

rot	30 Sekunden
rotgelb	4 Sekunde
grün	30 Sekunden
gelb	3 Sekunden

Programm-Code:

```
int LED=6;
int taster=7;
int tasterstatus=0;


 void setup()
{
 pinMode(LED, OUTPUT);
 pinMode(taster, INPUT);
}

void loop()
{
 tasterstatus=digitalRead(taster);
 if (tasterstatus == HIGH)

{
 digitalWrite(LED, HIGH);
 delay(5000); // 5 Sekunden warten

 digitalWrite(LED, LOW);
}
 else
{
 digitalWrite(LED, LOW);

}

}int led_red = 0; // LED rot
int led_yellow = 1; //LED gelb
int led_green = 2; // LED grün

void setup() {
 // set up all the LEDs as OUTPUT
 pinMode(led_red, OUTPUT);
 pinMode(led_yellow, OUTPUT);
 pinMode(led_green, OUTPUT);
}

void loop() {
 // turn the green LED on and the other LEDs off
 digitalWrite(led_red, LOW);
 digitalWrite(led_yellow, LOW);
 digitalWrite(led_green, HIGH);
 delay(4000);    // wait 6 seconds

 // turn the yellow LED on and the other LEDs off
 digitalWrite(led_red, LOW);
 digitalWrite(led_yellow, HIGH);
 digitalWrite(led_green, LOW);
 delay(500);   // wait 1 second

 // turn the red LED on and the other LEDs off
 digitalWrite(led_red, HIGH);
 digitalWrite(led_yellow, LOW);
 digitalWrite(led_green, LOW);
 delay(5000);  // wait 3 seconds

 // turn the yellow LED on and the other LEDs off
 digitalWrite(led_red, LOW);
 digitalWrite(led_yellow, HIGH);
 digitalWrite(led_green, LOW);
 delay(500);   // wait 1 second
}
```