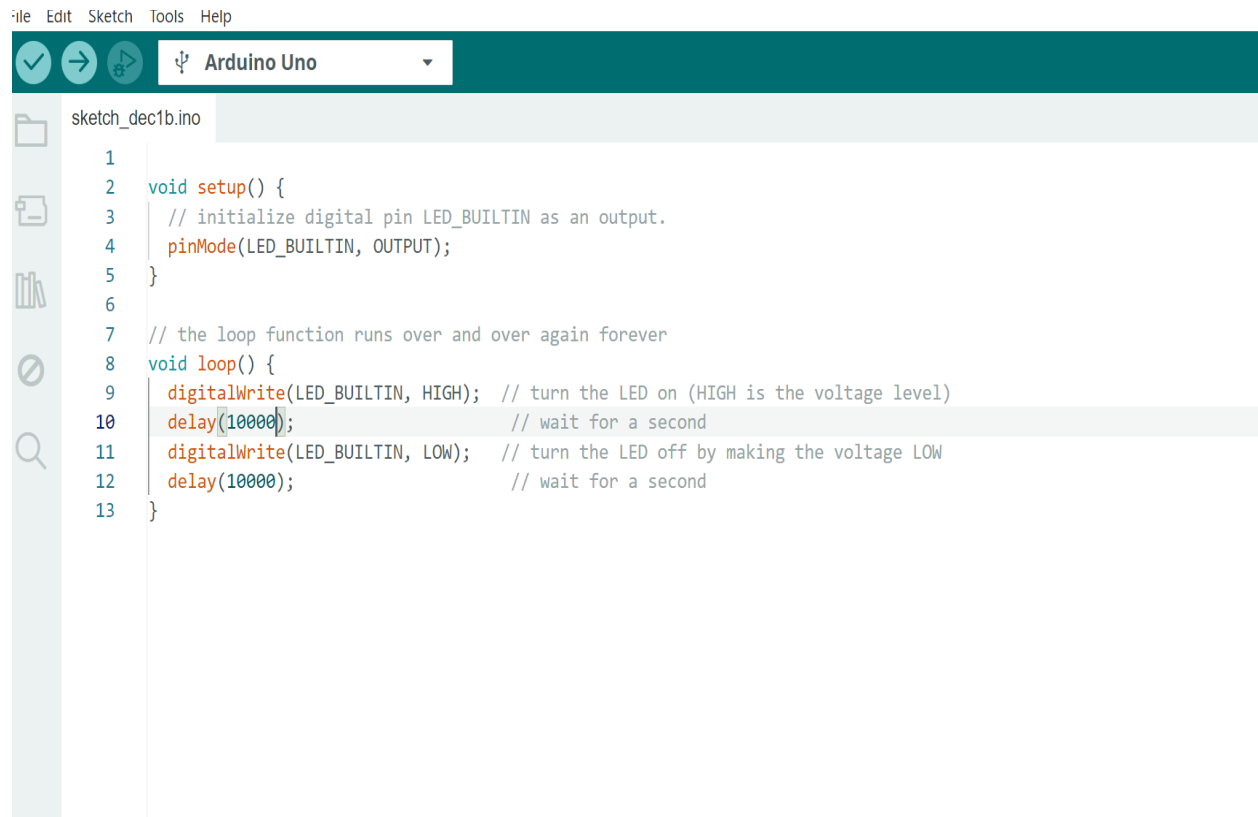


Fundamental Knowledge About Arduino Uno



The screenshot shows the Arduino IDE interface. At the top, there is a menu bar with 'File', 'Edit', 'Sketch', 'Tools', and 'Help'. Below the menu bar is a toolbar with icons for checking, running, and uploading code. A dropdown menu shows 'Arduino Uno'. The main workspace displays a sketch named 'sketch_dec1b.ino'. The code is as follows:

```
1
2 void setup() {
3   // initialize digital pin LED_BUILTIN as an output.
4   pinMode(LED_BUILTIN, OUTPUT);
5 }
6
7 // the loop function runs over and over again forever
8 void loop() {
9   digitalWrite(LED_BUILTIN, HIGH); // turn the LED on (HIGH is the voltage level)
10  delay(10000); // wait for a second
11  digitalWrite(LED_BUILTIN, LOW); // turn the LED off by making the voltage LOW
12  delay(10000); // wait for a second
13 }
```

This is an Arduino sketch to blink the built-in LED on an Arduino Uno. The `pinMode(LED_BUILTIN, OUTPUT)` function sets the LED pin as an output. The `digitalWrite` commands turn the LED on and off, with a delay of 10 seconds in between using `delay(10000)`. This simple program demonstrates the use of basic digital I/O and timing functions.

