

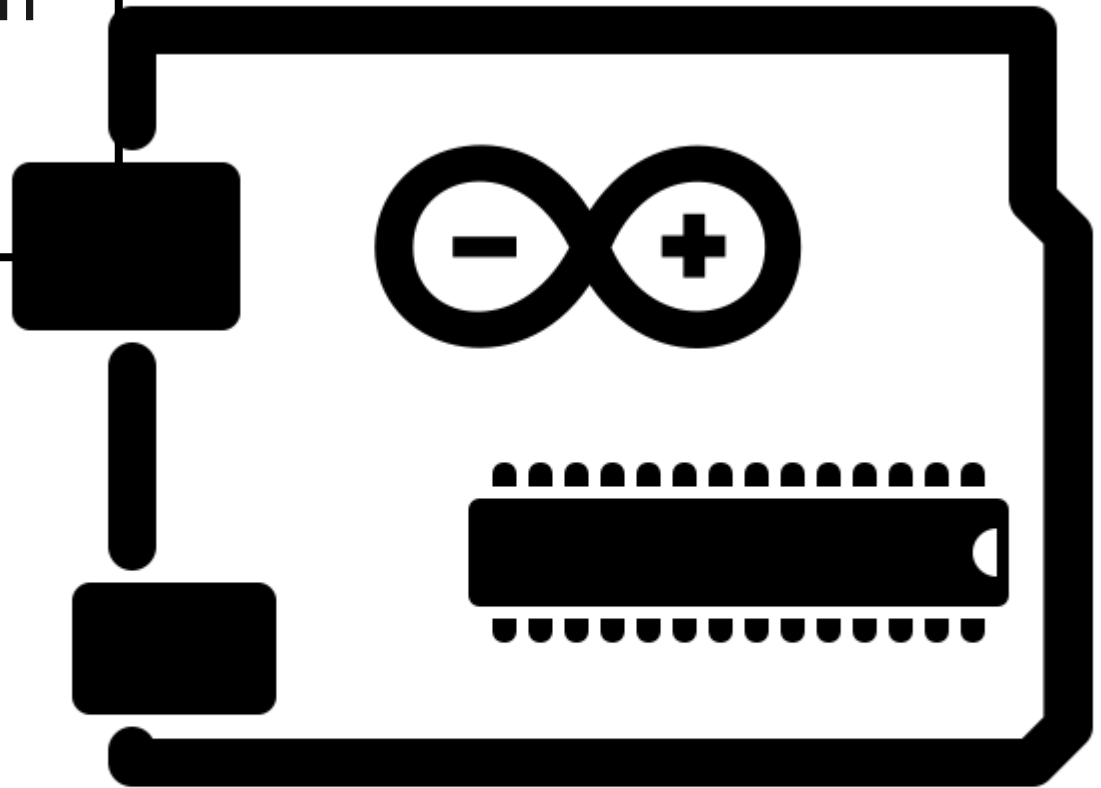
# A1

## Arduino

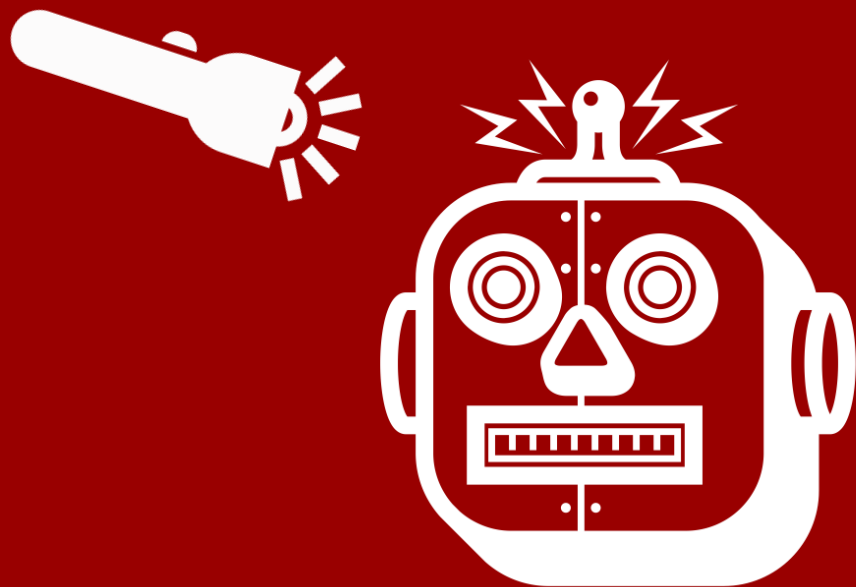
Equipamento e Instalação

É uma plataforma  
de prototipagem  
eletrônica de  
hardware livre.

# O que é um Arduino?



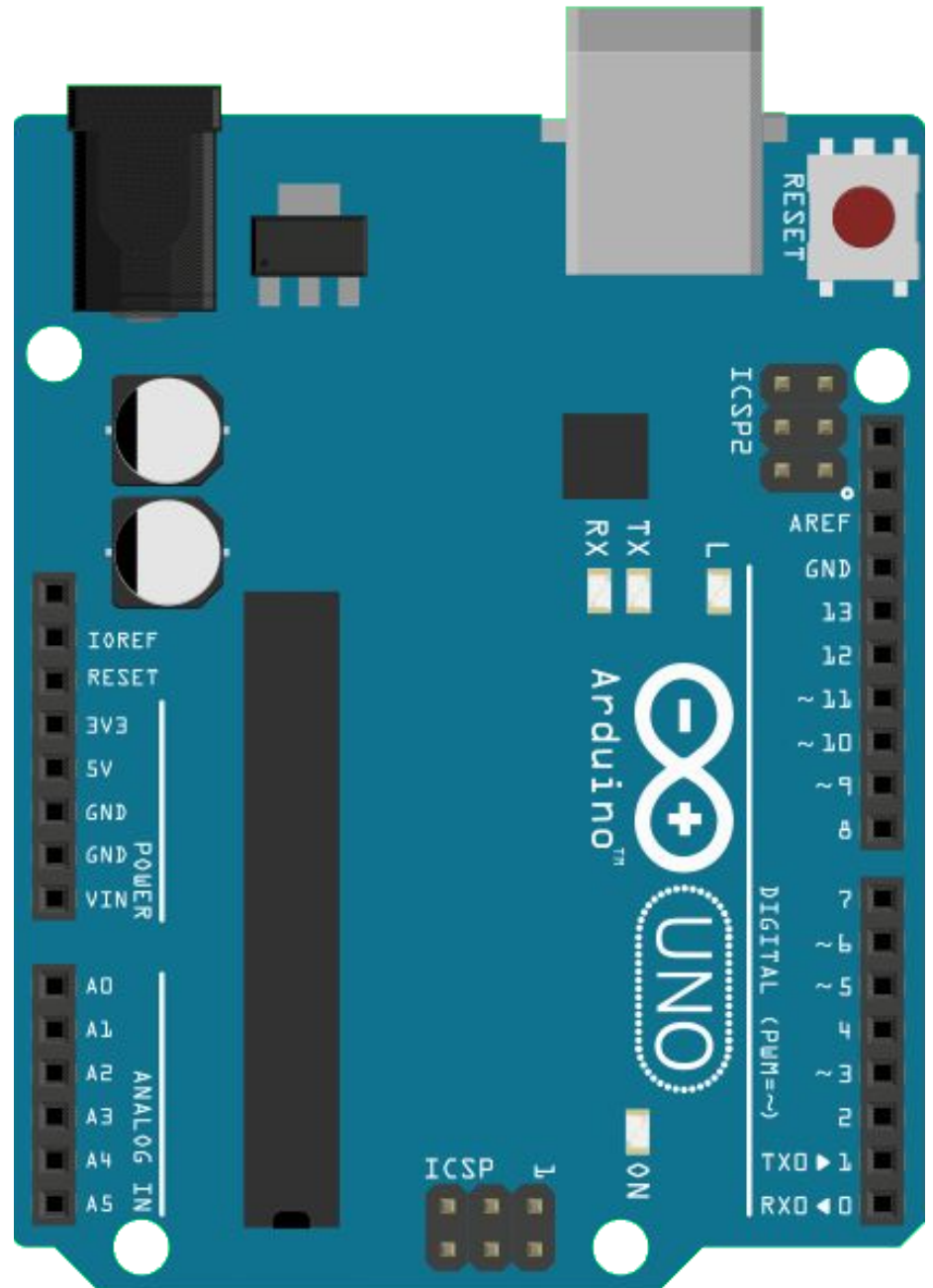
# O que é possível fazer com um Arduíno?



Um robô que segue a luz ou contorna obstáculos, uma cafeteira que twitta, um regador automático, um capacete neural, um carrinho de corrida de labirinto, um foguete, uma cadeira de massagem, um...

# Arduino UNO

Há mais de um modelo de Arduino. A maioria vai trabalhar com o Arduino UNO.



**Além do Arduino vamos precisar de um computador, qualquer um :)**

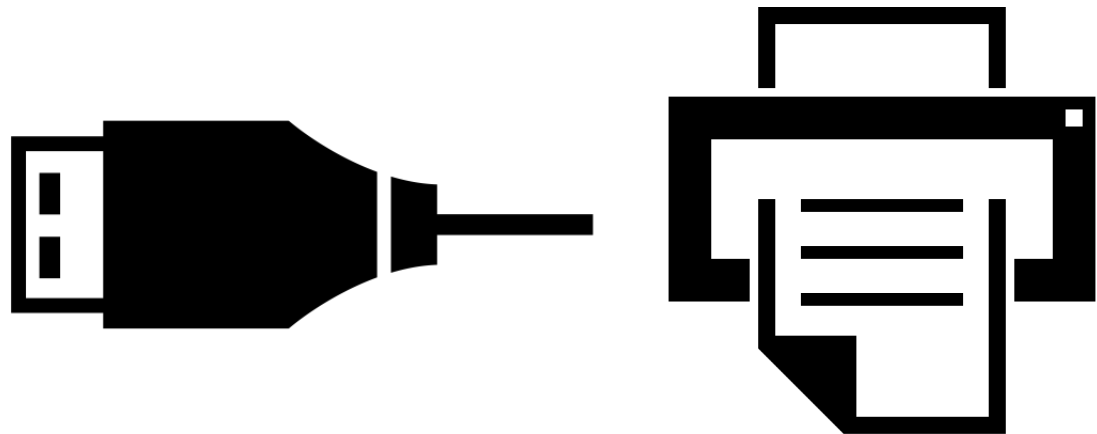
O Arduino é multiplataforma.

Podemos escrever código a partir do Windows, do Mac e do Linux.



**E para  
conectar o  
meu Arduíno  
ao meu  
computador?**

No caso dos  
nossos Arduinos,  
usaremos um cabo  
USB B igual ao de  
impressora.



# Vamos começar então?

O primeiro passo é instalar o software a partir do site oficial do Arduíno!

<https://www.arduino.cc>



SIGN IN

HOME

BUY

SOFTWARE

PRODUCTS

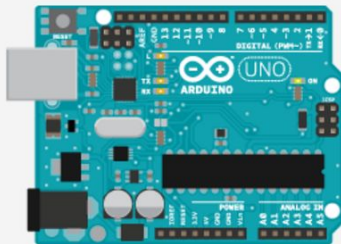
LEARNING

FORUM

SUPPORT

BLOG

WHAT IS ARDUINO?



BUY AN ARDUINO



LEARN ARDUINO



SUPPORT ARDUINO



BLOG

THIS GIANT  
ELECTROMECHANICAL  
CLOCK IS A WORK OF ART



PROJECT HUB

INSPIRATION FOR  
YOUR PROJECTS!





# Instale a versão compatível com seu sistema operacional (OS)

## Download the Arduino IDE



### ARDUINO 1.8.3

The open-source Arduino Software (IDE) makes it easy to write code and upload it to the board. It runs on Windows, Mac OS X, and Linux. The environment is written in Java and based on Processing and other open-source software.

This software can be used with any Arduino board. Refer to the [Getting Started](#) page for Installation instructions.

**Windows** Installer

**Windows** ZIP file for non admin install

**Windows app** 

**Mac OS X** 10.7 Lion or newer

**Linux** 32 bits

**Linux** 64 bits

**Linux** ARM

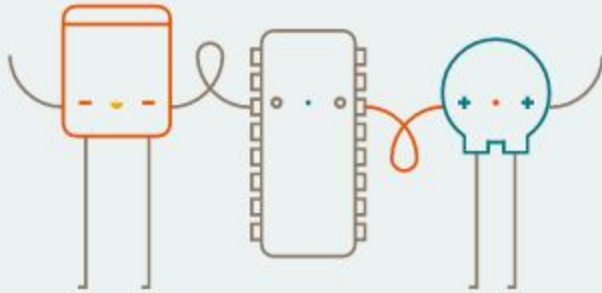
[Release Notes](#)

[Source Code](#)

[Checksums \(sha512\)](#)

Provavelmente é **Linux 32-bits**

# Sinta-se à vontade para doar ;)



SINCE MARCH 2015, THE ARDUINO IDE HAS BEEN DOWNLOADED **05621238** TIMES. IMPRESSIVE! THIS IDE IS NO LONGER JUST FOR ARDUINO AND GENUINO BOARDS. HUNDREDS OF COMPANIES AROUND THE WORLD ARE USING IT TO PROGRAM THEIR DEVICES, INCLUDING COMPATIBLES, CLONES, AND EVEN COUNTERFEIT. YOU CAN HELP ACCELERATE THE DEVELOPMENT OF THE ARDUINO IDE BY CONTRIBUTING TOWARDS THE EFFORT OF MAKING IT BETTER.

**\$5**

**\$10**

**\$25**

**\$50**

**OTHER**

JUST DOWNLOAD

**CONTRIBUTE & DOWNLOAD**

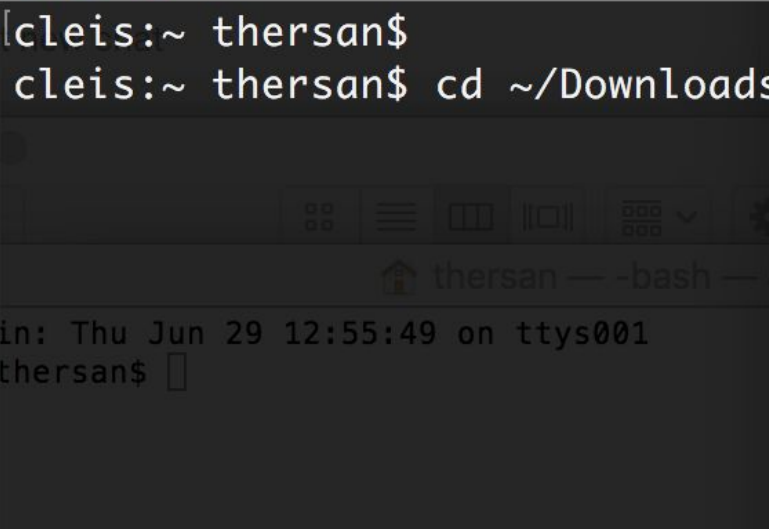
**Ou simplesmente faça o download!**

# Ao fim do download, temos que descomprimir o arquivo zip



# Navegue até a pasta dos arquivos do Arduino

```
[cleis:~ thersan$  
cleis:~ thersan$ cd ~/Downloads/arduino-1.8.3/
```



The image shows a terminal window with a dark background. The prompt is [cleis:~ thersan\$. The command cd ~/Downloads/arduino-1.8.3/ has been entered and is highlighted with a white cursor. Below the command line, there is a toolbar with icons for file operations and a status bar showing the current directory as thersan and the shell as -bash. The bottom of the terminal shows the date and time: in: Thu Jun 29 12:55:49 on ttys001, followed by the prompt thersan\$ and a cursor.

# Rode o arquivo **arduino** como *superuser* (sudo)

```
cleis:arduino-1.8.3 thersan$  
cleis:arduino-1.8.3 thersan$  
cleis:arduino-1.8.3 thersan$ sudo ./arduino
```



Man Page



Novel



Ocean

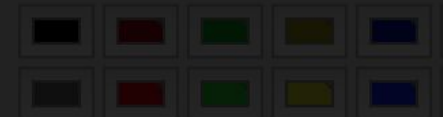


Pro

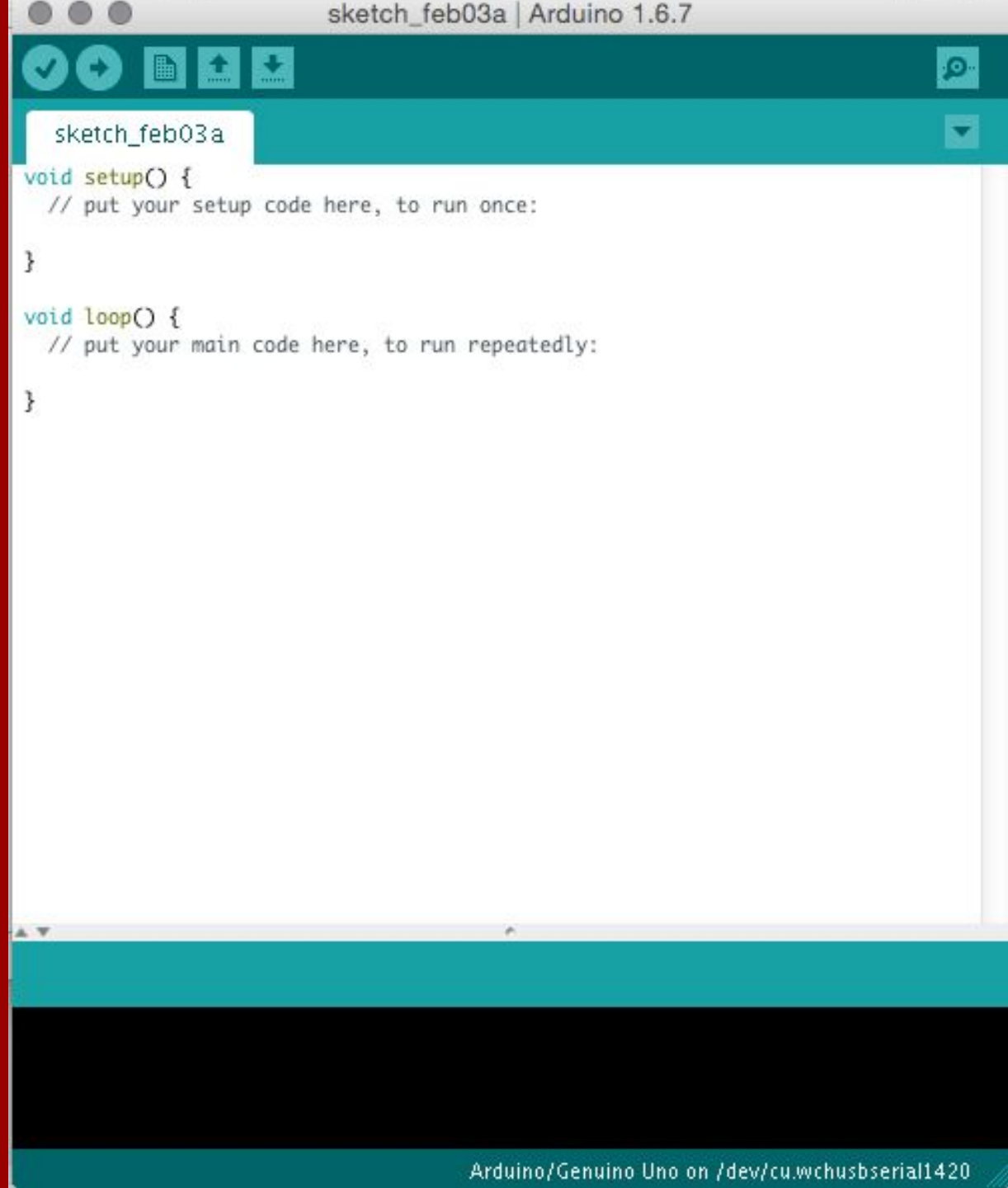
## Text

- ☐ Antialias text
- ☒ Use bold fonts
- ☒ Allow blinking text
- ☒ Display ANSI colors
- ☐ Use bright colors for bold text

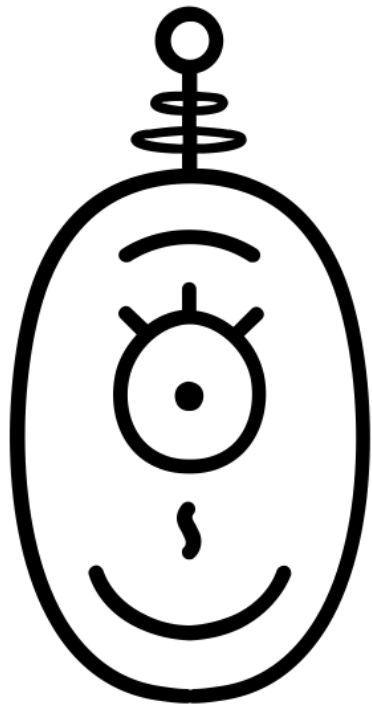
## ANSI Colors



Essa é a interface.



Pronto, você está preparado para o  
próximo passo!



**A2**