

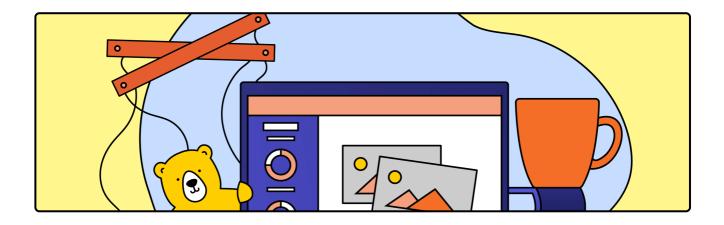


Bannerbear Blog > Developers

# How to Download Images from a Website Using Puppeteer

This article will take you through steps to download images from a website using Puppeteer.

by Josephine Loo · June 2022



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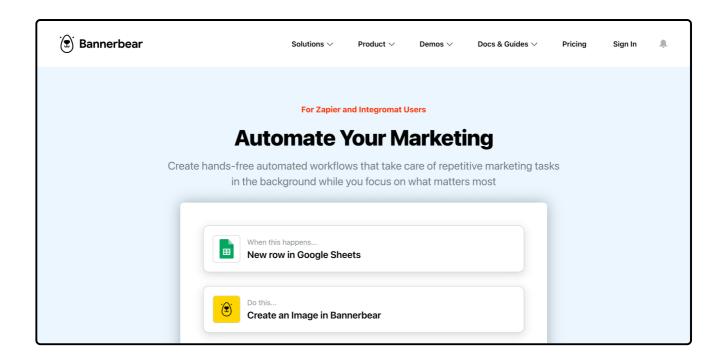
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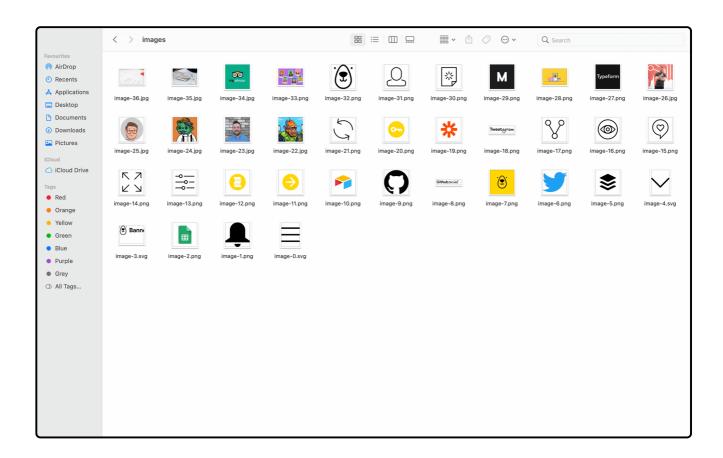
Why use Puppeteer to download images? We can just right-click and save. It's simple.

That's only true if you're only downloading a few images. Imagine if you're downloading 100+ images from a website manually, that's a dreadful task. Pret not! We can do this by using automation and save all images from a website to a folder IN ONE GO.

In this tutorial, we will be guiding you step-by-step on how to download images (.jpg, .png, .svg, .gif) from a website using an automation tool called Puppeteer. You can use it on any website that you want but we will be using this Bannerbear page for this tutorial:



At the end of this tutorial, you will have images from a website downloaded to a folder:



## What is Puppeteer

Puppeteer is a Node library which provides a high-level API to control Chrome or Chromium over the DevTools Protocol. It is very useful for automating the Chrome browser to run website tests. Puppeteer runs headless by default, which means you won't see the browser running but it can be configured to run full (non-headless) Chrome or Chromium.

## **Pre-requisites**

To use Puppeteer to download images from a website, you will need to have Node.js ♂ and npm ♂ installed.

For reference, the version of Node.js and npm we are using for this tutorial are 14.17.3 and 6.14.13 respectively. Please check the official documentation of to check your version compatibility.

## **Getting Started**

## Step 1. Create a New Node.js Project

Create a new folder for your project and go to the directory.

```
mkdir puppeteer-download-images
cd puppeteer-download-images
```

Init a new Node.js project in the folder.

```
npm init
```

It will prompt you for input for a few aspects of the project, just press enter if you want to use the default values.

Once you run through the npm init steps above, a
package.json file will be generated and placed in the current
directory.

```
DOUTINE

SOUTINE

OUTINE

OUTI
```

### **Step 2. Install Puppeteer**

Run the command below to install Puppeteer.

```
npm i puppeteer
```

A folder named node\_modules and a file named packagelock.json will be added to your project after running the command.

```
Declaration of the properties of the properties
```

When you run the command above to install Puppeteer, a recent version of Chromium which is guaranteed to work with the Puppeteer API is also downloaded.

```
Downloading Chromium r991974 - 117.2 Mb [===========] 100% 0.0s
Chromium (991974) downloaded to /Users/josephineloo/puppeteer-download-image/node_modules/puppeteer/.local-chromium/mac-991974
npm notice created a lockfile as package-lock.json. You should commit this file.
npm WARN puppeteer-download-image@1.0.0 No description
npm WARN puppeteer-download-image@1.0.0 No repository field.

+ puppeteer@14.1.1
added 58 packages from 76 contributors and audited 58 packages in 17.652s

8 packages are looking for funding
run `npm fund` for details

found 0 vulnerabilities
```

## **Testing Puppeteer**

Before we start writing codes to download images from a website, let's try whether Puppeteer is working properly. We will use a simple example from the official documentation of to take a screenshot of a website.

## **Step 1. Write the Code**

Create a new example.js file and paste the following code:

```
const puppeteer = require('puppeteer');

(async () => {
  const browser = await puppeteer.launch();
  const page = await browser.newPage();
  await page.goto('https://google.com');
  await page.screenshot({ path: 'example.png' });

await browser.close();
})();
```

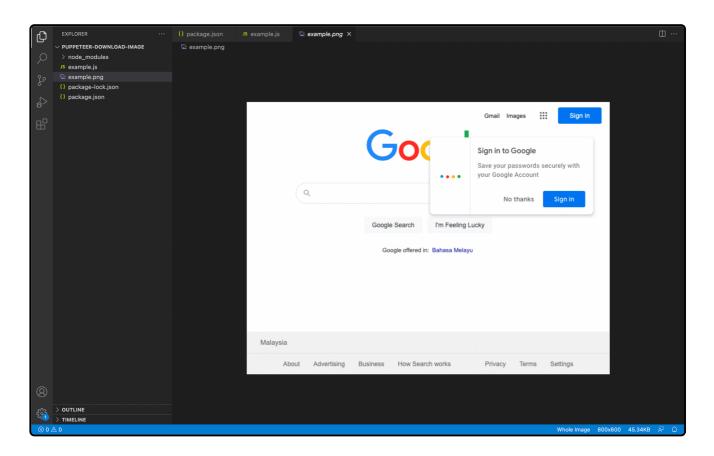
This example creates a page, navigates it to a URL, and then saves a screenshot.

## Step 2. Run the Code

Run the example.js file to execute the code.

```
node example.js
```

You will find a new image example.png created inside your folder.
This is the screenshot of the page visited by Puppeteer. e



Now we know that Puppeteer is working, we can start writing codes to download images!

## **Downloading Images from a Website**

## **Step 1. Create a New File**

In the same project, create <u>index.js</u> file. This is where we will be writing our code to download images from the Bannerbear page.

**Step 2. Import Modules** 

Inside the index.js file, we need to require puppeteer and the fs (file system) module. The fs module will allow you to write data fetched from the website into a file.

```
const puppeteer = require('puppeteer');
const fs = require('fs');
```

## **Step 3. Write the Code for Downloading Images**

Then, write the following code:

```
(async () => {
  const browser = await puppeteer.launch();
  const page = await browser.newPage();

let counter = 0;
  page.on('response', async (response) => {
    const matches = /.*\.(jpg|png|svg|gif)$/.exec(response.
    console.log(matches);
  if (matches && (matches.length === 2)) {
    const extension = matches[1];
    const buffer = await response.buffer();
    fs.writeFileSync(`images/image-${counter}.${extension counter += 1;
    }
  });

await page.goto('https://www.bannerbear.com/solutions/aut
```

```
await browser.close();
})();
```

Similar to the previous example, Puppeteer will open a page and navigate to the URL. Then, it will catch responses which match the image file extensions (.jpg, .png, .svg, .gif), rename it and save it to a folder named /images.

The complete code looks like this.

```
const puppeteer = require('puppeteer');
const fs = require('fs');
(async () => {
 const browser = await puppeteer.launch();
 const page = await browser.newPage();
 let counter = 0;
 page.on('response', async (response) => {
    const matches = /.*\.(jpg|png|svg|gif)$/.exec(response.
    console.log(matches);
   if (matches && (matches.length === 2)) {
      const extension = matches[1];
      const buffer = await response.buffer();
      fs.writeFileSync(`images/image-${counter}.${extension
      counter += 1;
  });
 await page.goto('https://www.bannerbear.com/solutions/aut
```

```
await browser.close();
})();
```

## **Step 4. Create a New Folder for Images**

Before executing the code, create a new /images subfolder in the current directory. This is where the images downloaded from the page will be saved.

```
| Description | Street | Stree
```

### **Step 5. Run the Code**

Now, run index.js and see all images from the page get
downloaded into the /images folder.

#### node index.js

```
JS index.is X
                                                                    1 const fs = require('fs');
2 const puppeteer = require('puppeteer');
3
    image-0.svg
                                                                             (async () => {
  const browser = await puppeteer.launch();
  const page = await browser.newPage();
                                                                               let counter = 0;
page.on('response', async (response) => {
  const matches = /.*\.(jpg|png|svg|gif)$/.exec(response.url());
  console.log(matches);
  if (matches && (matches.length === 2)) {
  const extension = matches[1];
  const buffer = await response.buffer();
  fs.writefileSync('images/image-${counter}).${extension}', buffer, 'base64');
  counter += 1;
}
    image-12.png
    image-14.png
    u image-15.png
    image-17.png
    image-18.png
    image-20.png
    image-21.png
    image-23.jpg
    image-24.jpg
    image-26.jpg
    image-27.png
    image-28.png
    image-29.png
   image-30.png
   image-32.png
> OUTLINE
```

That's it! All images from the Bannearbear page are now downloaded to the /images folder. 59

You can try this on other websites as well. Simply replace the Bannerbear URL with another URL and then run the node
index.js
command.

## **Using the Bannerbear API**

If you want to process the images like applying an overlay or watermark to them, you can try using the Bannerbear API. The Bannerbear API allows you to create a template that can be applied to all images and generate the images in a few seconds by sending modification requests to the API endpoint. There are also tons of templates in our template library to choose from if you don't want to create your own template. All you need to do is sign up for an account and you can start generating images immediately for free!



About the author

#### **Josephine Loo**

Josephine is an automation enthusiast. She loves automating stuff and helping people to increase productivity with automation.



July 2023

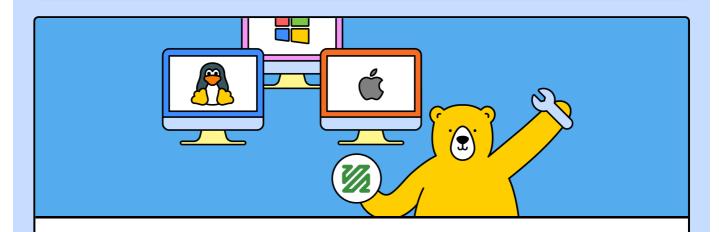
## Pyppeteer: How To Use Puppeteer in Python (Installation Guide and Examples)

Puppeteer is developed for Node.js but you can also use it to automate Chrome/Chromium in Python with Pyppeteer. We'll show you how in this article, with examples like taking screenshots, downloading images, and extracting data from a web page.

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## How to Install FFmpeg on Mac, Windows, and Ubuntu/Linux (Step-by-Step)

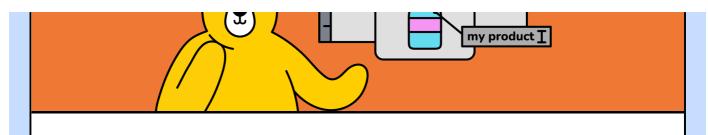
FFmpeg is a great tool for performing various media manipulation tasks. This guide will show you how to install it on Mac, Windows, and Ubuntu/Linux.

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## How to Make a T-Shirt/Merchandise Mockup Generator Using Bannerbear in Node.js

Using an image manipulation library like Jimp to overlay an image on top of another can be difficult. In this article, we'll learn how to do so easily with Bannerbear to create a product mockup generator.

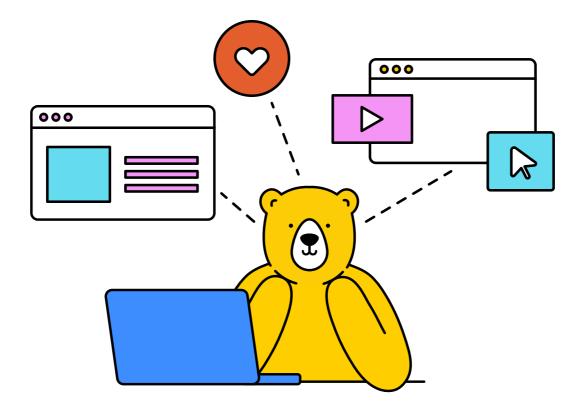
api

bannerbear

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Watermark Videos via API
Generate PDFs via API
Generate Images with Zapier
Watermark Videos with Zapier
Generate PDFs with Zapier
More Use Cases

#### **Product**

Image Generation API
Multi Image Generation API
Video Generation API
PDF Generation API
Template Library
Bannerbear for Enterprise

#### Integrations

Airtable Integration
Zapier Integration
Integromat Integration
Forms

**URLs** 

WordPress

#### Demos

Multi Image Demo

Al Face Detect Demo

Twitter to Instagram

Github Social

Smart Crop Demo

Online Certificate Maker

Online Wedding Invite Maker

Online Event ID Card Maker

Online Photo Collage Maker

Online Invoice Maker

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\$10K to \$20K MRR

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Twitter Preview Tool

Changelog

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