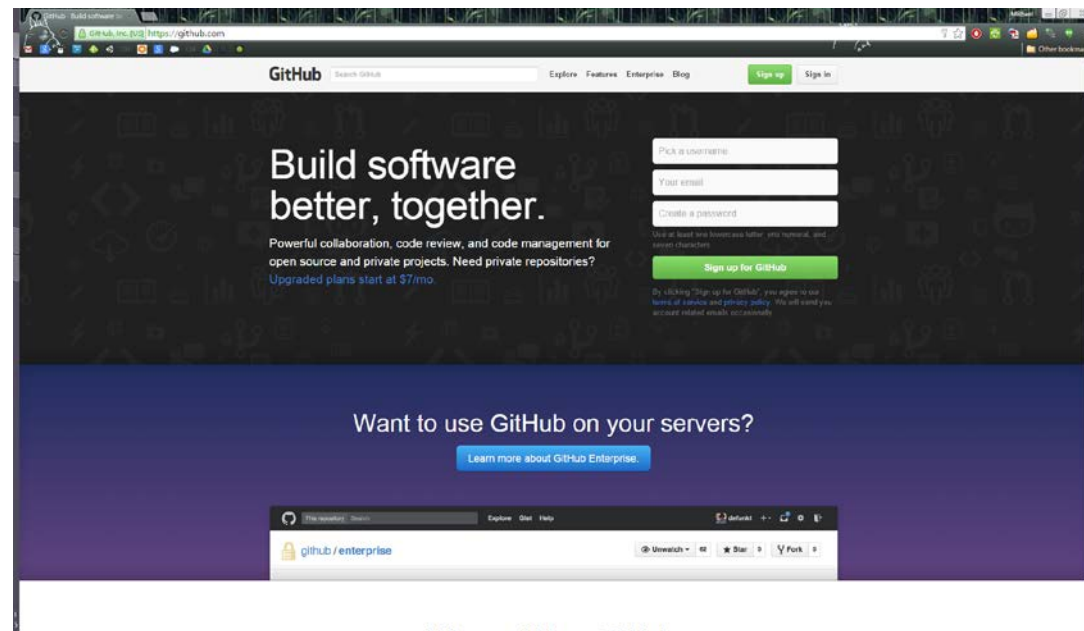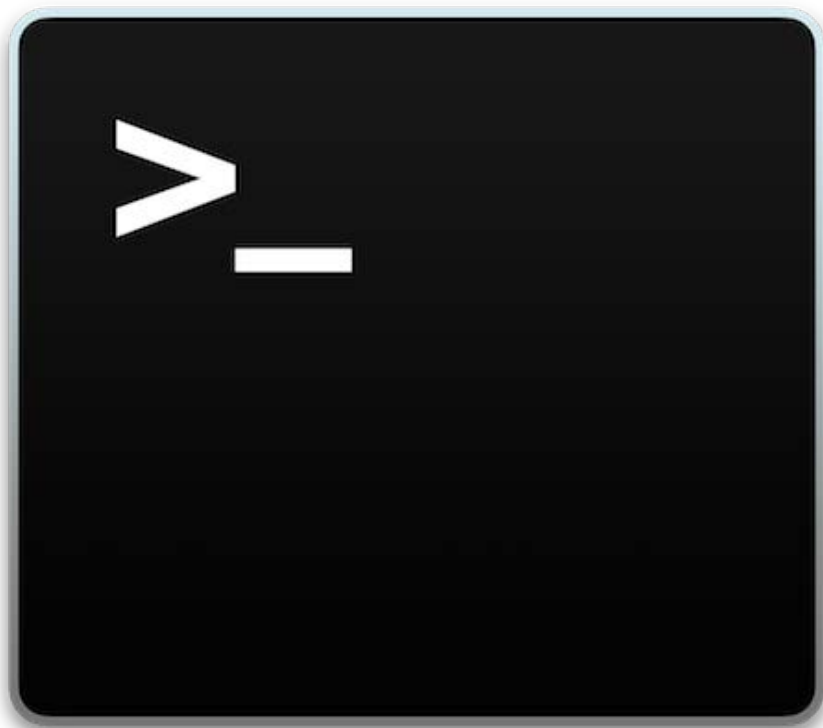# Git and GitHub

"Easy" Mode

Concepts

Git vs GitHub

Git Repository
(a folder with a history)

7/15/15 at 10:30p
First draft of website

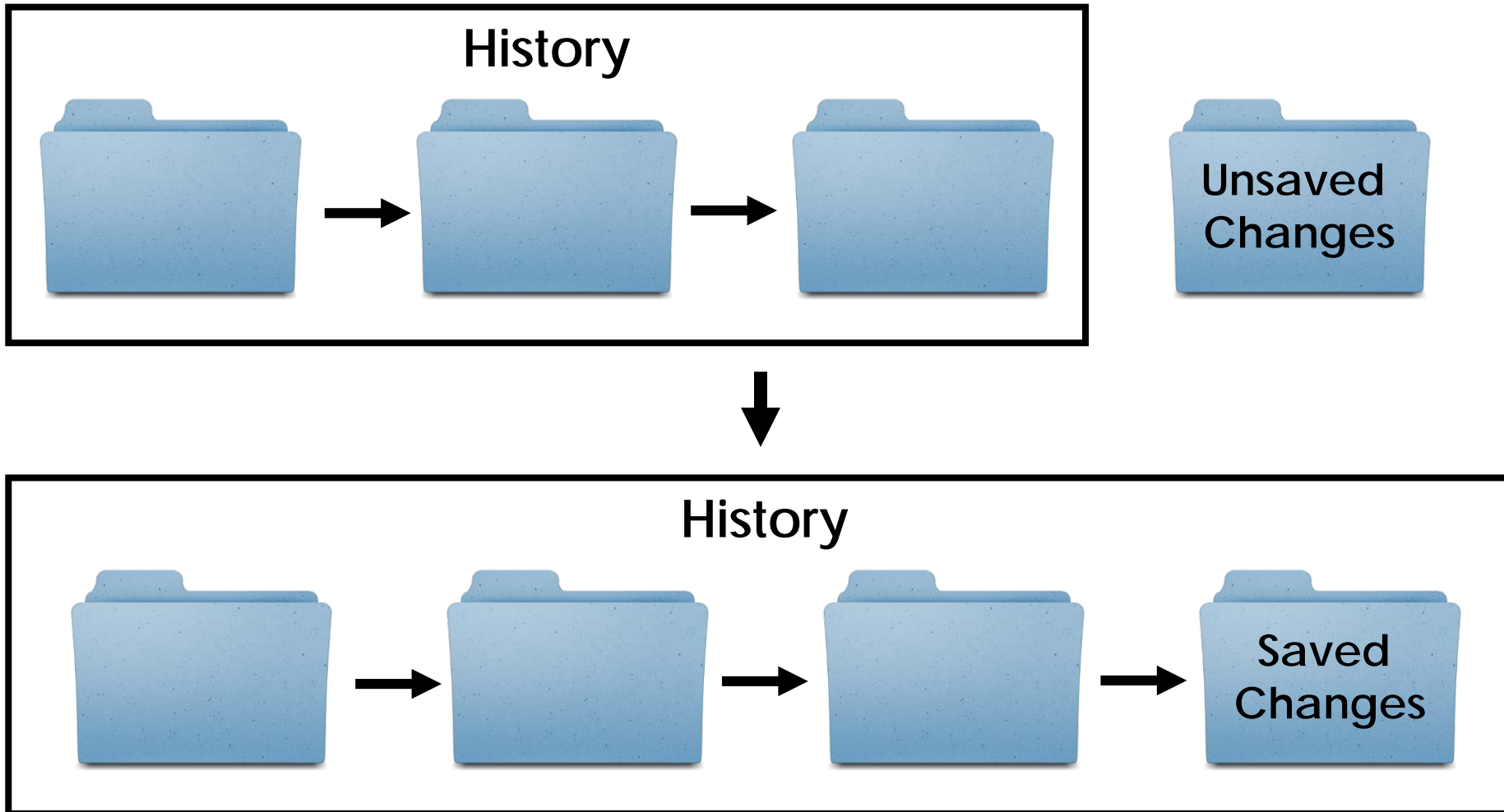7/16/15 at 11:30p
Fixed IE bug

7/17/15 at 12:00a
Public release!

7/17/15 at 12:05a
Everything broke…
Hopefully this fixes it?
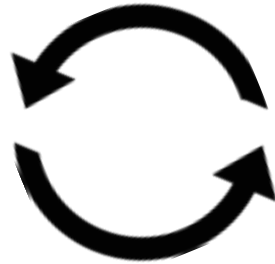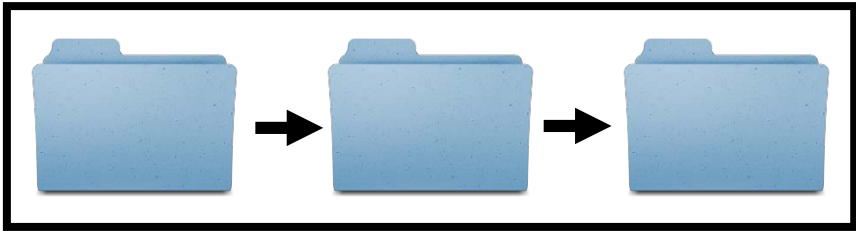
Git Committing
(saving a snapshot)

History

Unsaved Changes

History

Saved Changes

Syncing to GitHub
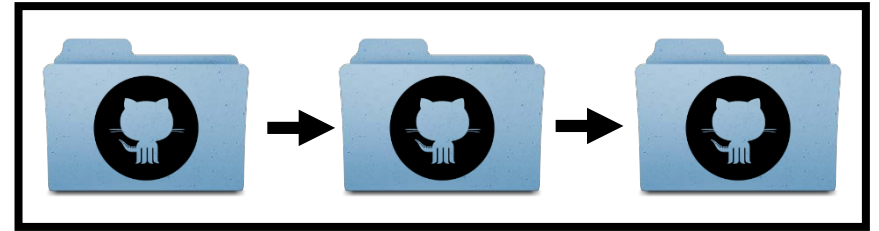(to the "cloud")

Local
(your computer's hard drive)

Remote
(GitHub's servers)

GitHub Pages

"Free" Web Hosting

First Time Setup

- Sign up for a GitHub account. Make sure to verify your email on your account!

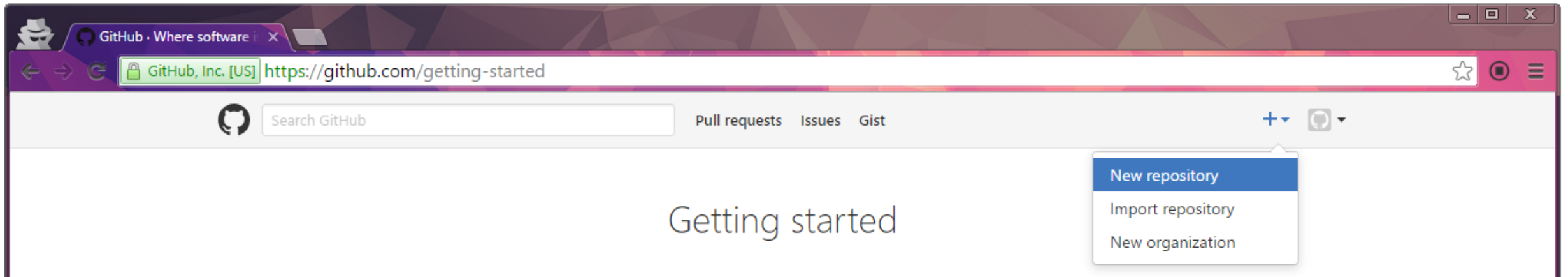- Download & install the [Desktop app](#)
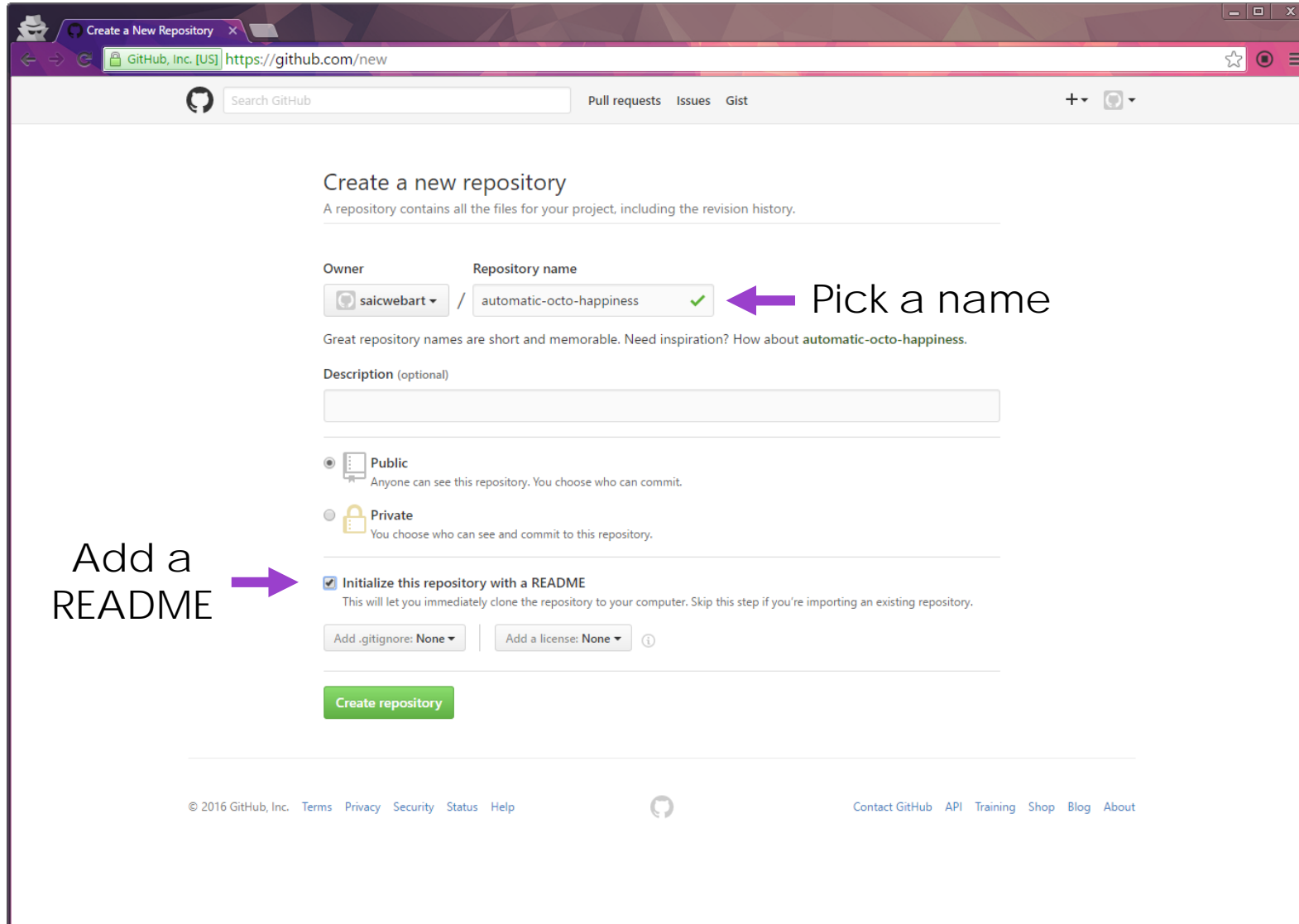
Repository (Website) Setup

Default URL

http://**username**.github.io/**repository**

Create New Repository on GitHub

Create New Repository on GitHub

Go to Settings

Setup for GitHub Pages
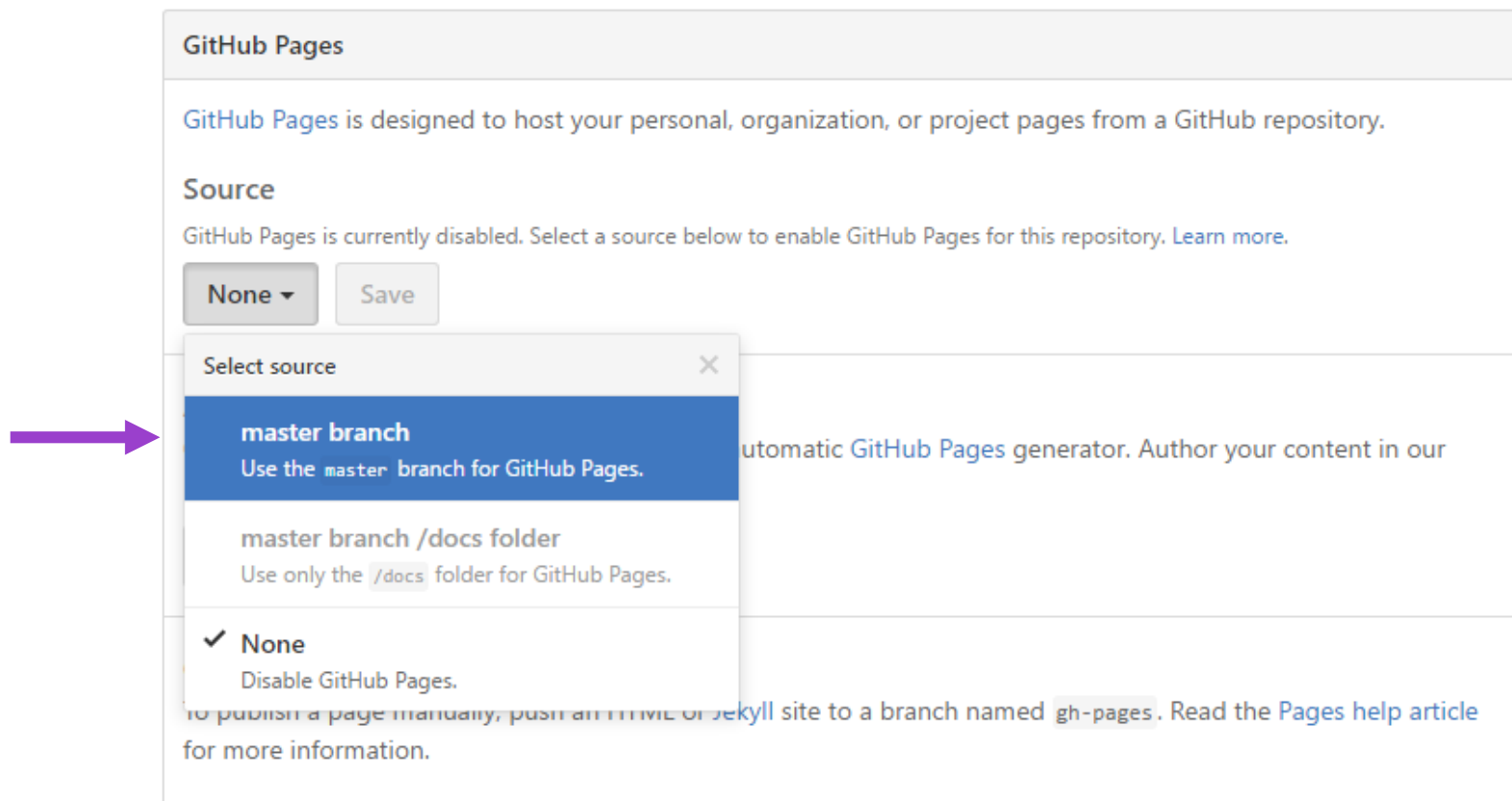
Repository Setup Done

GitHub Pages

→ Your site is ready to be published at https://saicwebart.github.io/automatic-octo-happiness/.

GitHub Pages is designed to host your personal, organization, or project pages from a GitHub repository.

Source

Your GitHub Pages site is currently being built from the `master` branch. Learn more.

[master branch ▾] [Save]

Custom domain

Custom domains allow you to serve your site from a domain other than `saicwebart.github.io`. Learn more.

[   ] [Save]

Update your site

To update your site, push your HTML or Jekyll updates to the `master` branch. Read the Pages help article for more information.

Overwrite site

Replace your existing site by using our automatic page generator. Author your content in our Markdown editor, select a theme, then publish.

[Launch automatic page generator]

☑ **Enforce HTTPS** — Required for your site because you are using the default domain (`saicwebart.github.io`)
HTTPS provides a layer of encryption that prevents others from snooping on or tampering with traffic to your site.
When HTTPS is enforced, your site will only be served over HTTPS. Learn more.

Local Setup

Clone Repository

Add Files and Commit

Sync Files to the "Cloud"

Repository (Website) Update

Repeat: Commit and Sync!

Extras

Quick start: Setting up a custom domain

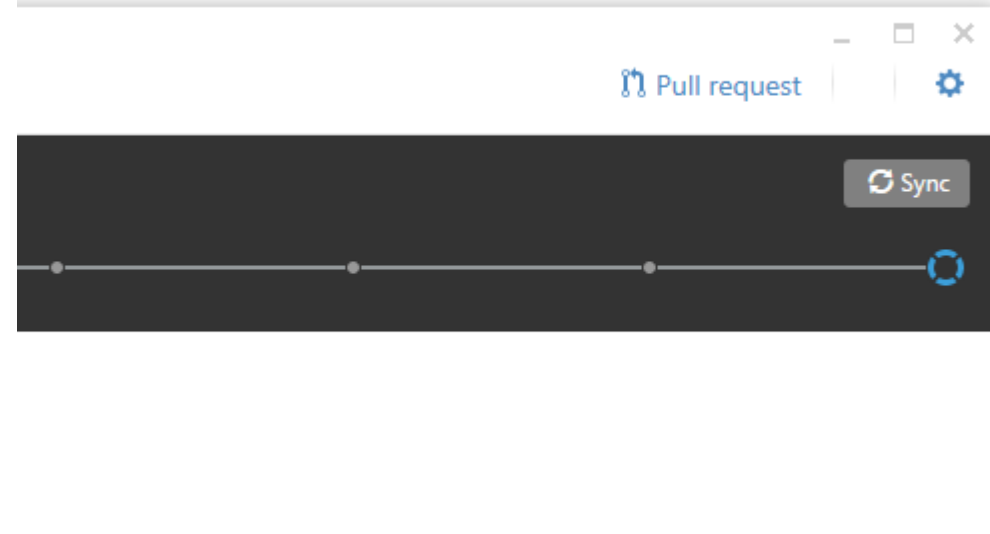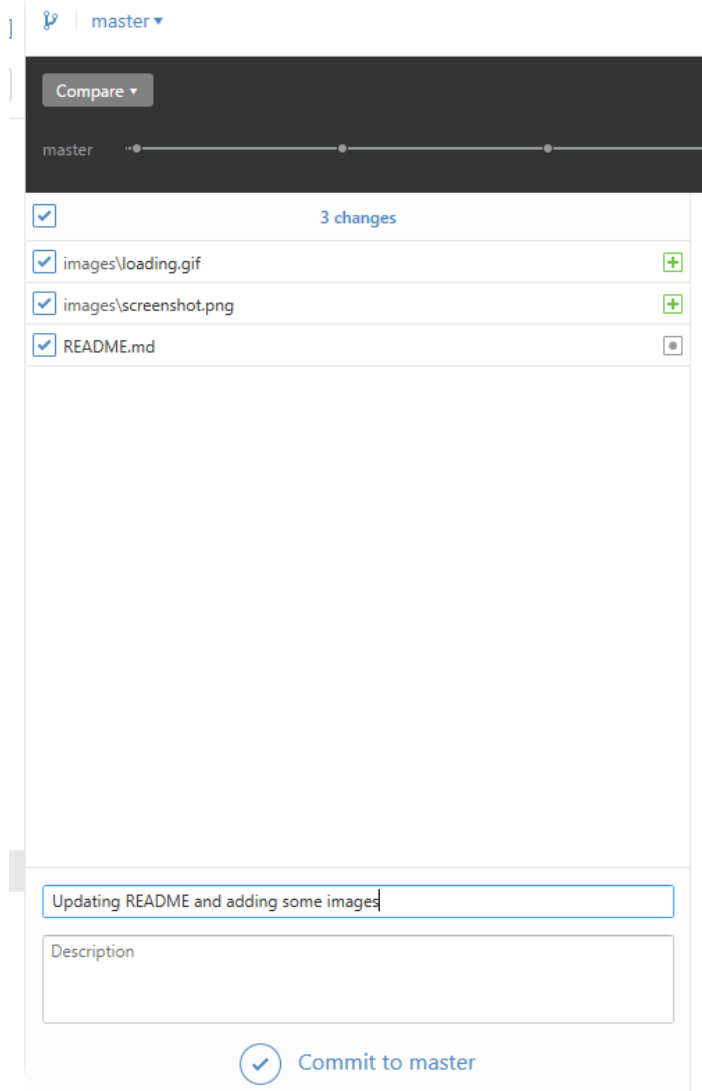There are three main stages to setting up a custom domain for your GitHub Pages site: choosing your custom domain and registering it with a DNS provider, adding your custom domain to your GitHub Pages site on GitHub, and configuring your domain with your DNS provider.

> **Tips:** For more information about choosing a custom domain, see:
>
> > "About supported custom domains"
> > "Custom domain redirects for GitHub Pages sites"

1 Pick a custom domain and register it with a DNS provider (if you haven't already done so). A *DNS provider* is a company that allows users to buy and register a unique domain name and connect that name to an IP (Internet Protocol) address by pointing your domain name to an IP address or a different domain name. A DNS provider may also be called a domain registrar or DNS host.

2 Add your custom domain to your GitHub Pages site.

3 Set up your custom domain with your DNS provider. Our guides outline how to set up your pages custom domain with your DNS provider depending on the type of custom domain you have:

> > Setting up an apex domain such as `example.com`
> > Setting up a `www` subdomain such as `www.example.com`
> > Setting up an apex domain and `www` subdomain such as `example.com` and `www.example.com`
> > Setting up a custom subdomain such as `blog.example.com`

https://help.github.com/articles/using-a-custom-domain-with-github-pages/

CMS with Jekyll

GitHub tutorial