Introduction to Git and GitHub

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GitHub.com

- ## What is GitHib?
  - An online repository.

- ## What is a repository?
  - A place to store files.
  - GitHub is designed to store code, projects, and software.

- ## What are the advantages to GitHub?
  - Version control.

What is a repository?

- Definition:
  - a central location in which data is stored and managed.
- A repository implements version control.
  - Version controls documents the who, what, when for all changes.
  - Allows for reverting code back to an older version
  - Permits multiple people to work on code at the same time

- https://github.com/matplotlib/matplotlib

What is a repository?

- Examples:
  - CRAN
  - Ancestry.com
  - Library of Congress Historical Maps Collection
  - Google Books
  - Smithsonian Images
  - Ravelry.com

Let's make a repository

- Create a repository using GitHub Desktop.
- Make some changes to the repository.
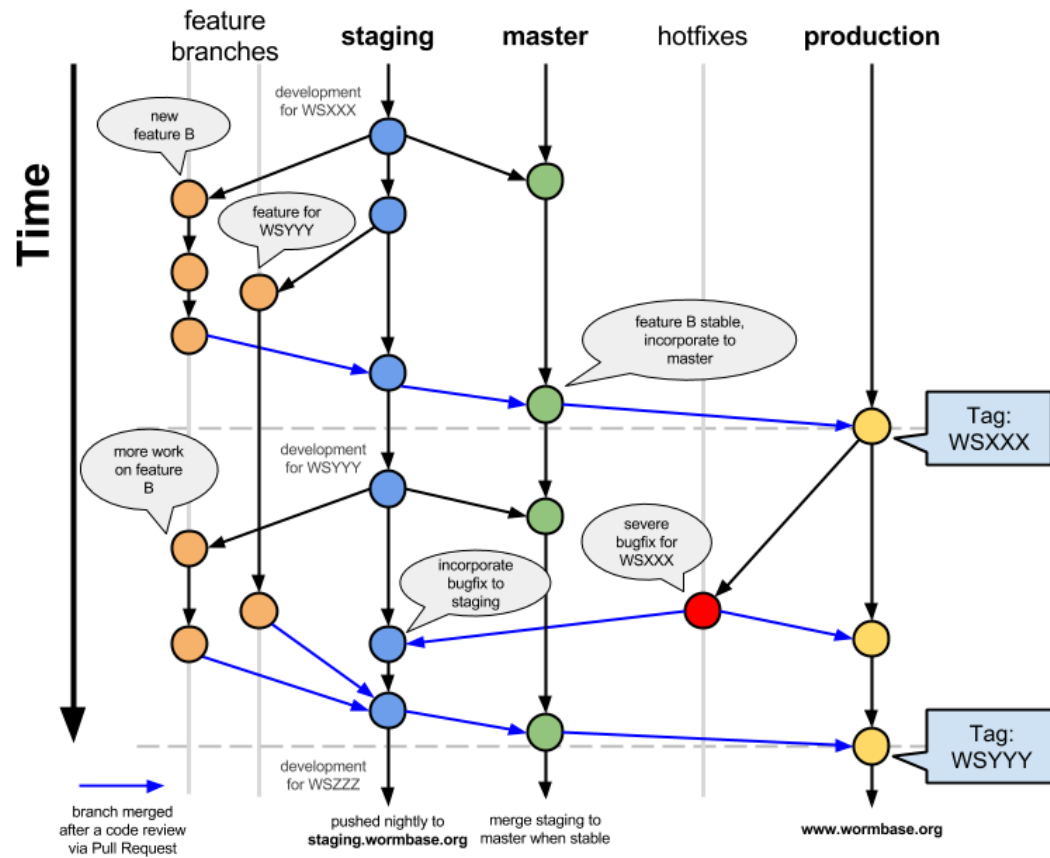- Merge those changes to GitHub.

Let's add a collaborator to repository

- Meet your neighbor, say hi, introduce yourself.
- Ask them for their GitHub ID, add them to your repository.

Let's clone a repository

- Use GitHub Desktop to clone the repository

- Make some changes to a document.

- Commit the changes. Don't forget to include a message!

- Push to GitHub.

WormBase Web Development Workflow with Git