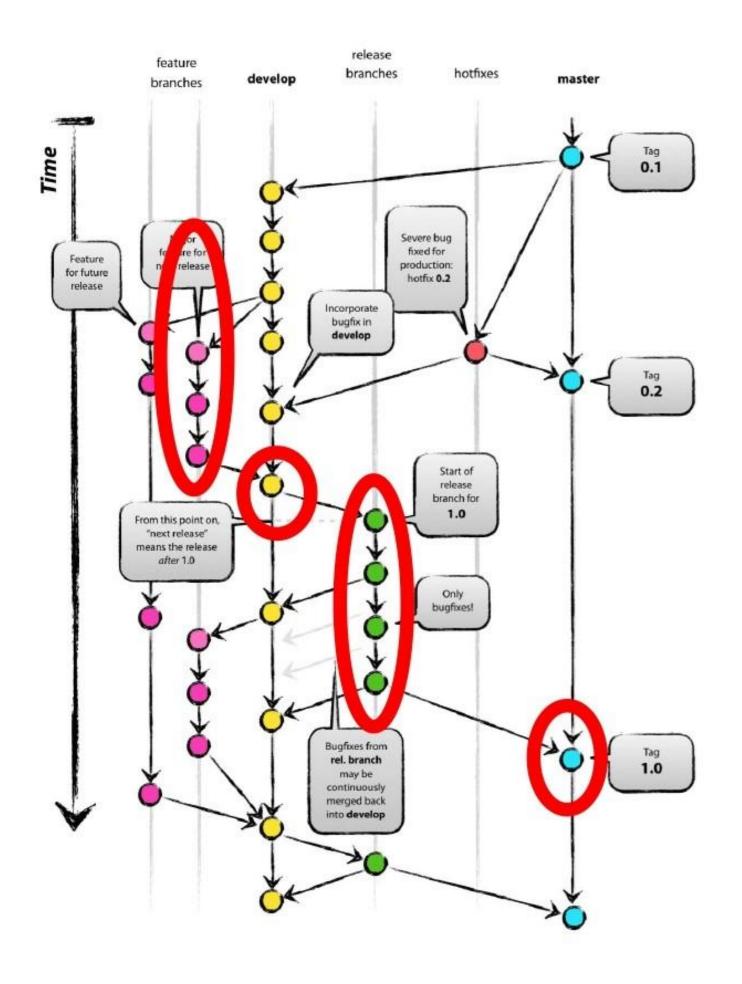
Branching Model

Git flow overview

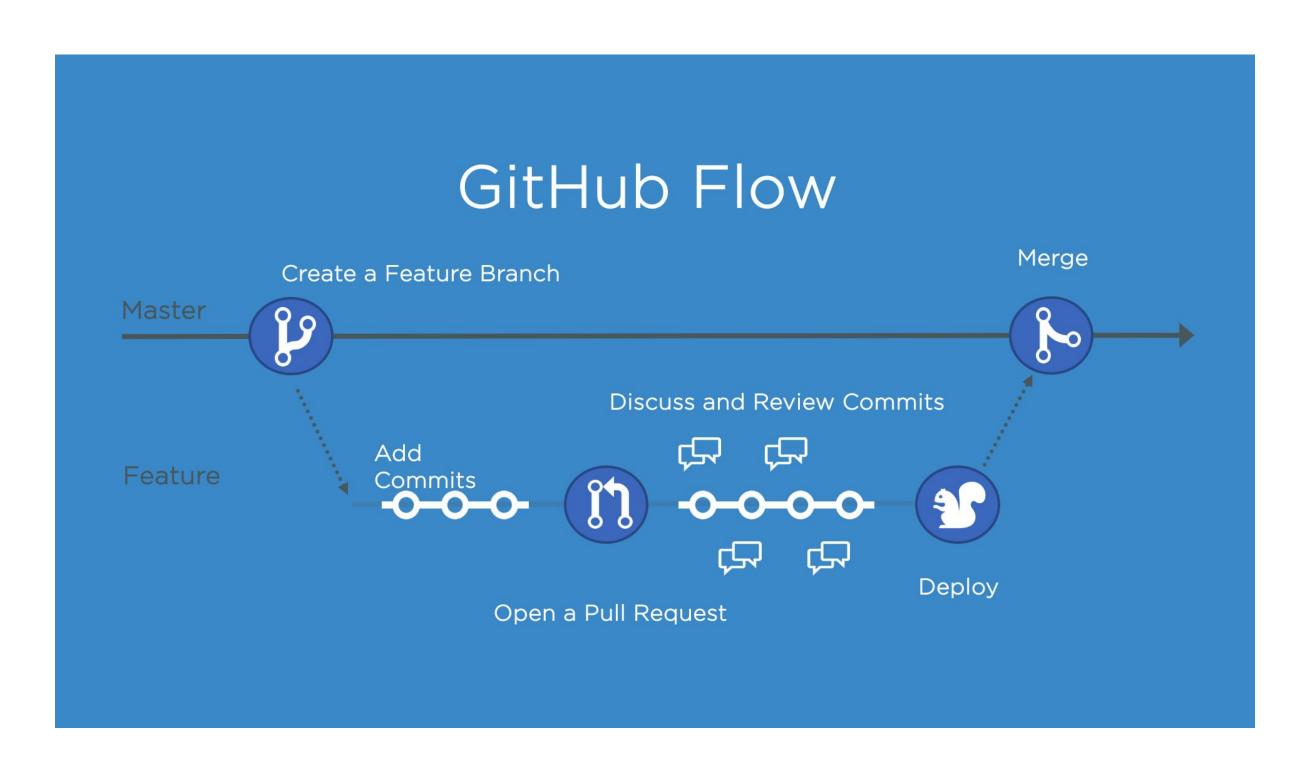


Workflow Summary:

- 1. Feature Development: Work is done on separate feature branches created from the develop branch.
- 2. Integration: Features are merged into the develop branch.
- 3. Release: Once enough features are developed, a release branch is created for testing and bug fixes.
- 4. Finalization: The release branch is merged into the main branch and tagged with a version number.
- 5. Hotfixes: Emergency fixes are developed in hotfix branches directly off the main branch and merged back into both main and develop.

I-Sheng Lee 1/5

GitHub flow



Workflow Summary:

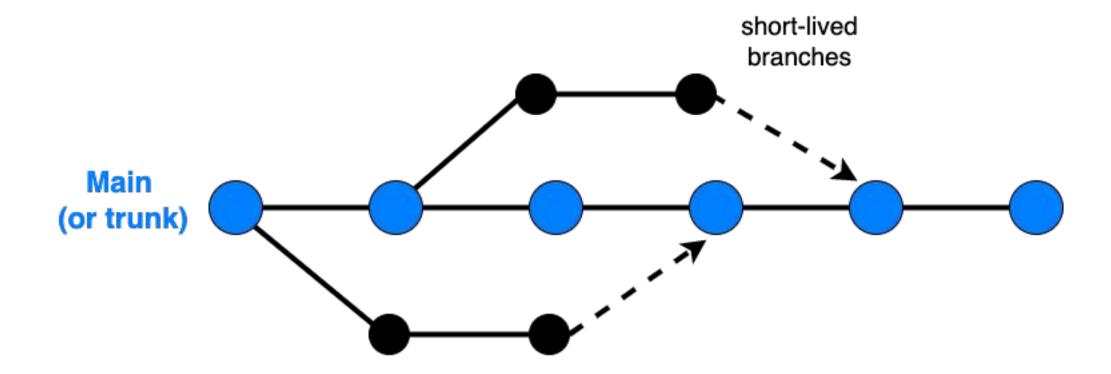
- 1. Create a Branch: Start by creating a new feature branch from the main branch.
- 2. Work on the Feature: Develop the feature or task in the new branch, committing changes regularly.
- 3. Open a Pull Request (PR): Once the feature is complete, open a PR to merge the feature branch into the main branch.
- 4. Review and Testing: Have the code reviewed by teammates. Automated tests (CI) run to ensure nothing is broken.
- 5. Merge: After approval and passing tests, merge the PR into the main branch.
- 6. Deploy: The code is immediately deployable, and, if continuous deployment is enabled, it can be automatically deployed.

I-Sheng Lee 2/5

Trunk-based development

Trunk-based development





■ ■ merging is done more frequently and more easily for shorter branches

Feature:

- 1. No develop branches
- 2. All implementation occurs directly on the main(trunk) branch

I-Sheng Lee

Comparison

Criteria	Git Flow	GitHub Flow	Trunk-Based Development
Main Branch	Uses main and develop branches	Only main branch	Only main (trunk) branch
Feature Branches	Long-lived, separate feature branches	Short-lived feature branches	Very short-lived or direct commits to main
Merging	Merge to develop first, then main	Merge directly into	Frequent merges directly into main
Deployment Frequency	Less frequent, after major releases	Frequent, after every merge	Continuous deployment, very frequent
Complexity	More complex, with multiple branches	Simpler, fewer branches	Simplest, directly from main

I-Sheng Lee 4/5

trunk-based deep dive

simple demo: https://www.youtube.com/watch?v=7_mOxnUCUJA

Advantages:

- 1. Not feature based.
- 2. Fast collaboration

I-Sheng Lee 5/5

Thank you for your attention!