

GitHub Exercise

Case Study: Git and GitHub Workflow Exercise

Background:

You are part of a development team working on a small project called "**Sample Project**". The project is designed to serve as a foundation for your team's Git and GitHub workflow training. The team has decided to host the project on GitHub to facilitate collaboration, version control, and centralized code management.

Your task is to initialize the project in Git, push it to a remote GitHub repository, and practice working with branches to simulate feature development and maintenance.

Scenario:

1. Project Initialization:

- Your team has asked you to set up version control for a new project locally and link it to a GitHub repository.

2. Feature Addition:

- A new feature requires you to add a README.md file that contains an introduction to the project. The file should include:
 - The project name.
 - A brief description of the project.

3. Branch Management:

- To add the README.md file, you must create a new branch called feature/update-readme.
- After completing the changes, you need to push the branch to the remote repository for review by your team.

4. Merge Changes:

- Once the feature branch is reviewed, you must merge it into the main branch and ensure that the changes are reflected in the remote repository.

5. Branch Cleanup:

- After the merge, the feature/update-readme branch is no longer needed. Your team has instructed you to delete it both locally and remotely.

Deliverables:

1. A GitHub repository named sample-project with the initial project content.
2. A new branch named feature/update-readme containing the updated README.md file.
3. The README.md file merged into the main branch.
4. The feature/update-readme branch deleted locally and remotely.

Key Questions:

1. How will you set up the project for version control and push it to GitHub?
2. What steps will you take to create, push, and manage branches effectively?
3. How will you ensure the changes in the feature branch are merged into the main branch?
4. What commands will you use to clean up unused branches locally and remotely?