

Cheat Sheet: Git: Making Changes

Making Changes to Code

- These steps are exactly the same for Cloud Source Repositories or GitHub
- Go make a change to your code
- In Cloud Shell, change to the folder with the change (internal or external)

```
git add .
git commit -m "My first change"
```

- This commits it to your local repo—has not changed remote repo yet
- git push -u origin main
 - This pushes the change to the remote repo main branch

Using Branches

- Try creating a branch called: new-feature-X
 - Make a change and commit in that branch
 - Switch back to the main branch
 - Look at code
 - Switch back to new-feature-X
 - Look at code
 - Merge the changes back to main
- Use the next two slides for help with the syntax

Branching Commands

- To list all branches:git branch
- To create a branch:git branch new-feature-X
- To select a branch for usage:
 git checkout new-feature-X
- Make changes to code and commit changes the normal way
- Can switch between branches with: git checkout main git checkout new-feature-X

git commit -a -m "some message"

- These commands are shown just for syntax reference
- These are not the exact commands or the order of commands you will need for the lab

Merging Branches

- To merge a branch to main:
 - First checkout the main:git checkout main
 - Then merge the branch:git merge new-feature-X
- May need to resolve conflicts

Collaboration (Bonus)

- Nominate one team member to host the main repo in GitHub
 - That person needs to invite the other teammates
 - In the GitHub <u>external</u> repo: click **Settings**, click **Collaborators**, click **Add People**, enter email of teammates
 - Other teammates need to check email and accept invite
- Teammates now need to clone repo
 - In Cloud Shell, issue the following commands:

```
mkdir ~/shared-external
cd ~/shared-external
git clone <URL_TO_SHARED_REPO>
ls
```

Collaboration (Bonus) (continued)

- Each teammate should now try to:
 - Create a branch in the new repo
 - Make a change to the branch
 - Merge the branch with the main branch
 - Push to origin
- If another team member has already pushed changes, you need to pull them before the push
 - o git pull
 - o git pull branchname
 - This will pull down the changes from the remote repo

Collaboration

Do the same thing for the repo for the internal service