

# [CS1555/2055] Simple GitHub Guide for Term Project

**For our project, we are expecting each group of students to create one repository for the project, and you need to add your Instructor and TAs as collaborators of your project.**

**To use Github you can first register through following link:**

<https://github.com/join>

**To create a new repository, one of the member should log in to your github account:**

- In the upper right corner, next to your avatar, click and then select New repository.
- Name your repository.
- Write a short description.
- Select Initialize this repository with a README.
- Click Create repository

**To add your TA as collaborator of your project:**

- Click on the "Settings" link in the right side menu, below "Network"
- On the new page, click the "Collaborators" menu item on the left side of the page.
- Start typing the new collaborator's GitHub username (of all other team mates and TA) into the text box.
- Select the GitHub user from the list that appears below the text box.
- Click the "Add" button.

**Overall the GitHub web interface is straightforward and easy to use, for more information about the GitHub you can visit: <https://guides.github.com/>.**

**Using Git Directly:**

Git is a version control system that is used for software development and other version control tasks. While, GitHub is a web serveries that allows your to publish your Git repositories and operates with you Git repositories with graphic web interface.

If you wish to use Git commends directly with local terminal to access your repository, you can do so by first install Git on your local machine by visiting following links:

**For Windows:** <https://git-for-windows.github.io/>

**For MacOS:** <https://code.google.com/archive/p/git-osx-installer/downloads>

**For Linux:** <https://git-scm.com/book/en/v2/Getting-Started-Installing-Git>

**Below are some useful Git commends that you may use, for more detailed information please visit: <https://git-scm.com/documentation>.**

### **1.To checkout a repository**

create a working copy of a local repository by running the command

***git clone /path/to/repository***

when using github, your command will be

***git clone https://github.com/YOUR-USERNAME/YOUR-REPOSITORY***

### **2. add & commit**

You can propose changes (add it to the Index) using

***git add <filename>***

***git add \****

To actually commit these changes use

***git commit -m "Commit message"***

Note, this commits the file to the HEAD, but not in your remote repository yet.

### **3. pushing changes**

Your changes are now in the HEAD of your local working copy. To send those changes to your remote repository, execute

***git push origin master***

### **4. updates**

to update your local repository to the newest commit, execute

***git pull***

These comments mentioned covered the very basic that you would need to conduct your project with Git. If you have any question about Git commends it is highly encouraged you to read following document: <https://git-scm.com/documentation>.

**NOTE:**

Each time after you have made changes to your project and repository remember to commit your changes. Each commit would generate a commit ID.

When you submit your milestones you need to **email us your commit ID** together with **the full web link** to your repository each time you submit a milestone.

For the project, each group can **only submit once per milestone per group**.