* Install Git
* Create GitHub account at github.com
* Create your own repository (if you so desire)

**Connect to a Repository**

1. Open the Command prompt
2. CD into the folder where you want your connection to the repository to reside
3. Log into github and copy the HTTP web address for the repository
4. Command: git clone *[URL]*

**Add a File to Git**

1. Add the file to the repository folder in windows explorer
2. Open the Command prompt
3. CD into the repository folder
4. Command: git add *[filename]*
5. Alternatively, to add all files not yet added/recognized by Git

Command: git add -A

**Commit Changes** (intentionally save changes locally. Must be done when pulling/merging)

1. Open the Command prompt
2. CD into the repository folder
3. Command: git commit –am “*[text comment about changes made]*”

**Check Status of all Changes**

1. Open the Command prompt
2. CD into the repository folder
3. Command: git status

**Push Changes up to GitHub from local machine for Permanent Sharing/Saving**

1. Open the Command prompt
2. CD into the repository folder
3. Command: git push origin *[name of branch being pushed]*
4. Enter your GitHub account username and password as prompted

**Pull Changes from GitHub to your local machine** (if you have changes on your local machine they will need to be committed and all conflicts resolved)

1. Open the Command prompt
2. CD into the repository folder
3. Checkout the branch which has the changes you wish to pull with Command: git checkout *[branch name]*
4. Command: git pull

**Create new Branch**

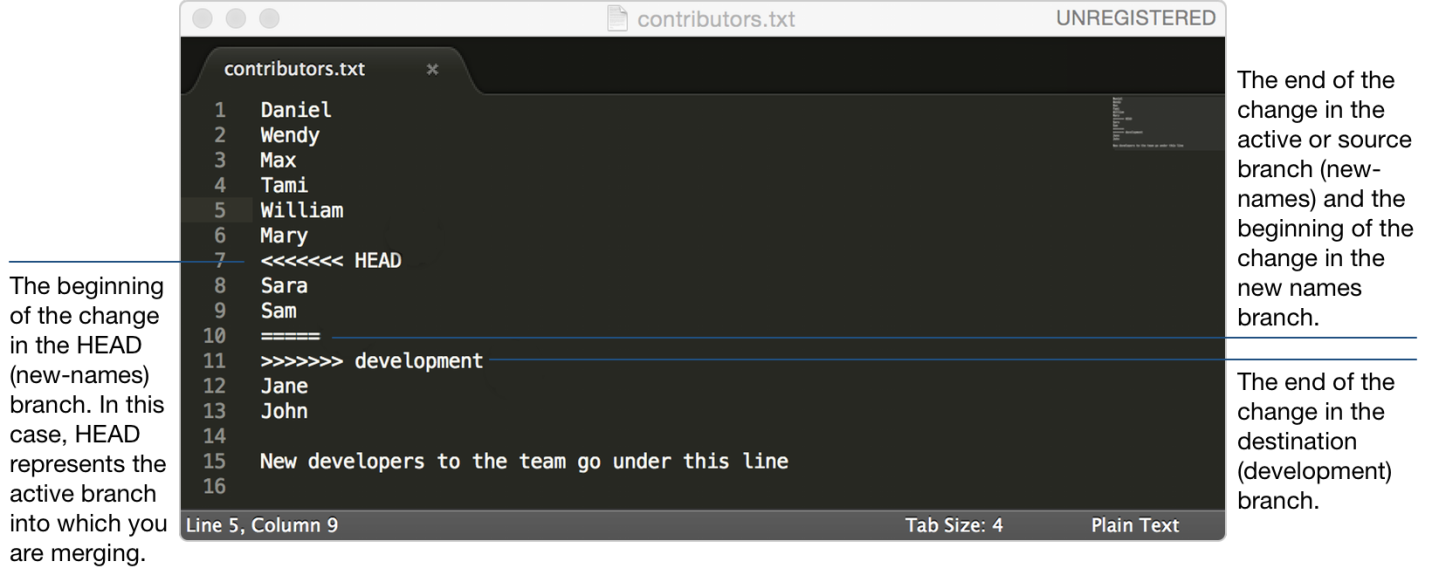
1. Open the Command prompt
2. CD into the repository folder
3. Command: git checkout –b *[name of the new branch]*

**Switch Between Branches (Checkout branch)**

1. Open the Command prompt
2. CD into the repository folder
3. Command: git checkout *[name of the branch]*

**Merge Branches**

1. Open the Command prompt
2. CD into the repository folder
3. Checkout the branch you want are modifying/merging into (called HEAD)
4. Command: git merge *[name of branch being merged]*
5. If conflicts exist in files, those files will be listed in the Command Prompt. Open those files and resolve the conflicts. They will be identified with:



1. Commit the de-conflicted file with Command: git commit –am “*[text comment about changes made]*”
2. Push the repository back up to GitHub as desired with Command: git push origin *[name of branch being pushed]*