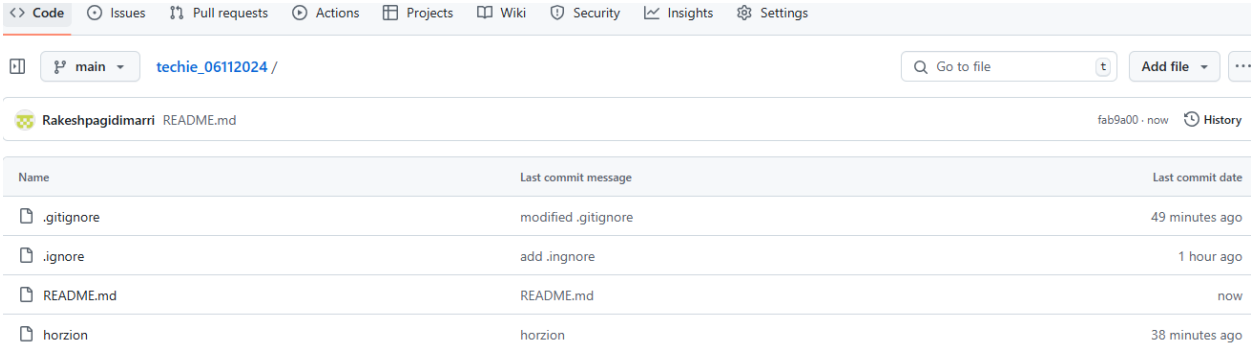
Git And GItHub 2

Install git.

```
nani@DESKTOP-O5K4621 MINGW64 ~/OneDrive/Desktop (release)
$ git init
Reinitialized existing Git repository in C:/Users/nani/OneDrive/Desktop/.git/

nani@DESKTOP-O5K4621 MINGW64 ~/OneDrive/Desktop (release)
$
```

Create a repo in github with README.md and .ignore file.



Clone the created repo to local.

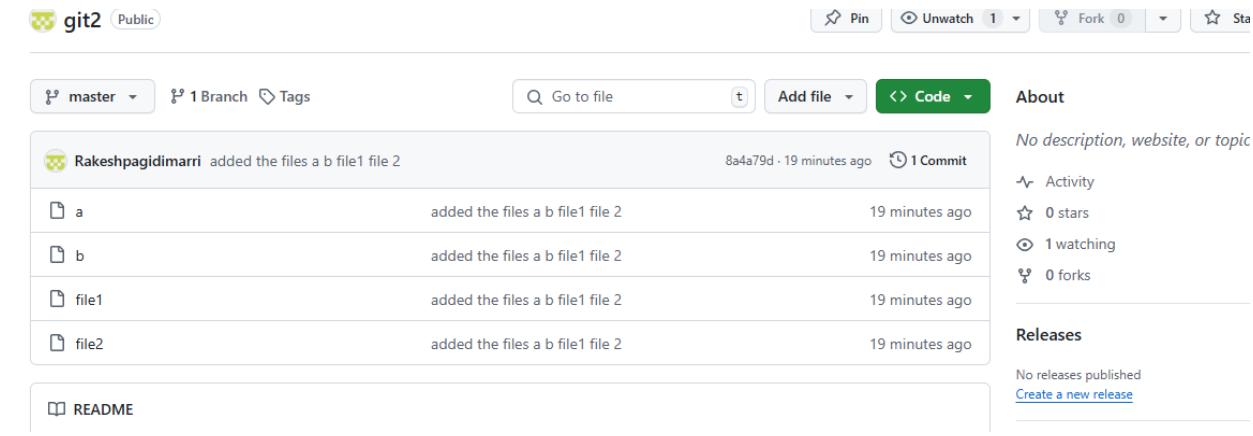
```
nani@DESKTOP-O5K4621 MINGW64 ~/OneDrive/Desktop/techie_06112024 (main)
$ git clone git@github.com:Rakeshpagidimarri/Read.me.git
Cloning into 'Read.me'...
remote: Enumerating objects: 3, done.
remote: Counting objects: 100% (3/3), done.
remote: Total 3 (delta 0), reused 0 (delta 0), pack-reused 0 (from 0)
Receiving objects: 100% (3/3), done.

nani@DESKTOP-O5K4621 MINGW64 ~/OneDrive/Desktop/techie_06112024 (main)
$
```

Create two files in local repo.

```
ani@DESKTOP-O5K4621 MINGW64 ~/OneDrive/Desktop/techie_06112024 (main)
$ git add .

ani@DESKTOP-O5K4621 MINGW64 ~/OneDrive/Desktop/techie_06112024 (main)
$ git status
n branch main
our branch and 'origin/main' have diverged,
nd have 4 and 4 different commits each, respectively.
  (use "git pull" to merge the remote branch into yours)

hanges to be committed:
  (use "git restore --staged <file>..." to unstage)
        new file:   Read.me
        new file:   file1
        new file:   file2


ani@DESKTOP-O5K4621 MINGW64 ~/OneDrive/Desktop/techie_06112024 (main)
$ git commit -m "add file1 file 2"
main c542cab] add file1 file 2
 3 files changed, 1 insertion(+)
 create mode 160000 Read.me
 create mode 100644 file1
 create mode 100644 file2

ani@DESKTOP-O5K4621 MINGW64 ~/OneDrive/Desktop/techie_06112024 (main)
$
```

Commit two files and push to central Repository.

```
nani@DESKTOP-O5K4621 MINGW64 ~/OneDrive/Desktop/git2 (master)
$ git push -u origin master
Enumerating objects: 3, done.
Counting objects: 100% (3/3), done.
Delta compression using up to 4 threads
Compressing objects: 100% (2/2), done.
Writing objects: 100% (3/3), 238 bytes | 238.00 KiB/s, done.
Total 3 (delta 0), reused 0 (delta 0), pack-reused 0
To github.com:Rakeshpagidimarri/git2.git
 * [new branch]      master -> master
branch 'master' set up to track 'origin/master'.

nani@DESKTOP-O5K4621 MINGW64 ~/OneDrive/Desktop/git2 (master)
$
```



Create a branch in local and create a sample file and push to central.

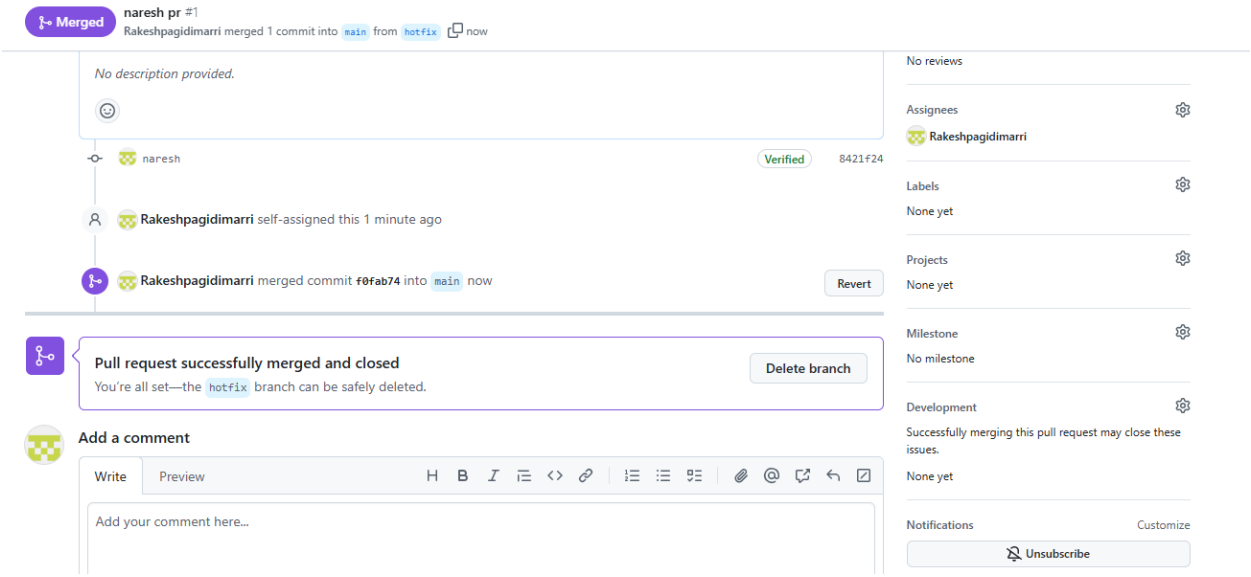
7)Create a branch in github and clone that to local.

```
nani@DESKTOP-O5K4621 MINGW64 ~/OneDrive/Desktop/rakesh (master)
$ git clone git@github.com:Rakeshpagidimarri/techie_06112024.git
Cloning into 'techie_06112024'...
remote: Enumerating objects: 27, done.
remote: Counting objects: 100% (27/27), done.
remote: Compressing objects: 100% (19/19), done.
remote: Total 27 (delta 8), reused 10 (delta 1), pack-reused 0 (from 0)
Receiving objects: 100% (27/27), 6.91 KiB | 589.00 KiB/s, done.
Resolving deltas: 100% (8/8), done.
```

8)Merge the created branch with master in git local.

```
nani@DESKTOP-O5K4621 MINGW64 ~/OneDrive/desktop/hiring_app (release)
$ git merge master
Auto-merging hiring_app/alph
CONFLICT (add/add): Merge conflict in hiring_app/alph
Automatic merge failed; fix conflicts and then commit the result.

nani@DESKTOP-O5K4621 MINGW64 ~/OneDrive/desktop/hiring_app (release|MERGING)
$  git status
On branch release
You have unmerged paths.
  (fix conflicts and run "git commit")
  (use "git merge --abort" to abort the merge)

Changes to be committed:
        modified:   hello
        new file:   hotfix
        new file:   rakesh

Unmerged paths:
  (use "git add <file>..." to mark resolution)
        both added:      alph
```

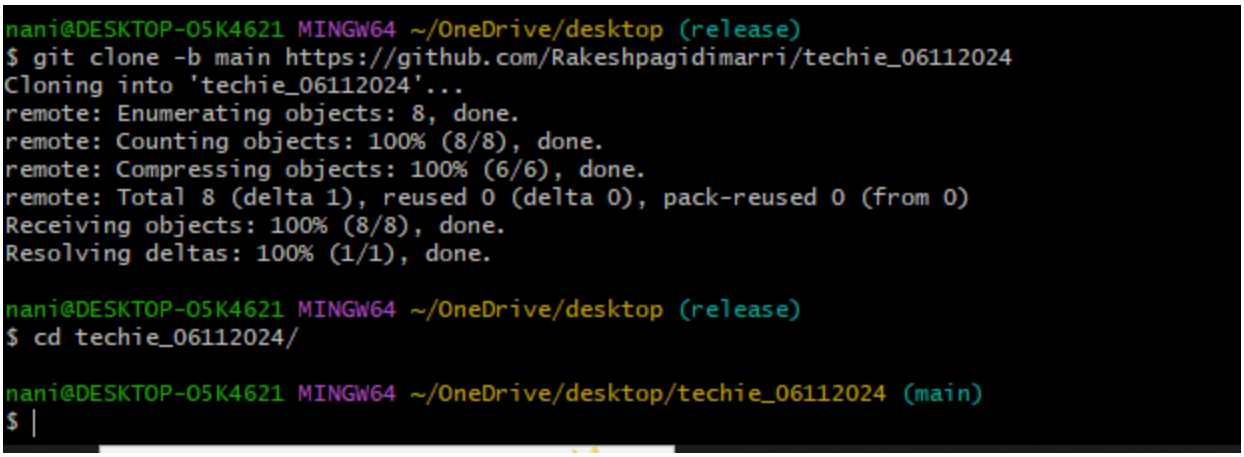
9)Merge the created branch with master in github by sending a pull request.



10)create a file in local and send that to branch in github.

```
nani@DESKTOP-O5K4621 MINGW64 ~/OneDrive/desktop/techie_06112024 (main)
$ git status
On branch main
Your branch is up to date with 'origin/main'.

Untracked files:
  (use "git add <file>..." to include in what will be committed)
        passwd

nothing added to commit but untracked files present (use "git add" to track)

nani@DESKTOP-O5K4621 MINGW64 ~/OneDrive/desktop/techie_06112024 (main)
$ git add .
warning: in the working copy of 'passwd', LF will be replaced by CRLF the next t
ime Git touches it

nani@DESKTOP-O5K4621 MINGW64 ~/OneDrive/desktop/techie_06112024 (main)
$ git commit -m "add password"
[main fcb15d4] add password
 1 file changed, 2 insertions(+)
 create mode 100644 passwd

nani@DESKTOP-O5K4621 MINGW64 ~/OneDrive/desktop/techie_06112024 (main)
$ git push -u origin main
fatal: helper error (-1): User cancelled dialog.
error: unable to read askpass response from 'C:/Program Files/Git/mingw64/bin/gi
t-askpass.exe'
Password for 'https://github.com':
remote: No anonymous write access.
fatal: Authentication failed for 'https://github.com/Rakeshpagidimarri/techie_06
112024/'

nani@DESKTOP-O5K4621 MINGW64 ~/OneDrive/desktop/techie_06112024 (main)
$ git push -u origin main
rakeshEnumerating objects: 4, done.
Counting objects: 100% (4/4), done.
Delta compression using up to 4 threads
Compressing objects: 100% (2/2), done.
Writing objects: 100% (3/3), 325 bytes | 325.00 KiB/s, done.
Total 3 (delta 0), reused 0 (delta 0), pack-reused 0
To https://github.com/Rakeshpagidimarri/techie_06112024
   f0fab74..fcb15d4  main -> main
branch 'main' set up to track 'origin/main'.
```

11)clone only a branch from github to local.



12)create a file with all passwords and make that untrackable with git.

```
nani@DESKTOP-O5K4621 MINGW64 ~/OneDrive/desktop/techie_06112024 (main)
$ vi prs

nani@DESKTOP-O5K4621 MINGW64 ~/OneDrive/desktop/techie_06112024 (main)
$ git status
On branch main
Your branch is up to date with 'origin/main'.

Untracked files:
  (use "git add <file>..." to include in what will be committed)
        prs

nothing added to commit but untracked files present (use "git add" to track)

nani@DESKTOP-O5K4621 MINGW64 ~/OneDrive/desktop/techie_06112024 (main)
$ cat prs
username naresh
password Naresh@11

nani@DESKTOP-O5K4621 MINGW64 ~/OneDrive/desktop/techie_06112024 (main)
$ vi .gitignore

nani@DESKTOP-O5K4621 MINGW64 ~/OneDrive/desktop/techie_06112024 (main)
$ git add .
warning: in the working copy of '.gitignore', LF will be replaced by CRLF the next time Git touches it

nani@DESKTOP-O5K4621 MINGW64 ~/OneDrive/desktop/techie_06112024 (main)
$ git status
On branch main
Your branch is up to date with 'origin/main'.

Changes to be committed:
  (use "git restore --staged <file>..." to unstage)
        modified:   .gitignore


nani@DESKTOP-O5K4621 MINGW64 ~/OneDrive/desktop/techie_06112024 (main)
```

```
nani@DESKTOP-O5K4621 MINGW64 ~/OneDrive/desktop/techie_06112024 (main)
$ ls
hotfix  naresh  passwd  prs  rake

nani@DESKTOP-O5K4621 MINGW64 ~/OneDrive/desktop/techie_06112024 (main)
$ git push -u origin main
Enumerating objects: 5, done.
Counting objects: 100% (5/5), done.
Delta compression using up to 4 threads
Compressing objects: 100% (2/2), done.
Writing objects: 100% (3/3), 306 bytes | 306.00 KiB/s, done.
Total 3 (delta 1), reused 0 (delta 0), pack-reused 0
remote: Resolving deltas: 100% (1/1), completed with 1 local object.
To https://github.com/Rakeshpagidimarri/techie_06112024
   cee7f65..fa33d1b  main -> main
branch 'main' set up to track 'origin/main'.

nani@DESKTOP-O5K4621 MINGW64 ~/OneDrive/desktop/techie_06112024 (main)
$
```

13)make a commit and make that commit reset without savings changes.

```
nani@DESKTOP-O5K4621 MINGW64 ~/OneDrive/Desktop/techie_06112024 (main)
$ git add .

nani@DESKTOP-O5K4621 MINGW64 ~/OneDrive/Desktop/techie_06112024 (main)
$ git commit -m "commit tech2"
[main ec6cca8] commit tech2
 2 files changed, 0 insertions(+), 0 deletions(-)
 create mode 100644 tech1
 create mode 100644 tech2

nani@DESKTOP-O5K4621 MINGW64 ~/OneDrive/Desktop/techie_06112024 (main)
$ git reset --hard HEAD~1
HEAD is now at 60722cb horzion

nani@DESKTOP-O5K4621 MINGW64 ~/OneDrive/Desktop/techie_06112024 (main)
$ git status
On branch main
Your branch and 'origin/main' have diverged,
and have 2 and 4 different commits each, respectively.
  (use "git pull" to merge the remote branch into yours)

nothing to commit, working tree clean

nani@DESKTOP-O5K4621 MINGW64 ~/OneDrive/Desktop/techie_06112024 (main)
$
```

14)Revert a commited commit to the older version.

```
nani@DESKTOP-O5K4621 MINGW64 ~/OneDrive/Desktop/techie_06112024 (main)
$ git revert head~1
[main 5228727] Revert "horzion"
 1 file changed, 1 deletion(-)
 delete mode 100644 horzion

nani@DESKTOP-O5K4621 MINGW64 ~/OneDrive/Desktop/techie_06112024 (main)
$ git log
commit 5228727210e13849b7daf97e747ebde90e4843b5 (HEAD -> main)
Author: rakesh pagidimarri <rakeshpagidimarri8@outlook.com>
Date:   Thu Nov 7 15:30:24 2024 +0530

    Revert "horzion"

    This reverts commit 60722cbde888f804a904639ef46b633e5238bfaf.

commit 29c806a55f638ca6f41378242088c122d8259353
Author: rakesh pagidimarri <rakeshpagidimarri8@outlook.com>
Date:   Thu Nov 7 15:25:40 2024 +0530

    add sai1
```

15)push a file to stash without savings the changes and work on another file.

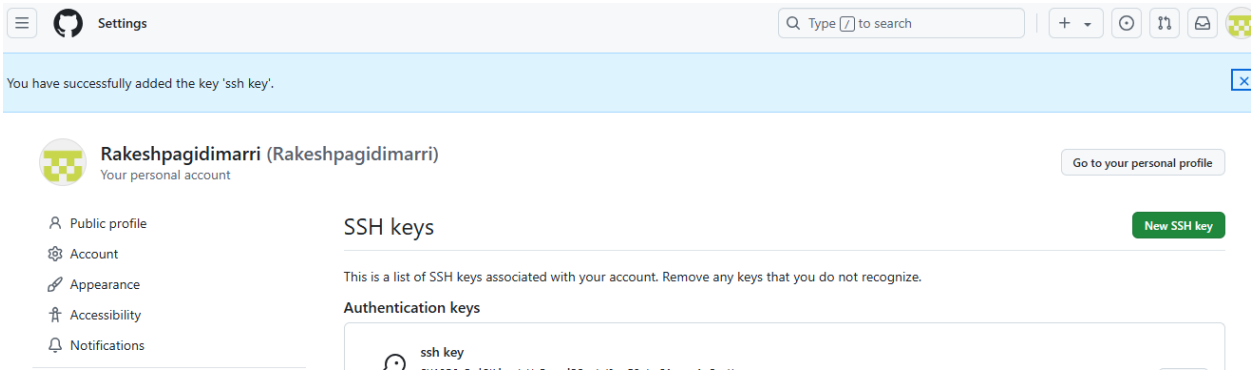
```
nani@DESKTOP-O5K4621 MINGW64 ~/OneDrive/Desktop/techie_06112024 (main)
$ ls
a.txt  b.txt  c.txt  horzion  hotfix  mREADME.md  naresh  passwd  prs  rake  sai

nani@DESKTOP-O5K4621 MINGW64 ~/OneDrive/Desktop/techie_06112024 (main)
$ git add .
warning: in the working copy of 'sai', LF will be replaced by CRLF the next time Git touches it

nani@DESKTOP-O5K4621 MINGW64 ~/OneDrive/Desktop/techie_06112024 (main)
$ git status
On branch main
Your branch and 'origin/main' have diverged,
and have 2 and 4 different commits each, respectively.
  (use "git pull" to merge the remote branch into yours)

Changes to be committed:
  (use "git restore --staged <file>..." to unstage)
        new file:   sai


nani@DESKTOP-O5K4621 MINGW64 ~/OneDrive/Desktop/techie_06112024 (main)
$ git stash
Saved working directory and index state WIP on main: 60722cb horzion

nani@DESKTOP-O5K4621 MINGW64 ~/OneDrive/Desktop/techie_06112024 (main)
$ git status
On branch main
Your branch and 'origin/main' have diverged,
and have 2 and 4 different commits each, respectively.
  (use "git pull" to merge the remote branch into yours)

nothing to commit, working tree clean

nani@DESKTOP-O5K4621 MINGW64 ~/OneDrive/Desktop/techie_06112024 (main)
$ ls
a.txt  b.txt  c.txt  horzion  hotfix  mREADME.md  naresh  passwd  prs  rake

nani@DESKTOP-O5K4621 MINGW64 ~/OneDrive/Desktop/techie_06112024 (main)
$
```

16)undo the stash file and start working on that again.

```
nani@DESKTOP-O5K4621 MINGW64 ~/OneDrive/desktop/hiring_app (master)
$  git stash list
stash@{0}: WIP on master: 43bed8d chaned the commit message useing amend commend

nani@DESKTOP-O5K4621 MINGW64 ~/OneDrive/desktop/hiring_app (master)
$ git stash pop
On branch master
Changes to be committed:
  (use "git restore --staged <file>..." to unstage)
        new file:   alph

Untracked files:
  (use "git add <file>..." to include in what will be committed)
        ../187.PNG
```

17)generate a ssh-keygen and configure into github.

```
nani@DESKTOP-O5K4621 MINGW64 ~/OneDrive/Desktop (master)
$ ssh-keygen
Generating public/private rsa key pair.
Enter file in which to save the key (/c/Users/nani/.ssh/id_rsa):
/c/Users/nani/.ssh/id_rsa already exists.
Overwrite (y/n)? y
Enter passphrase (empty for no passphrase):
Enter same passphrase again:
Your identification has been saved in /c/Users/nani/.ssh/id_rsa
Your public key has been saved in /c/Users/nani/.ssh/id_rsa.pub
The key fingerprint is:
SHA256:vihsFNcV/Nek81oZYjQbFU3uLtjD3t7srdkI3xic1lA nani@DESKTOP-O5K4621
The key's randomart image is:
+---[RSA 3072]----+
|         ...  .++|
|          o  + .o|
|       . . .. ++E|
|    . . .   .+++.|
|     o  S   ..oo+|
|    .  .     = *o|
|   o    .   o Xoo|
|    +  . .   =.%o|
|   . .. .     B+X|
+----[SHA256]-----+

nani@DESKTOP-O5K4621 MINGW64 ~/OneDrive/Desktop (master)
$ cd /c/Users/nani/.ssh/id_rsa
```



18)configure webhooks to github.

Settings | Recent Deliveries

We'll send a `POST` request to the URL below with details of any subscribed events. You can also specify which data format you'd like to receive (JSON, `x-www-form-urlencoded`, *etc*). More information can be found in our developer documentation.

Payload URL *

https://api.example.com/users?name=JohnDoe&age=25&location=NewYork

Content type *

application/json

There is currently a secret configured for this webhook. If you've lost or forgotten this secret, you can change it, but be aware that any integrations using this secret will need to be updated.

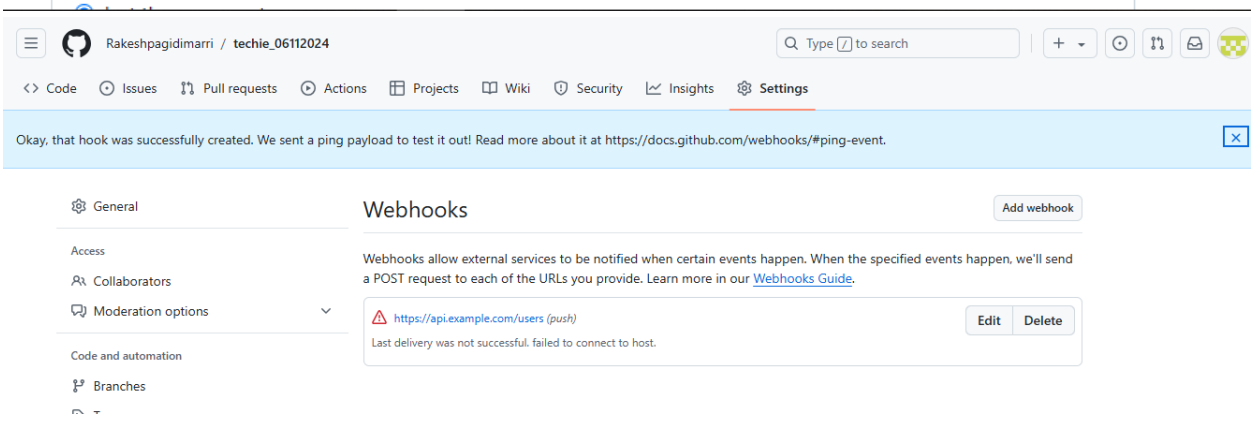
Change secret

SSL verification

By default, we verify SSL certificates when delivering payloads.

Enable SSL verification | Disable (not recommended)

Which events would you like to trigger this webhook?



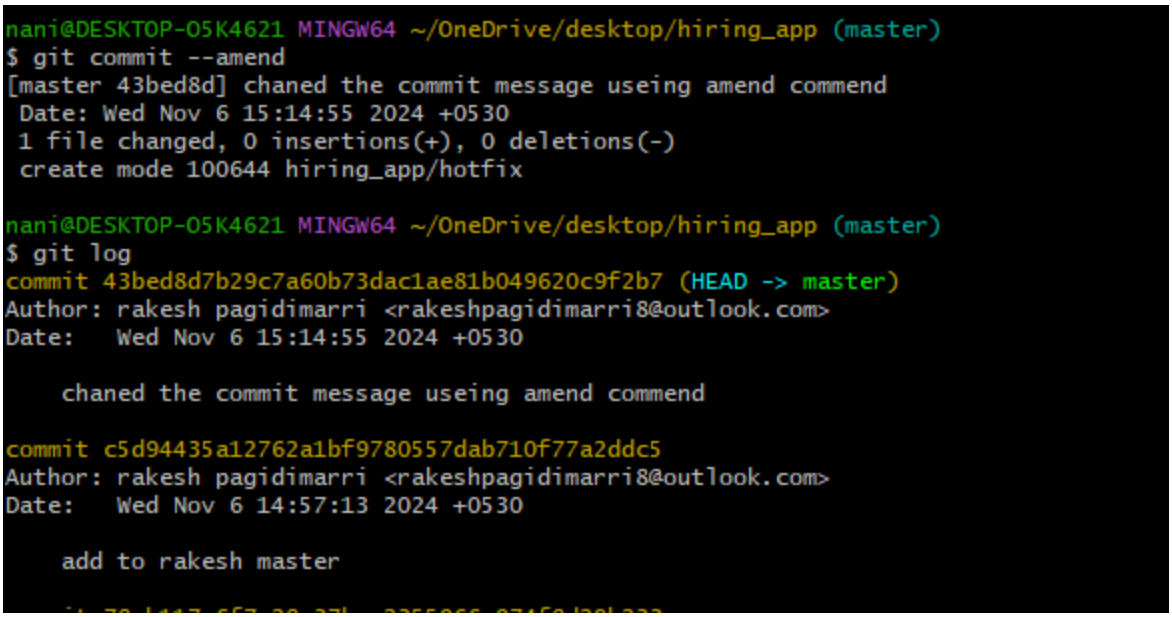
19)basic understanding of .git file.

```
nani@DESKTOP-O5K4621 MINGW64 ~/OneDrive/Desktop/git2 (master)
$ ls -a
./  ../  .git/  file1  file2

nani@DESKTOP-O5K4621 MINGW64 ~/OneDrive/Desktop/git2 (master)
$ cd .git

nani@DESKTOP-O5K4621 MINGW64 ~/OneDrive/Desktop/git2/.git (GIT_DIR!)
$ ll
total 7
-rw-r--r-- 1 nani 197609  23 Nov  7 13:03 HEAD
-rw-r--r-- 1 nani 197609 130 Nov  7 13:03 config
-rw-r--r-- 1 nani 197609  73 Nov  7 13:03 description
drwxr-xr-x 1 nani 197609   0 Nov  7 13:03 hooks/
drwxr-xr-x 1 nani 197609   0 Nov  7 13:03 info/
drwxr-xr-x 1 nani 197609   0 Nov  7 13:03 objects/
drwxr-xr-x 1 nani 197609   0 Nov  7 13:03 refs/
```

20)Check all the logs of git.

```
$ git log
commit 7d36777ee1f2fc13993b18b2b6c06e704d69c4d6 (HEAD -> main, origin/rakesh, origin/main, origin/HEAD, rakesh)
Author: Rakeshpagidimarri <rakeshpagidimarri8@outlook.com>
Date:   Wed Nov 6 18:13:46 2024 +0530

    horzion

commit 151dde3a41154e8451cd8180589b99e324303a31
Author: Rakeshpagidimarri <rakeshpagidimarri8@outlook.com>
Date:   Wed Nov 6 18:09:15 2024 +0530

    mREADME.md

commit 255887c86c48e335841123931dac02f352007266
Author: rakesh pagidimarri <rakeshpagidimarri8@outlook.com>
Date:   Wed Nov 6 18:02:37 2024 +0530

    modified .gitignore

commit fa33d1b7e756c363839O3ec135494b93c9b13926
Author: rakesh pagidimarri <rakeshpagidimarri8@outlook.com>
Date:   Wed Nov 6 17:51:54 2024 +0530

    modified .gitignore

commit cee7f652efc879c62c9a084d9ce848dca23b4343
Author: rakesh pagidimarri <rakeshpagidimarri8@outlook.com>
Date:   Wed Nov 6 17:42:11 2024 +0530

    add .ingnore

commit fcb15d47b0f95d140b5dec97b94cb0652b974cbc
Author: rakesh pagidimarri <rakeshpagidimarri8@outlook.com>
Date:   Wed Nov 6 17:31:34 2024 +0530

    add password

commit f0fab747c949b61d3039275bb0f8d4b1dedbc1a1 (list)
Merge: 6cba56a 8421f24
Author: Rakeshpagidimarri <rakeshpagidimarri8@outlook.com>
Date:   Wed Nov 6 15:31:45 2024 +0530

    Merge pull request #1 from Rakeshpagidimarri/hotfix
```

21)Rename the commit message.



22)Merge multiple commits into single commit.

```
commit 151dde3a41154e8451cd8180589b99e324303a31
Author: Rakeshpagidimarri <rakeshpagidimarri8@outlook.com>
Date:   Wed Nov 6 18:09:15 2024 +0530

    mREADME.md

commit 255887c86c48e335841123931dac02f352007266
Author: rakesh pagidimarri <rakeshpagidimarri8@outlook.com>
Date:   Wed Nov 6 18:02:37 2024 +0530

    modified .gitignore

commit fa33d1b7e756c36383903ec135494b93c9b13926
Author: rakesh pagidimarri <rakeshpagidimarri8@outlook.com>
Date:   Wed Nov 6 17:51:54 2024 +0530

[detached HEAD 4e14a75] modified .gitignore
 Date: Wed Nov 6 17:51:54 2024 +0530
 2 files changed, 3 insertions(+)
 create mode 100644 mREADME.md/OneDrive/desktop/techie_06112024 (main)
Successfully rebased and updated refs/heads/main.
fatal: invalid upstream '4'
nani@DESKTOP-O5K4621 MINGW64 ~/OneDrive/desktop/techie_06112024 (main)
$ ni@DESKTOP-O5K4621 MINGW64 ~/OneDrive/desktop/techie_06112024 (main)
$ git rebase -i head~4
nani@DESKTOP-O5K4621 MINGW64 ~/OneDrive/desktop/techie_06112024 (main)
$ git log
commit 60722cbde888f804a904639ef46b633e5238bfaf (HEAD -> main)
Author: Rakeshpagidimarri <rakeshpagidimarri8@outlook.com>
Date:   Wed Nov 6 18:13:46 2024 +0530

    horzion

commit 4e14a752fe4cca61e47ede5c63963ff18a5527c7
Author: rakesh pagidimarri <rakeshpagidimarri8@outlook.com>
Date:   Wed Nov 6 17:51:54 2024 +0530

    modified .gitignore

    modified .gitignore

    mREADME.md

commit cee7f652efc879c62c9a084d9ce848dca23b4343
Author: rakesh pagidimarri <rakeshpagidimarri8@outlook.com>
Date:   Wed Nov 6 17:42:11 2024 +0530

    add .ingnore
```