# **GITHUB**

Gv Trần Ngọc Phương

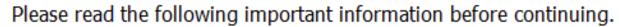
# Tạo Tài Khoản

https://github.com

## Cài đặt GIT

https://www.git-scm.com/download/win

#### Information





When you are ready to continue with Setup, click Next.

### **GNU General Public License**

Version 2, June 1991

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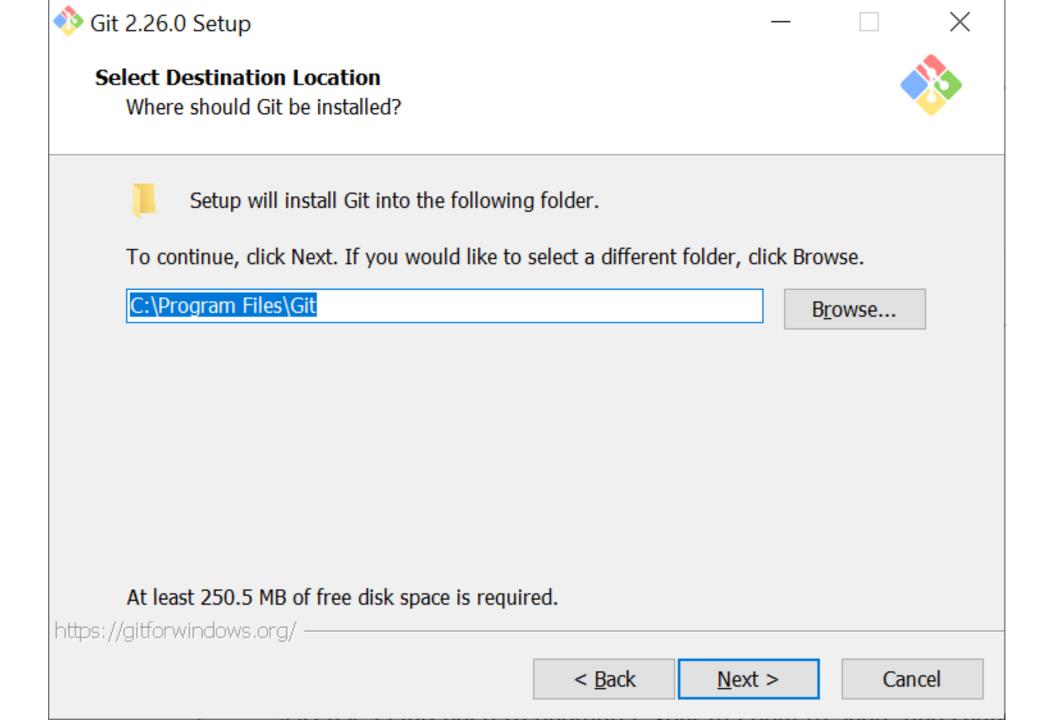
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#### **Preamble**

The licenses for most software are designed to take away your freedom to share and change it. By contrast, the GNU General Public License is intended to guarantee your freedom to share and change

https://gitforwindows.org/

Next >



<ul><li>♦ Git 2.26.0 Setup</li></ul>
Select Components Which components should be installed?
Solect the components you want to install: clear the components you do not



Select the components you want to install; clear the components you do not want to install. Click Next when you are ready to continue.

✓ Additional icons
On the Desktop
✓ Windows Explorer integration
✓ Git Bash Here
Git GUI Here
Git LFS (Large File Support)
✓ Associate .git* configuration files with the default text editor
✓ Associate .sh files to be run with Bash
✓ Use a TrueType font in all console windows
Check daily for Git for Windows updates

Current selection requires at least 250.1 MB of disk space.

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< <u>B</u>ack

Next >

Git 2.26.0 Setup	_	_	$\times$				
Select Start Menu Folder Where should Setup place the program's shortcuts?							
Setup will create the program's shortcuts in the following Start Menu folder.  To continue, click Next. If you would like to select a different folder, click Browse.							
Git		B <u>r</u> owse					
Don't create a Start Menu folder  https://gitforwindows.org/							
< <u>B</u> a	ack <u>N</u> ext >		Cancel				



#### Choosing the default editor used by Git

Which editor would you like Git to use?



Use Vim (the ubiquitous text editor) as Git's default editor

The <u>Vim editor</u>, while powerful, <u>can be hard to use</u>. Its user interface is unintuitive and its key bindings are awkward.

Note: Vim is the default editor of Git for Windows only for historical reasons, and it is highly recommended to switch to a modern GUI editor instead.

Note: This will leave the 'core.editor' option unset, which will make Git fall back to the 'EDITOR' environment variable. The default editor is Vim - but you may set it to some other editor of your choice.

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#### Choosing the default editor used by Git

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#### Adjusting your PATH environment

How would you like to use Git from the command line?



Use Git from Git Bash only

This is the most cautious choice as your PATH will not be modified at all. You will only be able to use the Git command line tools from Git Bash.

Git from the command line and also from 3rd-party software

(Recommended) This option adds only some minimal Git wrappers to your PATH to avoid cluttering your environment with optional Unix tools. You will be able to use Git from Git Bash, the Command Prompt and the Windows PowerShell as well as any third-party software looking for Git in PATH.

Use Git and optional Unix tools from the Command Prompt

Both Git and the optional Unix tools will be added to your PATH. Warning: This will override Windows tools like "find" and "sort". Only use this option if you understand the implications.

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### Use the OpenSSL library

Server certificates will be validated using the ca-bundle.crt file.

### Use the native Windows Secure Channel library

Server certificates will be validated using Windows Certificate Stores.

This option also allows you to use your company's internal Root CA certificates distributed e.g. via Active Directory Domain Services.

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#### Configuring the line ending conversions

How should Git treat line endings in text files?



### Checkout Windows-style, commit Unix-style line endings

Git will convert LF to CRLF when checking out text files. When committing text files, CRLF will be converted to LF. For cross-platform projects, this is the recommended setting on Windows ("core.autocrlf" is set to "true").

### Checkout as-is, commit Unix-style line endings

Git will not perform any conversion when checking out text files. When committing text files, CRLF will be converted to LF. For cross-platform projects, this is the recommended setting on Unix ("core.autocrlf" is set to "input").

### Checkout as-is, commit as-is

Git will not perform any conversions when checking out or committing text files. Choosing this option is not recommended for cross-platform projects ("core.autocrlf" is set to "false").

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#### Configuring the terminal emulator to use with Git Bash

Which terminal emulator do you want to use with your Git Bash?



### Use MinTTY (the default terminal of MSYS2)

Git Bash will use MinTTY as terminal emulator, which sports a resizable window, non-rectangular selections and a Unicode font. Windows console programs (such as interactive Python) must be launched via `winpty` to work in MinTTY.

#### O Use Windows' default console window

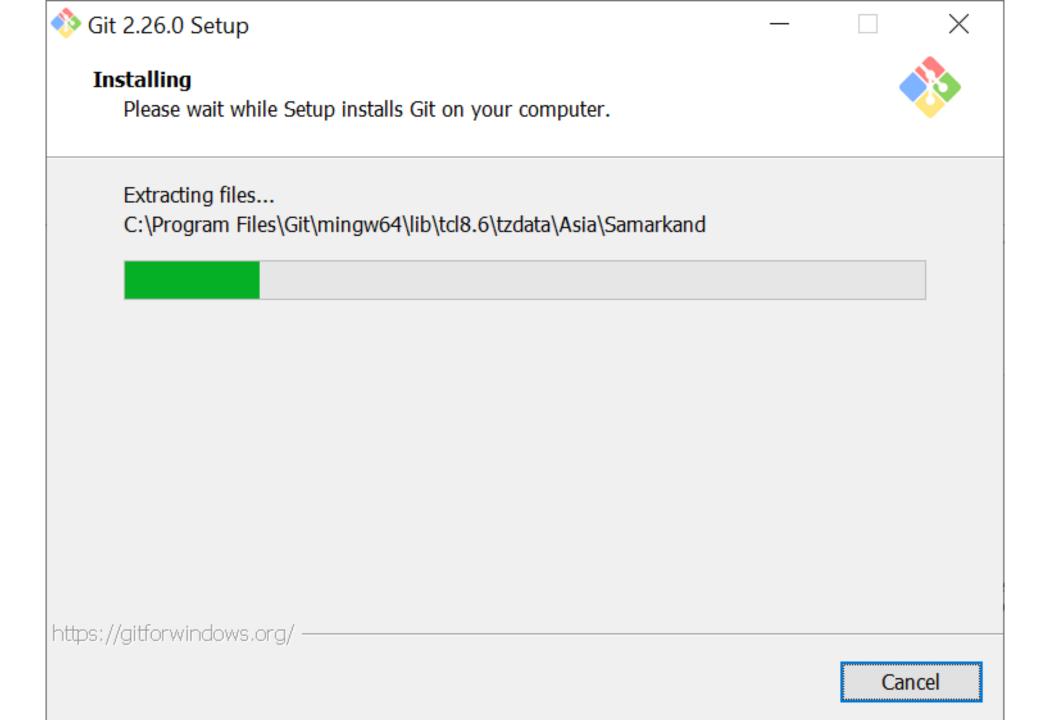
Git will use the default console window of Windows ("cmd.exe"), which works well with Win32 console programs such as interactive Python or node.js, but has a very limited default scroll-back, needs to be configured to use a Unicode font in order to display non-ASCII characters correctly, and prior to Windows 10 its window was not freely resizable and it only allowed rectangular text selections.

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Git 2.26.0 Setup		_		×			
Configuring extra options Which features would you like to enable?							
·	File system data will be read in bulk and cached in memory for certain operations ("core.fscache" is set to "true"). This provides a significant						
✓ Enable Git Credential Manager							
The <u>Git Credential Manager for Windows</u> provides secure Git credential storage for Windows, most notably multi-factor authentication support for Visual Studio Team Services and GitHub. (requires .NET framework v4.5.1 or later).							
Enable symbolic links  Enable symbolic links (requires the SeCreateSymbolicLink permission).  Please note that existing repositories are unaffected by this setting.							
	< <u>B</u> ack	<u>I</u> nstall	Can	cel			

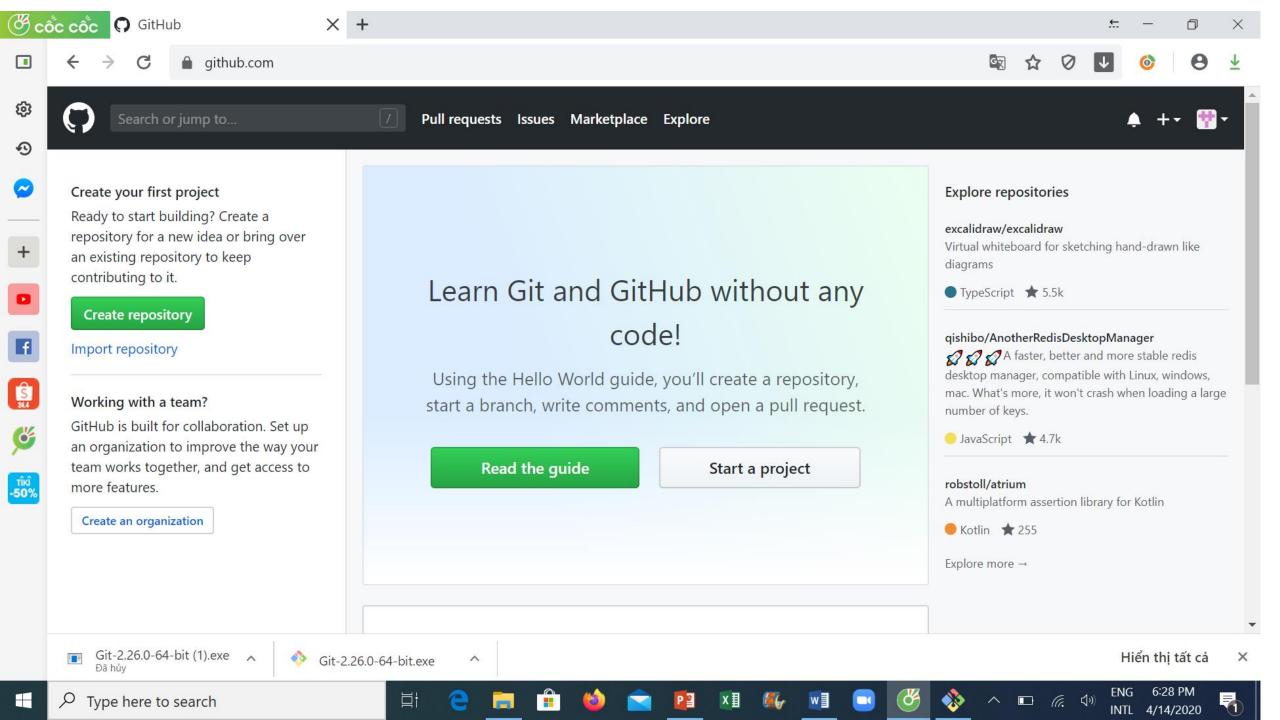


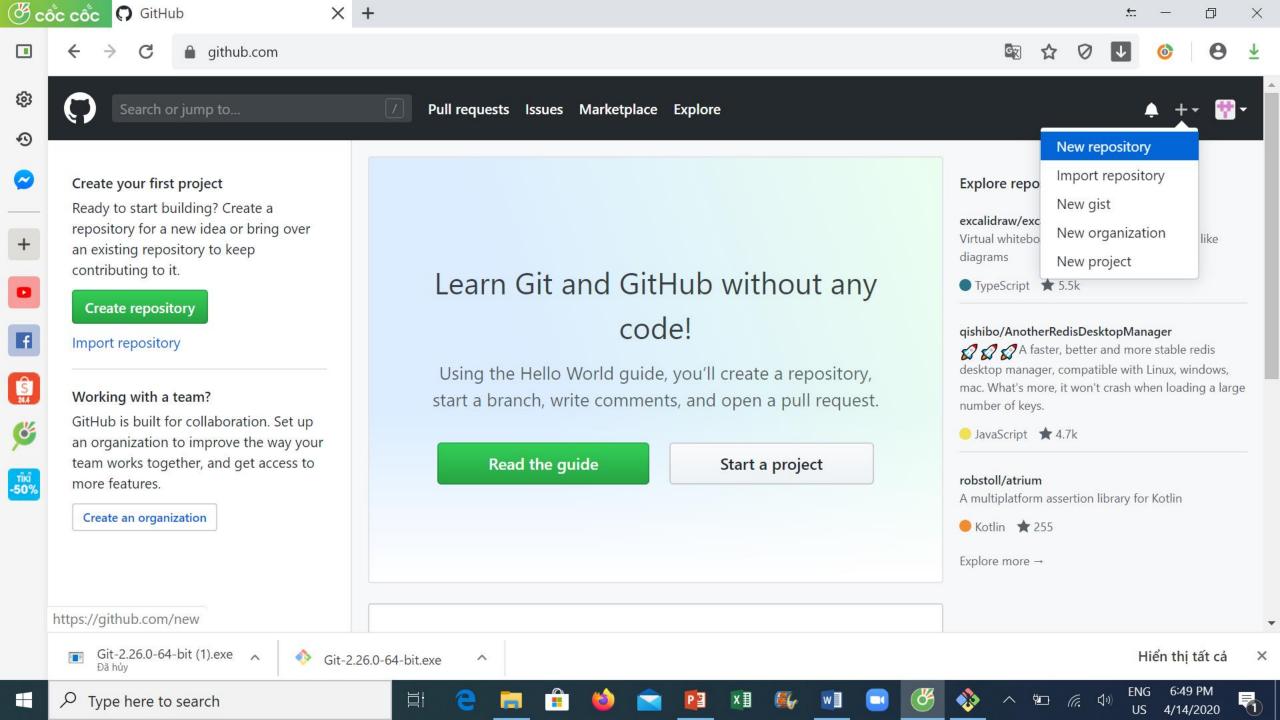
## Các thành phần chính trong GITHUB

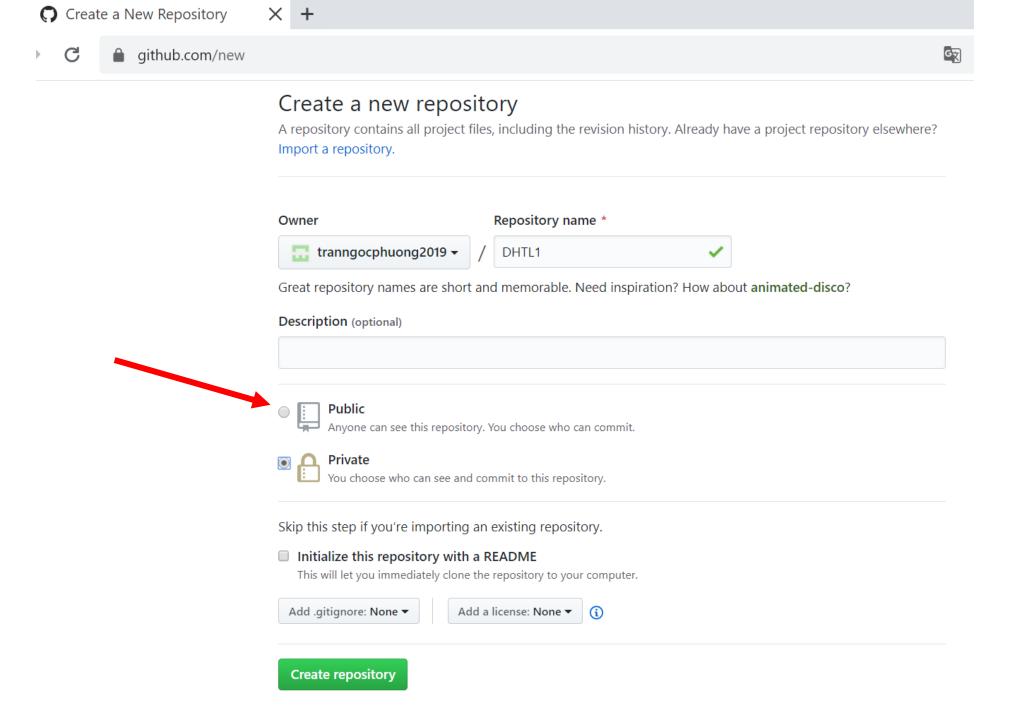
- Repository (Repo) : Nơi chứa source code
  - Local Repo: Là nơi lưu trữ trong máy tính
  - Remote Repo: Là nơi lưu trữ trên máy chủ (trên mạng)
- Commit: Xác nhận đã chỉnh sửa để lưu lên Repo
- Branch: Phân nhánh cho dự án (mặc định chỉ có branch Master)

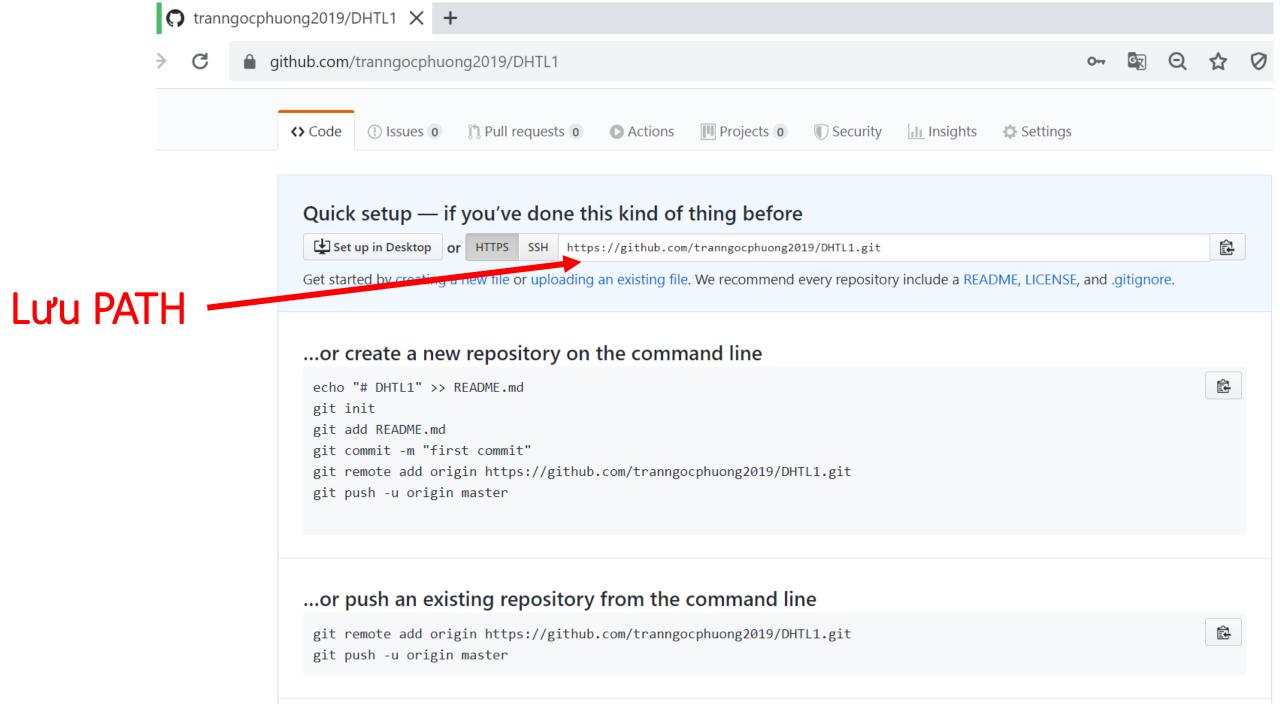
## Tạo Repository (Repo)

- Đăng nhập vào GitHub với tài khoản đã tạo
- https://github.com/
- Tạo mới một Repo: New Repository
- Dang Public

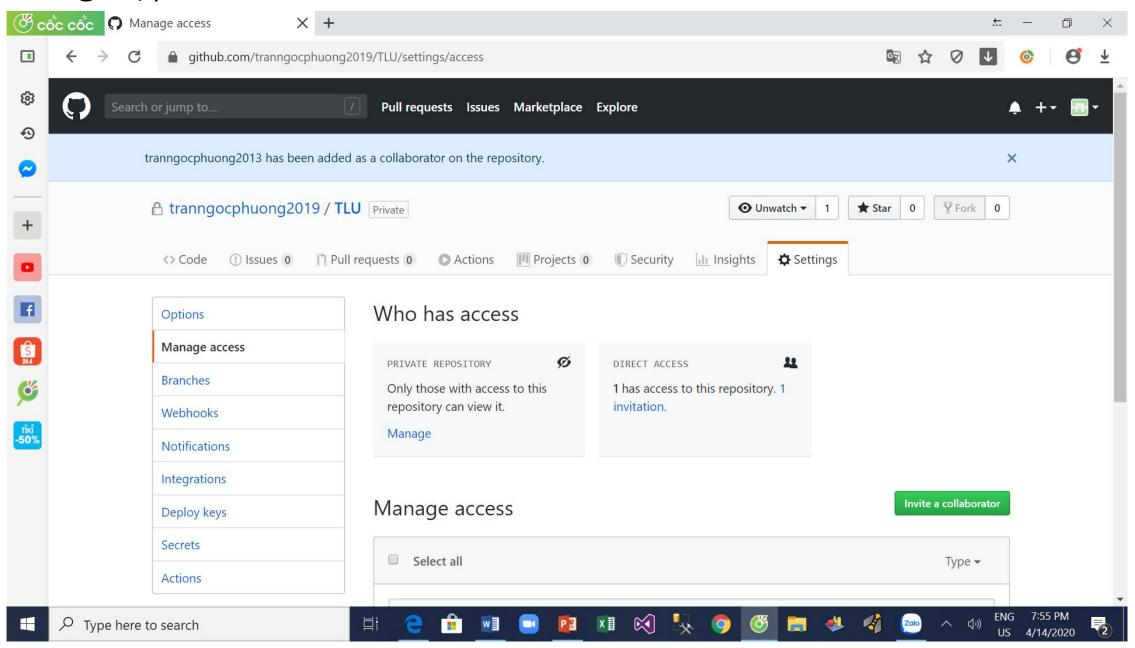




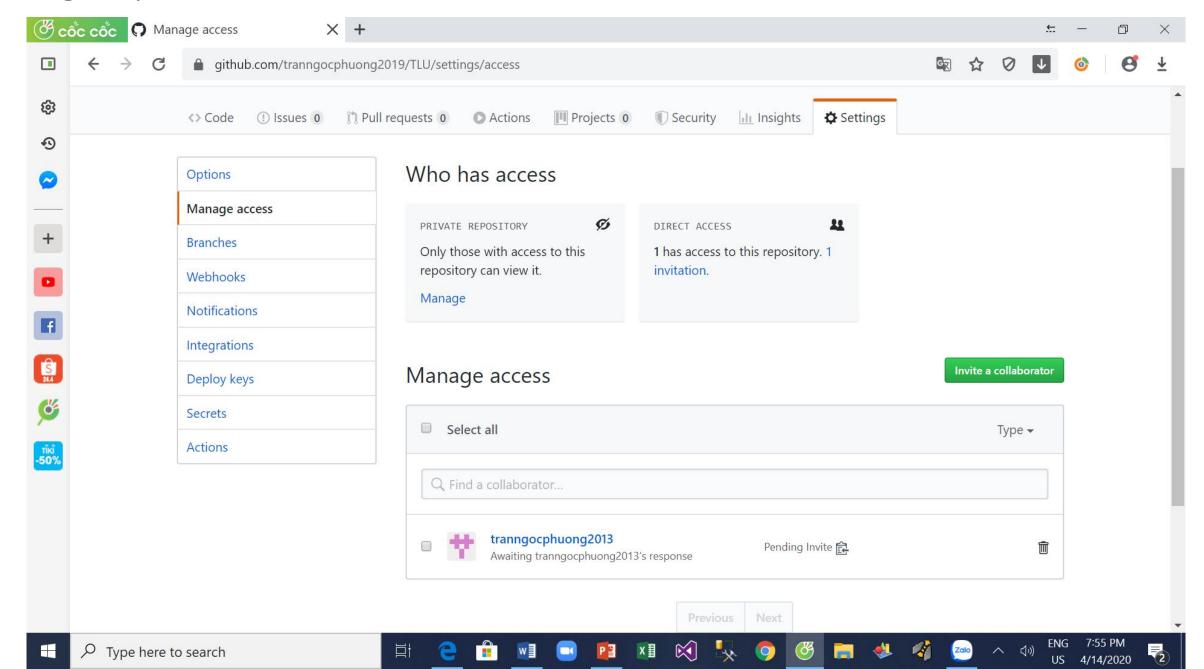




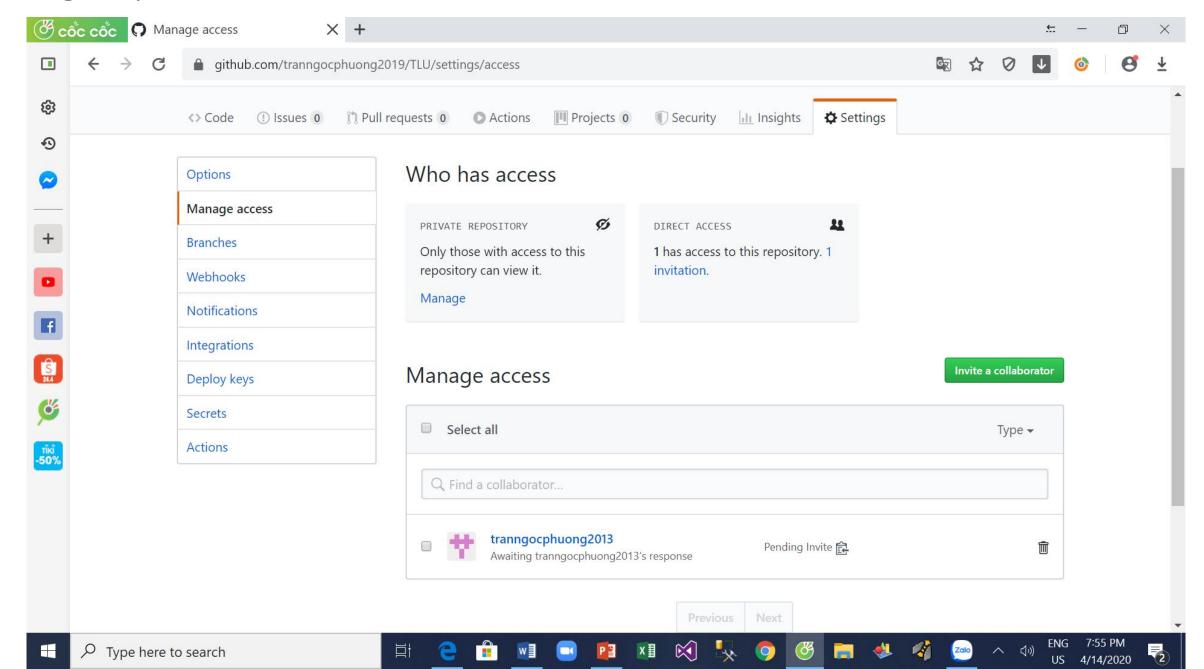
### Trường hợp Private: Mời các thành viên



### Trường hợp Private: Mời các thành viên

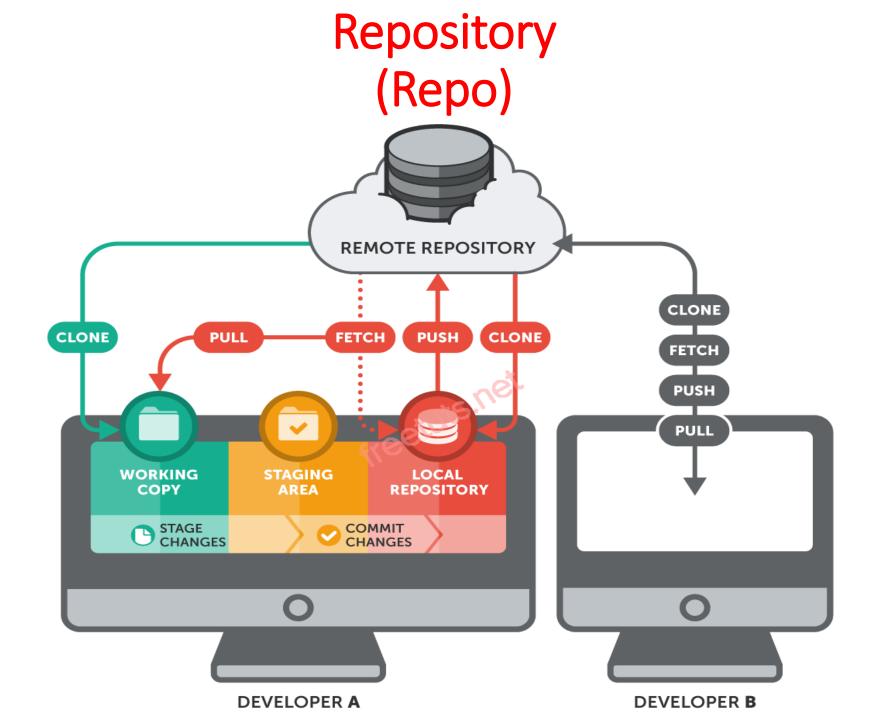


### Trường hợp Private: Mời các thành viên

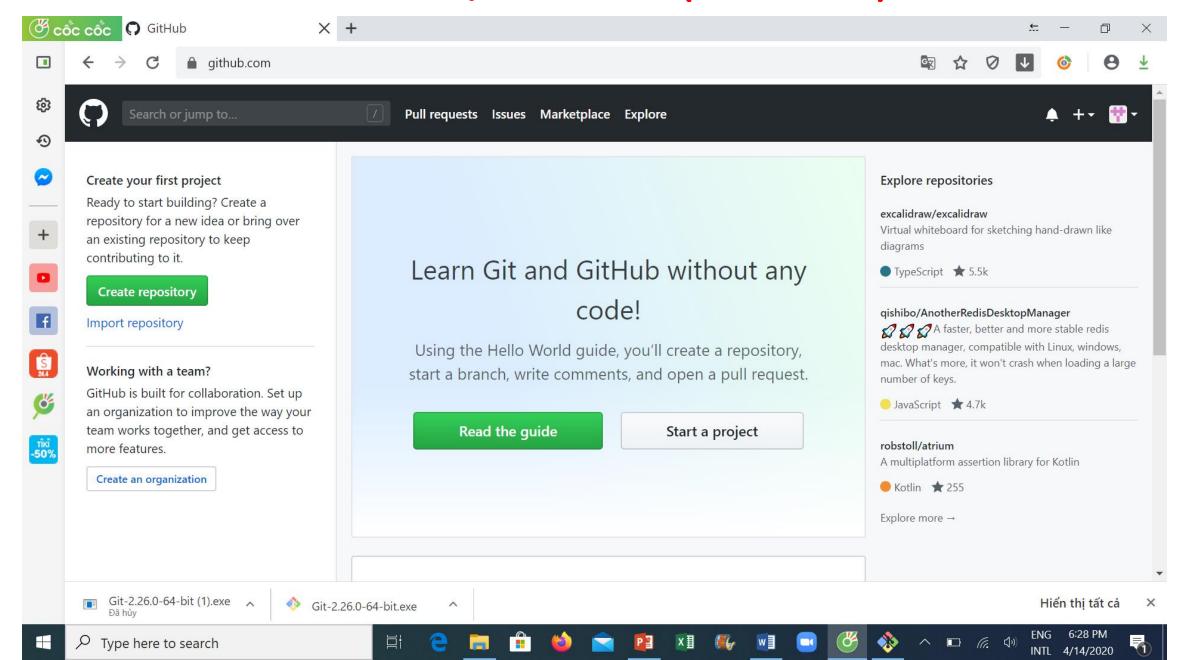


## Repository (Repo)

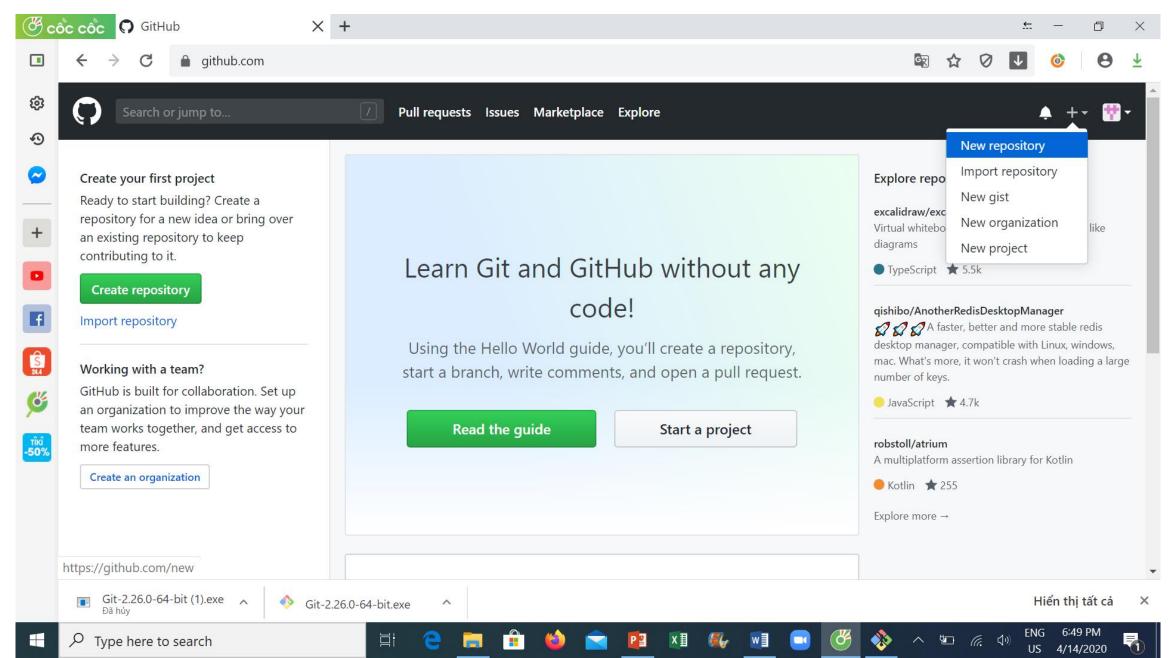
- Nơi chứa tất cả mã nguồn cho một dự án được quản lý bởi Git.
- Repository chính khai báo thư mục chứa dự án của bạn trên local hoặc remote.
- Mỗi repo trên local được lưu trữ ẩn trong thư mục .git



## KHỞI TẠO REPO (Remote)



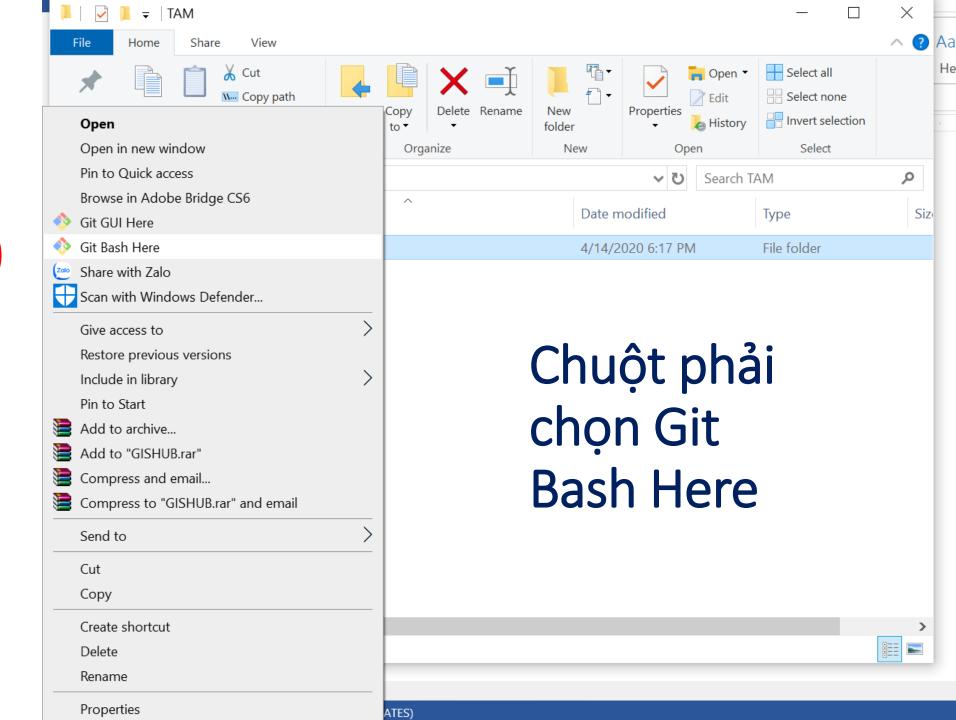
## KHỞI TẠO REPO (Remote)



### LOCAL REPOSITORY

- Repo được cài đặt trên máy tính của lập trình viên
- Repo này sẽ đồng bộ hóa với remote repo bằng các lệnh của git.

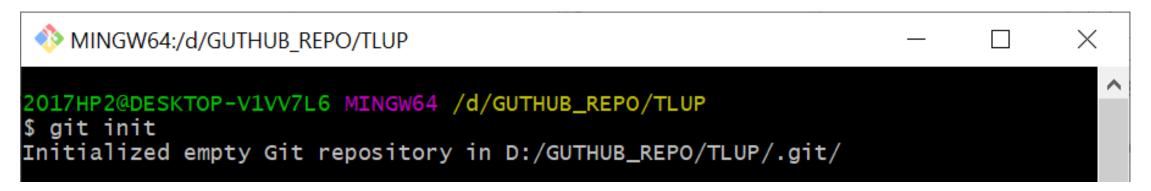
## KHỞI TẠO REPO (Local)



## Sử dụng lệnh trong của sổ Command



### \$ git init.



### Khởi tạo GIT

- 2017HP2@DESKTOP-V1VV7L6 MINGW64 /d/GitHUbPrivate (master)
- \$ git init
- Reinitialized existing Git repository in D:/GitHUbPrivate/.git/
- 2017HP2@DESKTOP-V1VV7L6 MINGW64 /d/GitHUbPrivate (master)
- \$ git add .
- 2017HP2@DESKTOP-V1VV7L6 MINGW64 /d/GitHUbPrivate (master)
- \$ git commit -m "Chu thich thay doi 1"
- 2017HP2@DESKTOP-V1VV7L6 MINGW64 /d/GitHUbPrivate (master)
- \$ git remote add origin https://github.com/tranngocphuong2019/TLU.git
- 2017HP2@DESKTOP-V1VV7L6 MINGW64 /d/GitHUbPrivate (master)
- \$ git push -u origin master

### Cập nhật GIT

- Bước 1: **\$ git add** .
- Bước 2: \$ git commit -m "Chu thich thay doi 2"
- Bước 3: \$ git remote add origin https://github.com/tranngocphuong2019/TLU.git
- Bước 4: \$ git push -u origin master

#### Kết quả cập nhật thành công

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), 2.72 KiB | 1.36 MiB/s, done.

Total 3 (delta 1), reused 0 (delta 0)

remote: Resolving deltas: 100% (1/1), completed with 1 local object.

To https://github.com/tranngocphuong2019/TLU.git

03c6b2a..58e1669 master -> master

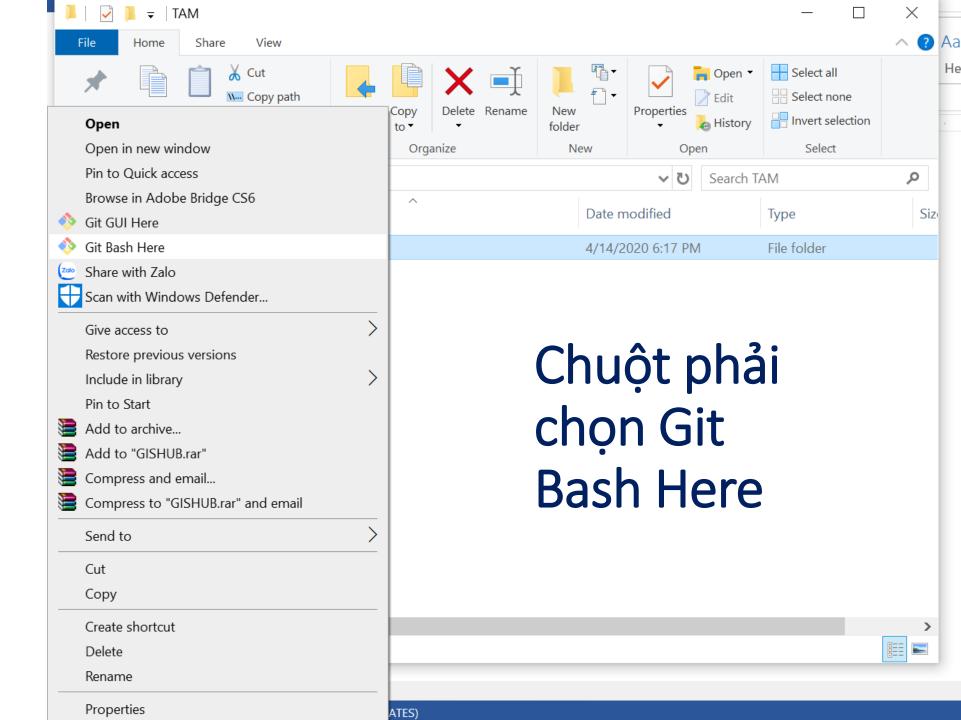
Branch 'master' set up to track remote branch 'master' from 'origin'.

### Các lệnh cơ bản

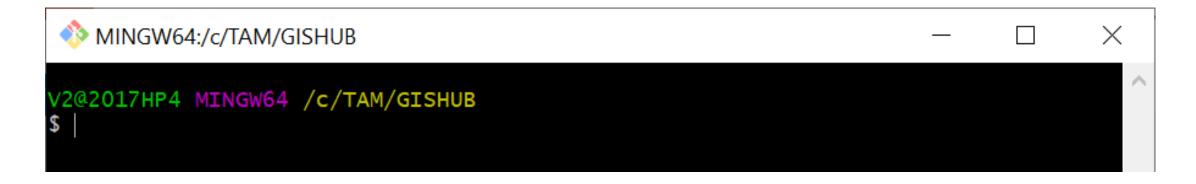
- 1. git init: khởi tạo git trong thư mục (.git)
- 2. git add .: thêm các file vào thư mục git trên local
- 3. git commit -m "Note 1": xác nhận
- 4. git remote add origin https://github.com/.../.git : chỉ đến remoter server
- 5. git push: Đồng bộ lên Github (git push origin master)
- 6. git pull: Đồng bộ từ Github về máy (git pull origin master)
- 7. git clone: lấy toàn bộ source code về máy
- 8. git status: xem trạng thái các file đã đưa vào Git hay chưa?
- 9. git log: Xem nhật ký của Git
- 10.git stash: lưu lại các file khi chưa Commit

- Tao Repositorie TLUP (Public)
- Tạo Thư mục TLUP trên Local
- Tạo 02 file txt trên máy tính:
  - P1.txt (nội dung "ABC")
  - P2.txt (nội dung "123")

### Đưa Project lên HUB



## Sử dụng lệnh trong của sổ Command



### \$ git init



git add.

```
2017HP2@DESKTOP-V1VV7L6 MINGW64 /d/GUTHUB_REPO/TLUP (master)
$ git add .
```

git commit -m "L1"

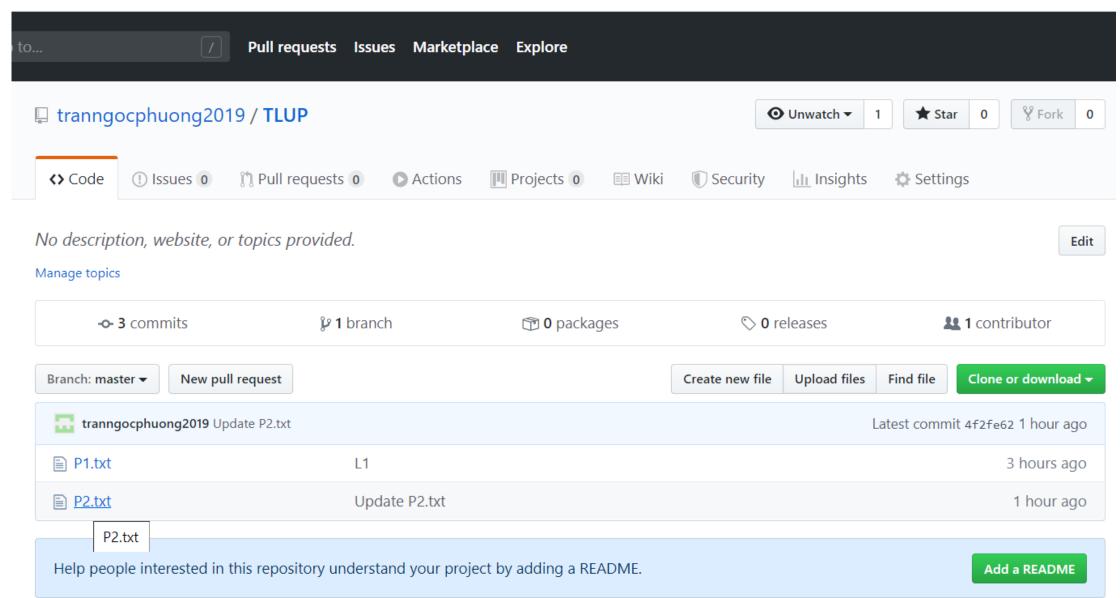
```
2017HP2@DESKTOP-V1VV7L6 MINGW64 /d/GUTHUB_REPO/TLUP (master)
$ git commit -m "L1"
[master (root-commit) 1f573ae] L1
2 files changed, 3 insertions(+)
create mode 100644 P1.txt
create mode 100644 P2.txt
```

git remote add origin https://.../.git

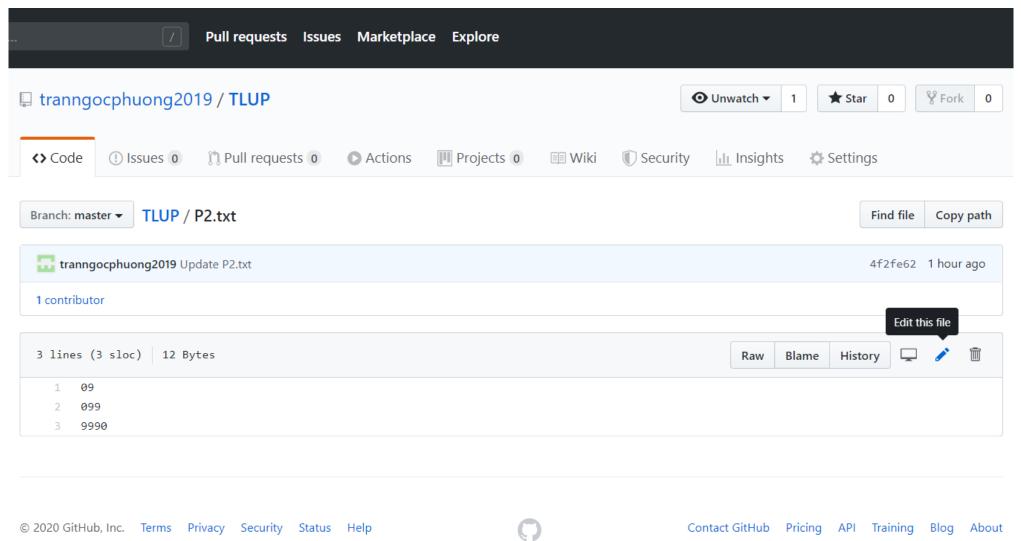
## git push -u origin master

```
$ git push
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), 267 bytes | 267.00 KiB/s, done.
Total 3 (delta 0), reused 0 (delta 0)
To https://github.com/tranngocphuong2019/TLUP.git
    1f573ae..6643bf8 master -> master
```

### Đăng nhập vào GITHUB server



Chọn file P2.txt Chọn Edit this file – Nhập thêm thông tin – Commit changes



## Cập nhật dữ liệu từ Remote server

### git pull

```
$ git pull
remote: Enumerating objects: 5, done.
remote: Counting objects: 100% (5/5), done.
remote: Compressing objects: 100% (2/2), done.
remote: Total 3 (delta 0), reused 0 (delta 0), pack-reused 0
Unpacking objects: 100% (3/3), 661 bytes | 31.00 KiB/s, done.
From https://github.com/tranngocphuong2019/TLUP
   6643bf8..4f2fe62 master -> origin/master
Updating 6643bf8..4f2fe62
Fast-forward
P2.txt | 3 ++-
1 file changed, 2 insertions(+), 1 deletion(-)
```

## git status - git log

```
$ git status
On branch master
Your branch is up to date with 'origin/master'.
nothing to commit, working tree clean
2017HP2@DESKTOP-V1VV7L6 MINGW64 /d/GUTHUB_REPO/TLUP (master)
$ git log
commit 4f2fe6241d65643d7326049b50b4cb516c2553fc (HEAD -> master, origin/master)
Author: tranngocphuong2019 <62366701+tranngocphuong2019@users.noreply.github.com
Date: Thu Apr 16 18:57:21 2020 +0700
    Update P2.txt
commit 6643bf8578802fddd4ea1a6b7ae1fe64c978b2ec
Author: tranngocphuong2019 <tranngocphuong2019@gmail.com>
Date: Thu Apr 16 18:52:54 2020 +0700
    lan2
commit 1f573aebb5c38fd942985da20c0c55ce4567f2c3
Author: tranngocphuong2019 <tranngocphuong2019@gmail.com>
       Thu Apr 16 17:31:34 2020 +0700
Date:
    L1
```

## Phục hồi lại Code

• \$ git stash

```
MINGW64:/d/DHTLGITHUB — X

2017HP2@DESKTOP-V1vV7L6 MINGW64 /d/DHTLGITHUB (master)
$ git stash
Saved working directory and index state WIP on master: 4b9dcbe Lan 1

2017HP2@DESKTOP-V1vV7L6 MINGW64 /d/DHTLGITHUB (master)
$ |
```

Lưu ý: Phục hồi các file đang ở trên máy local