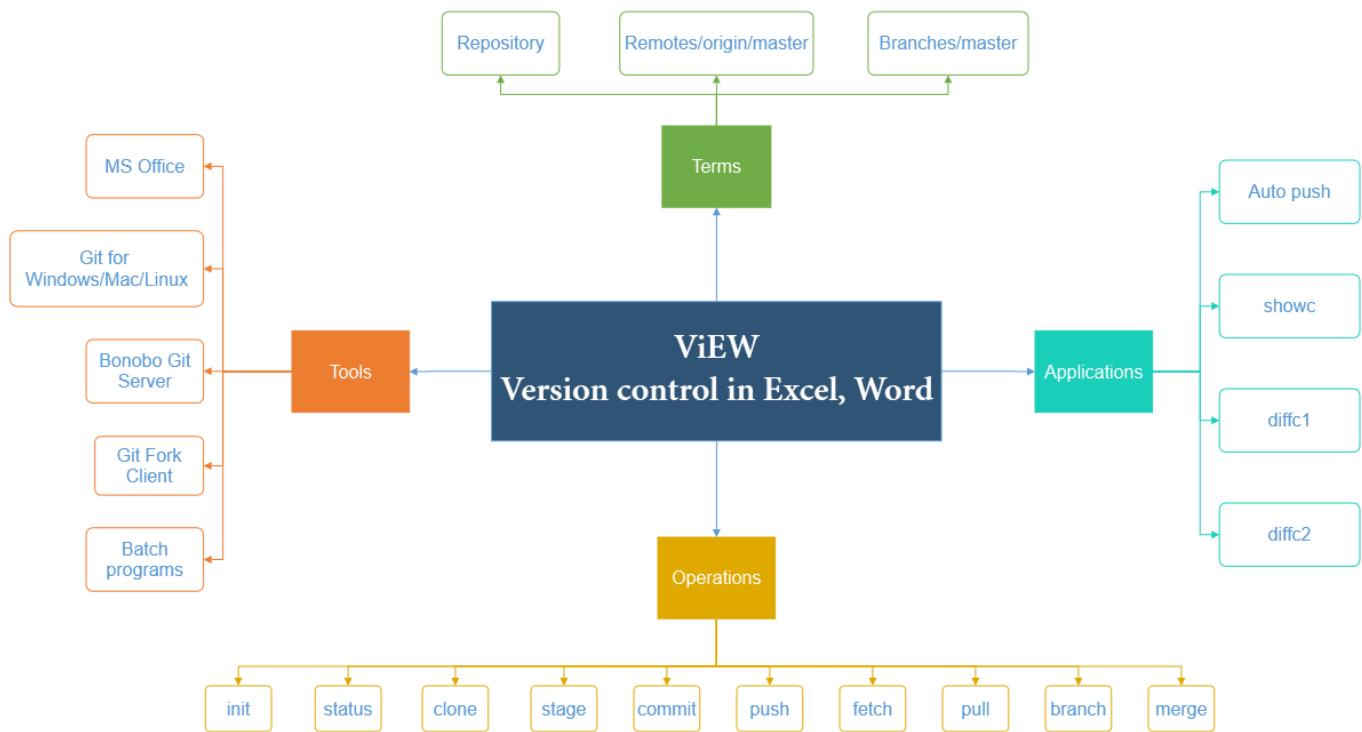


ViEW (Version control system in Excel, Word)

Version: 0.1

A software tool to use Git in Office | Excel, Word



Tools Installation

MS Office 2013 Professional Plus

- MS Office (any version) with `spreadsheet-compare` inside it, will be used to compare 2 versions of a file side-by-side. The `spreadsheetcompare.exe` file is normally available (depends on MS Office version) in this directory - "**C:\Program Files (x86)\Microsoft Office\Office15\DCF**".

File Home Share View Manage Application Tools DCF

Search DCF

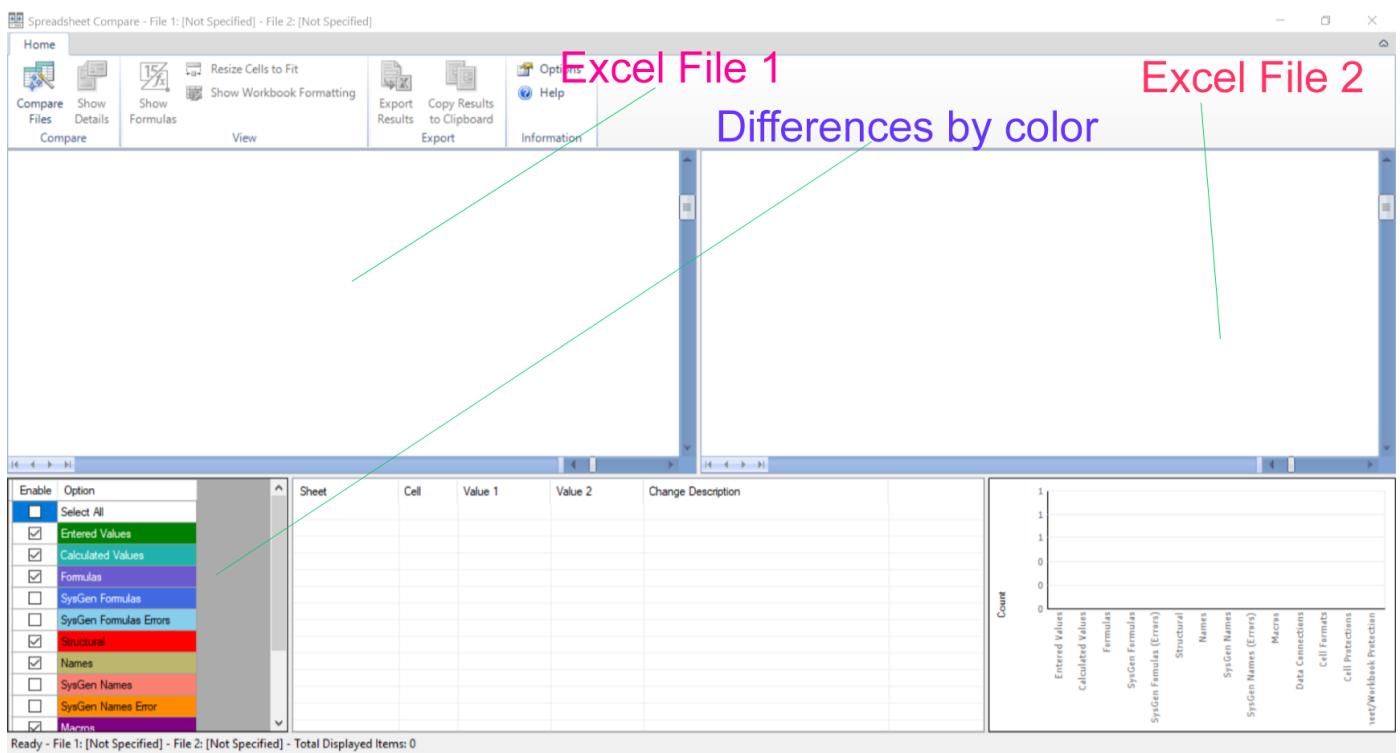
Directory

Name	Date modified	Type	Size
Infragistics2.WinForms.v11.1.dll	01-Oct-12 8:30 PM	Application extensi...	3,807 KB
Inquire.dll	01-Oct-12 8:39 PM	Application extensi...	14 KB
Microsoft.Office.Interop.Access.dao.dll	01-Oct-12 8:30 PM	Application extensi...	79 KB
Microsoft.Office.Interop.Access.dll	16-May-17 12:36 PM	Application extensi...	1,832 KB
Microsoft.Office.Interop.Excel.dll	16-May-17 12:36 PM	Application extensi...	1,600 KB
Microsoft.Vbe.Interop.dll	16-May-17 11:29 AM	Application extensi...	72 KB
MSVCR100.DLL	16-May-17 3:05 AM	Application extensi...	756 KB
NativeShim.dll	16-May-17 12:36 PM	Application extensi...	49 KB
NativeShim.Resources.dll	01-Oct-12 8:39 PM	Application extensi...	15 KB
Northwoods.Go.dll	01-Oct-12 8:30 PM	Application extensi...	619 KB
office.dll	16-May-17 12:36 PM	Application extensi...	456 KB
SPREADSHEETCOMPARE	16-May-17 12:36 PM	Application	689 KB
SPREADSHEETGEAR.DLL	16-May-17 12:36 PM	Application extensi...	0 KB
SpreadsheetIQ.Diagram.dll	01-Oct-12 8:39 PM	Application extensi...	61 KB
SpreadsheetIQ.ExcelAddIn.dll	16-May-17 12:36 PM	Application extensi...	2,136 KB
SpreadsheetIQ.ExcelServices.dll	01-Oct-12 8:39 PM	Application extensi...	267 KB
stdole.dll	01-Oct-12 8:30 PM	Application extensi...	23 KB
SyncFusion.Compression.Base.dll	01-Oct-12 8:39 PM	Application extensi...	67 KB
SyncFusion.Core.dll	01-Oct-12 8:39 PM	Application extensi...	123 KB
SyncFusion.Grid.Base.dll	01-Oct-12 8:39 PM	Application extensi...	23 KB
SyncFusion.Grid.Grouping.Base.dll	01-Oct-12 8:39 PM	Application extensi...	23 KB
SyncFusion.Grid.Grouping.Windows.dll	01-Oct-12 8:39 PM	Application extensi...	831 KB

76 items 1 item selected 688 KB

Spreadsheetcompare.exe

- It looks like this:



- Comparing 2 versions of a file in spreadsheetcompare:

The screenshot shows the Spreadsheet Compare interface comparing two Excel files. The ribbon has tabs for Home, Compare, View, Export, and Information. The 'Compare' tab is selected. The main area shows a table with columns A and B. Row 1 contains 'abhijit'. Row 10 contains 'Blockchain' and 'EOS', which are highlighted in green. The 'View' tab is also selected. The 'Information' tab is selected. The results table shows the following data:

Sheet	Cell	Value 1	Value 2	Change Description
Sheet1	A9		Blockchain	Added Row 2:10.
Sheet1	A10		EOS	Entered Value Added.

The 'Information' tab shows a 'Count' column with the following values:

Category	Count
Entered Values	2
Calculated Values	0
Formulas	0
SysGen Formulas	0
SysGen Formulas Errors	0

In the Image above,

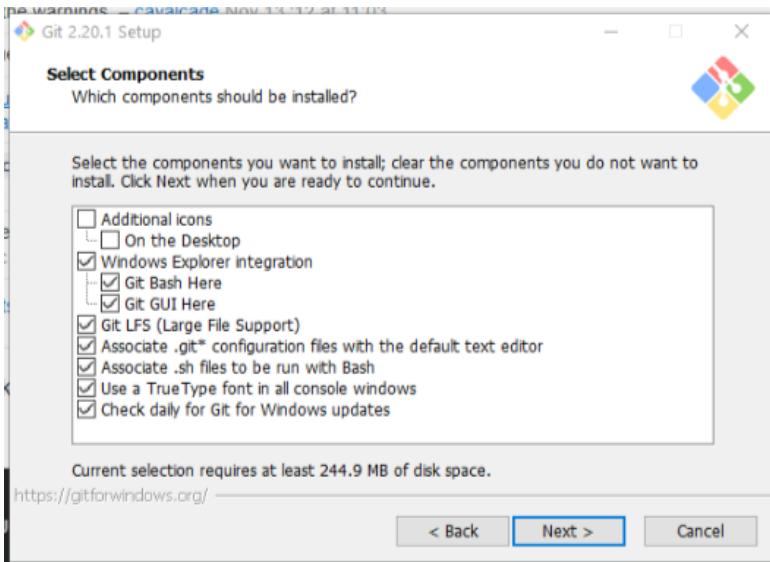
- 1 - A version (Old) of an Excel file (**Book1.xlsx**) on 22 Mar 2019 11:18:26
- 2 - Another (New) version of an Excel file (**Book1.xlsx**) on 24 Mar 2019 13:51:52
- 3 - Shown the differences by color. Entered values in green color,

Git for Windows

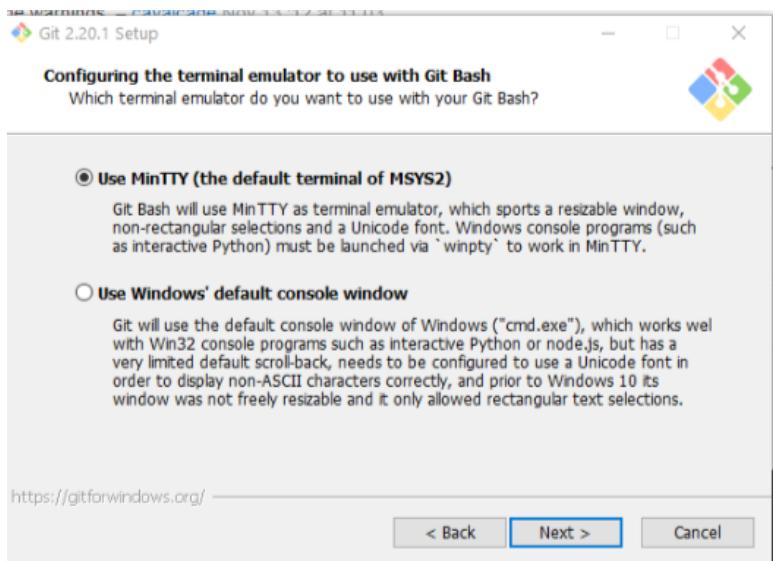
- Follow the Instructions as per the [setup file](#)

In order to work properly i.e. provide **Unix** features in **Windows**, tick/untick as per the images provided below.

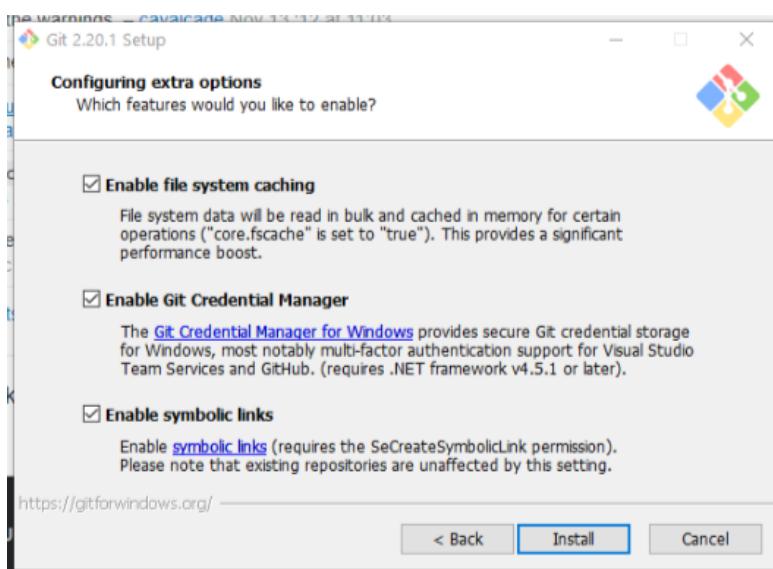
- **Components Installation**



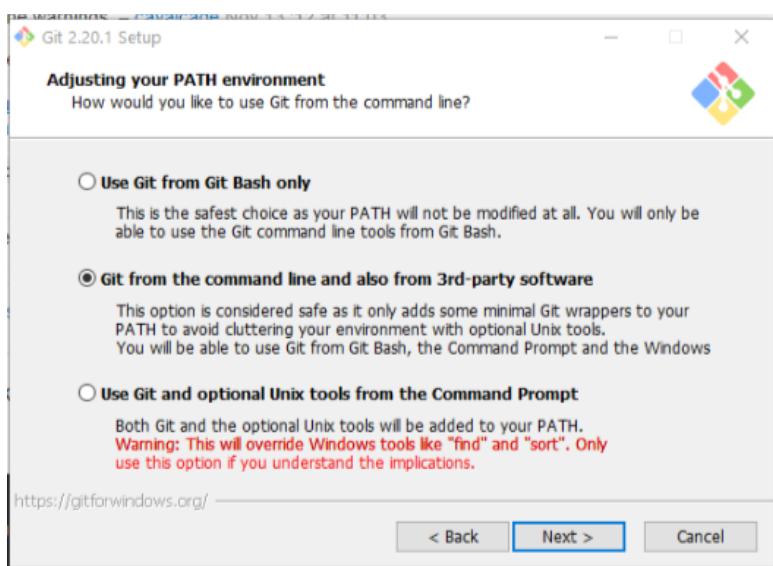
- **Config Terminal Emulator**



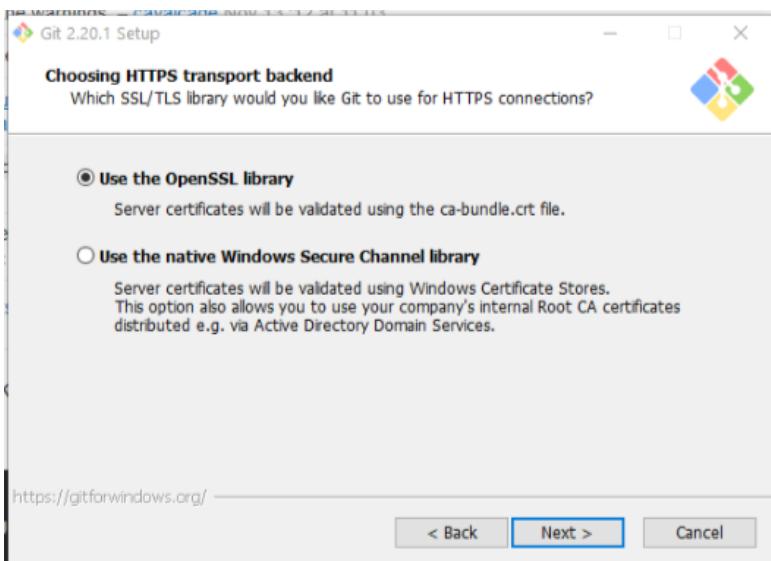
- Extra options



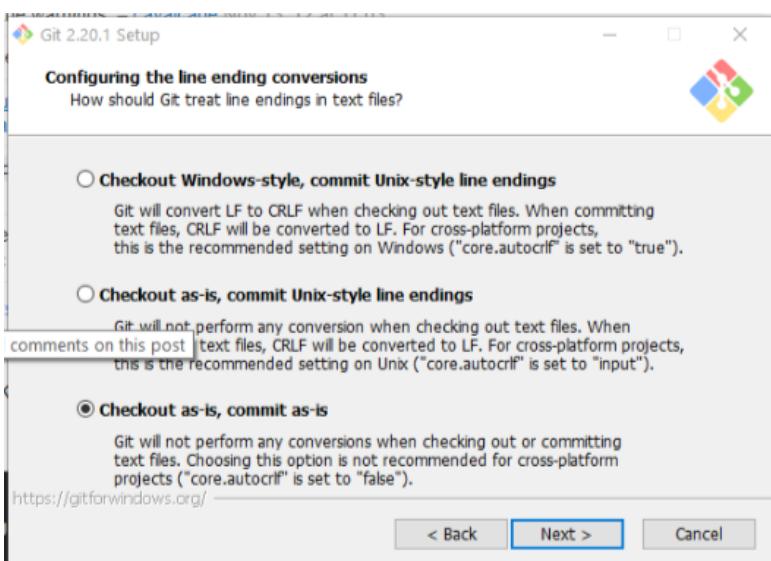
- Use Git from Command line



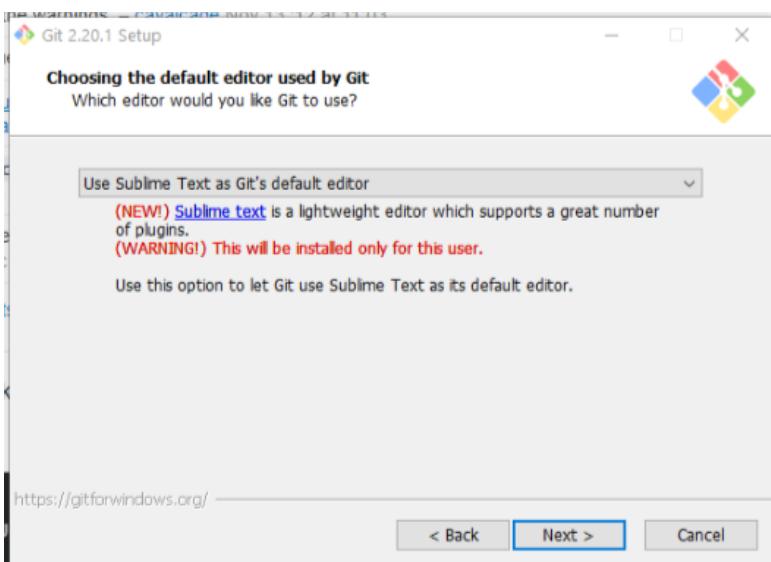
- Choosing HTTP Transport Backend



- Config line style



- Use Sublime Text 3 as editor



Batch programs

- Mainly there are 3 batch files, which are to be used for Excel, Word file types:
 - showc : Show a Word/Excel file on a specific datetime.
 - diffc1 : Compare 2 versions (past & latest) of a Word/Excel file on 2 different datetime.

- diffc2 : Compare 2 versions (on 2 different dates) of a Word/Excel file on 2 different datetime.

Set Environment PATH variable

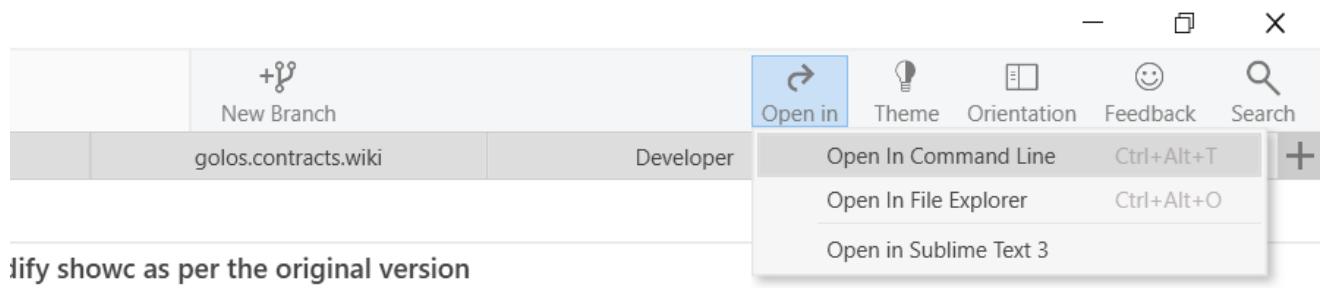
- Add location of **Developer folder** (e.g. "F:\Developer") to Environment PATH variable in Windows PC/Desktop.

Folder structure:

```
.
|--- .gitignore
|--- diffc1.bat
|--- diffc2.bat
|--- gitsetup.bat
|--- openinst3.bat
|--- showc.bat
```

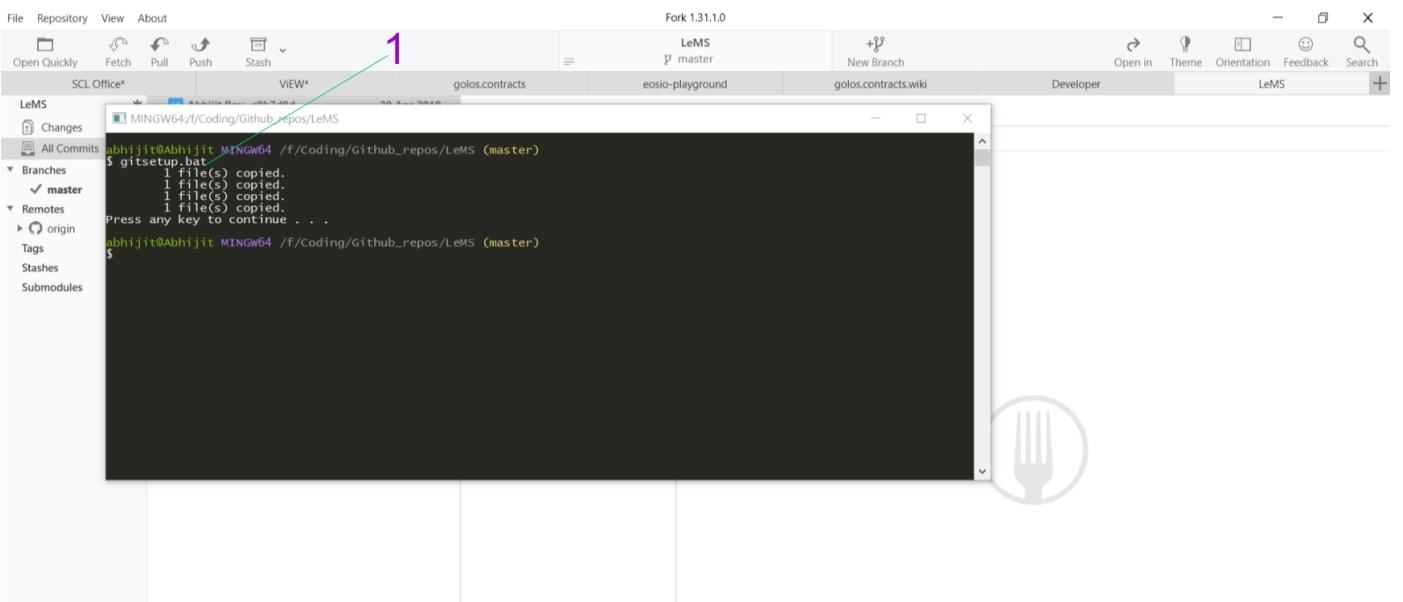
Here, execute in Command prompt.

Step 1: Open in Command Line



!if you want to run the file directly in command line

Step 2: Execute gitsetup.bat file



In the Image above, 1 - type `gitsetup.bat` and enter.

Bonobo Git Server

Installation

Prerequisites

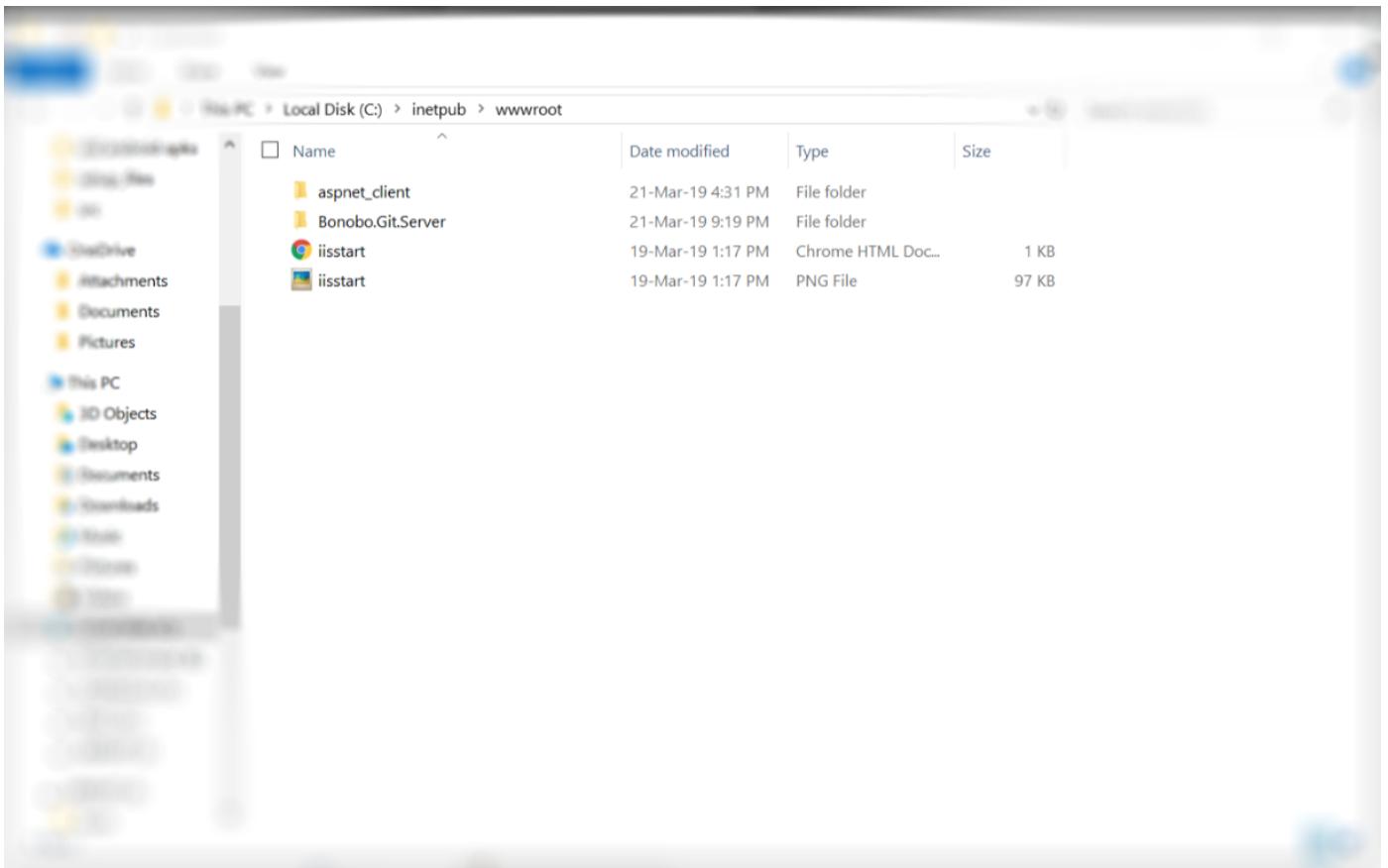
- Go to Control Panel - "Turn Windows Features On/Off"
- tick the "Internet Information Services" and Apply.
- Then, to install .NET Framework and ASP.NET support, follow this:
 - under "IIS -> World Wide Web Services -> Application Development Features"
 - Tick the followings and Apply.
 - .NET Extensibility 4.7
 - ASP.NET 4.7
 - ISAPI Extensions
 - ISAPI Filters
- Now, the prerequisites are installed.

[Bonobo Installation from Internet](#)

[Bonobo Installation from Local folder](#)

Follow the steps:

- Extract the Zip folder to "C:\inetpub\wwwroot" directory as shown in the image below -



- Set the permission (Modify, Write) for the App_Data folder inside Bonobo.Git.Server.
- Open IIS Manager. Goto "Right Click" on Bonobo.Git.Server and Convert to Application.
- Click on Authentication of Bonobo.Git.Server and enable Anonymous Authentication.

Images folder

Explore

- Admin page

Default credentials are username: *admin* password: *admin*

Sign In

Username *

Password *

Remember me?

[Forgot Password?](#)

• Change Admin details

localhost/Bonobo.Git.Server/Account/Edit/3eb9995e-99e3-425a-b978-1409bdd61fb6

BONOBO GIT SERVER

Go to repository ▾ Repositories Users Teams Settings admin Sign Out

admin

Username	admin *
Name	admin *
Surname	
Email	
New Password	
Confirm Password	
Roles	<input checked="" type="checkbox"/> Administrator <input type="checkbox"/>
← Back Save	

• Manage Users

Step 1:

localhost/Bonobo.Git.Server/Account/Index

BONOBO GIT SERVER

Go to repository ▾ Repositories Users Teams Settings admin Sign Out

Users

Username	Name	Surname	Email	Actions
abhijit	abhijit	roy	abhijit@scl.gov.in	
admin	admin			

Create new user

1

2

3

4

Bonobo Git Server (6.3.0.632) © 2015 Jakub Chodounský · Official Page · Github

In the Image above,

- [1] - Click on this to see the list of users
- [2] - Create new User
- [3] - A user created named - **Abhijit**
- [4] - Admin is also a user

Step 2:

localhost/Bonobo.Git.Server/Account/Create

BONOBO GIT SERVER

Go to repository ▾ Repositories Users Teams Settings admin Sign Out

Create New Account

Username	*
Name	*
Surname	*
Email	*
Password	*
Confirm Password	*

[← Back](#) [Create](#)

Bonobo Git Server (6.3.0.632) © 2015 Jakub Chodounský · Official Page · Github

In the Image above, fill all the user details (along with password) and then press [Create](#) button.

• List of Repositories

localhost/Bonobo.Git.Server/Repository/Index

BONOBO GIT SERVER

Go to repository ▾ Repositories Users Teams Settings admin Sign Out

Repositories

Name	Description	Actions
demo.git (Missing)	Discovered in file system.	
demo1	demo1	

[Search](#) [Create new repository](#) [Rescan directory](#)

Bonobo Git Server (6.3.0.632) © 2015 Jakub Chodounský · Official Page · Github

In the Image above,

- 1 - A missing repository (deleted from explorer)
- 2 - A existing repository
- 3 - Create New repository
- 4 - Repository's URL (e.g. "<http://localhost/Bonobo.Git.Server/demo1.git>")
- 5 - Edit repository details (add/delete users, repository details...)
- 6 - Delete the repository from Server side.

• Create New Repository

Create New Repository

Name	<input type="text"/>	*
Group	<input type="text"/>	
Description	<input type="text"/>	
Logo (36x36)	<input type="file"/> Choose File	No file chosen .png, jpg, jpeg, gif
Anonymous	<input type="checkbox"/> ⓘ	
Anonymous push	<input type="button" value="Global"/> ⓘ	
Use global linkify settings	<input checked="" type="checkbox"/>	
Link Regex	<input type="text"/>	
Link Url	<input type="text"/>	
Contributors	<input type="checkbox"/> abhijit roy ⓘ <input type="checkbox"/> admin	
Administrators	<input type="checkbox"/> abhijit roy ⓘ <input checked="" type="checkbox"/> admin	
Teams	No Records... ⓘ	

Bonobo Git Server (6.3.0.632) © 2015 Jakub Chodounský - Official Page - Github

Fill the repository details, add/delete contributors and then press button.

• Team list

← → C ⓘ localhost/Bonobo.Git.Server/Team/Index

 BONOBO GIT SERVER Go to repository Repositories Users Teams Settings admin Sign Out

Teams

Name	Description

Bonobo Git Server (6.3.0.632) © 2015 Jakub Chodounský - Official Page - Github

In the Image above, there is no team created as yet.

• Create Team

Create New Team

Name: *

Description:

Members:

<input type="checkbox"/>	abhijit roy
<input type="checkbox"/>	admin

[Back](#) [Save](#)

Bonobo Git Server (6.3.0.632) © 2015 Jakub Chodounský · Official Page · Github

In the Image above, add users in your team. Give the details and then press the [Save](#) button.

• Repository Browser

Click on a repository (say, demo1) in the **Repositories Page**. It will be shown as below:

demo1

Details Repository Browser Commits Tags Download Clone

master Home

Name	Message	Date
.gitattributes	modified .gitattributes	3/28/2019 1:24:54 PM
.gitignore	Ignore temp_files - temp_*	3/29/2019 12:17:33 PM
Book1.xlsx	modified files - Book1.xlsx - README.md	3/27/2019 9:07:33 PM
demo.txt	modified file demo.txt	3/27/2019 11:23:01 AM
diffc1.bat	edited the comments for 3 files - diffc1.bat - diffc2.bat -	4/3/2019 12:34:19 AM
diffc2.bat	edited the comments for 3 files - diffc1.bat - diffc2.bat -	4/3/2019 12:34:19 AM
README.md	modified README	3/27/2019 9:19:03 PM
showc.bat	edited the comments for 3 files - diffc1.bat - diffc2.bat -	4/3/2019 12:34:19 AM
todo	final version	4/2/2019 2:50:55 AM
Word1.docx	modified word file	3/24/2019 12:04:55 AM

VCS for Excel Windows Ink Workspace

• Settings page

The screenshot shows the 'Settings' page of the Bonobo Git Server. At the top, there's a header with a back arrow, forward arrow, refresh button, and a search bar. The URL is 'localhost/Bonobo.Git.Server/Settings/Index'. On the right side of the header are links for 'Go to repository', 'Repositories', 'Users', 'Teams', 'Settings', 'admin', and 'Sign Out'. Below the header, the page title is 'Settings'. There are several input fields and dropdown menus:

- Repository Directory: \wvmfg\wfd file server\
- Site Title: (empty)
- Site Logo URL: (empty)
- Site Footer Message: (empty)
- Site CSS URL: (empty)
- Language: en-US - English (United States) (dropdown menu)

Below these are several checkboxes:

- Allow anonymous registration (info icon)
- Allow user repository creation (info icon)
- Allow push to create repositories (info icon)
- Allow push for anonymous repositories (info icon)
- Show commit author avatar (info icon)

There are also two text input fields:

- Link Regex: (empty)
- Link Url: (empty)

A blue 'Save' button is located at the bottom left.

- change the default location to your choice
- Allow user repository creation
- Allow push to create repos
- Allow push for anonymous repos
- Show commit author avatar

Fork Git Client

Standard

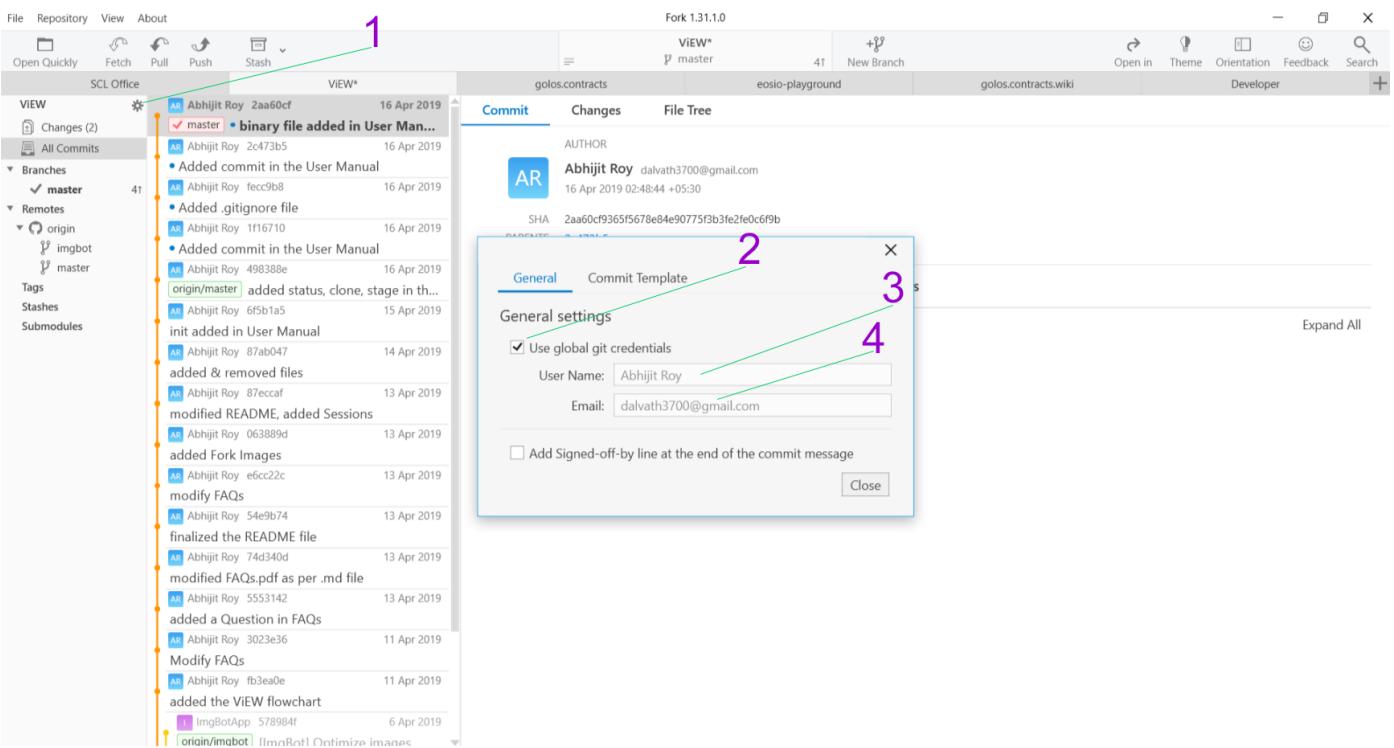
- Click the Setup file and install it as per instruction.

NOTE: No Administrator permission required.

- After Installation, it would ask for User details- `User Name`, `Email`. Give your full name and Office's email address. This would help in recording the author details when making any file changes.

NOTE: Although in the beginning, user details are taken, but for each repository there is an option to use different user details as well.

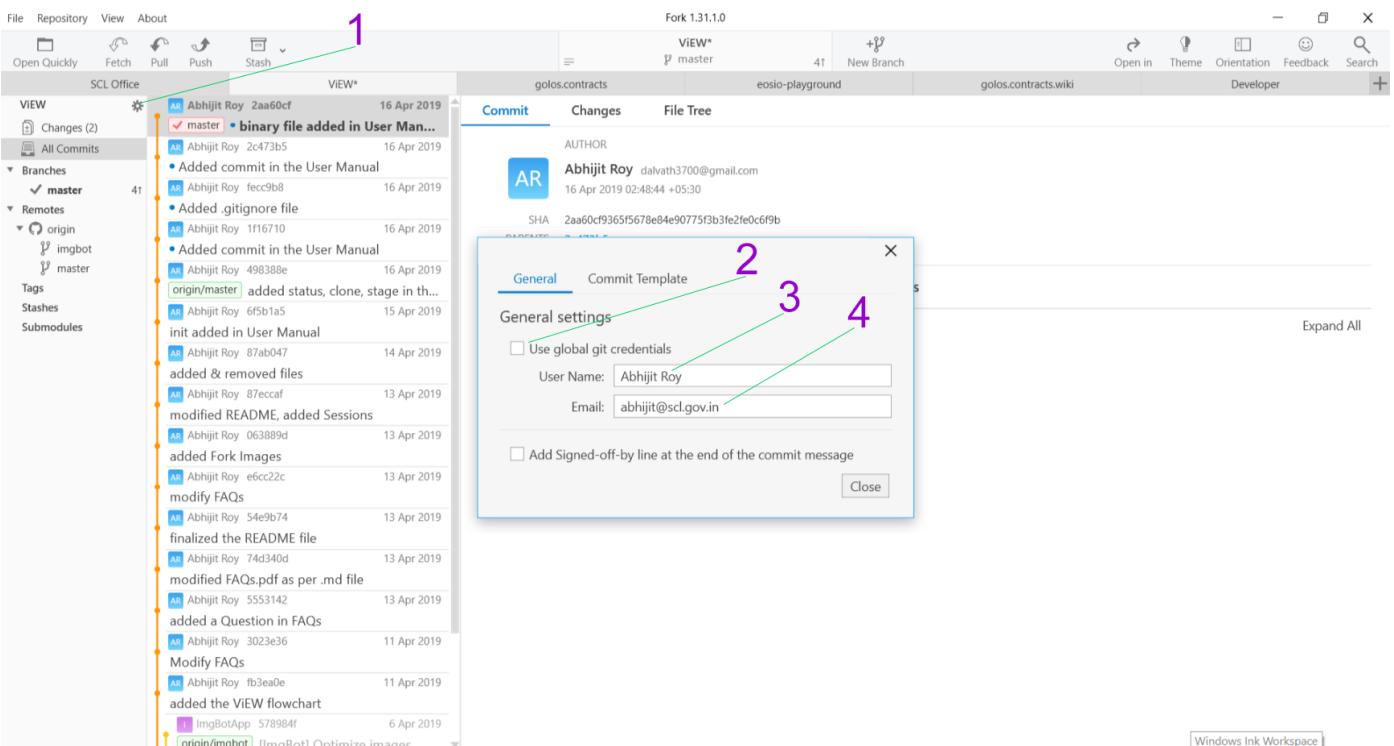
Global User credentials: Can be used for all repository



In the Image above,

- 1 - Click the Repository Settings to bring the dialog.
- 2 - Tick to use the global user credentials for this repository.
- 3 - Full name (of global) for this repository. Asked during Installation.
- 4 - Email address (of global) for this repository. Asked during Installation.

Local User credentials: Can be used for a repository



In the Image above,

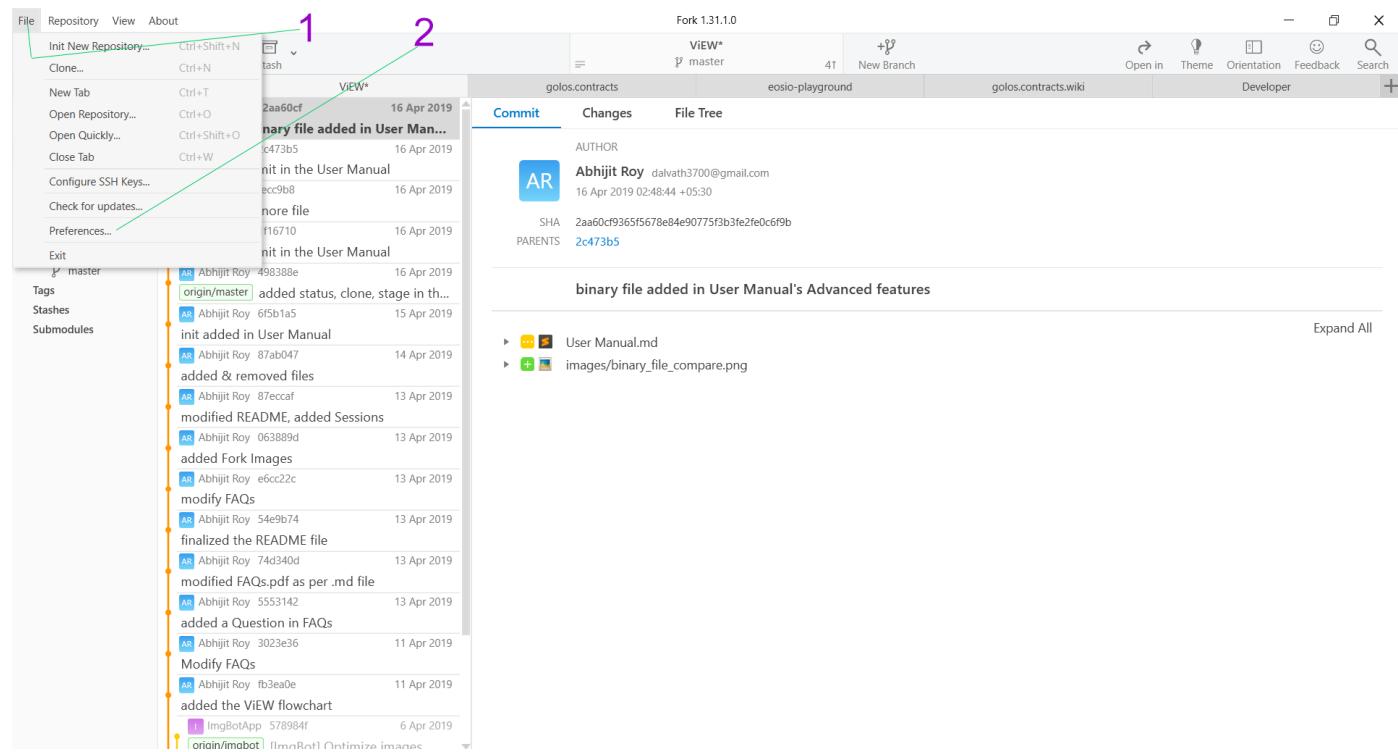
- 1 - Click the Repository Settings to bring the dialog.
- 2 - Untick to use different user credentials (other than global) for this repository.
- 3 - Full name for this repository.
- 4 - Email address for this repository.

Advanced

- Open in Sublime Text 3 If am Universal Editor is needed, **Sublime Text 3** can be used in that case.

Also, it can be merged with the Fork Client.

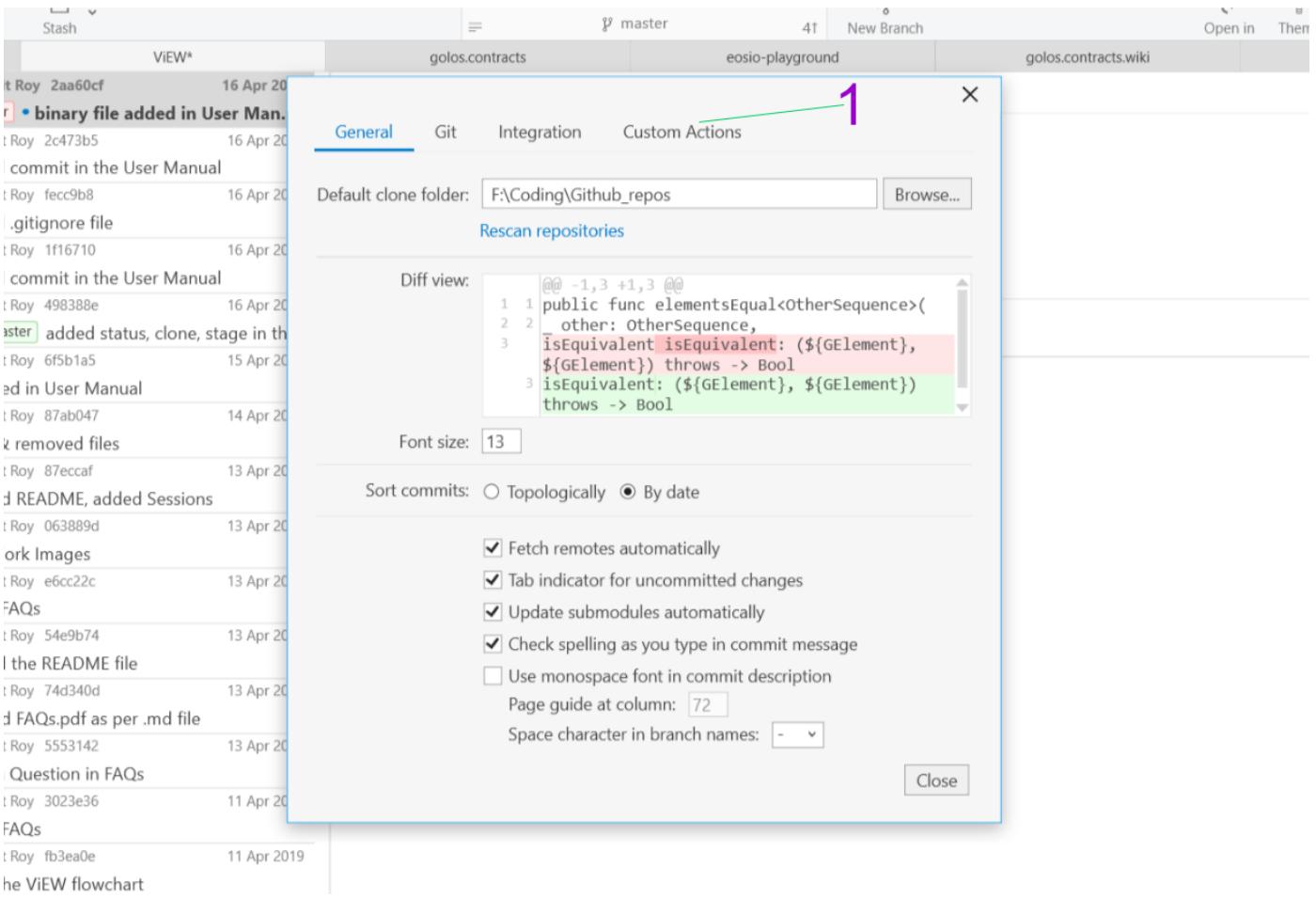
Step 1:



In the Image above,

- 1 - Click **File** menu option
- 2 - Click **Preferences..**

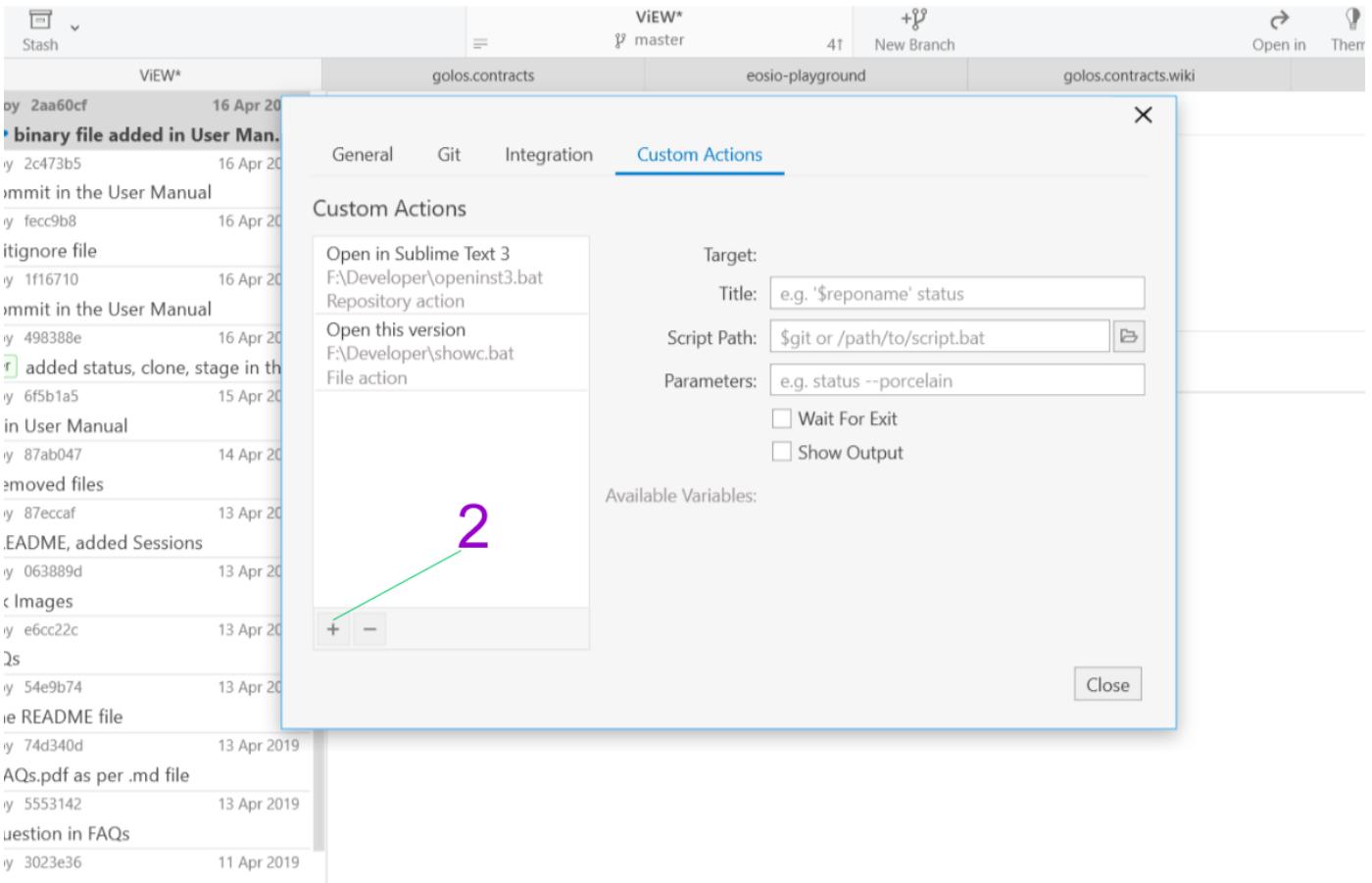
Step 2:



In the Image above,

[1] - Now, click the Custom Actions

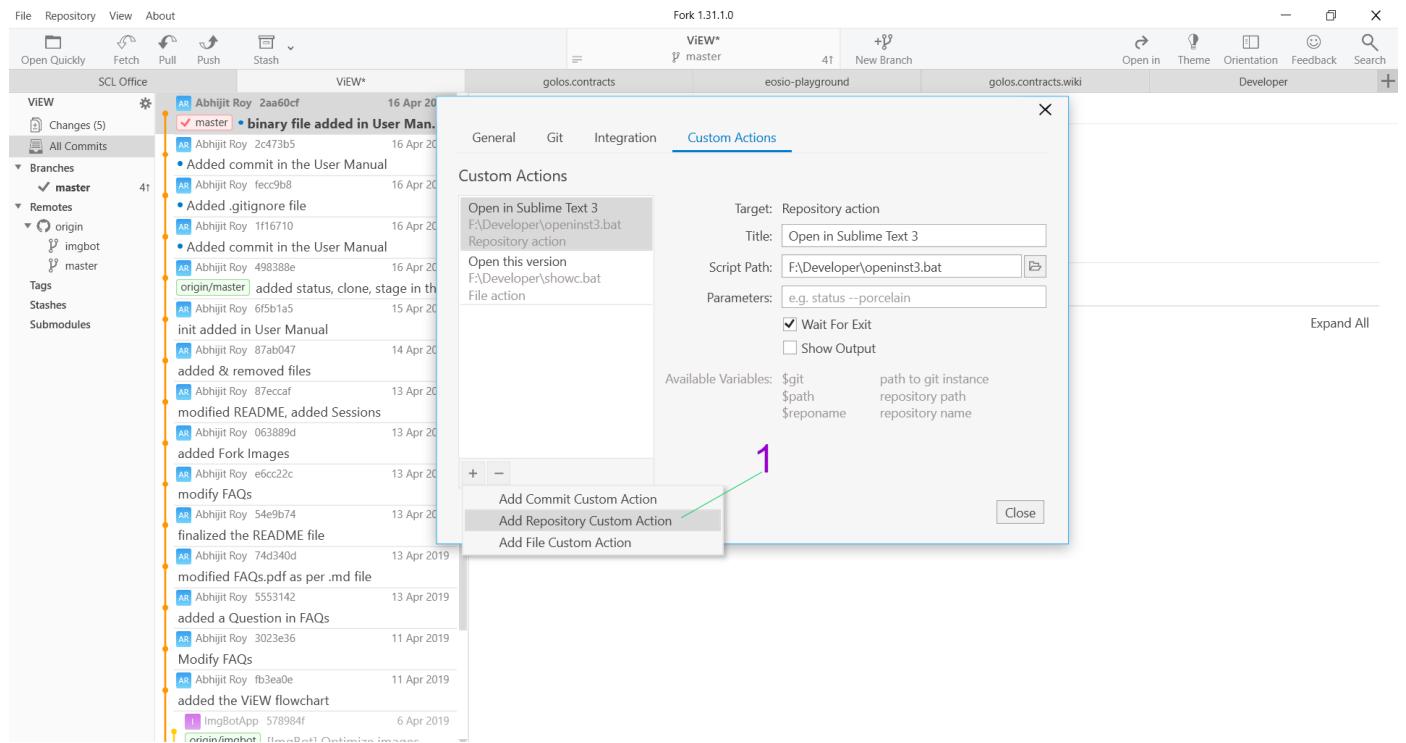
Step 3:



In the Image above,

- 2 - Click the + symbol to create the custom action.

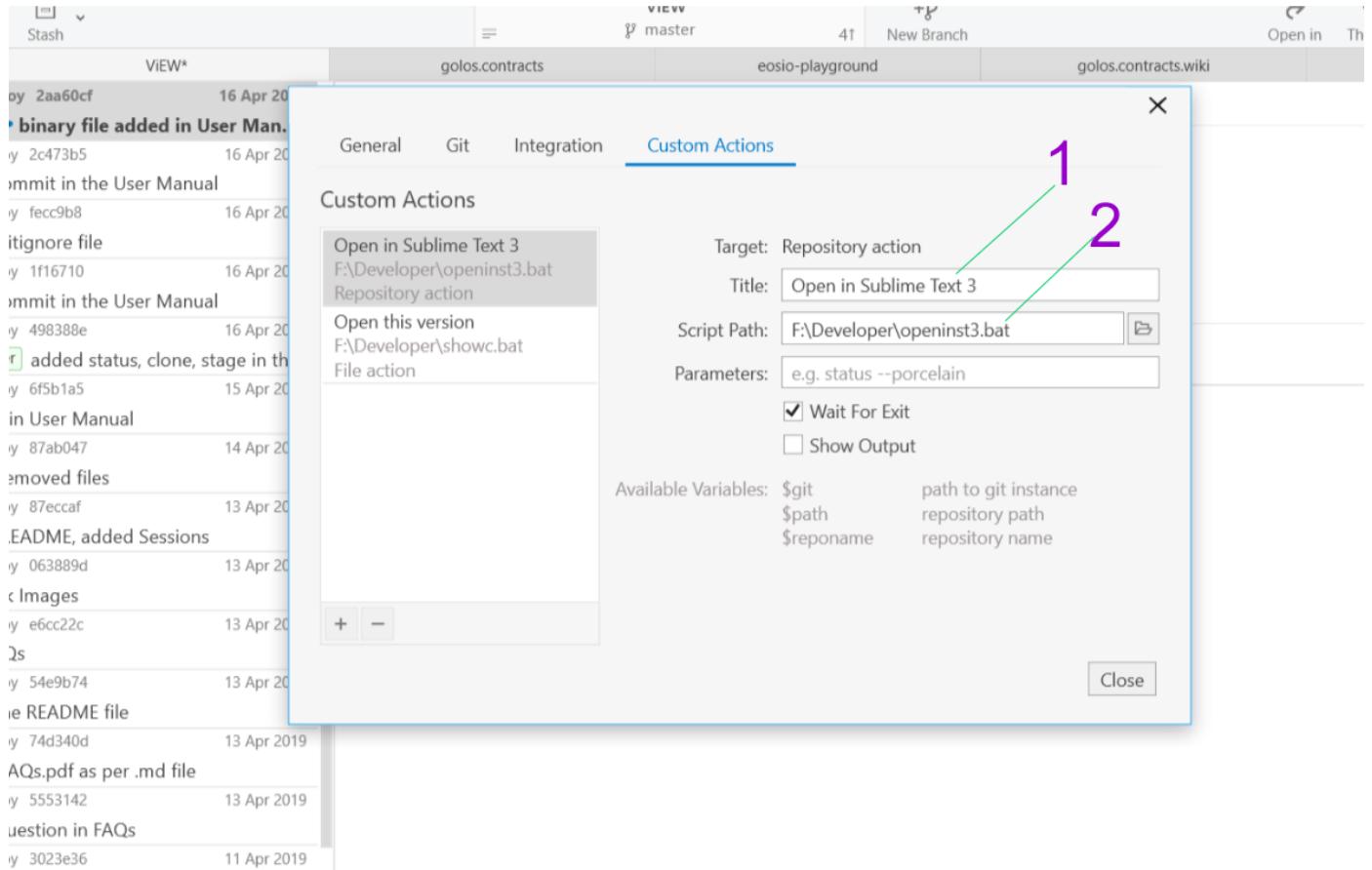
Step 4:



In the Image above,

- 1 - Click this to show the custom action dialog.

Step 5:

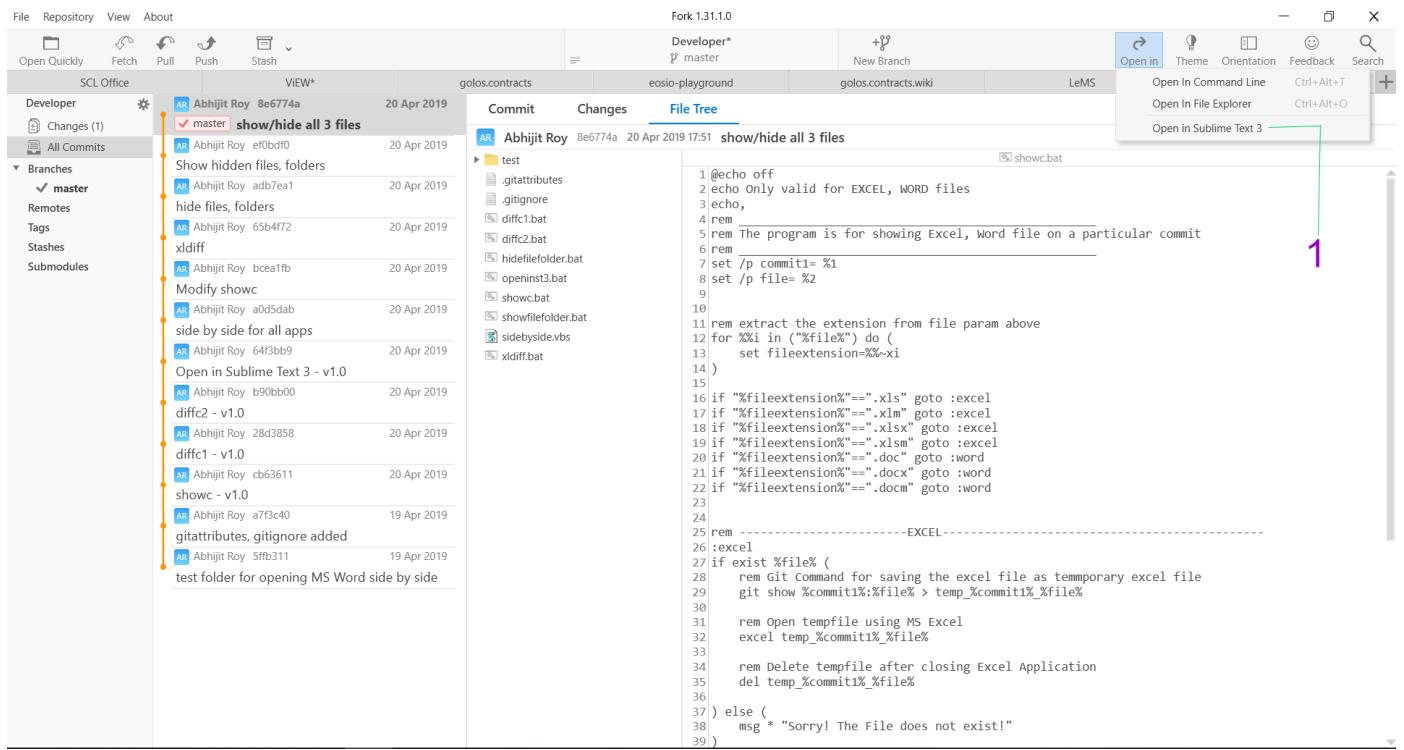


In the Image above,

- 1 - Write the title for custom action

- 2 - Link the .bat or .exe file (from Developer folder, explained above) to open **Sublime Text 3** in current repository path.

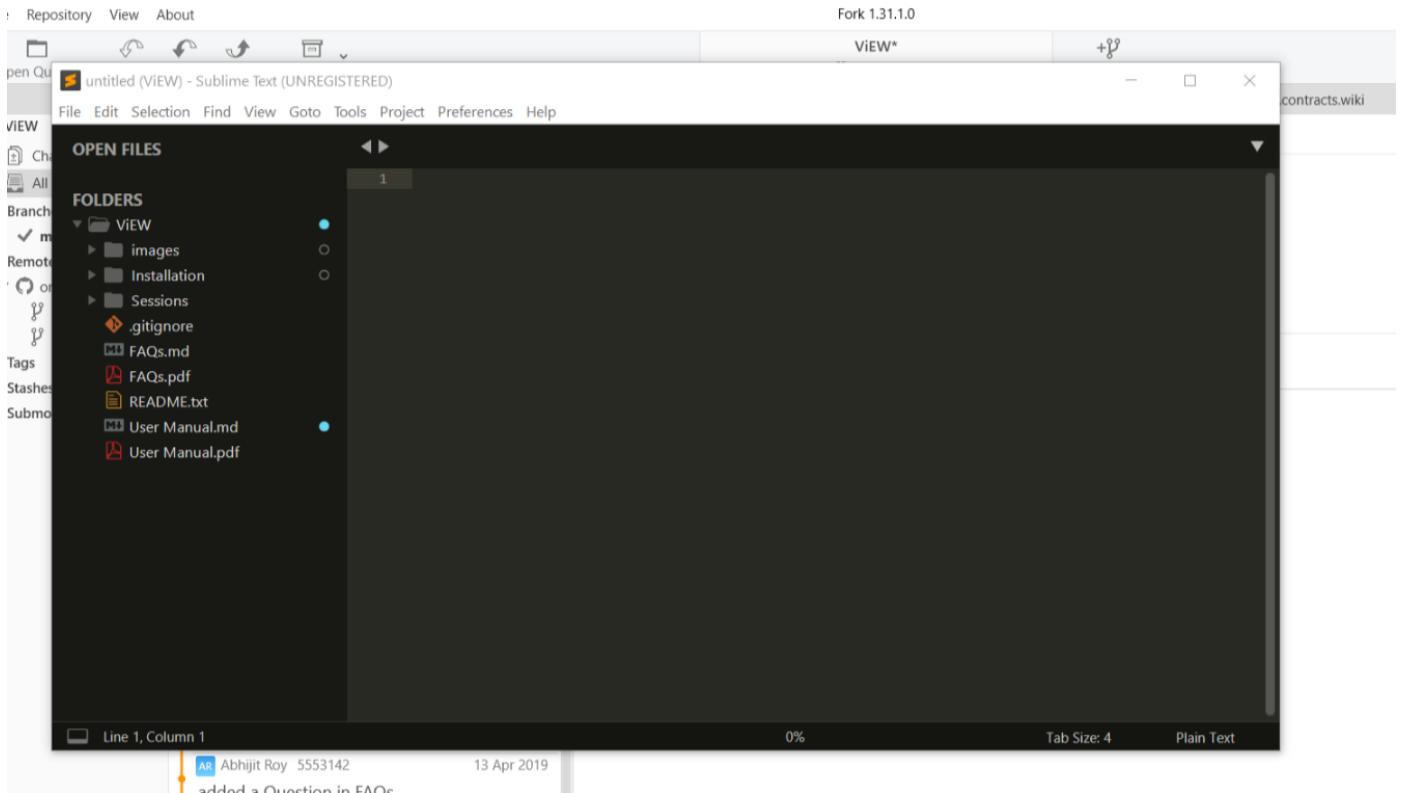
Step 6:



In the Image above,

- 1 - Finally, this opens **Sublime Text 3** for current repository.

Step 7:



In the Image above,

- 1 - This is how the repository looks like in **Sublime Text 3**.

NOTE: Now, this can be used especially, if someone is maintaining project directory with version control, this **Sublime Text 3** is really going to be helpful while coding practice (with too many custom themes with modern colors.)

Terms

1. Repository

Repository is termed as any folder with files (any format), sub-folders inside it.



2. remotes/origin/master

It refers to the **master** (or main) branch of the repository kept at remote server.

The screenshot shows the Fork 1.31.1.0 application interface. On the left, the sidebar includes 'File', 'Repository', 'View', and 'About' tabs, followed by 'Open Quickly', 'Fetch', 'Pull', 'Push', 'Stash', and a dropdown menu. Below these are 'VIEW', 'Changes', 'All Commits', 'Branches' (with 'master' checked), 'Remotes' (with 'origin' checked, showing 'imgbot' and 'master'), 'Tags', 'Stashes', and 'Submodules'. The main area displays a list of commits under 'My_Learning-Batch' for 'demo1'. Commit 1 (highlighted with a green border) is from 'Abhijit Roy' on 'origin/master' at '87eccaf' on '14 Apr 2019', with the message 'added & remov...'. Commit 2 (highlighted with a blue border) is from 'Abhijit Roy' on 'master' at '87eccaf' on '14 Apr 2019', with the message 'modified README, added Sessions'. The right side of the interface shows the commit details for commit 1, including the author 'Abhijit Roy', date '14 Apr 2019 12:22:48 +05:30', SHA '87ab047d70b45d479458322e0756cf686df46a7a', and parents '87eccaf'. It also lists 'added & removed files' such as 'FAQs.md', 'FAQs.pdf', and various batch and presentation files.

In the image above,

- [1] - shows the `origin/master`, basically the master (or main) branch of repository (named - ViEW) kept at remote location.

3. branch/master

It refers to the **master** (or main) branch of the repository (named - ViEW) kept at local storage (like PC, desktop).

In the image above,

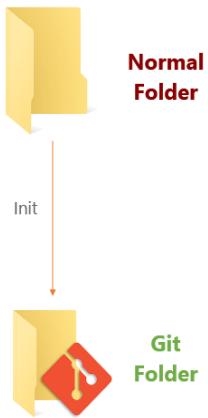
- [2] - shows the `branches/master`, basically the master (or main) branch of folder kept at local location.

NOTE: Both the masters (at remote & local) are in sync.

Operations

1. init

It refers to initializing a non-git (or normal) folder to git repository.



Example:

Normal repository:

Name	Date modified	Type	Size
images	14-Apr-19 12:35 PM	File folder	
Installation	14-Apr-19 11:37 AM	File folder	
Sessions	14-Apr-19 11:46 AM	File folder	
FAQs	14-Apr-19 11:31 AM	MD File	4 KB
FAQs	14-Apr-19 11:32 AM	Adobe Acrobat Doc...	332 KB
README	13-Apr-19 2:43 PM	Text Document	2 KB
User Manual	14-Apr-19 12:41 PM	MD File	2 KB
User Manual	14-Apr-19 11:35 AM	Adobe Acrobat Doc...	147 KB

Git repository:

Initialized with git protocol

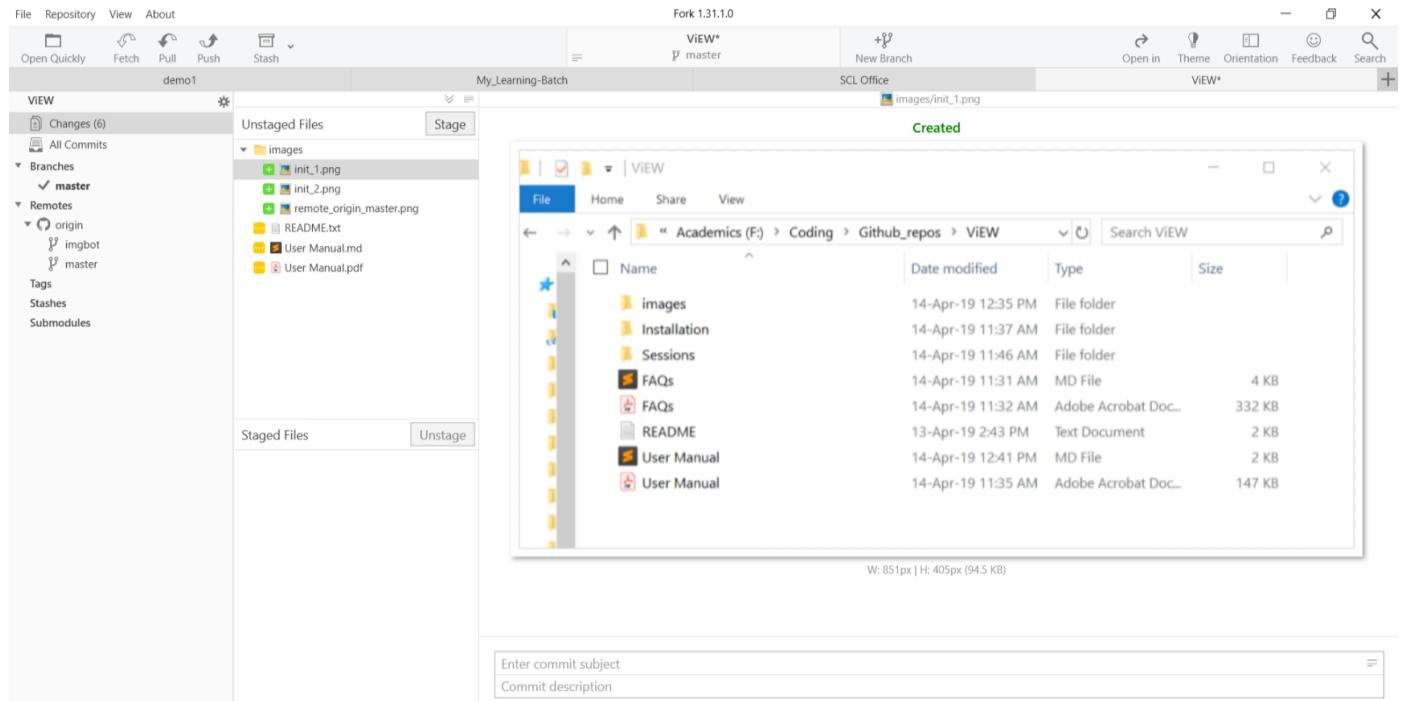
Name	Date modified	Type	Size
.git	14-Apr-19 12:35 PM	File folder	
images	14-Apr-19 12:43 PM	File folder	
Installation	14-Apr-19 11:37 AM	File folder	
Sessions	14-Apr-19 11:46 AM	File folder	
FAQs	14-Apr-19 11:31 AM	MD File	4 KB
FAQs	14-Apr-19 11:32 AM	Adobe Acrobat Doc...	332 KB
README	13-Apr-19 2:43 PM	Text Document	2 KB
User Manual	14-Apr-19 12:51 PM	MD File	3 KB
User Manual	14-Apr-19 11:35 AM	Adobe Acrobat Doc...	147 KB

NOTE: From now onwards, **Git repository** will be called as **repository** (in short).

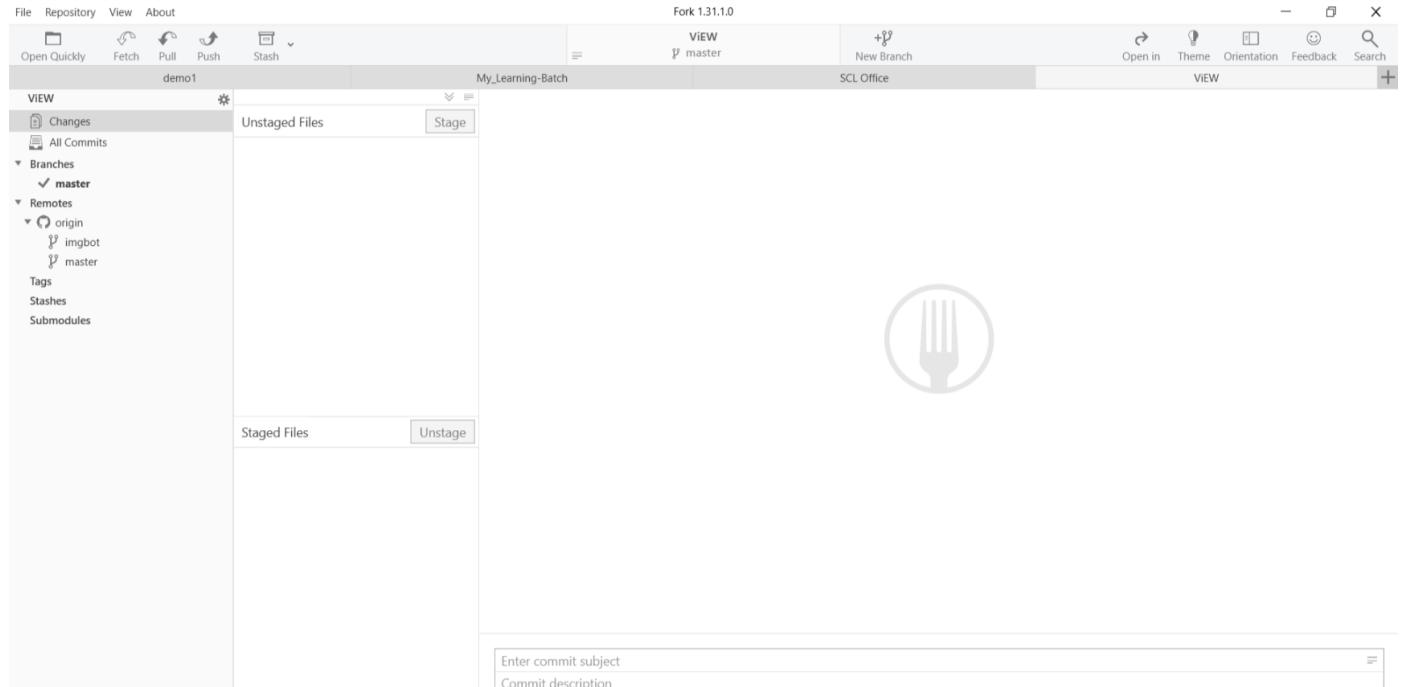
2. status

It shows the status of the files (inside repository) changed. To see the changes (if any), click "Changes" on the left pane of Fork Application.

Example 1: Status showing file changes

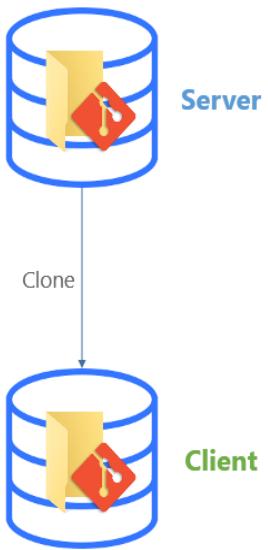


Example 2: Status showing NO file changes

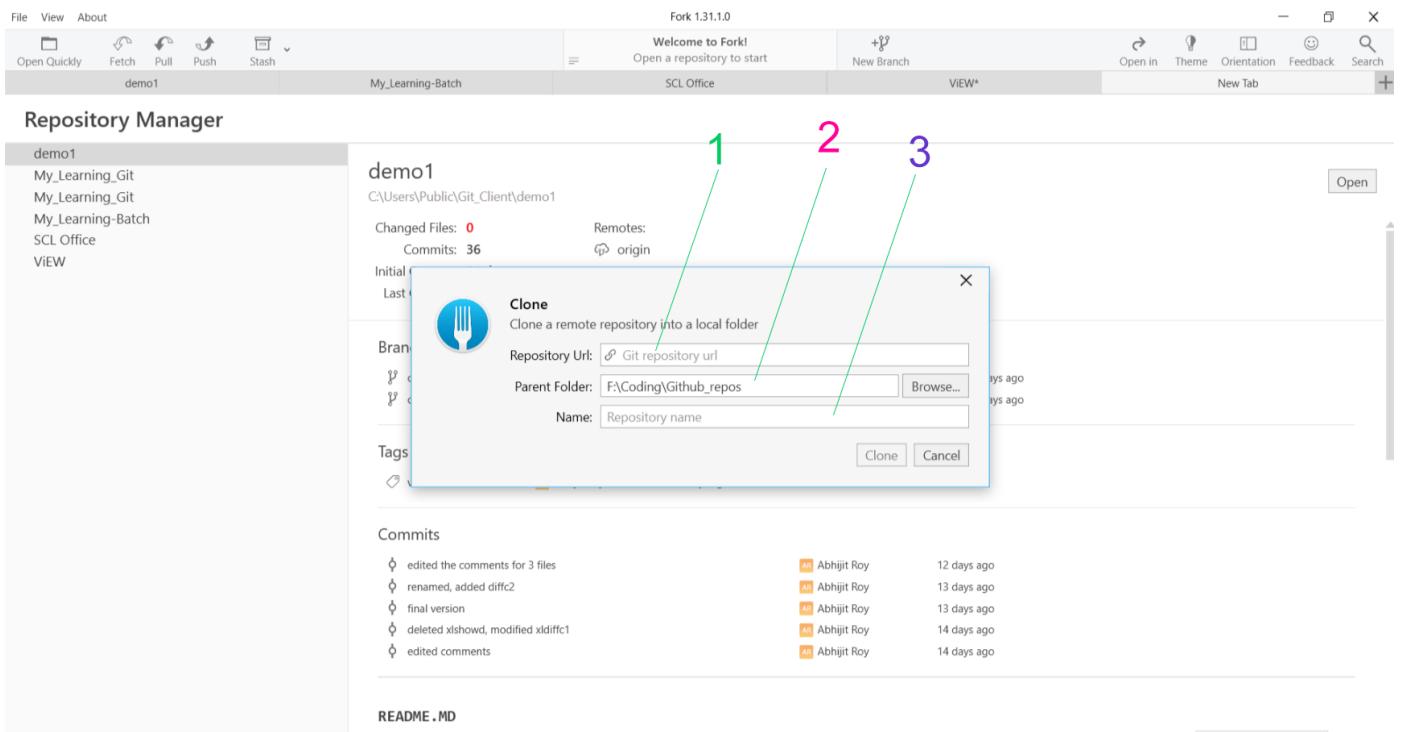


3. clone

This is to clone/download the repository (from remote location) to a desired directory in the local PC/Desktop.



Example: Clone a repository



In the Image above,

- [1] - Remote URL of the repository. E.g.: "http://localhost/Bonobo.Git.Server/demo1.git"
- [2] - Local directory where the repository is to be cloned.
- [3] - Custom Name for the cloned repository.

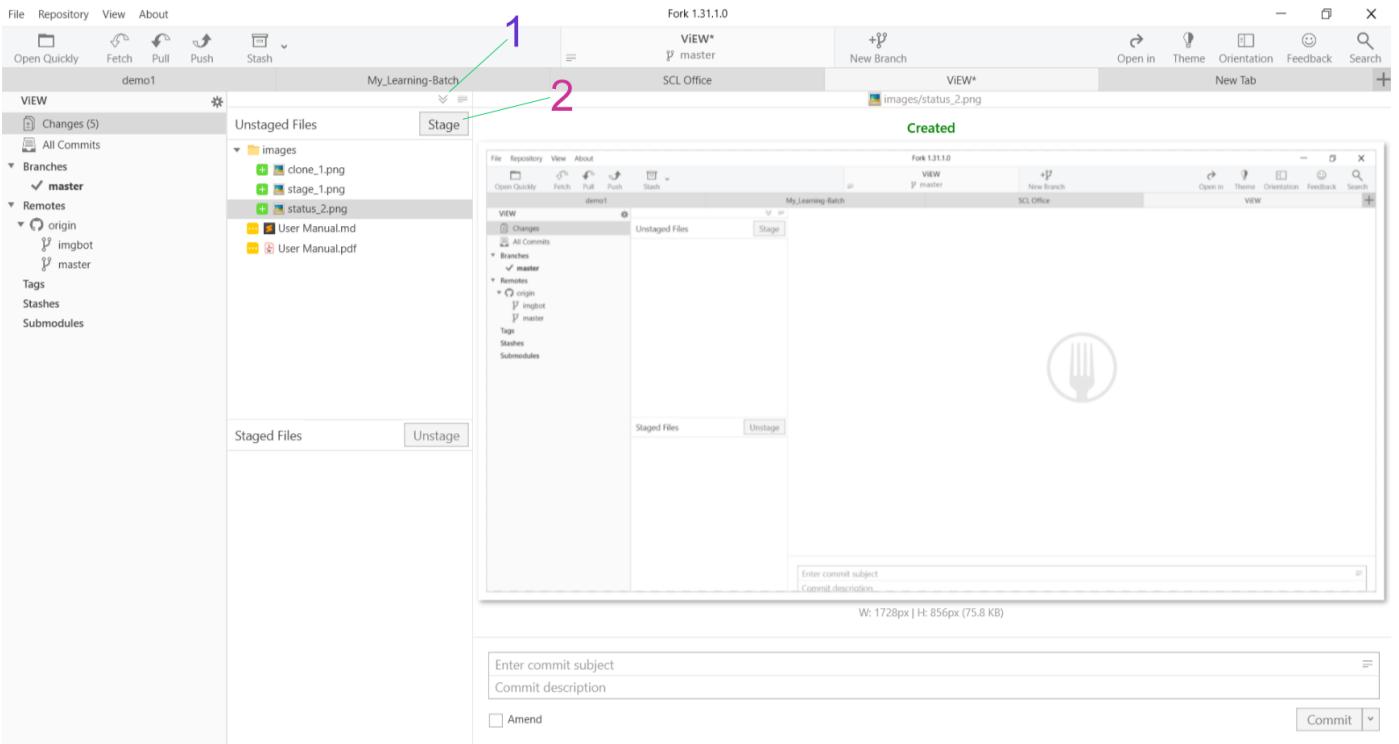
4. stage

Add file(s) to the Staging area. It's like adding/registering files for recording changes (in the repository).



In the image above, user has to stage the file(s) to **Staging area** before recording changes.

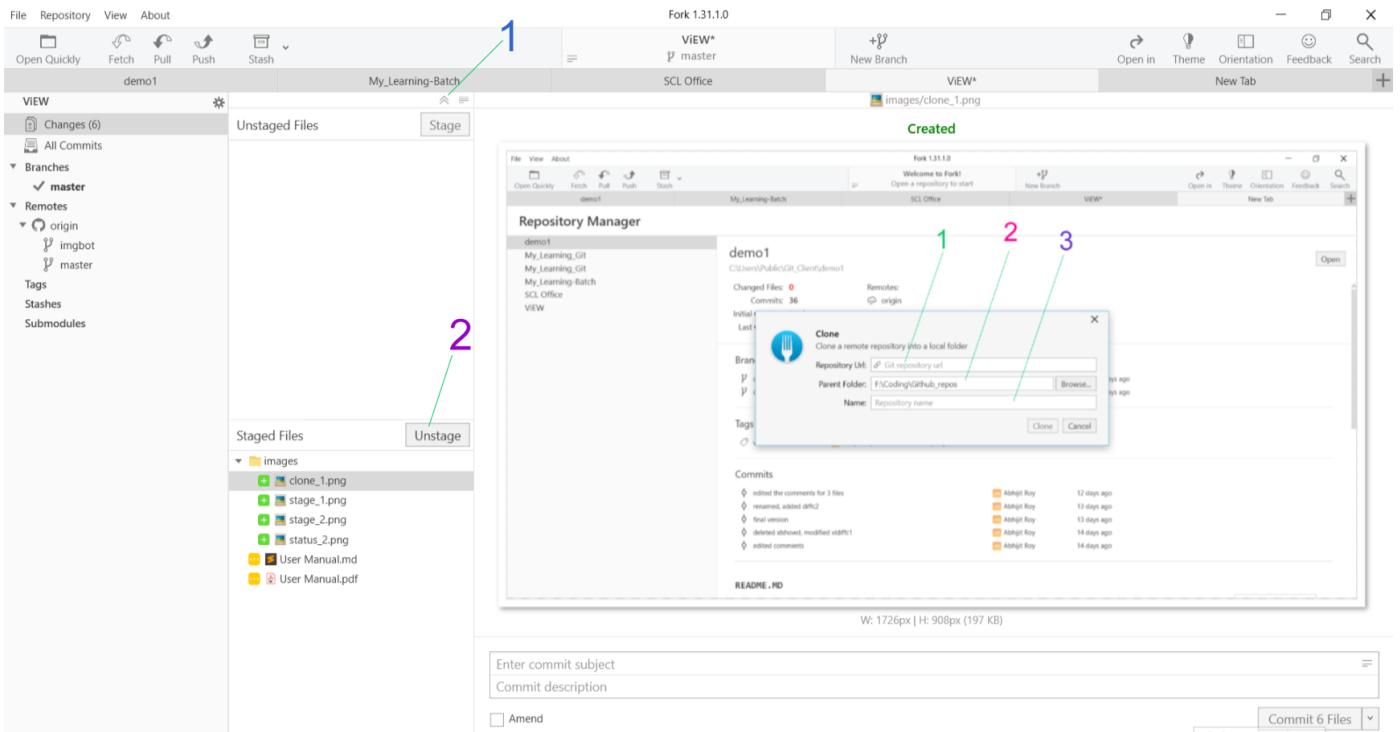
Example: Unstaged Files



In the Image above,

- [1] - Stage all file(s)
- [2] - Stage selected file(s)

Example: Staged Files

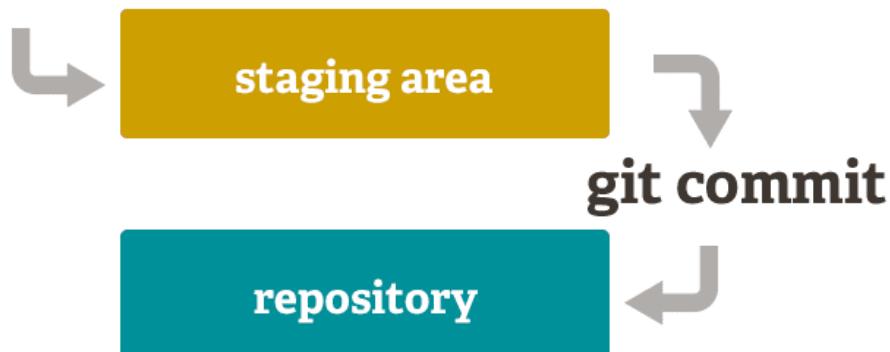


In the Image above,

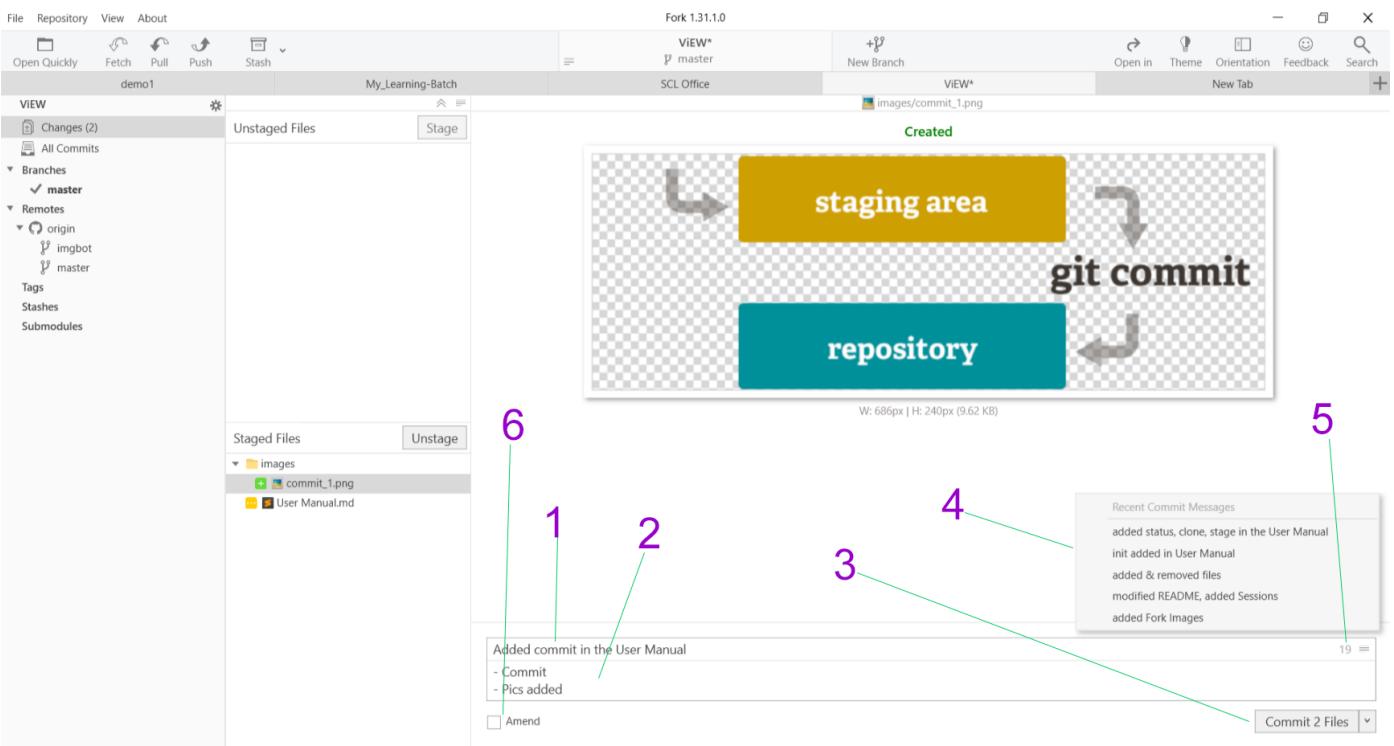
- [1] - Unstage all file(s)
- [2] - Unstage selected file(s)

5. commit

This is to record file changes and add it to the chain history. Here, **commit** means assigning a random unique no. (called as Cryptographic Hash) to a change.



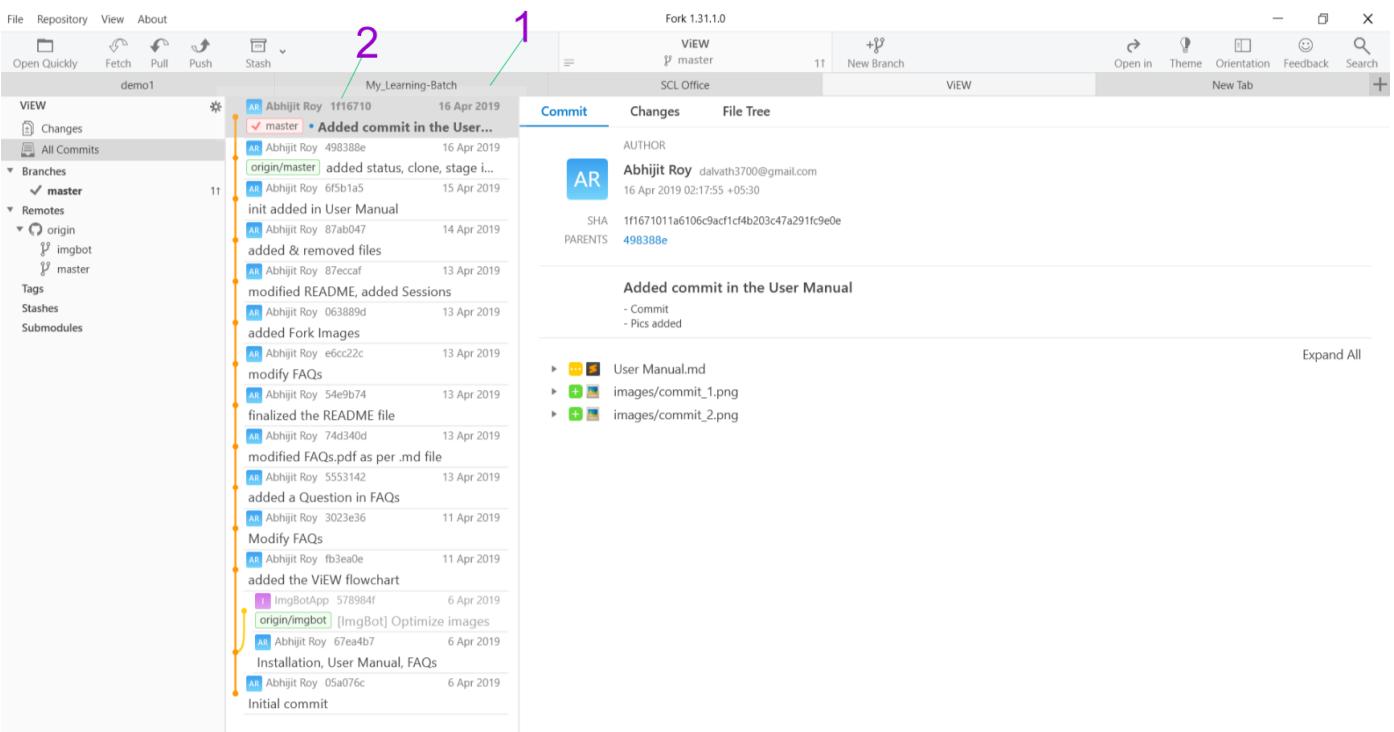
Example: Commit the Staged files



In the Image above,

- 1 - Commit Message Title
- 2 - Commit Message Description
- 3 - Commit button (when clicked => committed/recording)
- 4 - Old Commit Message Titles. Can be used when repetitive title required.
- 5 - Show Old commit message titles
- 6 - Amend button i.e. when clicked, automatically uses last message title and description

Example: Commit added to the Chain history



In the Image above,

- 1 - Latest block (with files changes) added
- 2 - commit Hash (unique Cryptographic Hash using SHA1 Algorithm)

6. push

7. `fetch`

8. `pull`

Utility

- `showc`
- `diffc1`
- `diffc2`
- `autopush`
- `allsync`

Advanced Features

- Binary File - TODO
- Ignore/Allow specified files - TODO
- File change security - TODO
- Old Block security - TODO