DOS:

Experiment no: 3

Aim: To perform various GIT operations on local and remote repositories using GIT cheatsheet.

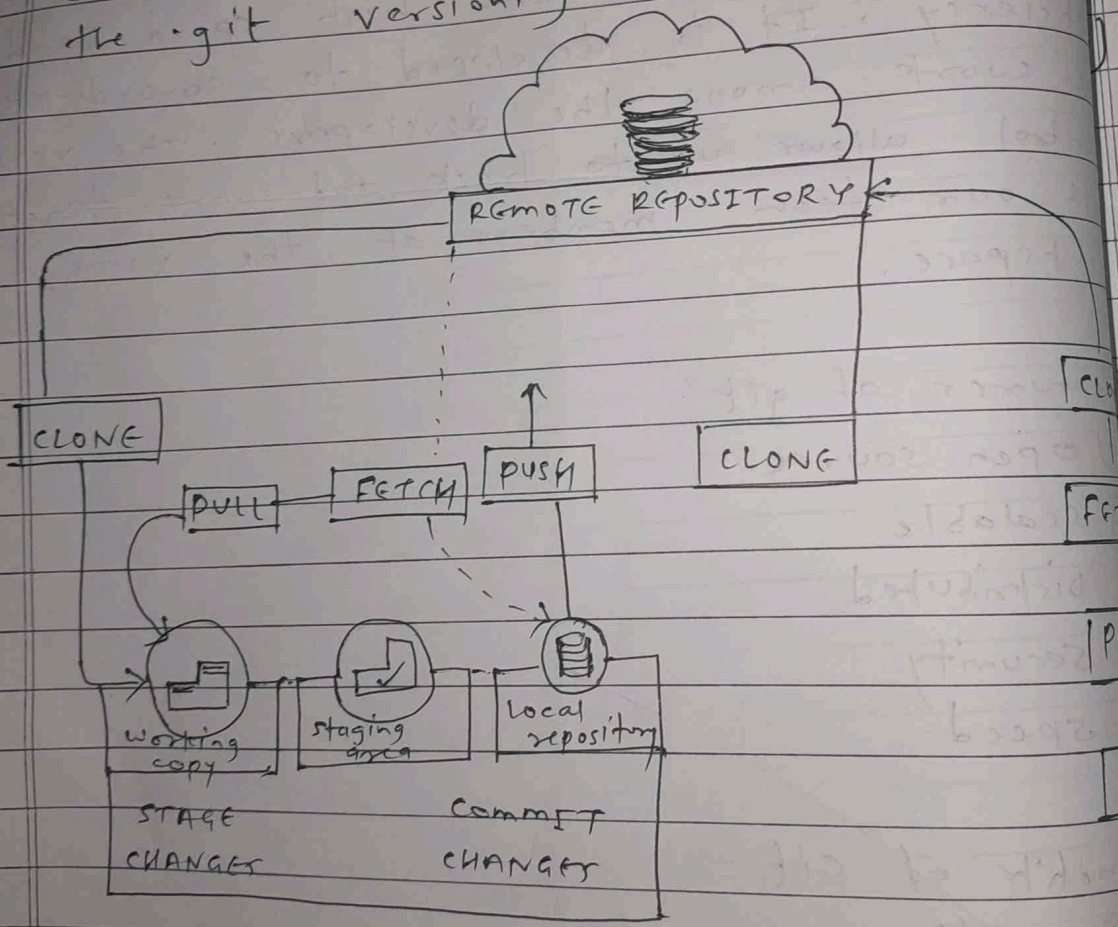
Theory:

Git is an open source distributed version control system. It is designed to handle minor to major projects with high speed and efficiency. It is developed to co-ordinate the work among the developers. The version control allows us to track and work together with our team members at the same workspace.

* Features of git:
  a) open source
  b) scalable
  c) Distributed
  d) security
  e) speed

* Benefits of git:
  a) saves time
  b) offline working
  c) undo mistakes
  d) Track the changes.

In Git, the term remote is concerned the remote repository. It is shared reposito all team members used to exchange th A remote repository is stored on a hosting service like internal server, GitHu subversion and more. In the case of local repository, a remote typically provide a file tree of the project's cur state as an alternative, it only consi the .git versioning data.



Git cheatsheet:
Git configurat
Git config -
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starting a proj
· Git init - cr
- Git clone - r

Local changes
· Git add -
· Git commit

Track chang
· Git diff

· Git status

commit
Git log :

pulling

- Git cheatsheet:

1) Git configuration:
- Git config - Get and sent configuration variables that control all factors to how git looks and operates.

2) starting a project:
- Git init - create a local repository
- Git clone - make a local copy

3) Local changes:
- Git add - Add a file / files.
- Git commit - Record or snapshots the file permanently in the version history with the message.

4) Track changes:
- Git diff: Track the changes that have been not staged.

- Git status: display the ~~state~~ of the working directory and the staging area

5) commit History:
Git log: display the most recent commits and the status of the head.

6) pulling updates.

- Git pull - pull the data from the serve
- Git fetch - Download branches and tag
  one or more repositories.

~~* sh~~

Experiment no.3

AIM:- to perform v

comands to ch

MINGW64:/c/Users/stu

student@DESKTOP-6B4HU
$ git --version
git version 2.41.0.wi

student@DESKTOP-6B4HU
$ git help config

student@DESKTOP-6B4HU
$

after checki
page.

git-

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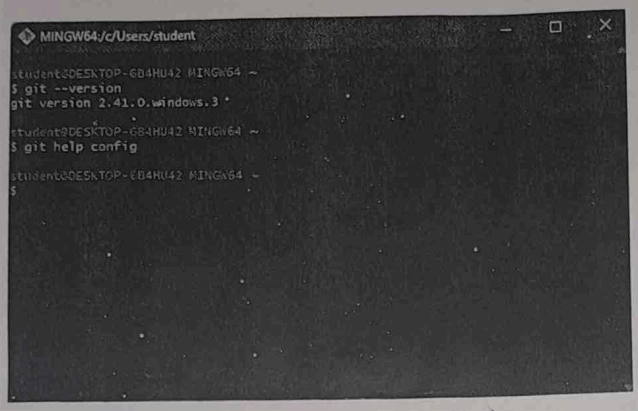
DEVOPS

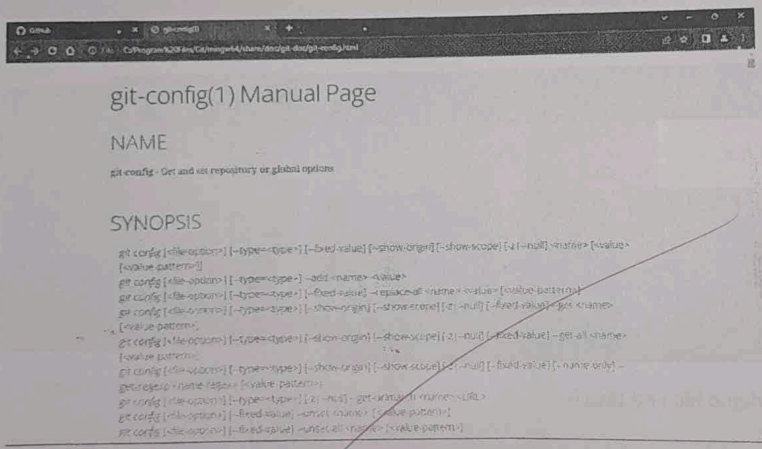
Experiment no.3

AIM:- to perform various GIT operations on local and remote repositories using GIT and cheatshit.

comands to check the version .



step① after checking the version, while executing the congif command this will take you to the manual page.



git-config(1) Manual Page

NAME

git-config - Get and set repository or global options

SYNOPSIS

step② make a new directory.

change the directory.

```
student@DESKTOP-6B4HU42 MINGW64 ~
$ mkdir test

student@DESKTOP-6B4HU42 MINGW64 ~
$ cd test

student@DESKTOP-6B4HU42 MINGW64 ~/test
$
```

git init .

```
MINGW64:/c/Users/student/test

student@DESKTOP-6B4HU42 MINGW64 ~
$ git --version
git version 2.41.0.windows.3

student@DESKTOP-6B4HU42 MINGW64 ~
$ git help config

student@DESKTOP-6B4HU42 MINGW64 ~
$ git config --help

student@DESKTOP-6B4HU42 MINGW64 ~
$ mkdir test

student@DESKTOP-6B4HU42 MINGW64 ~
$ cd test

student@DESKTOP-6B4HU42 MINGW64 ~/test
$ git init
Initialized empty Git repository in C:/Users/student/test/.git/

student@DESKTOP-6B4HU42 MINGW64 ~/test (master)
$
```

step 3 check whether the directory defined,exists properly.

This PC › Local Disk (C:) › Users › student › test

step 4 add a demo.txt file.

Name	Date modified	Type	Size
demo.txt	3/1/2023 11:42 AM	Text Document	1 KB

step 5 add text to the demo file and save it.

demo.txt

e Edit View

is is exp3 of devops

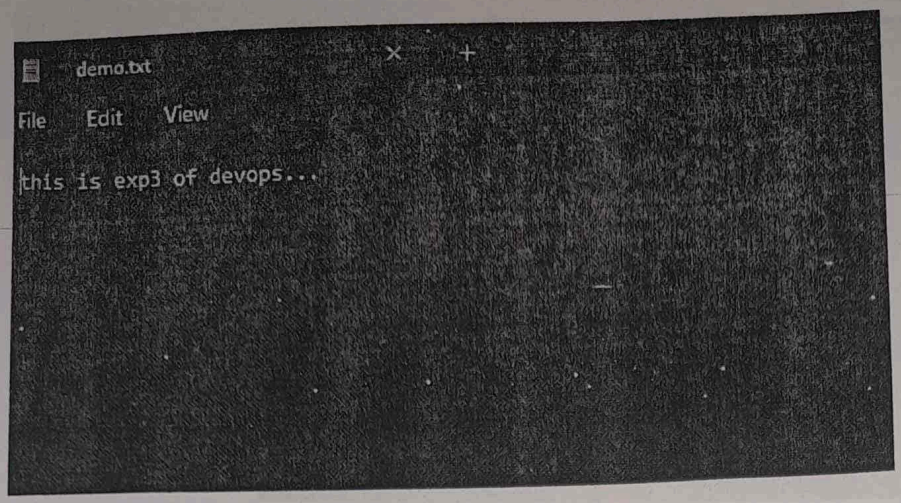
after that,check git st

```
udent@DESKTOP-6B4HU42 MINGW64
git status
branch master

commits yet

tracked files:
(use "git add <file>..." t
        demo.txt.txt

thing added to commit but
udent@DESKTOP-6B4HU42 MIN
```

make your first com

```
udent@DESKTOP-6B4HU42 M
git config --global use

udent@DESKTOP-6B4HU42 M
git config --global use

udent@DESKTOP-6B4HU42 M
git commit -m "firstco
master (root-commit) a5
1 file changed, 1 inser
create mode 100644 demo

udent@DESKTOP-6B4HU42
```

create a new repos



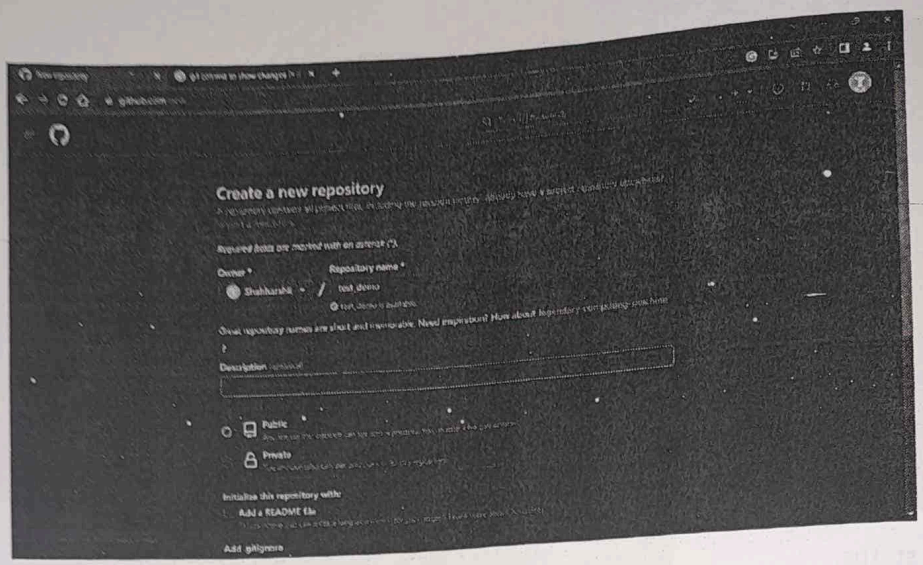
ep 6 after that,check git status.

```
student@DESKTOP-6B4HU42 MINGW64 ~/harshii (master)
$ git status
On branch master

No commits yet

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

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

student@DESKTOP-6B4HU42 MINGW64 ~/harshii (master)
$
```

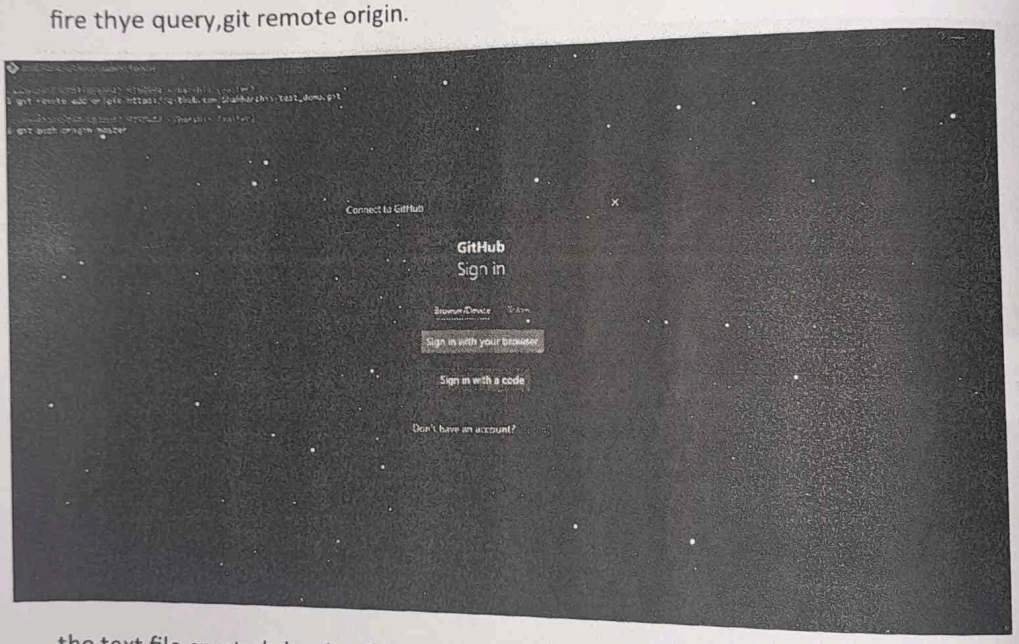
p 7 make your first commit.

```
student@DESKTOP-6B4HU42 MINGW64 ~/harshii (master)
$ git config --global user.email "shahharshi2704@gmail.com"

student@DESKTOP-6B4HU42 MINGW64 ~/harshii (master)
$ git config --global user.name "Shahharshii"

student@DESKTOP-6B4HU42 MINGW64 ~/harshii (master)
$ git commit -m "firstcommit"
[master (root-commit) a5ec954] firstcommit
 1 file changed, 1 insertion(+)
 create mode 100644 demo.txt

student@DESKTOP-6B4HU42 MINGW64 ~/harshii (master)
$
```

ep 8 create a new repository.



step 8 fire thye query,git remote origin.

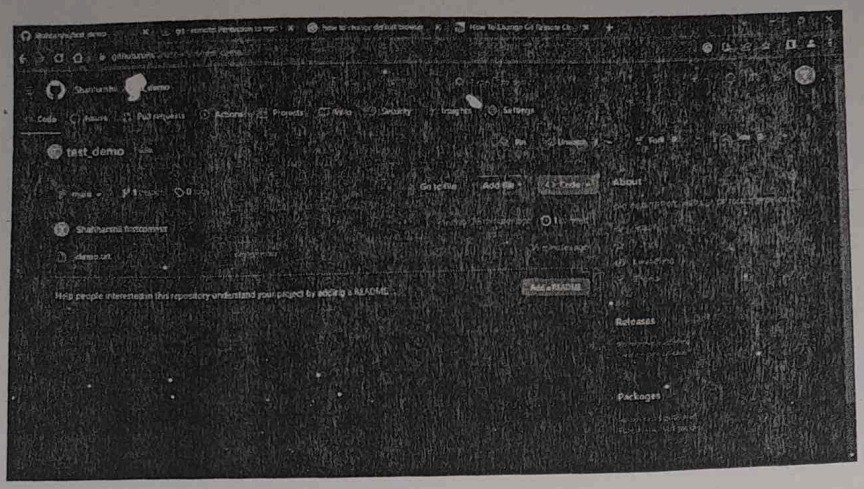


the text file created shoul reflect here.

commands to try

```
$ git push origin main
Everything up-to-date

$ git push -all
error: did you mean '--

$ git push --all
Everything up-to-date

$ git remote add origi
error: remote origin a

$ git remote set-url o

$ git push origin mai
Enumerating objects:
Counting objects: 100%
Writing objects: 100%
Total 3 (delta 0), re
To https://github.com
 * [new branch]

$ git push --all
Everything up-to-date
```

Conclusio
op



commands to try , if any error occurs.

```
student@DESKTOP-6B4HU42 MINGW64 ~/harshii (main)
$ git push origin main
Everything up-to-date

student@DESKTOP-6B4HU42 MINGW64 ~/harshii (main)
$ git push -all
error: did you mean `--all` (with two dashes)?

student@DESKTOP-6B4HU42 MINGW64 ~/harshii (main)
$ git push --all
Everything up-to-date

student@DESKTOP-6B4HU42 MINGW64 ~/harshii (main)
$ git remote add origin https://github.com/Shahharshii/practical3.git
error: remote origin already exists.

student@DESKTOP-6B4HU42 MINGW64 ~/harshii (main)
$ git remote set-url origin https://github.com/Shahharshii/practical3.git

student@DESKTOP-6B4HU42 MINGW64 ~/harshii (main)
$ git push origin main
Enumerating objects: 3, done.
Counting objects: 100% (3/3), done.
Writing objects: 100% (3/3), 235 bytes | 235.00 KiB/s, done.
Total 3 (delta 0), reused 0 (delta 0), pack-reused 0
To https://github.com/Shahharshii/practical3.git
 * [new branch]      main -> main

student@DESKTOP-6B4HU42 MINGW64 ~/harshii (main)
$ git push --all
Everything up-to-date
```

Conclusion: Hence we performed various GIT operations on local and remote repositories using Git cheatsheet.