```
qkrdl@DESKTOP-IO7MCK4 MINGW64 /c/[git-master] (main)
$ git init basic
Initialized empty Git repository in C:/[git-master]/basic/.git/

qkrdl@DESKTOP-IO7MCK4 MINGW64 /c/[git-master] (main)
$ cd basic

qkrdl@DESKTOP-IO7MCK4 MINGW64 /c/[git-master]/basic (main)
$ ls - al
ls: cannot access '-': No such file or directory
ls: cannot access 'al': No such file or directory

qkrdl@DESKTOP-IO7MCK4 MINGW64 /c/[git-master]/basic (main)
$ ls -al
total 4
drwxr-xr-x 1 qkrdl 197609 0 Dec  8 18:09 ./
drwxr-xr-x 1 qkrdl 197609 0 Dec  8 18:09 ../
drwxr-xr-x 1 qkrdl 197609 0 Dec  8 18:09 .git/

qkrdl@DESKTOP-IO7MCK4 MINGW64 /c/[git-master]/basic (main)
$ echo aaa > f

qkrdl@DESKTOP-IO7MCK4 MINGW64 /c/[git-master]/basic (main)
$ cat f
aaa

qkrdl@DESKTOP-IO7MCK4 MINGW64 /c/[git-master]/basic (main)
$ git status
On branch main

No commits yet

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

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

qkrdl@DESKTOP-IO7MCK4 MINGW64 /c/[git-master]/basic (main)
$ git status -s
?? f

qkrdl@DESKTOP-IO7MCK4 MINGW64 /c/[git-master]/basic (main)
$ git add f

qkrdl@DESKTOP-IO7MCK4 MINGW64 /c/[git-master]/basic (main)
$ git status
On branch main

No commits yet

Changes to be committed:
```

```
qkrdl@DESKTOP-IO7MCK4 MINGW64 /c/[git-master]/basic (main)
$ git status
On branch main

No commits yet

Changes to be committed:
  (use "git rm --cached <file>..." to unstage)
        new file:   f


qkrdl@DESKTOP-IO7MCK4 MINGW64 /c/[git-master]/basic (main)
$ git status -s
A  f

qkrdl@DESKTOP-IO7MCK4 MINGW64 /c/[git-master]/basic (main)
$ commit -m A
bash: commit: command not found

qkrdl@DESKTOP-IO7MCK4 MINGW64 /c/[git-master]/basic (main)
$ git commit -m A
[main (root-commit) b1c2acd] A
 1 file changed, 1 insertion(+)
 create mode 100644 f

qkrdl@DESKTOP-IO7MCK4 MINGW64 /c/[git-master]/basic (main)
$ git status
On branch main
nothing to commit, working tree clean

qkrdl@DESKTOP-IO7MCK4 MINGW64 /c/[git-master]/basic (main)
$ git status -s

qkrdl@DESKTOP-IO7MCK4 MINGW64 /c/[git-master]/basic (main)
$ git log
commit b1c2acdfbb75965260c8a28578e236dba205ac63 (HEAD -> main)
Author: youngwoo28 <qkrdlfvy0@naver.com>
Date:   Fri Dec 8 18:14:56 2023 +0900

    A

qkrdl@DESKTOP-IO7MCK4 MINGW64 /c/[git-master]/basic (main)
$ git log --oneline
b1c2acd (HEAD -> main) A

qkrdl@DESKTOP-IO7MCK4 MINGW64 /c/[git-master]/basic (main)
$
```

```
qkrdl@DESKTOP-IO7MCK4 MINGW64 /c/[git-master]/basic (main)
$ git log --patch
commit b1c2acdfbb75965260c8a28578e236dba205ac63 (HEAD -> main)
Author: youngwoo28 <qkrdlfvy0@naver.com>
Date:   Fri Dec 8 18:14:56 2023 +0900

        A

diff --git a/f b/f
new file mode 100644
index 0000000..72943a1
--- /dev/null
+++ b/f
@@ -0,0 +1 @@
+aaa

qkrdl@DESKTOP-IO7MCK4 MINGW64 /c/[git-master]/basic (main)
$ echo bbb >> f

qkrdl@DESKTOP-IO7MCK4 MINGW64 /c/[git-master]/basic (main)
$ catf
bash: catf: command not found

qkrdl@DESKTOP-IO7MCK4 MINGW64 /c/[git-master]/basic (main)
$ cat f
aaa
bbb

qkrdl@DESKTOP-IO7MCK4 MINGW64 /c/[git-master]/basic (main)
$ git status
On branch main
Changes not staged for commit:
  (use "git add <file>..." to update what will be committed)
  (use "git restore <file>..." to discard changes in working directory)
        modified:   f

no changes added to commit (use "git add" and/or "git commit -a")

qkrdl@DESKTOP-IO7MCK4 MINGW64 /c/[git-master]/basic (main)
$ git status -s
 M f

qkrdl@DESKTOP-IO7MCK4 MINGW64 /c/[git-master]/basic (main)
$
```

```
$

qkrdl@DESKTOP-IO7MCK4 MINGW64 /c/[git-master]/basic (main)
$ git commit -am B
[main 5060f2f] B
 1 file changed, 1 insertion(+)

qkrdl@DESKTOP-IO7MCK4 MINGW64 /c/[git-master]/basic (main)
$ git log
commit 5060f2f6dbe196032da07c589223489a2dff315a (HEAD -> main)
Author: youngwoo28 <qkrdlfvy0@naver.com>
Date:   Fri Dec 8 18:19:00 2023 +0900

        B

commit b1c2acdfbb75965260c8a28578e236dba205ac63
Author: youngwoo28 <qkrdlfvy0@naver.com>
Date:   Fri Dec 8 18:14:56 2023 +0900

        A

qkrdl@DESKTOP-IO7MCK4 MINGW64 /c/[git-master]/basic (main)
$ echo ccc >> f

qkrdl@DESKTOP-IO7MCK4 MINGW64 /c/[git-master]/basic (main)
$ git status
On branch main
Changes not staged for commit:
  (use "git add <file>..." to update what will be committed)
  (use "git restore <file>..." to discard changes in working directory)
        modified:   f

no changes added to commit (use "git add" and/or "git commit -a")

qkrdl@DESKTOP-IO7MCK4 MINGW64 /c/[git-master]/basic (main)
$ git status -s
 M f

qkrdl@DESKTOP-IO7MCK4 MINGW64 /c/[git-master]/basic (main)
$ git commit -am c
[main e2c389c] c
 1 file changed, 1 insertion(+)

qkrdl@DESKTOP-IO7MCK4 MINGW64 /c/[git-master]/basic (main)
$ git status
On branch main
nothing to commit, working tree clean

qkrdl@DESKTOP-IO7MCK4 MINGW64 /c/[git-master]/basic (main)
$ git log --oneline
e2c389c (HEAD -> main) c
5060f2f B
b1c2acd A
```

```
qkrdl@DESKTOP-IO7MCK4 MINGW64 /c/[git-master]/basic (main)
$ git log -p
commit e2c389c79be2eefa866f11df0cacf3f5d30d8971 (HEAD -> main)
Author: youngwoo28 <qkrdlfvy0@naver.com>
Date:   Fri Dec 8 18:19:45 2023 +0900

        c

diff --git a/f b/f
index dbee026..1802a74 100644
--- a/f
+++ b/f
@@ -1,2 +1,3 @@
 aaa
 bbb
+ccc

commit 5060f2f6dbe196032da07c589223489a2dff315a
Author: youngwoo28 <qkrdlfvy0@naver.com>
Date:   Fri Dec 8 18:19:00 2023 +0900

        B

diff --git a/f b/f
index 72943a1..dbee026 100644
--- a/f
+++ b/f
@@ -1 +1,2 @@
 aaa
+bbb

commit b1c2acdfbb75965260c8a28578e236dba205ac63
Author: youngwoo28 <qkrdlfvy0@naver.com>
Date:   Fri Dec 8 18:14:56 2023 +0900

        A

diff --git a/f b/f
new file mode 100644
index 0000000..72943a1
--- /dev/null
+++ b/f
@@ -0,0 +1 @@
+aaa

qkrdl@DESKTOP-IO7MCK4 MINGW64 /c/[git-master]/basic (main)
$
```

```
qkrdl@DESKTOP-IO7MCK4 MINGW64 /c/[git-master]/basic (main)
$  git show
commit e2c389c79be2eefa866f11df0cacf3f5d30d8971 (HEAD -> main)
Author: youngwoo28 <qkrdlfvy0@naver.com>
Date:   Fri Dec 8 18:19:45 2023 +0900

        c

diff --git a/f b/f
index dbee026..1802a74 100644
--- a/f
+++ b/f
@@ -1,2 +1,3 @@
 aaa
 bbb
+ccc

qkrdl@DESKTOP-IO7MCK4 MINGW64 /c/[git-master]/basic (main)
$ git show HEAD~
commit 5060f2f6dbe196032da07c589223489a2dff315a
Author: youngwoo28 <qkrdlfvy0@naver.com>
Date:   Fri Dec 8 18:19:00 2023 +0900

        B

diff --git a/f b/f
index 72943a1..dbee026 100644
--- a/f
+++ b/f
@@ -1 +1,2 @@
 aaa
+bbb

qkrdl@DESKTOP-IO7MCK4 MINGW64 /c/[git-master]/basic (main)
$ git show HEAD~~
commit b1c2acdfbb75965260c8a28578e236dba205ac63
Author: youngwoo28 <qkrdlfvy0@naver.com>
Date:   Fri Dec 8 18:14:56 2023 +0900

        A

diff --git a/f b/f
new file mode 100644
index 0000000..72943a1
--- /dev/null
+++ b/f
@@ -0,0 +1 @@
+aaa

qkrdl@DESKTOP-IO7MCK4 MINGW64 /c/[git-master]/basic (main)
$
```

```
qkrdl@DESKTOP-IO7MCK4 MINGW64 /c/[git-master]/basic (main)
$ git show HEAD~2
commit b1c2acdfbb75965260c8a28578e236dba205ac63
Author: youngwoo28 <qkrdlfvy0@naver.com>
Date:   Fri Dec 8 18:14:56 2023 +0900

    A

diff --git a/f b/f
new file mode 100644
index 0000000..72943a1
--- /dev/null
+++ b/f
@@ -0,0 +1 @@
+aaa

qkrdl@DESKTOP-IO7MCK4 MINGW64 /c/[git-master]/basic (main)
$ git log --oneline
e2c389c (HEAD -> main) c
5060f2f B
b1c2acd A

qkrdl@DESKTOP-IO7MCK4 MINGW64 /c/[git-master]/basic (main)
$ git checkout HEAD~
Note: switching to 'HEAD~'.

You are in 'detached HEAD' state. You can look around, make experimental
changes and commit them, and you can discard any commits you make in this
state without impacting any branches by switching back to a branch.

If you want to create a new branch to retain commits you create, you may
do so (now or later) by using -c with the switch command. Example:

  git switch -c <new-branch-name>

Or undo this operation with:

  git switch -

Turn off this advice by setting config variable advice.detachedHead to false

HEAD is now at 5060f2f B

qkrdl@DESKTOP-IO7MCK4 MINGW64 /c/[git-master]/basic ((5060f2f...))
$ |
```

```
qkrdl@DESKTOP-IO7MCK4 MINGW64 /c/[git-master]/basic ((5060f2f...))
$ git status
HEAD detached at 5060f2f
nothing to commit, working tree clean

qkrdl@DESKTOP-IO7MCK4 MINGW64 /c/[git-master]/basic ((5060f2f...))
$ cat f
aaa
bbb

qkrdl@DESKTOP-IO7MCK4 MINGW64 /c/[git-master]/basic ((5060f2f...))
$ git log --oneline
5060f2f (HEAD) B
b1c2acd A

qkrdl@DESKTOP-IO7MCK4 MINGW64 /c/[git-master]/basic ((5060f2f...))
$ git log --oneline --all
e2c389c (main) c
5060f2f (HEAD) B
b1c2acd A

qkrdl@DESKTOP-IO7MCK4 MINGW64 /c/[git-master]/basic ((5060f2f...))
$ git checkout main
Previous HEAD position was 5060f2f B
Switched to branch 'main'

qkrdl@DESKTOP-IO7MCK4 MINGW64 /c/[git-master]/basic (main)
$ |
```