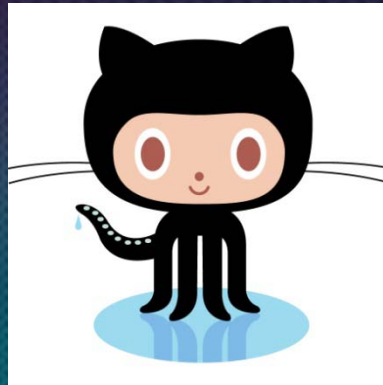




Pengenalan kepada

GitHub

Pengaturcaraan Sosial



ANJURAN



PESIMA

SILIBUS

SESI 1

- Pengenalan Git
 - Sejarah
 - Konsep
- Pengenalan Github
- Istilah penting

SESI 3

- Kolaborasi
 - Repo, Clone, fetch, pull, push

SESI 2

- Pemasangan
 - Linux
 - Windows
- Perintah standart

SESI 4

- Latihan Github
 - Akaun, fork, pull request



@hariadi

diperakui@gmail.com

SESI 1

PENGENALAN



GIT

Sejarah

- 2002 - Linux kernel menggunakan proprietary DVCS yang dipanggil BitKeeper
- 2005 – Konflik BitKeeper
- 2005 - Linus Torvalds membangun Git



GIT

Pengenalan

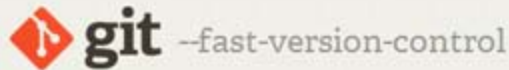


Git adalah perisian sumber terbuka dan merupakan DVCS yang direkabentuk untuk prestasi dan kecekapan.

GIT

Pengenalan

Git adalah perisian **sumber terbuka** dan merupakan *distribute version control system* yang direkabentuk untuk prestasi dan kecekapan



Git is a **free and open source** distributed version control system designed to handle everything from small to very large projects with speed and efficiency.

Git is **easy to learn** and has a **tiny footprint with lightning fast performance**. It outclasses SCM tools like Subversion, CVS, Perforce, and ClearCase with features like **cheap local branching**, convenient **staging areas**, and **multiple workflows**.



Learn Git in your browser for free with **Try Git**.



About

The advantages of Git compared to other source control systems.



Documentation

Command reference pages, Pro Git book content, videos and other material.



Downloads

GUI clients and binary releases for all major platforms.



Community

Get Involved! Mailing list, chat, development and more.



Pro Git by Scott Chacon is available to [read online for free](#). Dead tree versions are available on [Amazon.com](#).



Windows GUIs



Tarballs



Mac Build



Source Code

GIT

Pengenalan

Git adalah perisian sumber terbuka dan merupakan **distribute**
version control system yang direkabentuk untuk prestasi dan
kecekapan

Fully Distribute

(hampir) semuanya dalam local

Bermaksud:

- Laju
- Klon adalah backup
- Kerja secara offline



GIT

Konsep

- Decentralized
 - Semua boleh jadi server..
- Offline
 - Salinan local adalah repositori.
 - Commit/merge changes

***Git is not better than CVS/Subversion/ Perforce/Bazaar
But is also not worse. It's different.***



Perbezaan Git dengan {cvs|svn|p4}

*Git is not better than CVS/Subversion/ Perforce/Bazaar
But is also not worse. It's different.*



GIT

Konsep

- Staging Area





GIT

Konsep (err.. keburukan?)

- Kompleksiti

Checkout vs Clone

Commit vs Push

Kena tahu arahan itu sama ada bertindak pada local atau pada
server

GITHUB

Pengenalan



github
SOCIAL CODING

- Web-based hosting untuk pembangunan projek yang menggunakan Git sebagai kawalan versi.
- GitHub, Inc (dahulu dikenali sebagai Logical Awesome) ditubuhkan pada April 2008.

Github, Inc

San Francisco, USA

548 4th St

San Francisco, CA, 94107

USA

- Tom Preston-Werner – Co-Founder / CEO
- PJ Hyett - Founder / COO.
- Chris Wanstrath - Founder



Individu

```
https://github.com/hariadi
```

Organisasi

```
https://github.com/pesima
```

Avatar

```
https://gravatar.com
```


SESI 2

PEMASANGAN

Pemasangan Git

Linux

Debian/Ubuntu

```
apt-get install git
```

Pemasangan Git

Windows

Git

```
https://help.github.com/articles/set-up-git
```


Konfigurasi

Linux/Windows

Identiti

```
git config --global user.name "Hariadi Hinta"  
git config --global user.email "diperakui@gmail.com"
```

Global

```
git config user.name "Hariadi Hinta"  
git config user.email "hariadi@jpa.gov.my"
```

Per projek

SSH (Optional)

Linux/Windows

Terminal/Putty

```
ssh-keygen -t rsa -C "your_email@example.com"
```

Putty

```
http://www.chiark.greenend.org.uk/~sgtatham/putty/download.html
```

SESI 3

KOLABORASI



Initializing Git

Init

```
$ git init
```

Status

```
$ git status
```

Add & Commit

```
$ touch README  
$ git status  
$ git add README  
$ git commit -m 'Initial commit'
```

Cloning

Git Protokol

LOCAL (Basic)

```
$ git clone file:///main/code  
$ git clone file:///192.168.10.51/code  
$ git clone file:///<host>/<share>/<path>
```

HTTPS

```
$ git clone file://github.com/pesima/Spoon-Knife
```

SSH

```
$ git clone ssh://user@server/projek.git  
$ git clone ssh://hariadi@github.com/org.git
```



Best Practice

Contribution (Sync Fork)

FORK

```
https://github.com/pesima/pesima.git
```

CLONE YOUR OWN REPO

```
$ git clone https://github.com/<user>/pesima.git
```

ADD REMOTE UPSTREAM

```
$ git remote -v  
$ git remote add upstream https://github.com/pesima/pesima.git
```




Best Practice (samb.)

Contribution (Sync Fork)

VERIFY REMOTE

```
$ git remote -v
```

FETCHING

```
$ git pull upstream
```

VERIFY

```
$ git branch -va
```



Best Practice (samb.)

Contribution (Sync Fork)

CHECKOUT MASTER (LOCAL)

```
$ git checkout master
```

MERGING

```
$ git merge upstream/master
```

If your local branch didn't have any unique commits, git will
instead perform a "fast-forward"



Best Practice (samb.)

Contribution (Sync Fork)

CONTRIBUTE ON YOUR BRANCH

```
$ git checkout -b <your-fix-or-features-branch>
```

PULL

```
$ git pull origin <your-fix-or-features-branch>
```




Best Practice (samb.)

SUMMARY

SYNCING FORK

Fork <https://github.com/pesima/pesima.git>

```
$ mkdir pesima && cd pesima
$ git clone https://github.com/<username>/pesima.git
$ cd pesima
$ git remote add upstream
https://github.com/pesima/pesima.git
$ git checkout master
$ git pull upstream master
```

SESI 4

Latihan Github



Account

```
https://github.com/<user>
```


LATIHAN 1

PESIMA: : Fork/Remote/Pull/Checkout/Branch

FORK REPOSITORY PESIMA

```
https://github.com/pesima/pesima.git
```

CLONE

```
$ git clone https://github.com/<username>/pesima.git
```

ADD REMOTE UPSTREAM

```
$ git remote add upstream  
https://github.com/pesima/pesima.git
```

PULL UPSTREAM

```
$ git pull upstream master
```

LATIHAN 2: PESIMA Pages

PESIMA

OBJECTIVE

`https://pesima.github.com/`

LATIHAN 2: PESIMA Pages

PESIMA

OBJECTIVE

`https://pesima.github.com/`

SOALAN

Q & A

ADD-ON

Node.js

Pemasangan (Windows)

`http://nodejs.org`

```
$ npm install -g twitter-bootstrap-node
```


Building Twitter Bootstrap

Nodejs, Jekyll

Pemasangan (Windows)

```
$ git clone https://github.com/twitter/bootstrap.git
```

```
$ npm install
```

Terima Kasih

[**https://github.com/hariadi**](https://github.com/hariadi)

[**https://github.com/jpagov**](https://github.com/jpagov)

[**https://github.com/pesima**](https://github.com/pesima)