



System Administration Practice Homework 1-3 : Chinese World

lctseng

Requirements (1)

- Basic system (40%)
 - Build a basic X Server and Window Manager(with Display Manager) and Wine
- Software Rank B (20%)
- Software Rank A (20%)
- Software Rank S (25%)
- Bonus (Up to 15%)
- Choose to install **one** application for each category
 - You still can install more than one for precaution
 - * for recommended

Requirements (2)

- ❑ There are many applications bundled with KDE, but...
- ❑ You need to demo with your **NEWLY INSTALLED** applications
 - ❑ **0 credits** for using bundled application
 - ❑ Exception: that application is listed on slides
 - ❑ Guide line: use the software **listed on the slides**
- ❑ Meet the requirements listed after each software to get points

Requirements (3)

- ❑ **Attention!**
- ❑ TA **WON'T** tell you which command to execute during demo
 - ❑ We have checklist for you
 - ❑ **Make a demo flow** for yourself
 - ❑ Time limit: 20~30(暫定) minutes for you to demo HW1
 - ❑ You get points according to your demo during time limit
 - ❑ **No further grading** when time limit exceeds

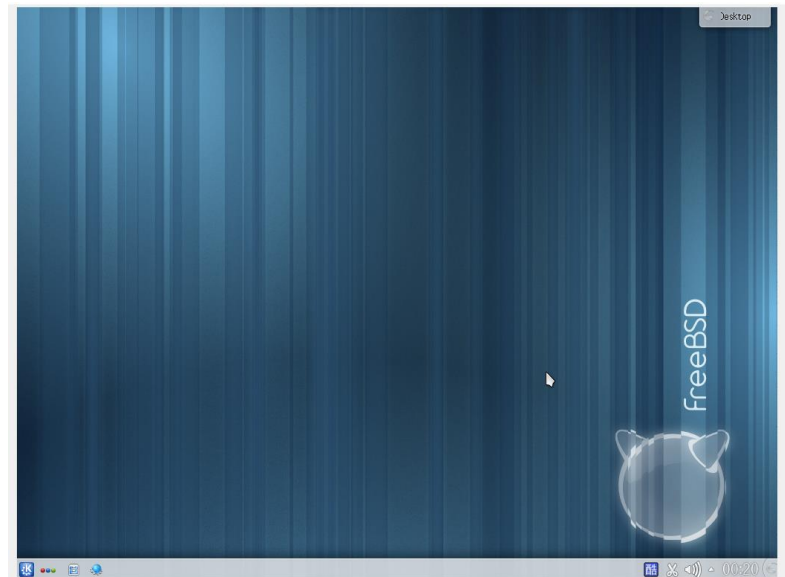
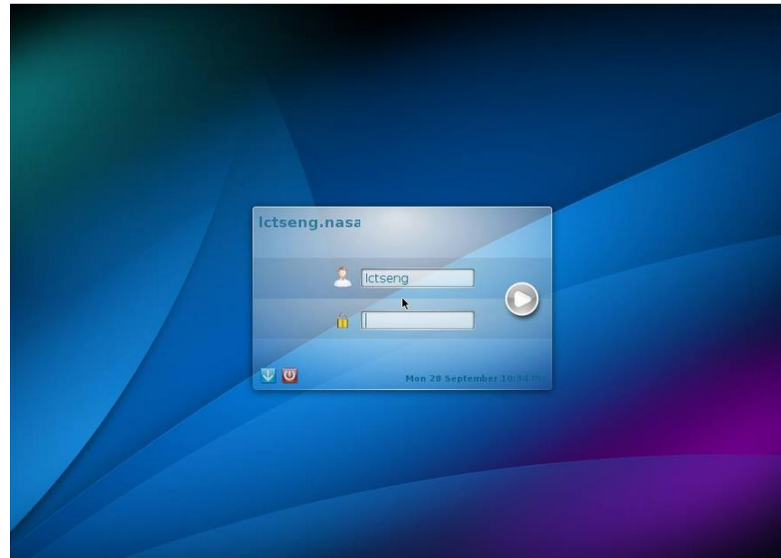
Base system (40%) (1)

- ❑ FreeBSD base system (a.k.a Hw1-1) (5%)
 - ❑ No points for **having any errors**
 - ❑ Find your id and show that you have no error
 - ❑ Make sure your record is correct **before 10/1 23:59**

| IP | ID | User | Hostname | Timestamp | Status |
|-----------------|---------|---------|----------------|----------------------------|----------------------|
| 140.113.140.33 | 0116211 | ychung | ychung | 2015-09-25 10:51:14.502954 | VIEW |
| 140.113.126.31 | 0416248 | 0416248 | 0416248 | 2015-09-24 22:13:25.081864 | VIEW |
| 140.113.141.120 | 0316220 | Gina | namelesscat | 2015-09-25 02:02:52.493402 | VIEW |
| 140.113.123.106 | 0116084 | kltsai | sa.com | 2015-09-25 21:18:18.363103 | VIEW |
| 140.113.66.22 | 0116055 | ssuyi | sabsd.ssuyi.me | 2015-09-28 17:45:43.936670 | VIEW |
| 114.25.207.236 | 0416040 | Kaiyeh | Ky | 2015-09-26 00:42:57.456219 | VIEW |
| 140.113.67.34 | 0111036 | Kevin | KevinBSD | 2015-09-24 23:35:19.406347 | VIEW |

Base system (40%) (2)

- ❑ X server + Window manager (total 12%)
 - ❑ Basic Xorg (can see simplest windows) (5%)
 - ❑ Window Manager (desktop environment) (4%)
 - ❑ Display Manager (friendly login screen) (3%)



Base system (40%) (3)

- ❑ Chinese support (total 13%)
 - ❑ KDE with Chinese (display) (3%)



Base system (40%) (4)

❑ Chinese support (total 13%)

❑ Display commands with Chinese (5%)

❑ E.g. date

```
0:15 lctseng@lctseng(10.0.2.15)[~]
[ ^_^ ] > date
2015年 9月29日 周二 00時15分32秒 CST
```

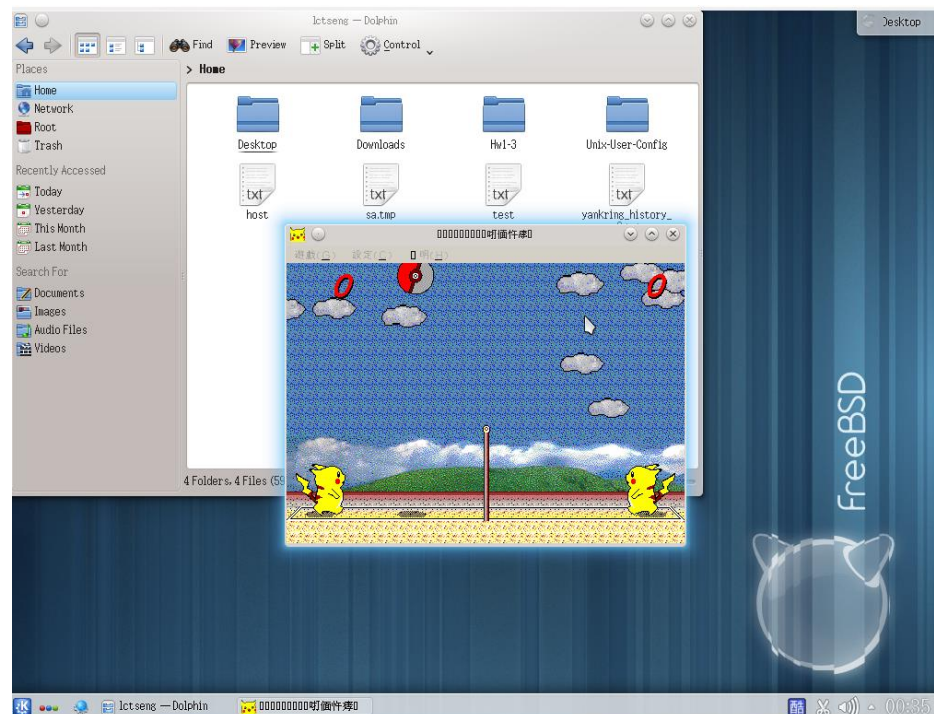
❑ Typing Chinese in your terminal (with Chinese support, e.g. ROXTerm) (5%)

❑ Create a directory with Chinese name

```
0:17 lctseng@lctseng(10.0.2.15)[~/tmp/test]
[ ^_^ ] > mkdir 安安你好
0:17 lctseng@lctseng(10.0.2.15)[~/tmp/test]
[ ^_^ ] > ls
安安你好/
0:17 lctseng@lctseng(10.0.2.15)[~/tmp/test]
[ ^_^ ] >
```

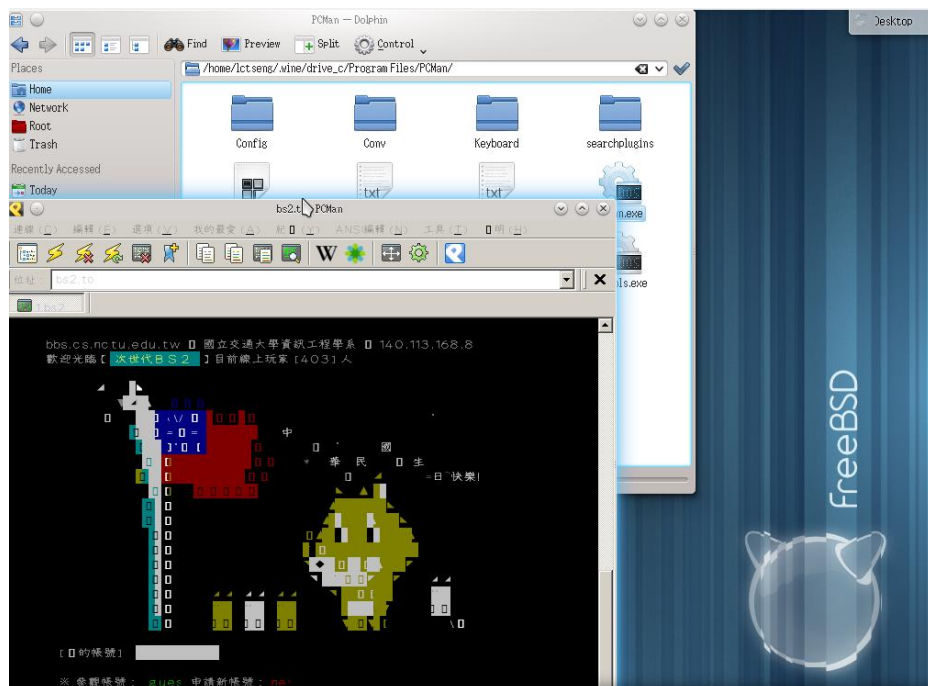

Base system (40%) (5)

- ❑ Wine (total 10%)
 - ❑ Play: 皮卡丘打排球 (4%)
 - ❑ Play a game without any error
 - ❑ Download this game:
 - ❑ <https://nasa.cs.nctu.edu.tw/2015sahw1/files/Volleyball.exe>



Base system (40%) (6)

- ❑ Wine (total 10%)
 - ❑ Install PCMan for windows and run it (3%)
 - ❑ Path: `~/.wine/drive_c/ProgramFiles/PCMan`
 - ❑ Download the installer
 - ❑ <https://nasa.cs.nctu.edu.tw/2015sahw1/files/PCMan.exe>
 - ❑ With Chinese support (3%)



Software Rank B (20%)

Terminal (5%)

- rxvt-unicode*

- ROXTerm*

- xterm

- eterm

- aterm

FTP client (2%)

- filezilla*

Mail client (6%)

- Thunderbird*

- Evolution

Instant Messenger (3%)

- pidgin*

PDF reader (2%)

- Xpdf *

- evince

- mupdf

Browser (2%)

- Firefox*

- Opera

- Chromium

Software Rank B – Requirement (1)

Terminal (total 5%)

rxvt-unicode*

ROXTerm*

xterm

eterm

Aterm

Requirements

ssh to ssh.bs2.to (bbs) (1%)

\$ ssh bbsu@ssh.bs2.to

Chinese support (4%)

Above command using **UTF-8 (not Big5!)**

You must have **correct encoding** in env. variables



Software Rank B – Requirement (2)

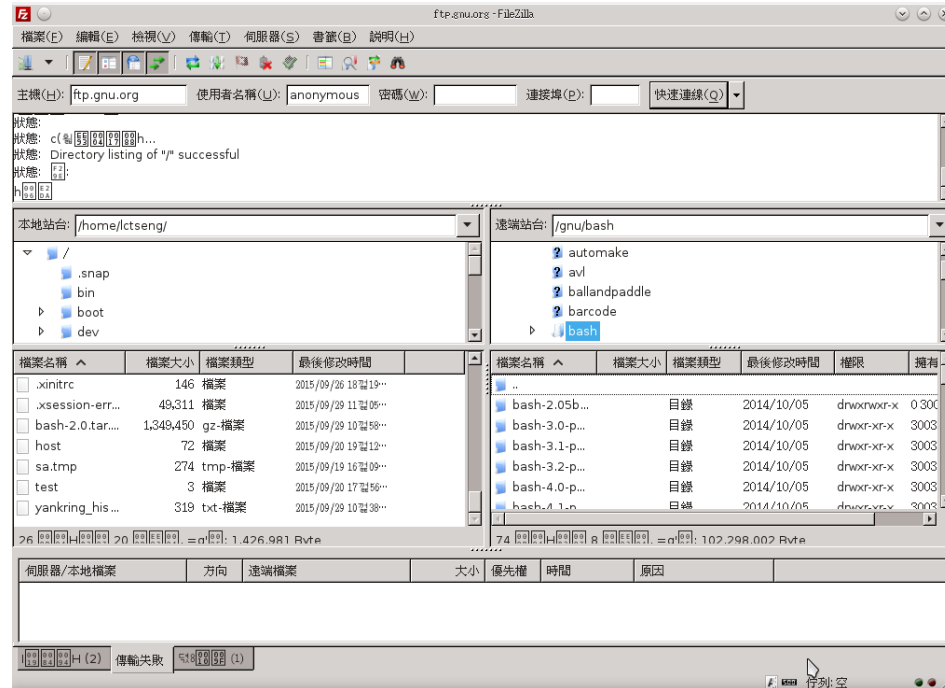
❑ FTP client (total 2%)

❑ filezilla*

❑ Requirements

❑ Download files from <ftp://ftp.gnu.org/gnu/bash> (1%)

❑ Display in Chinese (1%)



Software Rank B – Requirement (3)

❑ Mail client (total 6%)

❑ Thunderbird*

❑ Evolution

❑ Requirements

❑ Send mails (2%)

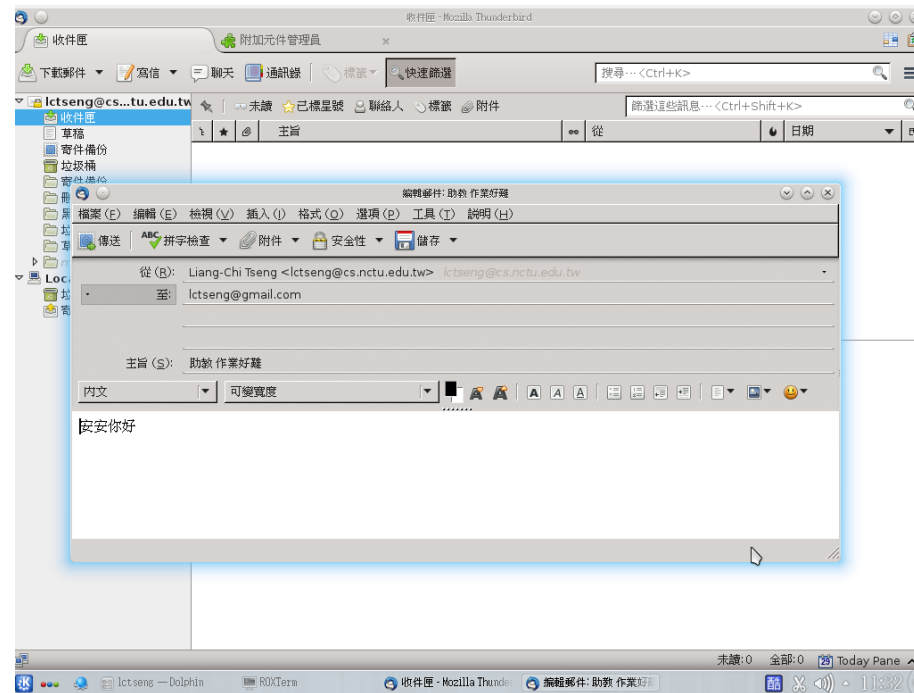
❑ Receive mails (2%)

❑ Chinese support

❑ display (1%)

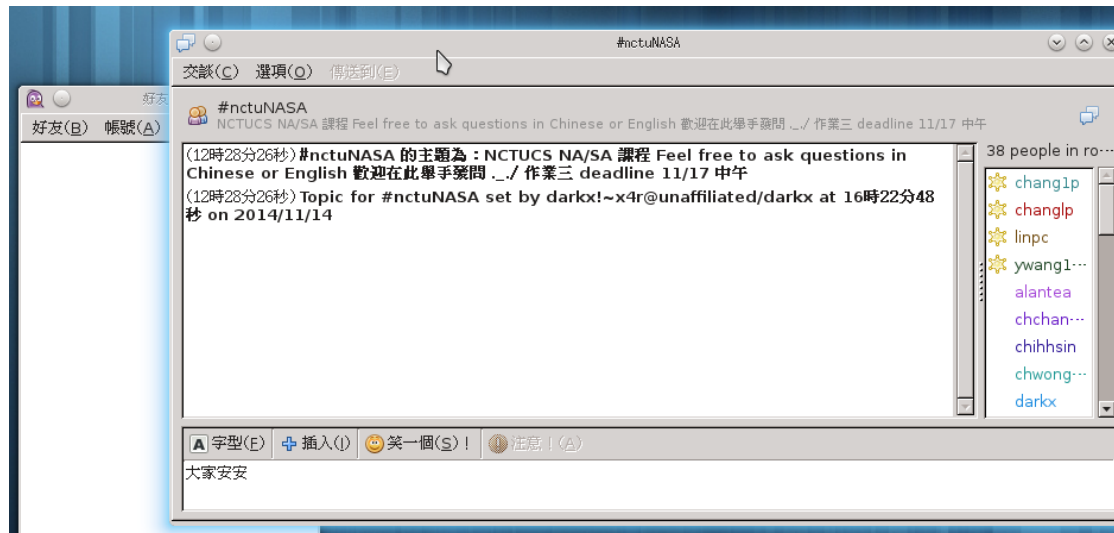
❑ input (1%)

❑ Note: don't sent to yourself



Software Rank B – Requirement (4)

- ❑ Instant Messenger (total 3%)
 - ❑ pidgin*
- ❑ Requirements
 - ❑ Join #nctuNASA IRC group (1%)
 - ❑ Can see Chinese (1%)
 - ❑ Input in Chinese (1%)



Software Rank B – Requirement (5)

- ❑ PDF reader (2%)

- ❑ xpdf *

- ❑ evince

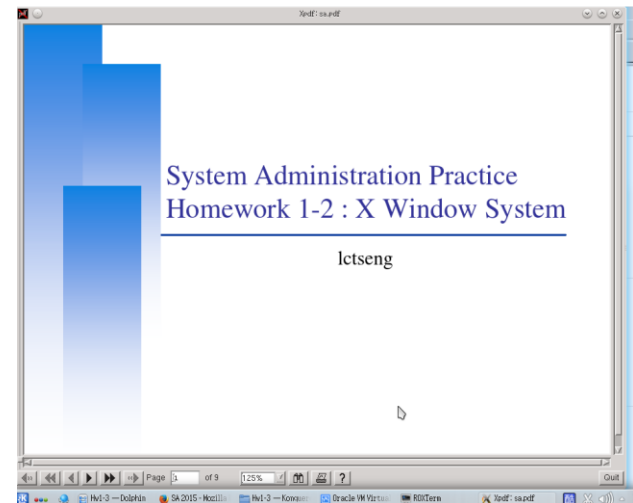
- ❑ mupdf

- ❑ Requirements

- ❑ Open any PDF file **with applications listed above**

- ❑ You can download PDF files from here

- ❑ <https://nasa.cs.nctu.edu.tw/sa/2015/>



Software Rank B – Requirement (6)

- Browser (total 2%)
 - Firefox*
 - Opera
 - Chromium
- Requirements
 - Open <http://www.cs.nctu.edu.tw> (1%)
 - Chinese interface (1%)



Software Rank A (20%)

Browser (10%) (with Flash support)

Firefox*

Opera

Chromium

Multimedia : Video, Audio(4%)

Mplayer*

VLC

Xmms

BBS client (2%)

pccmanx*

Pictures editor/viewer (2%)

Gimp*

Remote desktop (2%)

freeNX

(32bits only)

tightvnc

tigervnc

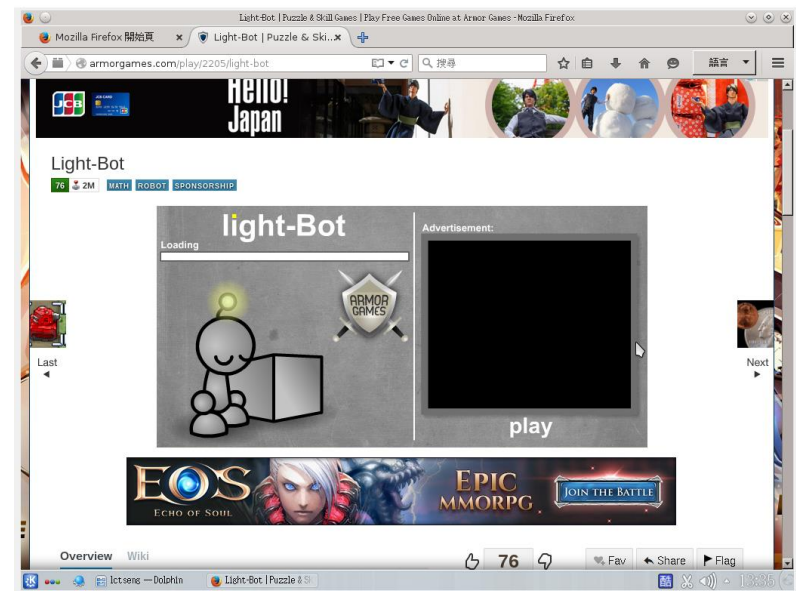
Tsclient

Remmina

vinagre

Software Rank A – Requirement (1)

- ❑ Browser (with Flash support) (10%)
 - ❑ Firefox*
 - ❑ Opera
 - ❑ Chromium
- ❑ Requirement
 - ❑ <http://armorgames.com/play/2205/light-bot>
 - ❑ Play this flash game ***normally***



Software Rank A – Requirement (2)

Multimedia : Video, Audio(total 4%)

Mplayer*

VLC

Xmms



Requirement

Play this video (with audio) (1%)

Video: <https://nasa.cs.nctu.edu.tw/2015sahw1/files/sahw1.mp4>

Subtitle: <https://nasa.cs.nctu.edu.tw/2015sahw1/files/sahw1.srt>

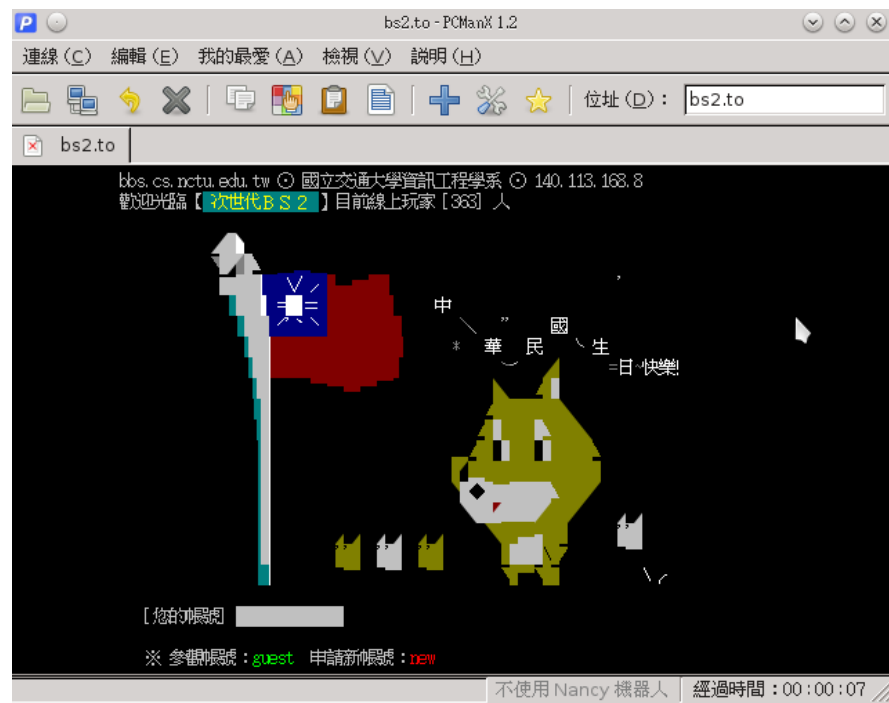
Load subtitle (1%)

Show Chinese subtitle (2%)

Attention! This subtitle is encoded in UTF-8 w/ BOM

Software Rank A – Requirement (3)

- BBS client (total 2%)
 - pcmanx*
- Requirement
 - Connect to bs2.to (1%)
 - Chinese support (1%)



Software Rank A – Requirement (4)

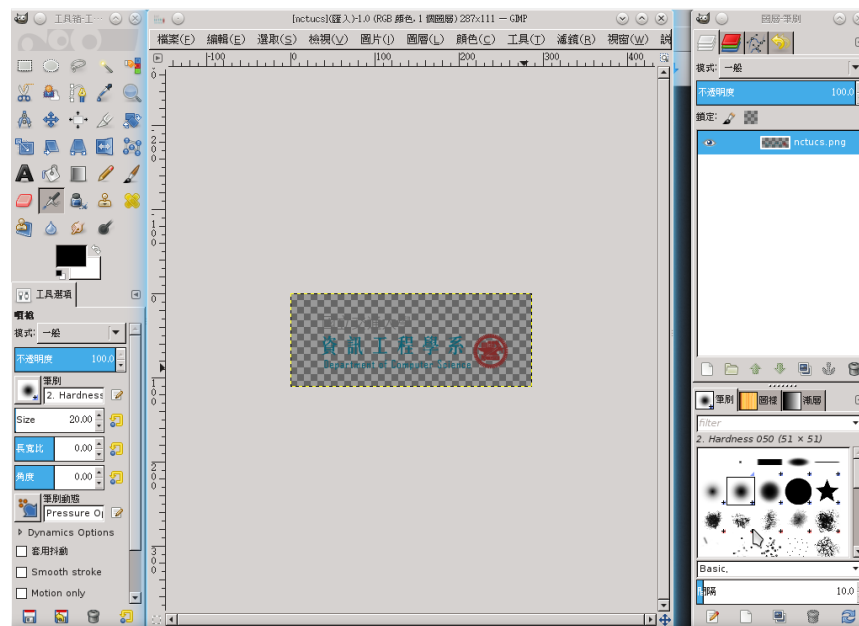
Pictures editor/viewer (2%)

Gimp*

Requirement

Download and edit the picture

<https://nasa.cs.nctu.edu.tw/2015sahw1/files/nctucs.png>



Software Rank A – Requirement (5)

- Remote desktop (2%)

- freeNX
 - (32bits only)
- tightvnc
- tigervnc
- tsclient
- remmina
- vinagre

- Requirement

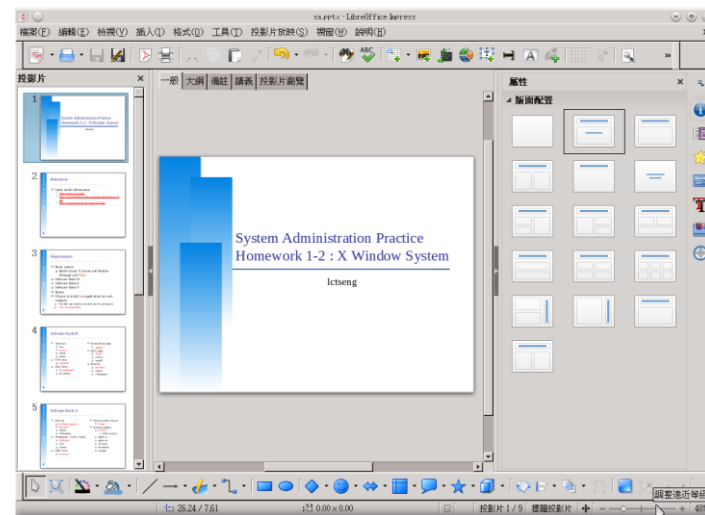
- Connect to TA's VNC server, announce when demo
- You can connect to your own computer for testing

Software Rank S (25%)

- ❑ Office (4%)
 - ❑ openoffice
 - ❑ libreoffice*
- ❑ P2P software (3%)
 - ❑ transmission*
 - ❑ deluge
- ❑ Virtual Machine (18%)
 - ❑ virtualbox-ose*
 - ❑ qemu

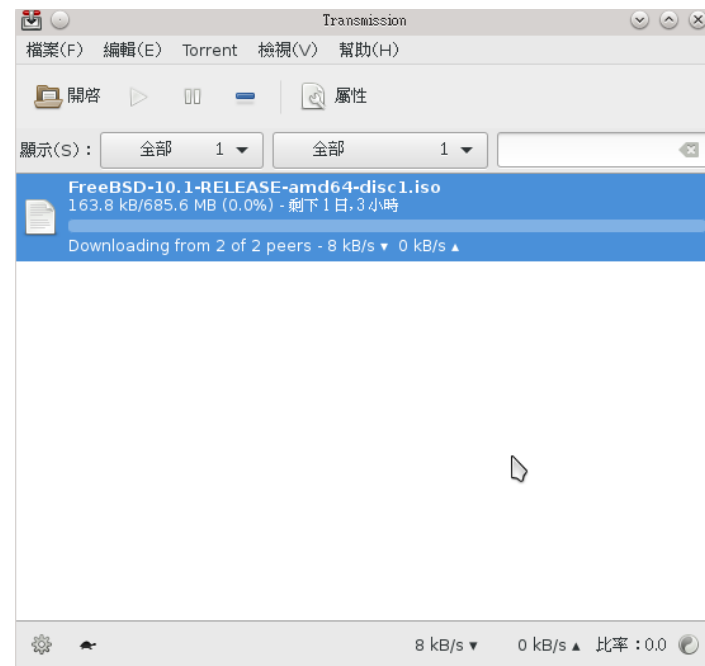
Software Rank S – Requirement (1)

- ❑ Office (total 4%)
 - ❑ openoffice
 - ❑ libreoffice*
- ❑ Requirement
 - ❑ Open any pptx file with applications listed above (2%)
 - ❑ You can download pptx files from here
 - ❑ <https://nasa.cs.nctu.edu.tw/sa/2015/>
 - ❑ Chinese support (2%)



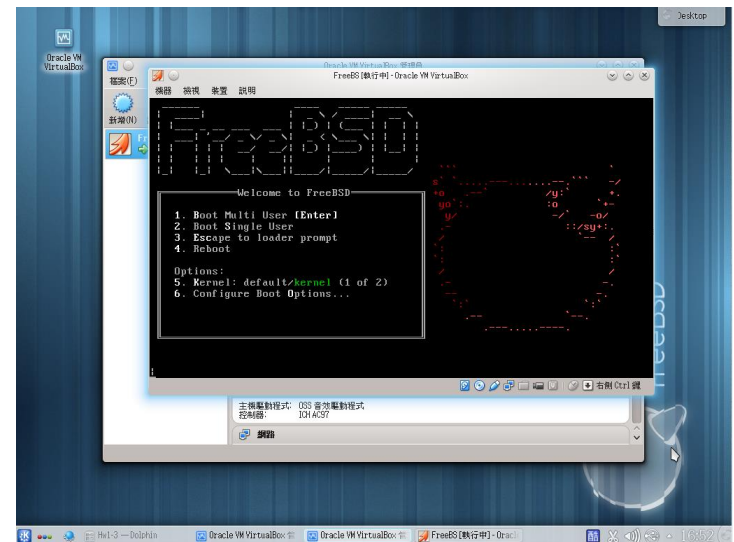
Software Rank S – Requirement (2)

- ❑ P2P software (total 3%)
 - ❑ transmission*
 - ❑ deluge
- ❑ Requirement
 - ❑ Download files via torrents(2%) (show the progress)
 - ❑ Chinese support (1%)
 - ❑ You can get torrents from:
 - ❑ <http://www.gotbsd.net>
 - ❑ Notes: **No NCTU-Wireless**



Software Rank S – Requirement (3)

- ❑ Virtual Machine (total 18%)
 - ❑ virtualbox-ose*
 - ❑ qemu
- ❑ Requirement
 - ❑ Open an FreeBSD VM inside your FreeBSD (17%)
 - ❑ Tips: use host CD (from host OS) if you cannot load .ISO from virtualbox
 - ❑ Chinese support (1%)



Bonus (up to 15%)

- ❑ IDE Environment
 - ❑ Code::Blocks **with C/C++** compiling/executing (2%)
 - ❑ Eclipse **with Java** compiling/executing(3%)
- ❑ Games (in Wine) (5%)
 - ❑ try to install WoW, PoE, LoL(US) ... fancy 3D games
 - ❑ Make sure it can run normally.
- ❑ Other language support (2%)
 - ❑ Full Japanese support for 皮卡丘打排球
 - ❑ Show the Japanese application title correctly
- ❑ Misc
 - ❑ applications which **cannot be built up easily**

Due Time

- ❑ You need to go to CSCC to fill the sheet to make an appointment about your demo time
 - ❑ Will open for signup from 10/7 (Mon)
- ❑ Demo 10/12(Mon)~10/18 (Sun)
 - ❑ Demo time will be chosen from these days (announced on 10/7)
 - ❑ Please follow your appointment in demo sheet
 - ❑ If you are not available for all demo time, please make appointment with TA, choose **earlier time before deadline**
- ❑ Important! DO NOT use **root** account when demonstrating your homework!
 - ❑ Try to use **normal user with sudo** when doing your homework
 - ❑ You **may get 0 credit** if using root!

Help!

- ❑ Newsgroup cs.course.sysadm
- ❑ BS2 board CS-SysAdmin
- ❑ CSCC
- ❑ ta@nasa.cs.nctu.edu.tw (For complex problems)
- ❑ IRC channel #nctuNASA (Recommend)
 - passwd: ILoveCSCC
 - Use screen or tmux to stay online, so TAs can tag you to answer your questions.
- ❑ Before you ask a question...
 - 提問的智慧: How To Ask Questions The Smart Way
 - <http://mis.ndhu.edu.tw/docu/question.htm>