# Linux System

Chonnam National University
School of Electronics and Computer
Engineering

Kyungbaek Kim

### Syllabus

- Instructor
  - Kyungbaek Kim
  - Office: Engineering Building 6 715
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  - Office Hours: Tuesday 10:00 ~ 10:50
- Lectures: Tuesday, Thursday 13:30 ~ 14:45
- Location: Engineering Building 2-100
- Course Web Page :
  - eClass of JNU
  - http://myweb.jnu.ac.kr/~kbkim/jnu\_classes/2019s\_linux\_syst em\_index.html

## Syllabus (cont'd)

- Textbook
  - Using Lecture Slides
- Reference Books
  - UNIX and Linux System Administration
     Handbook (4th Edition), Evi Nemeth, Garth
     Snyder, Trent R. Hein, Ben Whaley
  - 우분투 리눅스, 시스템 & 네트워크, 이종원
  - 리눅스 바이블, 크리스토퍼 네거스
  - 한눈에 빠져드는 셀 스크립트, 데이브 테일러

# Grading Policy << Absolute Evaluation>>

- Attendance 10 points
  - 1.5 Points Deduction/Absence
  - 0.5 Points Deduction/Lateness
  - More than six (6) unexcused absences may result in an automatic failure of this course
- Homework 35 points
  - Tentatively scheduled for 8~10 sets of homework
  - Late submission takes disadvantages
- Midterm Exam 25 points
  - Tentatively scheduled on 2019/04/23 13:30pm~14:45pm
- Final Exam 30 points
  - Tentatively scheduled on 2019/06/13 13:30pm~14:45pm
- Students taking less than 60 points are subject to fail this course

#### Homeworks

- 8-10 exercises
  - Self Guided Tutorial of Handling Linux
  - Exercises of playing with Linux
- Due of each homework will be posted through eClass
  - Usually, one and half week
- Late submission policy
  - 50% degradation for one week delay
  - No more delays except one week will be considered

#### After this class, you will ...

- Use a linux client
- Manage a linux server as an administrator

#### Lecture Schedule

- Intoruction of Unix/Linux System
  - History of Linux
  - Installation of Linux using VMWare
- Users and accounts
  - System Login, logout, and shutdonw
  - Creating/changing users and groups
- Files and Directories
  - Handling Files and Directories
  - Linux Directories
  - Compressing files and directories
- Access Control of Linux
  - Changing permission and ownership

#### Lecture Schedule (cont'd)

- Text Editors
  - Vi, Vim, Emacs
- Documents and Software Packages
  - Managing documents of Linux
  - Managing software packages
- System Logs and Scheduled tasks
  - System Logs
  - Cron Jobs
- File System of Linux
  - Inode and Directories
  - Hard and Symbolic Links

#### Lecture Schedule (cont'd)

- Handling Disks of Linux
  - Partition of Filesystem
  - Filesystem Mount and Unmount
  - Set and view Disk Quotas
- Job and Process Control
  - Job control commands
  - Process creation and deletion
  - Daemon Processes
- Network of Linux
  - Basic Network Commands
  - Remote accessing
  - handling servers (ftp, web)

#### Lecture Schedule (cont'd)

- Boot Linux
  - Boot sequence
  - Running level and shutdown or reboot the system
- Shells of Linux
  - Shell Variables
  - Basic Shell Commands
  - Linux Environment
  - Shell Programming
- Text Processing
  - Filtering texts
  - Searching with Regular expression
- gcc and projects (Introduce gcc and make, automake and autoconf)