Free/Libre and Open Source software

Lecture 1

Oleg Sadov

ITMO University

sadov@mail.ifmo.ru

Free/Libre and Open Source software

Lecture 1

UNIX/Linux

http://www.levenez.com/unix/

Windows

http://www.levenez.com/windows/

Computer Languages History

http://www.levenez.com/lang/

Free/Libre and Open Source software

Lecture 1

Standards

Open – POSIX, SYSV, ANSI, etc...

Free – LSB, FreeDesktop.org, X-Window, etc...

Free/Libre and Open Source software

Lecture 1

Open and Free Software

- Open Software (for example, OSF) — open standards
- Free Software (for example, FSF) — free licenses (BSD, MIT, GNU, etc) with a four freedoms:

  0) The freedom to run the program for any purpose.

  1) The freedom to study how the program works, and change it to make it do what you wish.

  2) The freedom to redistribute copies so you can help your neighbor.

  3) The freedom to improve the program, and release your improvements (and modified versions in general) to the public, so that the whole community benefits.

Free/Libre and Open Source software

Lecture 1

Main concepts of UNIX/Linux systems

- Users
- Files
- Processes

Terminal lines

Free/Libre and Open Source software

Lecture 1

Components

- Kernel
- Shell
- Libraries
- Utilities

Free/Libre and Open Source software

Lecture 1

Just to try

Online services to access UNIX/Linux systems:

- PDP-11 emulator with UNIX
- a lot of online Linux'es

Free/Libre and Open Source software

Lecture 1

Literature

- System tutorials, guides & manuals
- Main concepts:
  - Eric Raymond "The Art of Unix Programming"
  - Kernighan & Pike's "The Unix Programming Environment"
  - Baurn "The UNIX system"
- System administration:
  - **Red Book —** Nemeth, etc... "UNIX and Linux System Administration Handbook"
  - **Armadilla Book** — Æleen Frisch "Essential System Administration"