



# LibreOffice 3

The Document Foundation



Team:

- Tạ Đức Tùng
- Nguyễn Hải Hà
- Hà Thị Thắm

Mentors:

- Huỳnh Anh Dũng
- Nguyễn Vũ Hưng

# What are you talking about?

- A **Free Office Suite**?
- Take an **Overview**!!!!!!
- What's the **Plan**?
- \$\$\$? Don't panic ~~> **Licenses**
- How the **Structure**
  - We **Did It**!
  - Wanna **Give Up**? No
  - Keep moving **Forward**
    - **Lessons** learn
    - **Meaning** of Project

# A Free Office Suite

**OpenOffice  
2002**

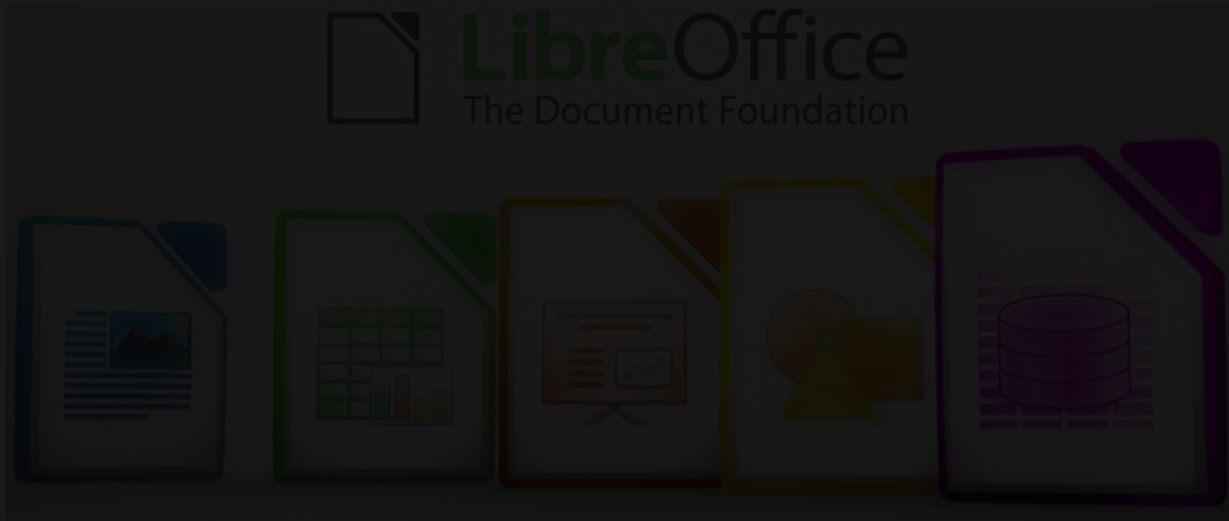


**2010  
LibreOffice**



**1999  
StarOffice**

# Take an **Overview!**



**UNO**  
Universal  
Network  
Objects



**GNU**  
toolchain

# Take an **Overview!**

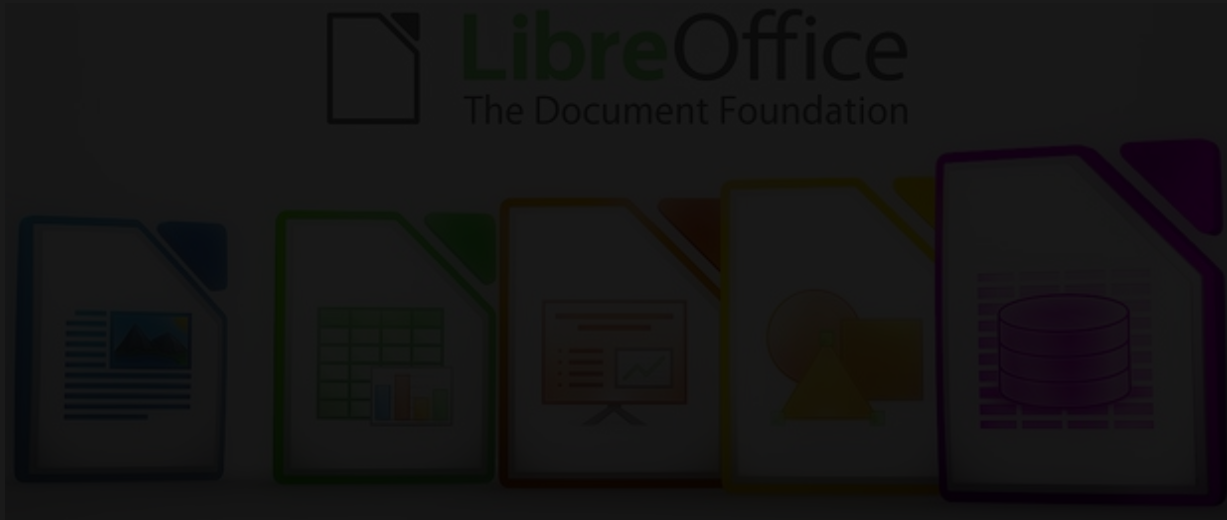


**UNO**  
Universal  
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**GNU**  
toolchain

# Take an Overview!



UNO  
Universal  
Network  
Objects

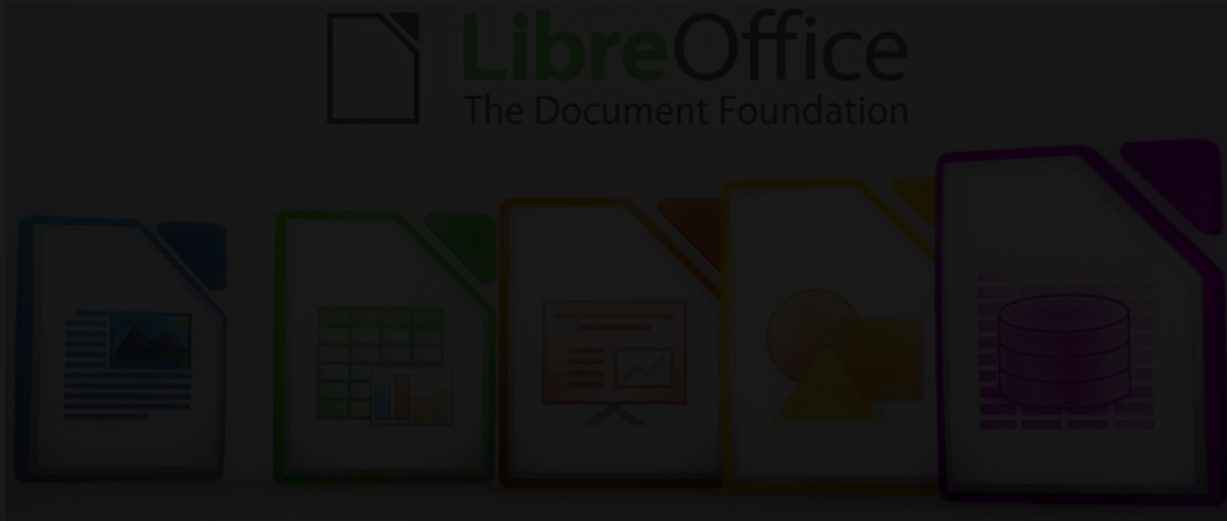


GNU  
toolchain

13M



# Take an Overview!



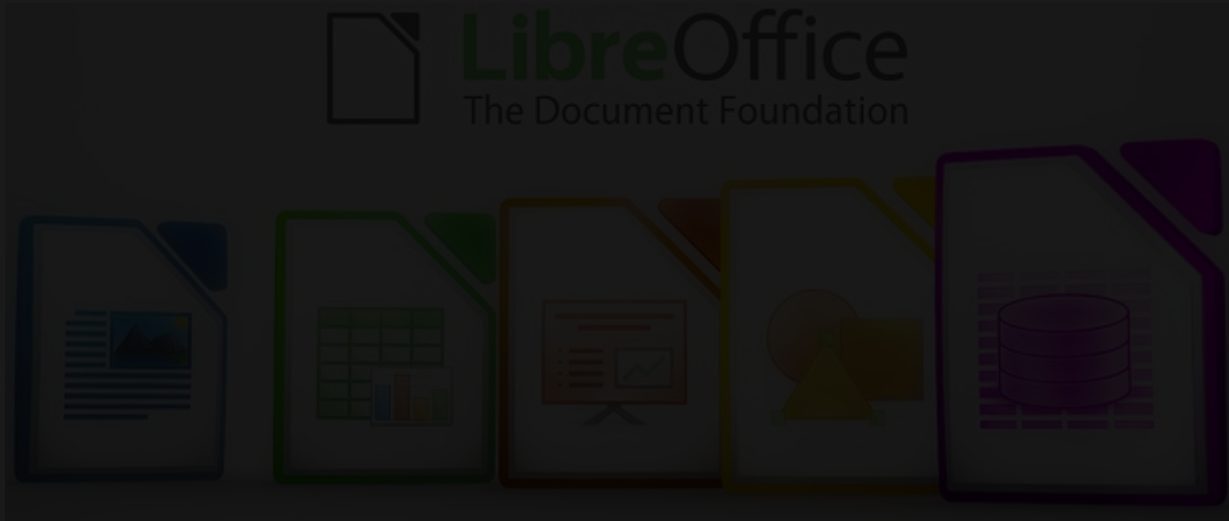
UNO  
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# Take an **Overview!**

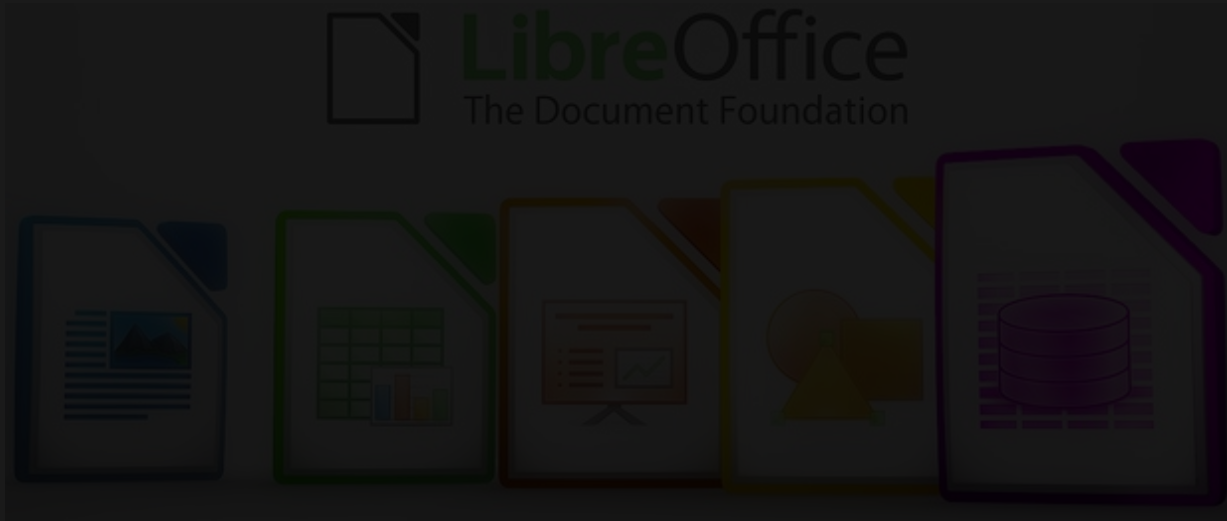


**UNO**  
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# Take an **Overview!**



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\$\$\$? Don't panic ~~> **Licenses**



***Free as in Freedom***

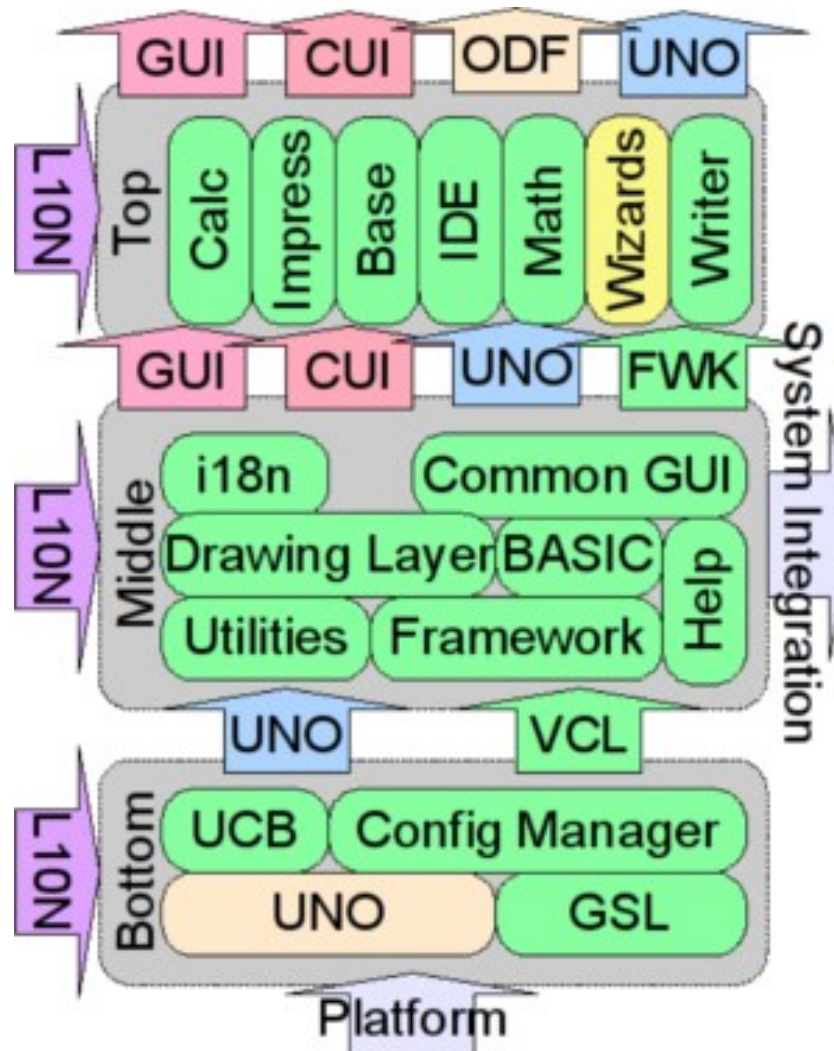
# What's the **Plan**?

**Build – 1 week**

**Easy Hack – 1 month**

**Main Idea – 2 months**

# How the Structure



# We Did It!



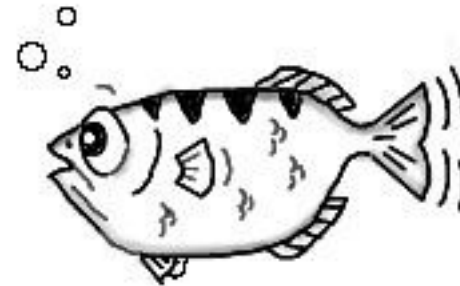
Fedora 15



VIM editor



GNU toolchain



GDB



We **Did It!**

**Build**

**Easy Hack**

**Main Idea**

# We Did It!

**Build**

**Easy Hack**

**Main Idea**

- **Get code**
- **Configure** environment
  - Fedora 15
- **Build**
  - First build: 7 – 10 hrs (depends)
  - Clean build: 2 – 4 hrs
  - Normal build: 15 mins
  - 2 weeks to get first build

# We Did It!

Build

- Find EasyHack
  - #34697: Print current page option
  - #36800: "Find & replace" does not search single cell

Easy Hack



HACK STORY

Main Idea

# We Did It!

**Build**

**Easy Hack**

**Main Idea**

- Fix it
  - Code pointer
  - Libreoffice mailing list
  - Study and fix code



**SwXTextDocument**



**SwPrintUIOptions**



**SwDocShell**



**SwWrtShell**



**SwPaM**

# We Did It!

**Build**

**Easy Hack**

**Main Idea**

- Fix it
  - Code pointer
  - Libreoffice mailing list
  - Study and fix code
  - Patch
  - Wait for review





# We Did It!

**Build**

**Easy Hack**

**Main Idea**

- Result
  - #34697: done in Writer
    - Calc, Draw & Impress left

Details Properties...

Range and copies

☒ All pages

☐ Pages 1-10

Number of copies 1

☒ Collate

Print

Comments None (document only)

Details Properties...

Range and copies

☒ All pages

☐ Pages 2

☐ Current page

☐ Print in reverse page order

Number of copies 1

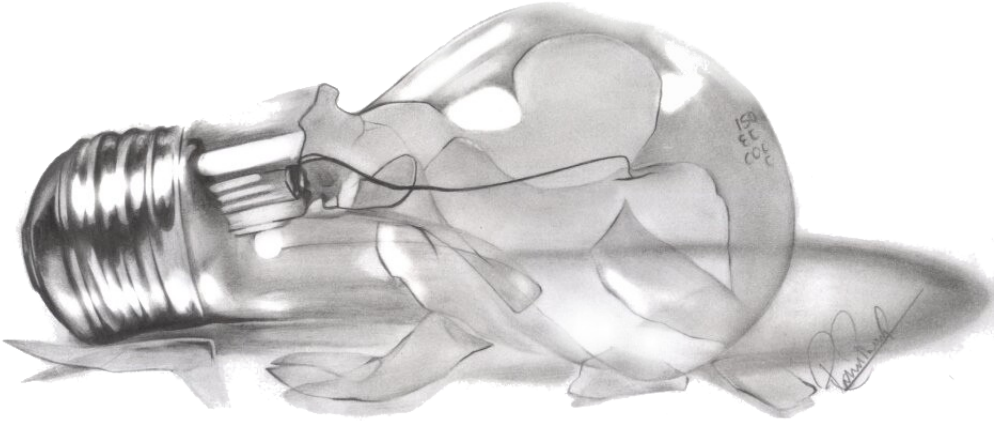
☒ Collate

# We Did It!

Build

Easy Hack

Main Idea



NO main idea here! Why?

- Cannot **find** a suitable **idea**
- **Ability** of **control**  
libreoffice source **code**

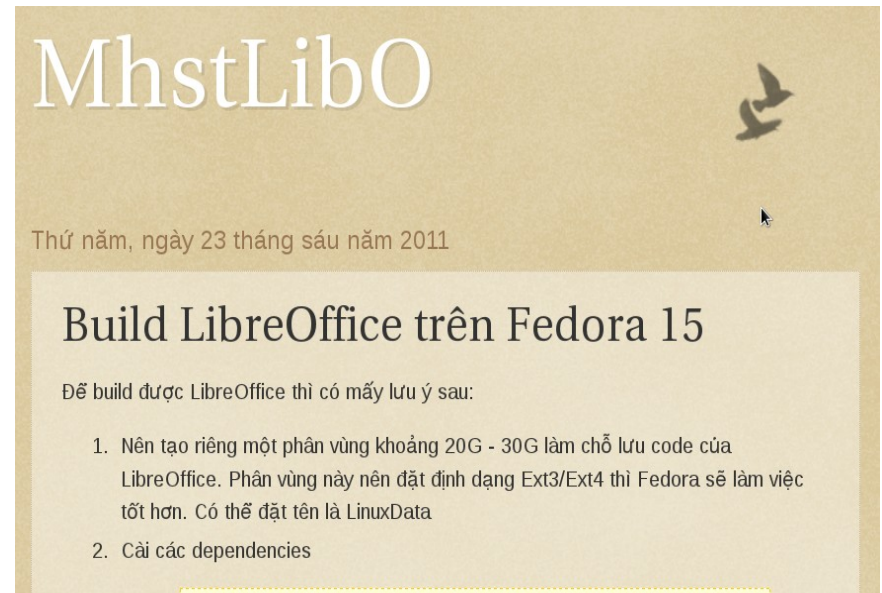
# Wanna **Give Up**? NO

- Internal
  - Ability
  - Study at university
- External
  - **Lacking** of Specification **Document**
  - Too **big** and **unstable** source code
  - Build **time** too **looooong**



# Lessons learned

- **Be patient**
- **Search everywhere**
- **Ask everyone (actively)**
- **Blog everything**
- **Do NOT** update source code if not necessary
- **Learn C++ technique**



# Keep moving **Forward**

- Continue with **EasyHack**
- **Keep in touch** with LibreOffice Community
- Make **LibreOffice** more **popular**





# Meaning of Project

- Commit **patch** successfully
- Vietnamese **student** can **solve LibO**
- **Change mindset**
- Libo **Development Team** in Vietnam
- Help to make **LibO popular**
  - Government
  - Company



Thank You!



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