




Workshop

Minecraft 服务端插件开发

叶子 (Alan Richard) - August 25, 2021

Session 5 ㄟ



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Session 5 ㄟ : 第三方依赖


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依赖

- 通过代码利用其他程序中已有功能的关系。
- 例如：



EssentialsX is the essential plugin suite for Minecraft servers, with over 130 commands for servers of all size and scale.



Vault is a Permissions, Chat, & Economy API to give plugins easy hooks into these systems.

You'll also need to install **Vault** to allow EssentialsX to talk to permissions plugins; without it, prefixes, suffixes and group-related features won't work.

Images from <https://www.spigotmc.org/resources/vault.34315/> and <https://essentialsx.net>

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IDE 的功能

- 语法高亮
- 代码补全
- 重构
- 版本控制
- 调试
- 代码搜索
- 可视化编程
- 语言支持

[^] Translated from https://en.wikipedia.org/wiki/Integrated_development_environment

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Import

```
ExpBank.java x
1 package cc.eumc.expbank;
2
3 import cc.eumc.expbank.command.UserCommand;
4 import cc.eumc.expbank.listener.PlayerListener;
5 import org.bukkit.plugin.java.JavaPlugin;
6
7 public final class ExpBank extends JavaPlugin {
8     @Override
9     public void onEnable() {
```

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Import (Cont'd)

Project

ExpBank ~\Documents\IdeaProjects\ExpBank

idea

src

main

java

cc.eumc.expbank

command

UserCommand

listener

PlayerListener

util

ExpBank

resources

config.yml

plugin.yml

test

target

.gitignore

ExpBank.iml

pom.xml

External Libraries

< 16 > /Library/Java/JavaVirtualMachine

Maven: com.google.code.gson:gson:2.8.6

Maven: com.google.guava:guava:21.0

Maven: com.googlecode.json-simple:json-simple:1.1.1

Maven: commons-lang:commons-lang:2.6

Maven: io.papermc.paper:paper-api:1.16.3-R0.1-SNAPSHOT

Maven: it.unimi.dsi:fastutil:8.2.2

```
ExpBank.java x
1 package cc.eumc.expbank;
2
3 import cc.eumc.expbank.command.UserCommand;
4 import cc.eumc.expbank.listener.PlayerListener;
5 import org.bukkit.plugin.java.JavaPlugin;
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```

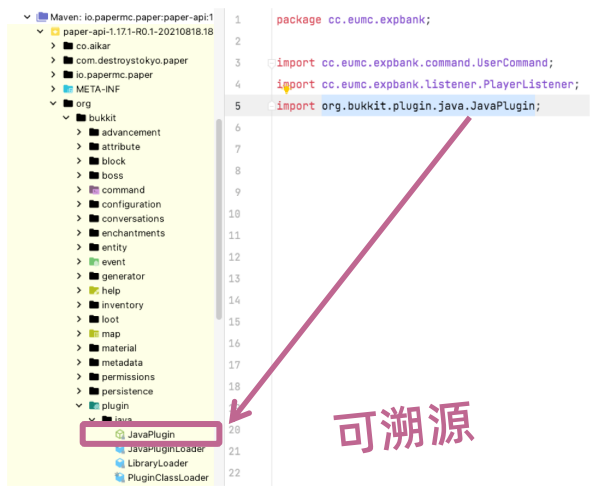
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Import (Cont'd)



```

1 package cc.eumc.expbank;
2
3 import cc.eumc.expbank.command.UserCommand;
4 import cc.eumc.expbank.listener.PlayerListener;
5 import org.bukkit.plugin.java.JavaPlugin;
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```

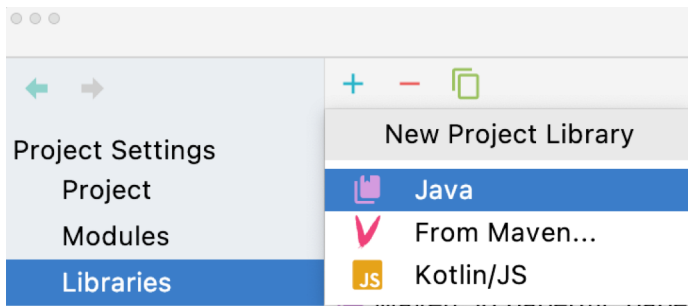
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添加依赖 (Legacy 🐶)

- 下载 jar
- 添加到 Library
- 使用



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构建自动化 Build Automation

- 自动创建软件构建和相关流程的过程

^ Translated from https://en.wikipedia.org/wiki/Build_automation

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Java 工程常用构建工具



Images from https://en.wikipedia.org/wiki/Apache_Maven and <https://en.wikipedia.org/wiki/Gradle>

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利用构建工具方便地管理依赖

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Demo: 经验银行的积分奖励功能

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VaultAPI

- <https://github.com/MilkBowl/VaultAPI>

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