

자료구조론 실습 수업

- 수업 진행방향 소개
- JDK와 Eclipse 설치
- 기본 프로젝트 생성방법

2016. 9. 05.
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수업 진행방향 소개

- 수업 방식
 - 기본 개념 설명 후 주어진 문제 풀이
 - 지정좌석제
- 수업 내용
 - 이론시간에 배운것을 실제 구현
 - TODO로 표기되어 있는 부분을 구현 후 테스트코드 실행
 - 소스코드 공유 금지!!

수업 진행방향 소개

- 점수

- 출석 20%, 수업참여 20%, 실습 기말시험 60%
- 결석 -1 감점, 지각 2번 = 결석 1번
- 수업시간 내 주어진 문제 해결하지 못할 시 -1 감점

수업 진행방향 소개

- 따로 출석을 부르지 않고 자리에 없는 사람 체크
- 출석체크는 기본 개념 설명 마친 후 실시
- 수업시간 중 휴대폰 울림 주의
- 납득할만한 사정이 있을 경우 다음수업 때 사유서 제출 요망
 - 병원의 진단서 혹은 입원확인서 등 제출

실습강의계획

- 1주차(9/6) Introduction
- 2주차(9/13) Java Training 1
- 3주차(9/20) Java Training 2
- 4주차(9/27) Linked List 1
- 5주차(10/4) Linked List 2
- 6주차(10/11) Stack
- 7주차(10/18) Queue
- 8주차(10/25) Mid-term
- 9주차(11/1) Recursion
- 10주차(11/8) Hash Table
- 11주차(11/15) Binary Search Tree 1
- 12주차(11/22) Binary Search Tree 2
- 13주차(11/29) Sorting 1
- 14주차(12/6) Sorting 2
- 15주차(12/13) 실습 기말시험
- 16주차(12/20) Final-term

JDK 설치

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www.oracle.com/technetwork/java/javase/downloads/index.html

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- MySQL
- Oracle Berkeley DB
- Oracle Instant Client
- Oracle Application Express
- See All...

Middleware

- Oracle Fusion Middleware (including Oracle WebLogic Server)
- Oracle JRockit
- Oracle SOA Suite
- See All...

Enterprise Management

- Oracle Enterprise Manager
- Oracle Application Testing Suite
- See All...

Server and Storage Systems

- Solaris
- Linux and Oracle VM
- Firmware
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Developer Tools

- SQL Developer
- JDeveloper and ADF
- Developer Tools for Visual Studio
- Enterprise Pack for Eclipse
- NetBeans IDE
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Prebuilt Developer VMs

Applications

- Oracle Fusion Applications, Oracle E-Business Suite, PeopleSoft, JD Edwards, Siebel CRM
- Agile
- AutoVue
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Community

Java Magazine

Java SE 8u101 / 8u102

Java SE 8u101 includes important security fixes. Oracle strongly recommends that all Java SE 8 users upgrade to this release. Java SE 8u102 is a patch-set update, including all of 8u101 plus additional features (described in the release notes). Learn more ▶

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JDK

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Server JRE

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JRE

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Which Java package do I need?

- Software Developers: JDK** (Java SE Development Kit). For Java Developers. Includes a complete JRE plus tools for developing, debugging, and monitoring Java applications.
- Administrators running applications on a server: Server JRE** (Server Java Runtime Environment) For deploying Java applications on servers. Includes tools for JVM monitoring and tools commonly required for server applications, but does not include browser integration (the Java plug-in), auto-update, nor an installer. Learn more ▶
- End user running Java on a desktop: JRE:** (Java Runtime Environment). Covers most end-users needs. Contains everything required to run Java applications on your system.

Forums

Java Magazine

Java.net

Developer Training

Tutorials

Java.com

www.oracle.com/technetwork/apps-tech/index-097651.html

JDK 설치

Oracle Technology Network > Java > Java SE > Downloads

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Java SE Downloads

Java Platform (JDK) 8u101 **DOWNLOAD +**

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Java Platform, Standard Edition

Java SE 8u101 / 8u102
 Java SE 8u101 includes important security fixes. Oracle strongly recommends that all Java SE 8 users upgrade to this release. Java SE 8u102 is a patch-set update, including all of 8u101 plus additional features (described in the release notes).
[Learn more](#)

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JDK **DOWNLOAD +**

Server JRE **DOWNLOAD +**

JRE **DOWNLOAD +**

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Java SE Development Kit 8u101

You must accept the [Oracle Binary Code License Agreement for Java SE](#) to download this software.

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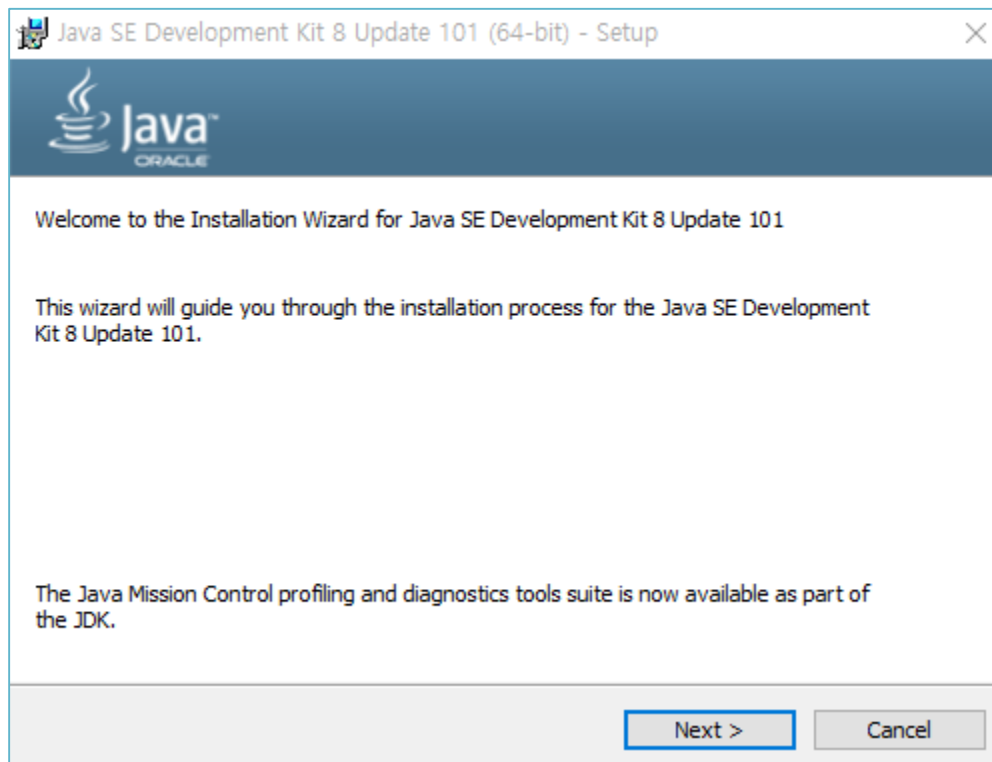
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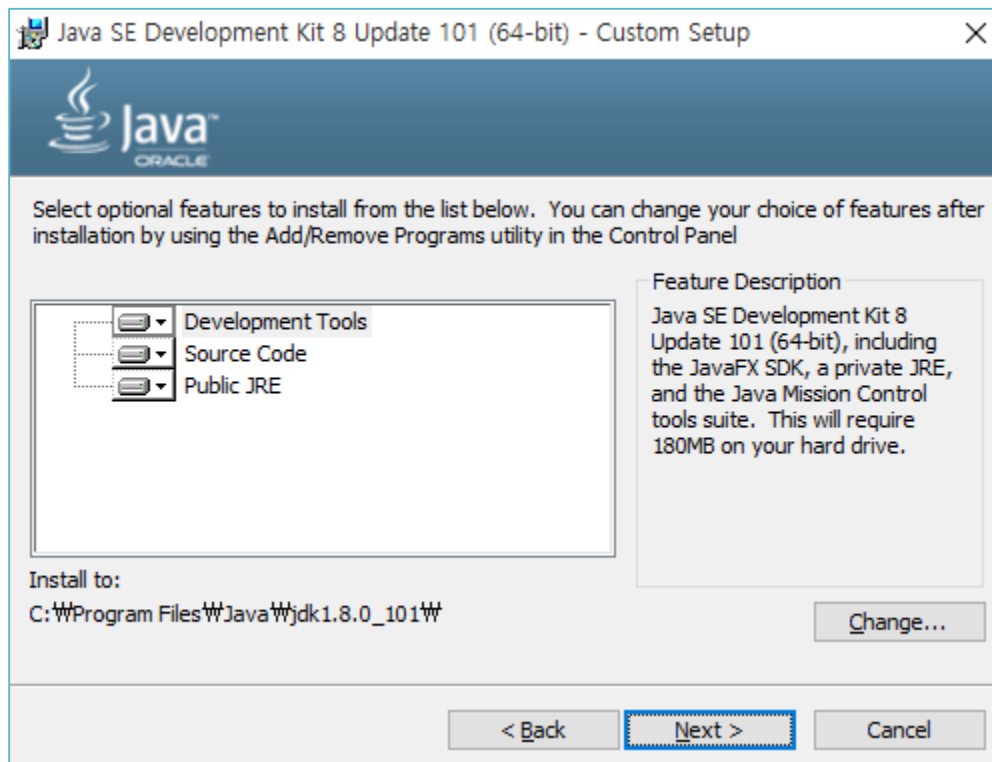
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- 계속 NEXT



JDK 설치

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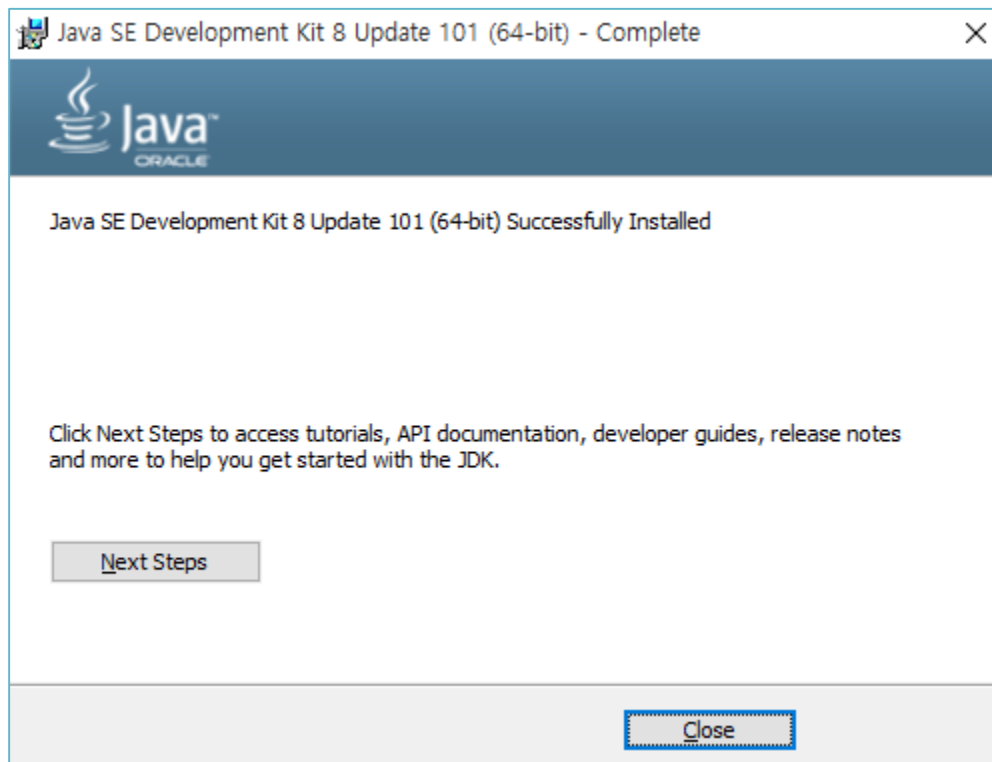


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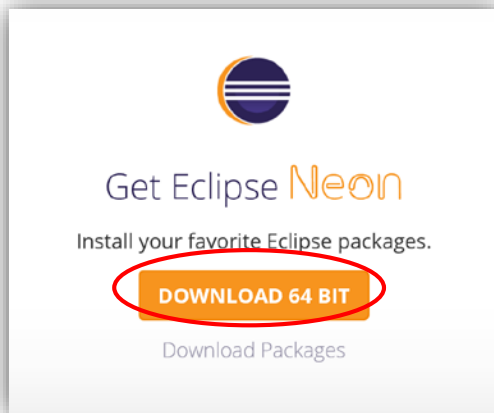
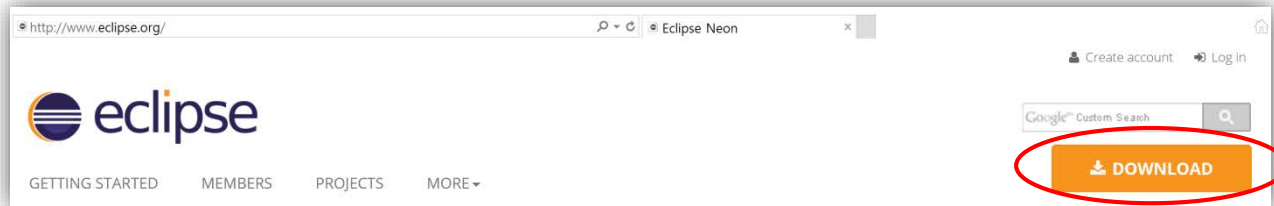
JDK 설치

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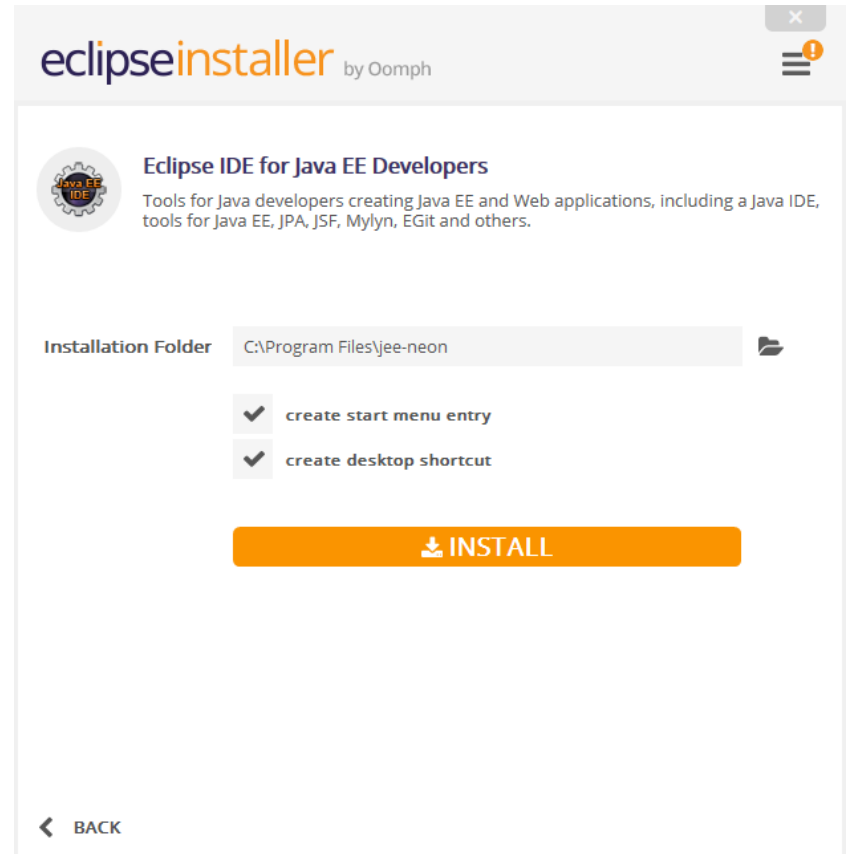
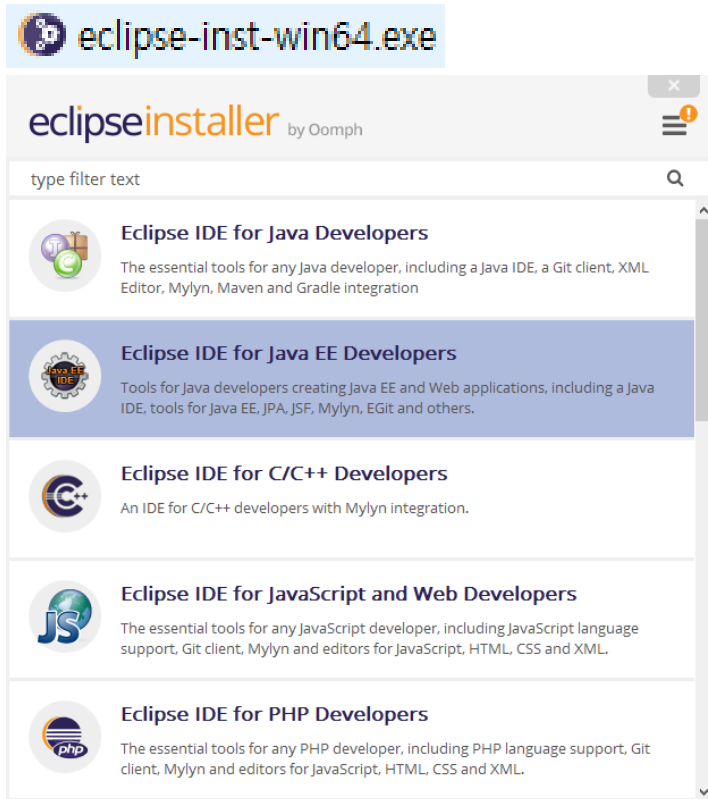
Eclipse 설치

- <http://www.eclipse.org/>
- 다운로드 !



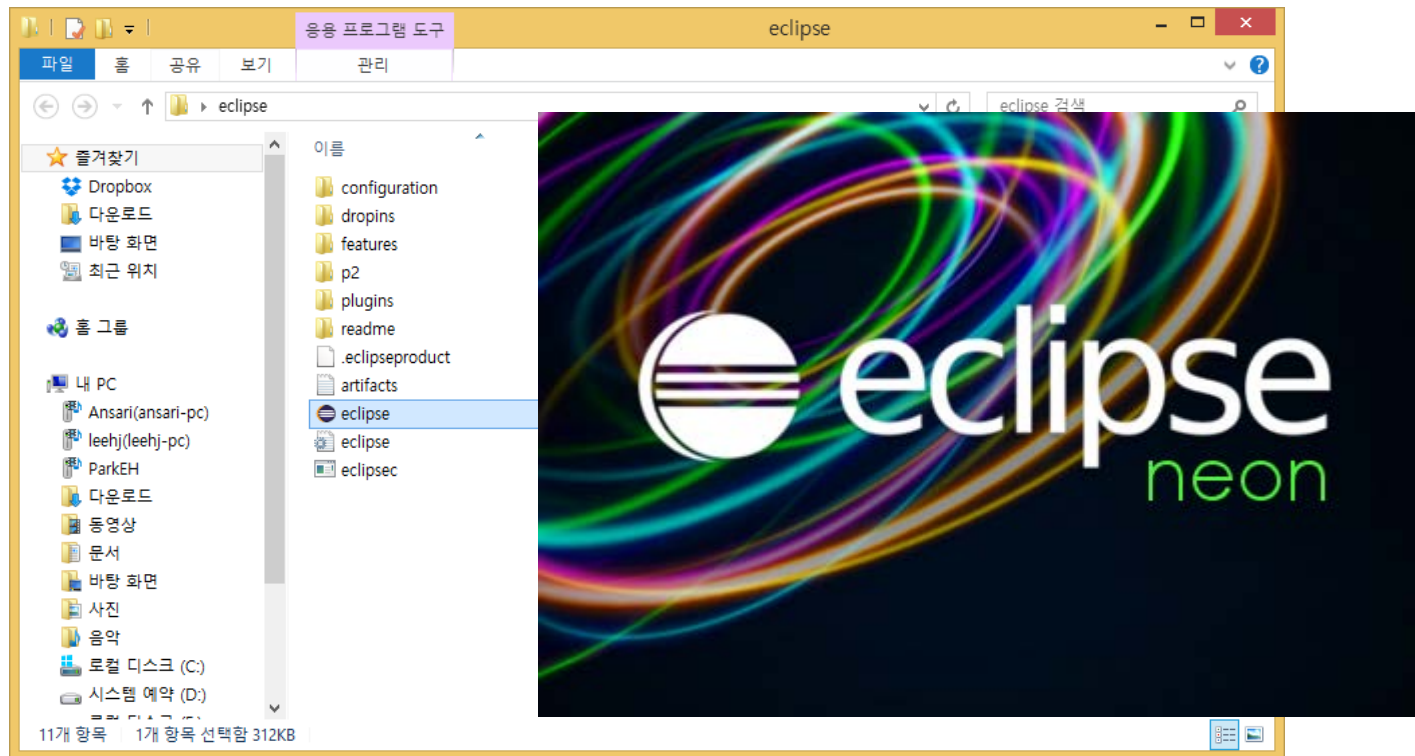
Eclipse 설치

- 설치 !



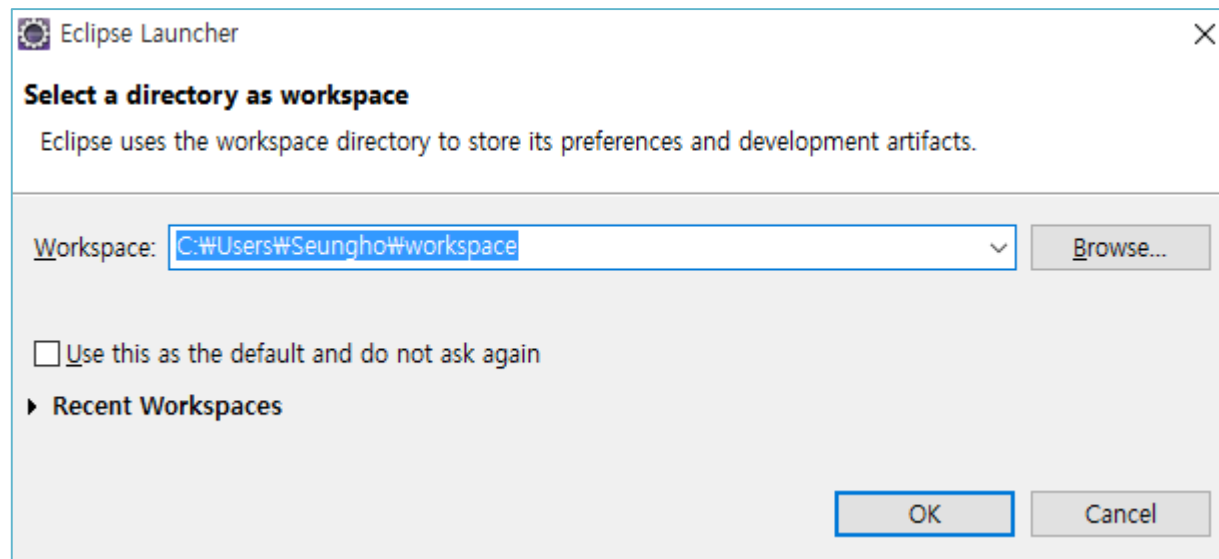
Eclipse 실행

- eclipse 실행

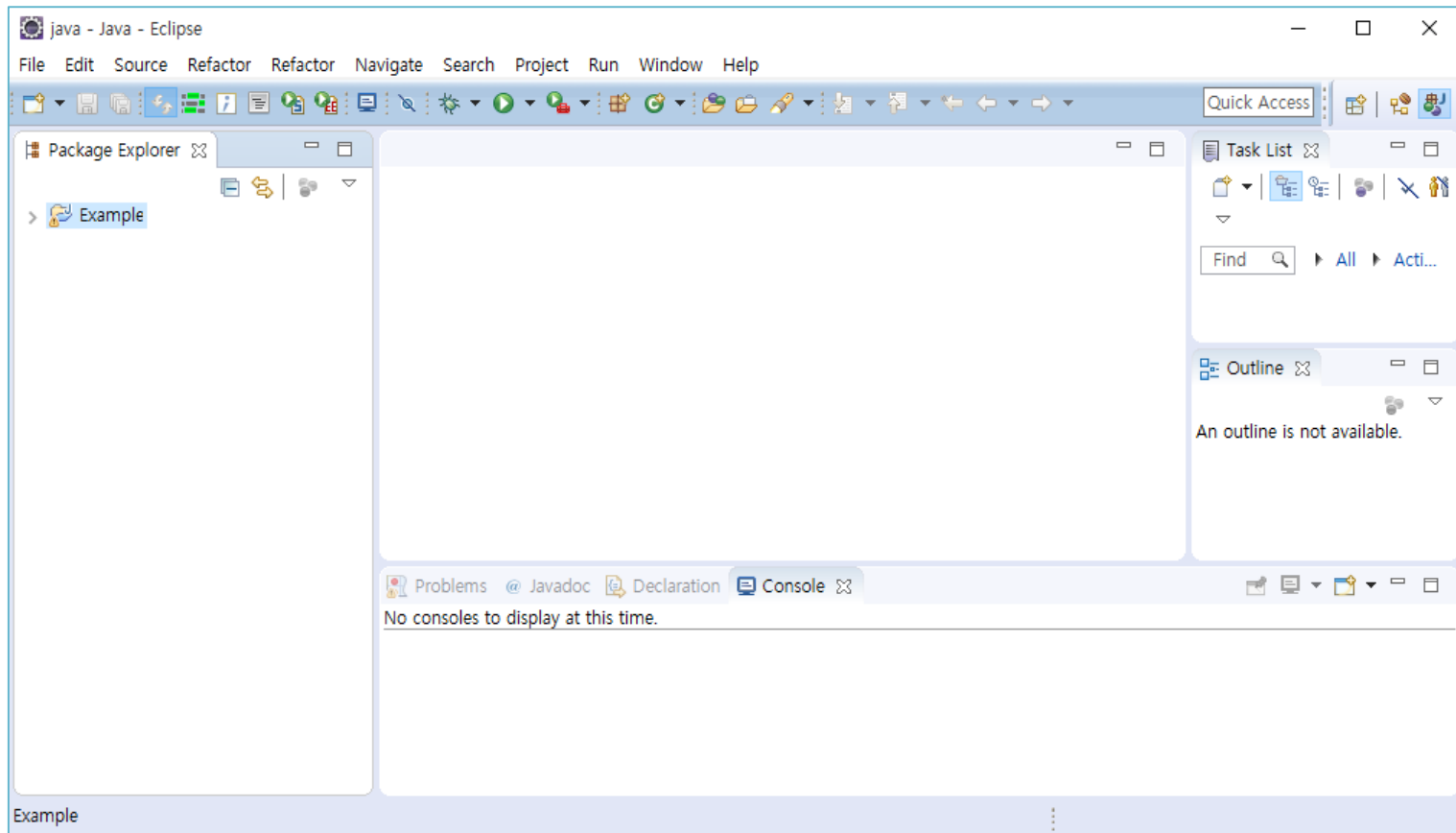


Eclipse 실행

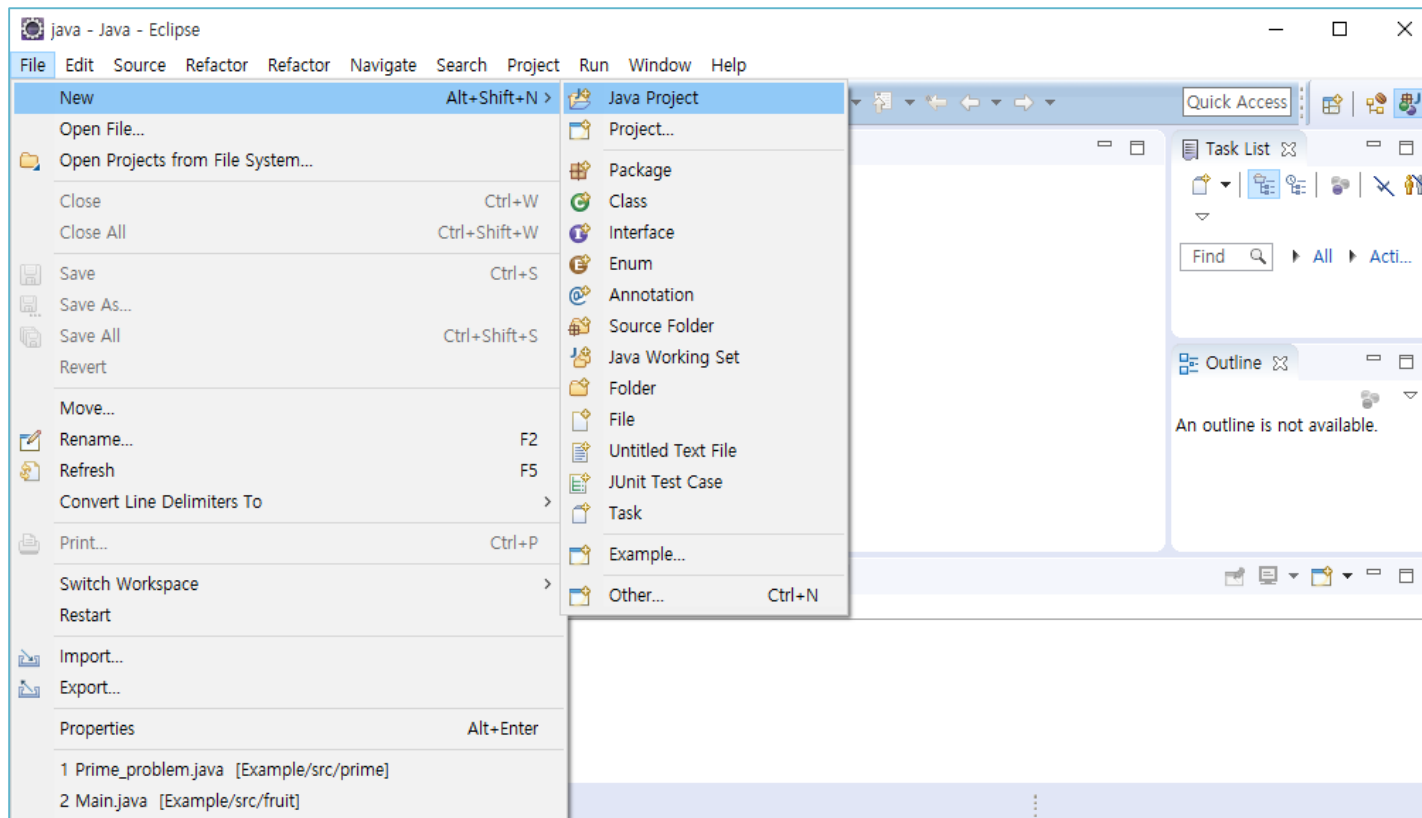
- OK



Eclipse 실행화면



“Hello world!” 실습 (새 프로젝트 생성)



- [File>New>Java Project]를 선택

“Hello world!” 실습 (새 프로젝트 생성)

New Java Project

Create a Java Project

Create a Java project in the workspace or in an external location.

Project name:

☒ Use default location

Location: [Browse...](#)

JRE

☒ Use an execution environment JRE:

☐ Use a project specific JRE:

☐ Use default JRE (currently 'jre1.8.0_101') [Configure JREs...](#)

Project layout

☐ Use project folder as root for sources and class files

☒ Create separate folders for sources and class files [Configure default...](#)

Working sets

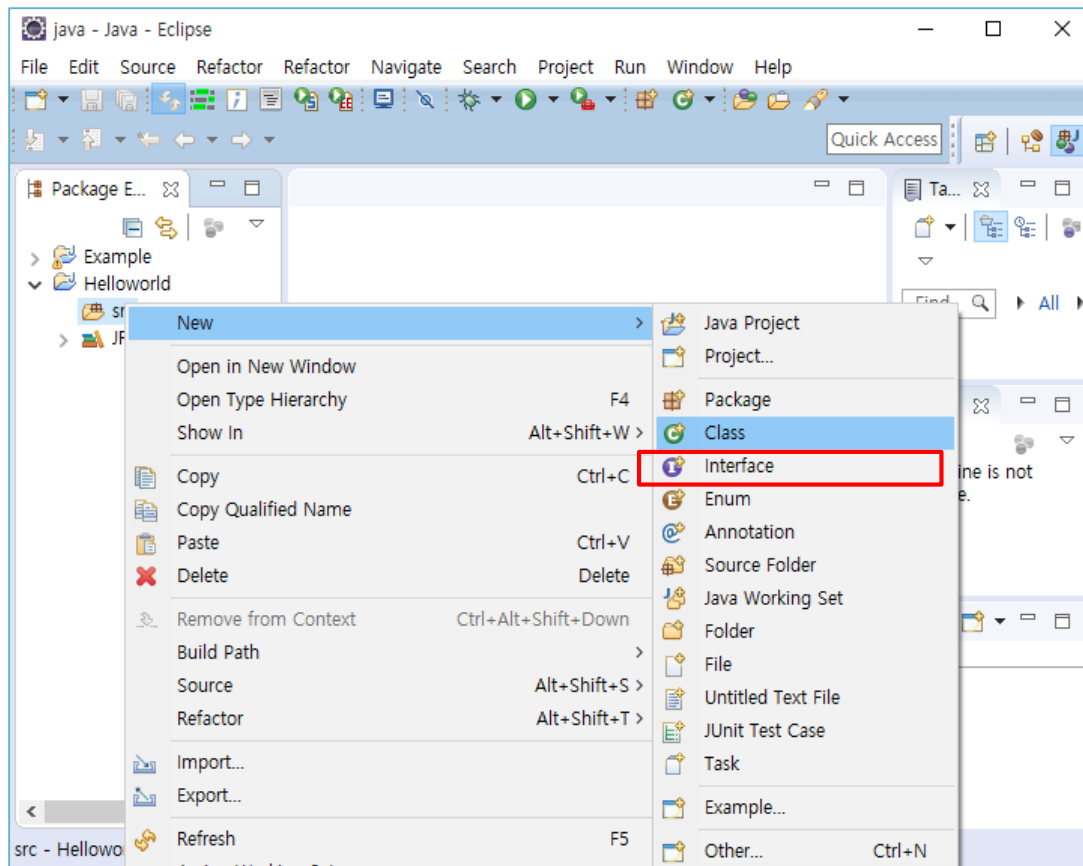
☐ Add project to working sets [New...](#)

Working sets: [Select...](#)

[?](#) [< Back](#) [Next >](#) [Finish](#) [Cancel](#)

- Project name을 입력
- [Finish]버튼을 클릭

“Hello world!” 실습 (새 클래스 생성)



- Package Explorer에서 [Project name>src]를 오른쪽 클릭
- [New>Class]를 클릭

“Hello world!” 실습 (새 클래스 생성)

New Java Class

Java Class

The use of the default package is discouraged.

Source folder:

Package:

☐ Enclosing type:

Name:

Modifiers: ☒ public ☐ package ☐ private ☐ protected
☐ abstract ☐ final ☐ static

Superclass:

Interfaces:

Which method stubs would you like to create?

☒ `public static void main(String[] args)`

☐ Constructors from superclass

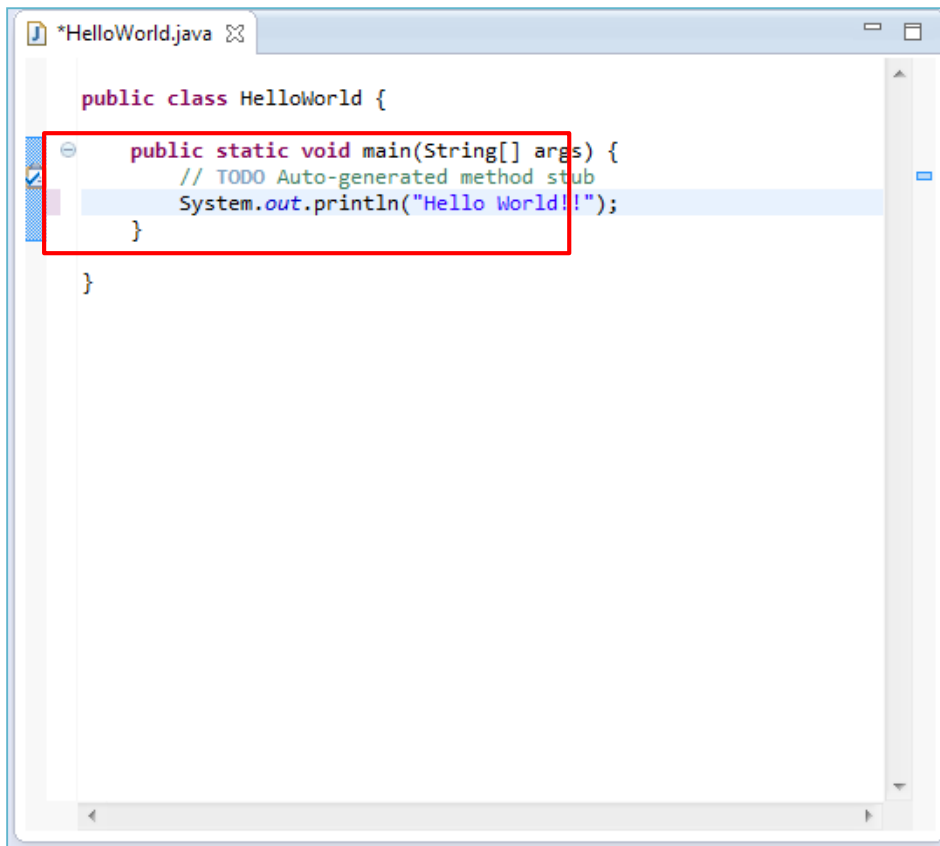
☒ Inherited abstract methods

Do you want to add comments? (Configure templates and default value [here](#))

☐ Generate comments

- Name을 입력
- 기타 필요한 항목을 입력 혹은 체크
- [Finish]를 클릭

“Hello world!” 실습 (소스 코드 입력)



```
*HelloWorld.java

public class HelloWorld {

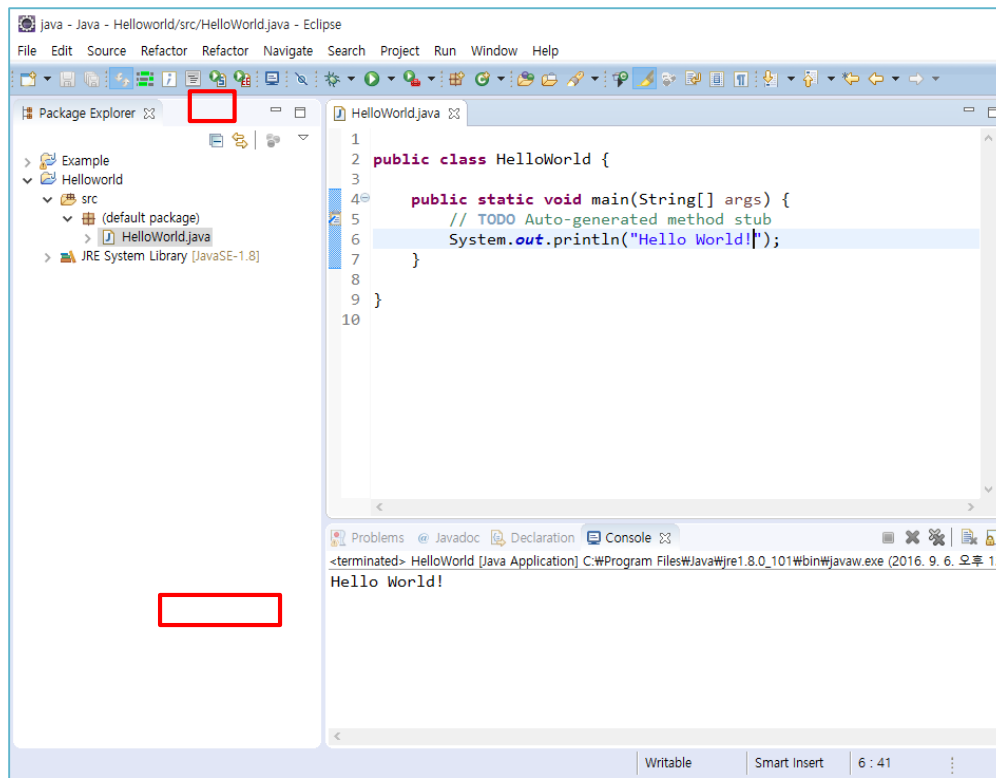
    public static void main(String[] args) {
        // TODO Auto-generated method stub
        System.out.println("Hello World!!");
    }

}
```

왼쪽의 내용을 입력

- ▣ Main함수 안에 “Hello World!!”를 출력함

“Hello world!” 실습 (소스 코드 실행)



- [Run>Run]을 수행
- Console에서 출력된 결과를 확인

수고하셨습니다

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