

# The Modular Book

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## **MANIFEST.MF**

Bundle-Name: The Modular Book

Bundle-SymbolicName: org.greenscape.modularbook

Bundle-Version: 0.0.1

Import-Package: The OSGi Specification

## Copyright

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# Dedication

This book is dedicated to the designer of this Universe and beyond which is the only example of a perfect modular system.

# Preface

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## About the Author

Sheikh Mohammad Sajid is a software consultant guiding small and large companies in implementing modular architecture

# Credits

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## **Chapter 1**

# **Introduction**

## **MANIFEST.MF**

Bundle-Name: Introduction

Bundle-SymbolicName: org.greenscape.modularbook.introduction

Bundle-Version: 0.0.1

## **1.1 Whom This Book Is For**

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## **1.2 What This Book Covers**

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## **1.3 How This Book Is Structured**

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## **1.4 What You Need to Use This Book**

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## **1.5 Conventions**

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## **1.6 Source Code**

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## **1.7 Errata**

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## **Chapter 2**

# **Evolution of Programming Paradigm**

**MANIFEST.MF**

Bundle-Name: Evolution of Programming Paradigm

Bundle-SymbolicName: org.greenscape.modularbook.evolution

Bundle-Version: 0.0.1

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## **2.1 Procedural**

Procedural programming uses procedures or functions to structure code.

## **2.2 Functional**

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## **2.3 Logic**

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## **2.4 Object Oriented**

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## **2.5 Modular**

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## **2.6 Enter OSGi**

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## **Chapter 3**

# **History of OSGi**

**MANIFEST.MF**

Bundle-Name: History of OSGi

Bundle-SymbolicName: org.greenscape.modularbook.history

Bundle-Version: 0.0.1

## **Chapter 4**

# **The OSGi Proposition**

**MANIFEST.MF**

Bundle-Name: The OSGi Proposition

Bundle-SymbolicName: org.greenscape.modularbook.proposition

Bundle-Version: 0.0.1

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## **Chapter 5**

# **Overview of OSGi**

**MANIFEST.MF**

Bundle-Name: Overview of OSGi

Bundle-SymbolicName: org.greenscape.modularbook.overview

Bundle-Version: 0.0.1

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## **Chapter 6**

# **Setting up the environment**

**MANIFEST.MF**

Bundle-Name: Setting up the environment

Bundle-SymbolicName: org.greenscape.modularbook.settingup

Bundle-Version: 0.0.1



In this chapter, we will cover the installation of different OSGi frameworks and quickly cover its contents. Then we'll give it a try to make sure it's well installed.

## 6.1 Runtime environment

Since OSGi is based on Java, we will need a Java Runtime Environment (JRE) to run any of the available implementations. Since we will be developing applications as well, it is better to install the Java Development Kit (JDK). We will be using the Oracle JDK available from Oracle for all of our development needs. For downloading and installing a copy of the Oracle JDK, visit: <http://www.oracle.com/technetwork/java/javase/downloads/index.html>.

### 6.1.1 Using Apache Felix

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### 6.1.2 Using Eclipse Equinox

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### 6.1.3 Using Knoplerfish

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## 6.2 Development environment

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### 6.2.1 Eclipse PDE

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### 6.2.2 Bnd Tools

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### 6.2.3 Netbeans

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### 6.2.4 Maven integration

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## **Chapter 7**

# **Getting Started**

**MANIFEST.MF**

Bundle-Name: Getting Started

Bundle-SymbolicName: org.greenscape.modularbook.gettingstarted

Bundle-Version: 0.0.1

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## 7.1 Hello OSGi!

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## **Chapter 8**

# **Services, services**

**MANIFEST.MF**

Bundle-Name: Services, services

Bundle-SymbolicName: org.greenscape.modularbook.services

Bundle-Version: 0.0.1

## 8.1 OSGi Services

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## Chapter 9

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