1. Record Nr. UNINA9911008927003321 Autore Barbini Uberto Titolo From objects to functions: build your software faaster and safer with functional programming and kotlin / / Uberto Barbini [Raleigh, North Carolina]:,: The Pragmatic Programmers, LLC,, [2023] Pubbl/distr/stampa ©2023 **ISBN** 9798888650462 9798888650479 Edizione [First edition.] Descrizione fisica 1 online resource (473 pages) 005.1 Disciplina Soggetti Application software - Development Lingua di pubblicazione Inglese **Formato** Materiale a stampa Livello bibliografico Monografia Nota di bibliografia Includes bibliographical references. Cover -- Table of Contents -- Acknowledgments -- Preface -- About Nota di contenuto This Book -- Introduction: Why Functional Programming? -- Why Kotlin? -- What Functional Programming Is Really About -- Unlearning Object-Oriented Programming -- Recap -- 1. Preparing a New Application -- Defining the Sample Application -- Zettai: An Innovative To-Do List Application -- Letting Tests Guide Development -- Setting Up the Project -- Making Unit Tests Functional -- Recap -- Exercises -- 2. Handling HTTP Using Functions -- Kicking Off the Project --Serving HTML Pages Functionally -- Starting Zettai -- Designing with Arrows -- Serving Lists from a Map -- Recap -- Exercises -- 3. Defining the Domain and Testing It -- Improving the Acceptance Tests -- Using Higher-Order Functions -- Separating the Domain from the Infrastructure -- Driving the Tests from the Domain -- Converting DDT to Pesticide -- Recap -- Exercises -- 4. Modeling the Domain and the Adapters -- Starting a New Story to Modify a List -- Using Functional Dependency Injection -- Debugging Functional Code -- Functional Domain Modeling -- Recap -- Exercises -- 5. Using Events to Modify the State -- Creating and Displaying To-Do Lists -- Storing the State

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Sommario/riassunto

From Objects to Functions by Uberto Barbini is a comprehensive guide to functional programming, particularly using Kotlin. The book explores the integration of functional programming concepts into real-world applications, emphasizing the benefits of functional patterns such as referential transparency, immutability, and reusability. It provides insights into practical application development, utilizing technologies like http4k and PostgreSQL, and covers topics like functional state machines, error handling, and domain modeling. The author aims to bridge the gap between objects and functions, offering a detailed study for developers interested in enhancing their programming practices. The book is targeted at software developers seeking to expand their understanding of functional programming and its application in modern software development.