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Autore	Seyedzadeh Saleh
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Nota di contenuto	Introduction -- Building Energy Performance Assessment -- Machine Learning for Building Energy Forecasting -- Building Retrofit Planning -- Machine Learning Models for Prediction of Building Energy Performance -- Building Energy Data Driven Model Improved by Multi-Objective Optimisation -- Modelling Energy Performance of Non-Domestic Buildings.
Sommario/riassunto	This book outlines the data-driven modelling of building energy performance to support retrofit decision-making. It explains how to determine the appropriate machine learning (ML) model, explores the selection and expansion of a reasonable dataset and discusses the extraction of relevant features and maximisation of model accuracy. This book develops a framework for the quick selection of a ML model based on the data and application. It also proposes a method for optimising ML models for forecasting buildings energy loads by employing multi-objective optimisation with evolutionary algorithms. The book then develops an energy performance prediction model for non-domestic buildings using ML techniques, as well as utilising a case study to lay out the process of model development. Finally, the book outlines a framework to choose suitable artificial intelligence methods for modelling building energy performances. This book is of use to both academics and practising energy engineers, as it provides

theoretical and practical advice relating to data-driven modelling for energy retrofitting of non-domestic buildings.