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Titolo	Formal methods in architecture : proceedings of the 5th International Symposium on Formal Methods in Architecture (5FMA), Lisbon 2020 // Sara Eloy [and three others], editors
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Descrizione fisica	1 online resource (XXXII, 313 p. 193 illus., 159 illus. in color.)
Collana	Advances in science, technology & innovation
Disciplina	720.285
Soggetti	Architecture - Data processing City planning - Data processing Regional planning - Data processing Formal methods (Computer science)
Lingua di pubblicazione	Inglese
Formato	Materiale a stampa
Livello bibliografico	Monografia
Nota di bibliografia	Includes bibliographical references.
Nota di contenuto	The Ethics of our Work -- From Datascape to Formal Methods -- Variational Beauty of Space. Machine Intuition and Urban Networks -- Global and Disciplinary Frameworks for Formal Methods in Architecture -- Mathematically Developing Building Facades: an Algorithmic Framework -- Design to Experiment - Experiment to Design: Tool (User, Breaker, Designer) -- Tectonics of Differential Growth. Folds in Additive Fabrication and Moulding for Architectural Design -- BIM Based Airport Design Project Standardization (IFC) for Use of Code Checking -- Agent-based Semiology: Optimizing Office Occupation Patterns with Agent-based Simulations -- Digital Doxiadis: Parametric Thinking for Human Settlements -- L'Objet Invalide.
Sommario/riassunto	This edited book gathers research studies presented at the 5th International Symposium on Formal Methods in Architecture (5FMA), Lisbon 2020. Studies focus on the use of methodologies, especially those that have witnessed recent developments, that stem from the mathematical and computer sciences and are developed in a collaborative way with architecture and related fields. This book constitutes a contribution to the debate and to the introduction of new

methodologies and tools in the mentioned fields that derive from the application of formal methods in the creation of new explicit languages for problem-solving in architecture and urbanism. It adds valuable insight into the development of new practices solving identified societal problems and promoting the digital transformation of institutions in the mentioned fields. The primary audience of this book will be from the fields of architecture, urban planning, civil engineering, AEC, landscape design, computer sciences and mathematics, both academicians and professionals.

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