Record Nr. UNISA996465840003316 Mathematics of Program Construction [[electronic resource]]: 9th **Titolo** International Conference, MPC 2008 Marseille, France, July 15-18, 2008 Proceedings / / edited by Philippe Audebaud, Christine Paulin-Mohring Berlin, Heidelberg:,: Springer Berlin Heidelberg:,: Imprint: Springer, Pubbl/distr/stampa 2008 **ISBN** 3-540-70594-5 Edizione [1st ed. 2008.] 1 online resource (X, 423 p.) Descrizione fisica Theoretical Computer Science and General Issues, , 2512-2029 ; ; 5133 Collana 005.11 Disciplina Soggetti Computer programming Software engineering Compilers (Computer programs) Computer science Machine theory **Programming Techniques** Software Engineering Compilers and Interpreters Computer Science Logic and Foundations of Programming Formal Languages and Automata Theory Lingua di pubblicazione Inglese **Formato** Materiale a stampa Livello bibliografico Monografia Note generali Bibliographic Level Mode of Issuance: Monograph Nota di bibliografia Includes bibliographical references and index. Exploiting Unique Fixed Points -- Scrap Your Type Applications --Nota di contenuto Programming with Effects in Cog -- Verifying a Semantic ??-Conversion Test for Martin-Löf Type Theory -- The Capacity-C Torch Problem --Recounting the Rationals: Twice! -- Zippy Tabulations of Recursive Functions -- Unfolding Abstract Datatypes -- Circulations, Fuzzy Relations and Semirings -- Asynchronous Exceptions as an Effect --The Böhm–Jacopini Theorem Is False, Propositionally -- The Expression Lemma -- Nested Datatypes with Generalized Mendler Iteration: Map Fusion and the Example of the Representation of Untyped Lambda Calculus with Explicit Flattening -- Probabilistic Choice in Refinement Algebra -- Algebra of Programming Using Dependent Types -- Safe

Modification of Pointer Programs in Refinement Calculus -- A Hoare

Logic for Call-by-Value Functional Programs -- Synthesis of Optimal Control Policies for Some Infinite-State Transition Systems -- Modal Semirings Revisited -- Asymptotic Improvement of Computations over Free Monads -- Symmetric and Synchronous Communication in Peerto-Peer Networks.

Sommario/riassunto

This book constitutes the refereed proceedings of the 9th International Conference on Mathematics of Program Construction, MPC 2008, held in Marseille, France in July 2008. The 18 revised full papers presented together with 1 invited talk were carefully reviewed and selected from 41 submissions. Issues addressed range from algorithmics to support for program construction in programming languages and systems. Topics of special interest are type systems, program analysis and transformation, programming language semantics, program logics.