

1. Record Nr.	UNINA9911034860603321
Autore	Khan M. Ali
Titolo	Matching, Dynamics and Games for the Allocation of Resources : Essays in Celebration of David Gale's 100th Birthday / / edited by M. Ali Khan, Nobusumi Sagara, Alexander J. Zaslavski
Pubbl/distr/stampa	Singapore : , : Springer Nature Singapore : , : Imprint : Springer, , 2025
ISBN	981-9666-61-9 9789819666614
Edizione	[1st ed. 2025.]
Descrizione fisica	1 online resource (763 pages)
Collana	Monographs in Mathematical Economics, , 2364-8287 ; ; 7
Altri autori (Persone)	SagaraNobusumi ZaslavskiAlexander J
Disciplina	519
Soggetti	Social sciences - Mathematics Mathematics in Business, Economics and Finance Ciències socials Matemàtica Llibres electrònics
Lingua di pubblicazione	Inglese
Formato	Materiale a stampa
Livello bibliografico	Monografia
Nota di contenuto	On Gale's Contribution in Revealed Preference Theory -- Finding Nonlinear Production - Consumption Equilibrium -- Systemic Risk in Financial Systems: Properties of Equilibria -- The Coalitional TU Extensions of Gale-Mas-Colell Economy -- Simple visibility design in network games -- Repeated Games with Tail-Measurable Payoffs -- Calibrated Forecasts: The Minimax Proof -- Getting Permission when Options are Partially Ordered -- Existence of Haar measures: A note on Rudin's fixed-point approach -- Infinite-horizon single-objective and multiobjective optimal control problems in the continuous time framework -- Optimal Growth in a Miniature Two-Sector Model with and without Discounting: A Synthesis -- Production functions with continuum of vintage inputs -- Two country model of trade with international borrowing and lending -- David Gale: Duality and Turnpikes -- Stochastic Dynamical Framework for Risk Managements of SMEs' Growth: Model, Approach and Quantitative Analysis -- Two turnpike results for a generalized von Neumann-Gale model -- Stability

and Weak Setwise Stability in Many-to-Many Matching with Contracts
-- A Deferred Acceptance Algorithm for Large Marriage Markets --
Gale-Shapley algorithm revisited: semistability -- Applying the New
Concept of Variances with Uncertainty to Cover the Worst Markets.

Sommario/riassunto

This research book, dedicated to Professor David Gale on his 100th birthday, compiles significant new findings by renowned experts in mathematical economics related to Gale's work. The book is divided into three parts labelled as: "Economies and Games," "Economic Dynamics and Growth," and "Matching, Contracts, and Finance." These parts are introduced by the two surviving editors in an exploratory attempt to answer the question "Who is David Gale?" The first part contains 9 chapters covering topics such as visibility design in network games, repeated games with tail-measurable payoffs, the existence of calibrated forecasts via the minimax theorem, revealed preference theory, the problem of obtaining permission when options partially ordered, an alternative proof for the existence of Haar measures on locally compact topological groups, equilibria of nonlinear production-consumption models, systemic risk in financial networks, and coalitional transferable utility extensions of the Gale-Mas-Colell economy. The second part contains 7 chapters discussing topics like a generalization of the Pontryagin maximum principle in infinite horizon models, the Robinson-Shinkai-Leontief optimal growth model, dynamic CES production functions with a continuum of vintages of capital inputs across varying substitution elasticities, a two-country dynamic model, static and dynamic equilibrium in the Walrasian tradition, duality theorems in linear programming, and the turnpike phenomenon in the generalized von Neumann-Gale model. The third part comprises 4 chapters exploring the relationship between stable and weakly setwise stable outcomes in many-to-many matching with contracts, a version of Gale and Shapley's marriage market with a continuum of agents, the existence of stable contract systems between two complementary groups (e.g., workers and firms), and the general notions of upper and lower variances, initially introduced by Peter Walley for bounded random variables.
