

1. Record Nr.	UNINA9910484524103321
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Titolo	Distributed cooperative control and communication for multi-agent systems // Dong Yue, Huaipin Zhang, Shenxuan Weng
Pubbl/distr/stampa	Gateway East, Singapore : , : Springer, , [2021] Â©2021
ISBN	981-336-718-0
Edizione	[1st ed. 2021.]
Descrizione fisica	1 online resource (XI, 196 p. 60 illus., 50 illus. in color.)
Disciplina	629.8
Soggetti	Automatic control
Lingua di pubblicazione	Inglese
Formato	Materiale a stampa
Livello bibliografico	Monografia
Nota di contenuto	Overview of multi-agent systems cooperation -- Distributed Adaptive Model-Based Event-Triggered Predictive Control for Consensus of MASs -- Event-Triggered Tracking Control For Heterogeneous MASs With Markov Communication Delays -- Time-varying Formation Tracking of Uncertain Non-affine Nonlinear MASs with Communication Delays -- Consensus of Nonlinear MASs with Relative State Saturations -- Distributed event-triggered cooperative attitude control of multiple groups of rigid bodies on manifold SO(3) -- Distributed robust finite-time attitude containment control for multiple rigid bodies with uncertainties -- Data-driven Distributed Optimal Consensus Control for Unknown MASs with Input-delay -- Data-driven optimal event-triggered consensus control for unknown nonlinear MASs with control constraints.
Sommario/riassunto	This book investigates distributed cooperative control and communication of MASs including linear systems, nonlinear systems and multiple rigid body systems. The model-based and data-driven control method are employed to design the (optimal) cooperative control protocol. The approaches of this book consist of model-based and data-driven control such as predictive control, event-triggered control, optimal control, adaptive dynamic programming, etc. From this book, readers can learn about distributed cooperative control methods, data-driven control, finite-time stability analysis, cooperative attitude control of multiple rigid bodies. Some fundamental knowledge

prepared to read this book is finite-time stability theory, event-triggered sampling mechanism, adaptive dynamic programming and optimal control. .
