Record Nr. UNINA9910349294003321 Social Robots: Technological, Societal and Ethical Aspects of Human-Titolo Robot Interaction / / edited by Oliver Korn Pubbl/distr/stampa Cham:,: Springer International Publishing:,: Imprint: Springer,, 2019 **ISBN** 3-030-17107-8 Edizione [1st ed. 2019.] 1 online resource (XIII, 288 p. 73 illus., 57 illus. in color.) Descrizione fisica Human-Computer Interaction Series, , 1571-5035 Collana 005.437 Disciplina 4.019 User interfaces (Computer systems) Soggetti Robotics Application software User Interfaces and Human Computer Interaction Computer Appl. in Social and Behavioral Sciences Lingua di pubblicazione Inglese **Formato** Materiale a stampa Livello bibliografico Monografia A Short History of the Perception of Robots and Automata from Nota di contenuto Antiquity to Modern Times -- Designing Social Robots at Scales Beyond the Humanoid -- A Study on Robot-Initiated Interaction: Toward Virtual Social Behavior -- The Role of Gesture in Social Telepresence Robots --A Scenario of Distant Collaborative Problem-Solving -- Unobtrusive Vital Data Recognition by Robots to Enhance Natural Human-Robot Communication -- Interacting With Collaborative Robots - A Study on Attitudes and Acceptance in Industrial Contexts -- A Social Robot in a

Shopping Mall: Studies on Acceptance and Stakeholder Expectations -- Multi-party Interaction in Public Spaces: Cross-cultural Variations in Parental and Nonparental Response to Robots' Adaptive Strategies -- Cross-Collaborative Approach to Socially-Assistive Robotics: A Case Study of Humanoid Robots in a Therapeutic Intervention for Autistic Children -- Social Robots and Human Touch in Care: The Perceived Usefulness of Robot Assistance among Healthcare Professionals -- Attitudes of Professionals toward the Need for Assistive and Social Robots in the Healthcare Sector -- Evaluating the Sense of Safety and

## Sommario/riassunto

Security in Human-Robot Interaction with Older People -- AMIGO - A Socially Assistive Robot for Coaching Multimodal Training of Persons with Dementia.

Social robots not only work with humans in collaborative workspaces we meet them in shopping malls and even more personal settings like health and care. Does this imply they should become more human, able to interpret and adequately respond to human emotions? Do we want them to help elderly persons? Do we want them to support us when we are old ourselves? Do we want them to just clean and keep things orderly - or would we accept them helping us to go to the toilet, or even feed us if we suffer from Parkinson's disease? The answers to these questions differ from person to person. They depend on cultural background, personal experiences – but probably most of all on the robot in question. This book covers the phenomenon of social robots from the historic roots to today's best practices and future perspectives. To achieve this, we used a hands-on, interdisciplinary approach, incorporating findings from computer scientists, engineers, designers, psychologists, doctors, nurses, historians and many more. The book also covers a vast spectrum of applications, from collaborative industrial work over education to sales. Especially for developments with a high societal impact like robots in health and care settings, the authors discuss not only technology, design and usage but also ethical aspects. Thus this book creates both a compendium and a guideline, helping to navigate the design space for future developments in social robotics.