Record Nr. UNINA9910460336103321 Human attention in digital environments / / edited by Claudia Roda **Titolo** [[electronic resource]] Pubbl/distr/stampa Cambridge:,: Cambridge University Press,, 2011 **ISBN** 0-511-99428-1 1-107-21744-X 1-282-96716-9 9786612967160 0-511-99206-8 0-511-99107-X 0-511-99309-9 0-511-98927-X 0-511-97451-5 0-511-98749-8 Descrizione fisica 1 online resource (xx, 323 pages) : digital, PDF file(s) Disciplina 004.01/9 Soggetti Human-computer interaction Attention Lingua di pubblicazione Inglese **Formato** Materiale a stampa Livello bibliografico Monografia Note generali Title from publisher's bibliographic system (viewed on 14 Jan 2016). Includes bibliographical references and index. Nota di bibliografia Nota di contenuto 1. Introduction Claudia Roda; Part I. Concepts: 2. Human attention and its implications for HCI Claudia Roda; 3. The management of visual attention in graphic displays Ronald A. Rensink; 4. Cognitive load theory, attentional processes and optimized learning outcomes in a digital environment Renae Low, Putai Jin and John Sweller; 5. Salience sensitive control, temporal attention and stimulus-rich reactive interfaces Howard Bowman, Li Su, Brad Wyble and Phil J. Barnard; Part II. Theoretical and Software Tools: 6. Attention-aware intelligent embodied agents Benoit Morel and Laurent Ach; 7. Tracking of visual attention and adaptive applications Kari-Jouko Ra;iha;, Aulikki Hyrskykari and Pa;ivi Majaranta; 8. Contextualised attention metadata Hans-Christian Schmitz, Martin Wolpers, Uwe Kirschenmann and Katja

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Sommario/riassunto

Digital systems, such as phones, computers and PDAs, place continuous demands on our cognitive and perceptual systems. They offer information and interaction opportunities well above our processing abilities, and often interrupt our activity. Appropriate allocation of attention is one of the key factors determining the success of creative activities, learning, collaboration, and many other human pursuits. This book presents research related to human attention in digital environments. Original contributions by leading researchers cover the conceptual framework of research aimed at modelling and supporting human attentional processes, the theoretical and software tools currently available, and various application areas. The authors explore the idea that attention has a key role to play in the design of future technology and discuss how such technology may continue supporting human activity in environments where multiple devices compete for people's limited cognitive resources.