Record Nr. UNINA9910163148303321 Advances in Ergonomic Design of Systems, Products and Processes: **Titolo** Proceedings of the Annual Meeting of GfA 2016 / / edited by Christopher Marc Schlick, Sönke Duckwitz, Frank Flemisch, Martin Frenz, Sinem Kuz, Alexander Mertens, Susanne Mütze-Niewöhner Pubbl/distr/stampa Berlin, Heidelberg:,: Springer Berlin Heidelberg:,: Imprint: Springer, 2017 **ISBN** 3-662-53305-7 Edizione [1st ed. 2017.] 1 online resource (IX, 366 p. 120 illus., 87 illus. in color.) Descrizione fisica Disciplina 670 Soggetti Industrial engineering Production engineering Personnel management Economic sociology Industrial psychology Industrial and Production Engineering **Human Resource Management** Organizational Studies, Economic Sociology Industrial and Organizational Psychology Lingua di pubblicazione Inglese **Formato** Materiale a stampa Livello bibliografico Monografia Nota di bibliografia Includes bibliographical references. Nota di contenuto Best-practice approach for a solution-oriented technology assessment -- Human-oriented productivity management as a key criterion for success in the digitalised working world -- Resource Constrained Projekt Scheduling Problem -- Fields of Action for Work Design in Industrie 4.0 -- Skilled Workers - are they Losers of "Industry 4.0"? --Work Requirements and Qualifications in Maintenance 4.0 --Development of a Business Game for Teaching the Kanban Method --Training interventions to increase innovations in age-diverse teams --Change into an Ergonomic 3 Shift Model with a Reduction of the Night Shifts for all Workers -- Vocational Competency Management through the use of Serious Games -- Retirement research requires a broad view and interdisciplinarity -- Age-differentiated Analysis of the Influence of

Task Descriptions on Learning Sensorimotor Tasks -- The potential of virtual interactive learning environments for individual and organizational learning -- Designing Rooms for Virtual, Informal Communication -- Analysis of the stress and strain of repetitive assembly tasks -- Analysis and evaluation of physical workload during long-cyclic tasks as a prerequisite for ergonomic work design --Walking "normally" vs. "sideways" in simulated, simple assembly operations -- 1 Analysis of a multimodal human-robot-interface in terms of mental workload -- How to evaluate the usability of smart devices as conceivable work assistance -- An age-differentiated perspective on visualizations of personal health data -- How the Duration of Automated Driving Influences -- Take-Over Performance and Gaze Behavior -- Uncanny and unsafe valley of assistance and automation -- Man-Robot Collaboration in the context of Industry 4.0 -- Joint angle depending representation of maximum forces in digital human models.

Sommario/riassunto

These proceedings summarize the best papers in each research area represented at the 2016 Annual Meeting of the German Human Factors and Ergonomics Society, held at Institute of Industrial Engineering and Ergonomics of RWTH Aachen University from March 2-4. The meeting featured more than 200 presentations and 36 posters reflecting the diversity of subject matter in the field of human and industrial engineering. This volume addresses human factors and safety specialists, industrial engineers, work and organizational psychologists, occupational medicines as well as production planners and design engineers.