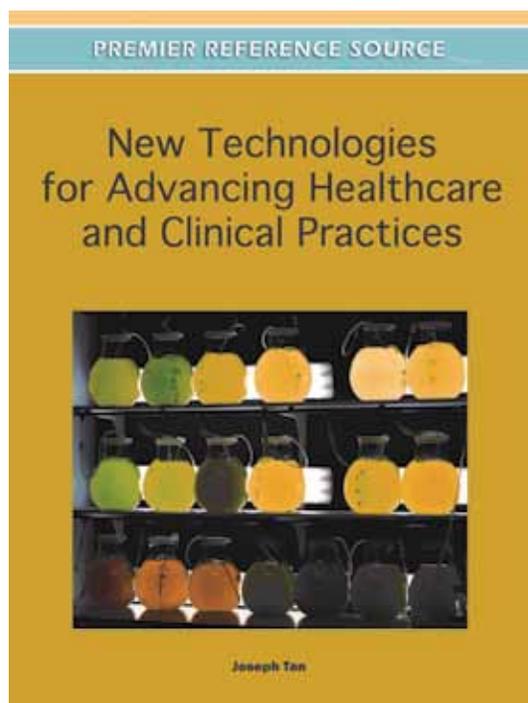


An Excellent Addition to Your Library!

Released: June 2011

New Technologies for Advancing Healthcare and Clinical Practices



Joseph Tan (McMaster University, Canada)

As technology becomes further engrained in the modern healthcare experience, an understanding of the impact created by the implementation of each new technology as well as the issues surrounding the today's medical experience is never more necessary.

New Technologies for Advancing Healthcare and Clinical Practices chronicles the latest developments that are forming the future of medicine. This book introduces and explores the current technological innovations and applications of information systems and informatics in the healthcare industry while directing frameworks for advancing healthcare and clinical practices and research. Practitioners, educators, and researchers will find an international collection of case studies, surveys, and empirical research using qualitative approaches.

Topics Covered:

- Alerts in Healthcare Applications
- Clinical Decision Support Systems
- Content-Based Image Retrieval
- EMR Functions and Physician Characteristics
- Evidence-Based Medical Guidelines
- Internet as a Source of Health Information
- IT Adoption and Evaluation in Healthcare
- Open Source Health Information Technology Projects
- Stakeholder Analysis in Healthcare Information Systems
- Telemedicine Services

ISBN: 9781609607807; © 2011; 472 pp.

Print: US \$265.00 | Perpetual: US \$400.00 | Print + Perpetual: US \$530.00

Market: This premier publication is essential for all academic and research library reference collections. It is a crucial tool for academicians, researchers, and practitioners and is ideal for classroom use.

Joseph Tan (Dip, BA, MS, PhD) holds a professional diploma in civil engineering from Singapore Polytechnic, an undergraduate degree in mathematics and computer science from Wartburg College, a master's degree in industrial & management engineering from the University of Iowa, and a PhD in management information systems from the University of British Columbia (UBC). He has been a tenured associate professor teaching in the Department of Healthcare & Epidemiology at UBC for many years prior to serving as a professor and Head of Information System and Manufacturing (ISM) Department at the School of Business at Wayne State University. Joseph has published research in computing, ergonomics, information systems, health informatics, health education, e-health, and e-business journals and has served as guest editor and member of various journal editorial boards. He sits on key organizing committees for local, national, and international meetings and conferences. Professor Tan's research, which has enjoyed significant support in the last several years from local, national and international funding agencies and other sources, has also been widely cited and applied across a number of major disciplines, including healthcare informatics and clinical decision support, health technology management research, human processing of graphical representations, ergonomics, health administration education, telehealth, mobile health, and e-health promotion programming.



www.igi-global.com

Publishing Academic Excellence
at the Pace of Technology Since 1988

- Chapter 1**
Content-Based Image Retrieval for Advancing Medical Diagnostics, Treatment and Education
Long L. Rodney (National Library of Medicine (NIH), USA)
Antani Sameer (National Library of Medicine (NIH), USA)
Thoma George R. (National Library of Medicine (NIH), USA)
Deserno Thomas M. (RWTH Aachen University, Germany)
- Chapter 2**
Evaluation Challenges for Computer-Aided Diagnostic Characterization:
Horsthemke William H. (DePaul University, USA)
Raicu Daniela S. (DePaul University, USA)
Furst Jacob D. (DePaul University, USA)
Armato Samuel G. (University of Chicago, USA)
- Chapter 3**
Multi-Modal Content Based Image Retrieval in Healthcare:
Kim Jinman (University of Sydney, Australia)
Kumar Ashnil (University of Sydney, Australia)
Cai Tom Weidong (University of Sydney, Australia)
Feng David Dagan (University of Sydney, Australia & Hong Kong Polytechnic University, Hong Kong)
- Chapter 4**
Issues and Techniques to Mitigate the Performance Gap in Content-Based Image Retrieval Systems
Traina Agma J. M. (University of São Paulo (USP) at São Carlos, Brazil)
Traina Cactano (University of São Paulo (USP) at São Carlos, Brazil)
Cordeiro Robson (University of São Paulo (USP) at São Carlos, Brazil)
Ribeiro Marcela Xavier (Federal University of Sao Carlos, Brazil)
Azevedo-Marques Paulo M. (University of São Paulo (USP) at Ribeirão Preto, Brazil)
- Chapter 5**
Revisiting the Feature and Content Gap for Landmark-Based and Image-to-Image Retrieval in Medical CBIR
Greenspan Hayit (Tel-Aviv University, Israel)
- Chapter 6**
Putting the Content Into Context:
Müller Henning (University and Hospitals of Geneva and University of Applied Sciences, Switzerland)
Kalpathy-Cramer Jayashree (Oregon Health and Science University, USA)
- Chapter 7**
Anticipated Use of EMR Functions and Physician Characteristics
Meinert David (Missouri State University, USA)
Peterson Dane K. (Missouri State University, USA)
- Chapter 8**
Decision Making by Emergency Room Physicians and Residents:
Hine Michael J. (Carleton University, Canada)
Farion Ken J. (Children's Hospital of Eastern Ontario, Canada)
Michalowski Wojtek (University of Ottawa, Canada)
Wilk Szymon (Poznan University of Technology, Poland)
- Chapter 9**
Alerts in Healthcare Applications:
Chiu Dickson K.W. (Dickson Computer Systems, Hong Kong)
Kwok Benny W. C. (The Chinese University of Hong Kong, Hong Kong)
Wong Ray L. S. (The Chinese University of Hong Kong, Hong Kong)
Kafeza Marina (University Hospital of Heraklion, Greece)
Cheung S.C. (Hong Kong University of Science and Technology, Hong Kong)
Kafeza Eleanna (Athens University of Economics and Business, Greece)
Hung Patrick C.K. (University of Ontario Institute of Technology, Canada)
- Chapter 10**
Understanding the Role of User Experience for Mobile Healthcare
Oinas-Kukkonen Harri (University of Oulu, Finland)
Räsänen Teppo (University of Oulu, Finland)
Leiviskä Katja (University of Oulu, Finland)
Seppänen Matti (The Finnish Medical Society Duodecim, Finland)
Kallio Markku (The Finnish Medical Society Duodecim, Finland)
- Chapter 11**
Physician Characteristics Associated with Early Adoption of Electronic Medical Records in Smaller Group Practices
O'Neill Liam (University of North Texas, USA)
Talbert Jeffery (University of Kentucky, USA)
Klepack William (Dryden Family Medicine, USA)
- Chapter 12**
Healthcare Information Systems Research:
McLeod Alexander J. (University of Nevada – Reno, USA)
Clark Jan Guynes (The University of Texas at San Antonio, USA)
- Chapter 13**
Perceptions of an Organizing Vision for Electronic Medical Records by Independent Physician Practices
Reardon John L. (University of Hawaii, USA)
- Chapter 14**
Challenges Associated with Physicians' Usage of Electronic Medical Records
Ilie Virginia (University of Kansas, USA)
Van Slyke Craig (Saint Louis University, USA)
Courtney James F. (Louisiana Tech University, USA)
Styne Philip (Digestive Health Florida Hospital Orlando, USA)
- Chapter 15**
EMR Implementation and the Import of Theory and Culture
Cellucci Leigh W. (East Carolina University, USA)
Wiggins Carla (University of Wisconsin-Milwaukee, USA)
Trimmer Kenneth J. (Idaho State University, USA)
- Chapter 16**
Insight into Healthcare Information Technology Adoption and Evaluation:
Wiggins Carla (University of Wisconsin-Milwaukee, USA)
Trimmer Ken (Idaho State University, USA)
- Chapter 17**
Internet as a Source of Health Information and its Perceived Influence on Personal Empowerment
Paré Guy (HEC Montréal, Canada)
Malek Jean-Nicolas (HEC Montréal, Canada)
Sicotte Claude (University of Montreal, Canada)
Lemire Marc (University of Montreal, Canada)
- Chapter 18**
Open Source Health Information Technology Projects
Katsamakos Evangelos (Fordham University, USA)
Janamanchi Balaji (Texas A&M International University, USA)
Raghupathi Wullianallur (Fordham University, USA)
Gao Wei (Fordham University, USA)
- Chapter 19**
An Innovation Ahead of its Time: Understanding the Factors Influencing Patient Acceptance of Walk-In Telemedicine Services
Serrano Christina I. (University of Georgia, USA)
Karahanna Elena (University of Georgia, USA)
- Chapter 20**
The Impact of Information Technology across Small, Medium, and Large Hospitals
Bourgeois Stacy (University of North Carolina, Wilmington, USA)
Prater Edmund (University of Texas at Arlington, USA)
Slinkman Craig (University of Texas at Arlington, USA)
- Chapter 21**
GIS Application of Healthcare Data for Advancing Epidemiological Studies
Woodside Joseph M. (Cleveland State University, USA)
Sikder Ifukhar U. (Cleveland State University, USA)