Introduction to Health Informatics
A Canadian Perspective

The first of its kind, this engaging textbook unpacks health informatics from a uniquely Canadian perspective. With a bottom up approach, author Christo El Morr identifies how health informatics influences and affects a range of Canadian healthcare stakeholders including populations, patients, doctors, nurses, managers, clinicians, and governments. Presented in a clear and concise way, section one equips students with an overview of health informatics building blocks: computers, networks, databases, and user interfaces. Section two details major health informatics systems: picture archiving, communication systems, data warehousing, and business intelligence. Finally, section three explores challenges with privacy, confidentiality, security, and emerging trends such as big data, gamification, and wearable technologies.

Packed with key terms, reflection activities, quizzes, a test bank, and assignments, this comprehensive introductory textbook is an invaluable read for undergraduate students, educators, and practitioners in the health informatics, health management, health policy, or global health fields.

Author Information

Christo El Morr

**Christo El Morr** is an Associate Professor of Health Informatics and the Health Informatics Certificate Coordinator at the school of Health Policy and Management at York University. His cross-disciplinary research covers health informatics and computer engineering... His research interests focus on Health Virtual Communities, Mobile Communities, e-collaboration, particularly in the domain of Chronic Disease Management and health promotion: Peripheral Arterial Disease, Kidney Diseases and Mental Health. He also has research interests in Hospital Patient Services and Patient Quality of Care (e.g. readmission patterns, dose reduction), Picture Archiving and Communication Systems (PACS), and Electronic Health Record. He has published books, chapters, and articles in these areas. He particularly enjoys working in applied research in partnerships with IT industry, he received funds from the Ontario Center of Excellence (OCE) and the Canadian Institute for Health Research (CIHR). He consulted for international organizations and served as an Expert Reviewer for the Ministry of Research and Innovation, Ontario... He is a Research Scientist at North York General Hospital and work with collaborators from Saint Michael's Hospital. In 2016, he received recognition as York U Research Leader.

Reviews

"This first of its kind health informatics textbook provides a unique and very interactive introduction to the key concepts within the field of health informatics in Canada. The guiding framework adopted provides students with a rich and practical foundation of the topic paired with the associated technical aspects specific to healthcare. Students will gain valuable knowledge about the significance of data, how it is generated and used to create personal health records and electronic health records, the different types of systems used in Canada, and the several telemedicine applications available across the country. Highlighting both the current and future trends and challenges, this textbook enables students to be successful leaders in the field of health informatics.”

— Pria Nippak, PhD, Associate Professor, School of Health Services Management, Ryerson University

"A great introduction for students to health informatics in Canada! The text provides an excellent overview of the key concepts, health information technologies, and future directions of health informatics research, applications, and professionalism with a Canadian focus.”

— Elizabeth Borycki, RN, PhD, Professor, School of Health Information Science, University of Victoria

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info@canadianscholars.ca
416-929-2774