Preface

Computers have revolutionized society. They have made information easier to store, create, utilize, and manipulate. The Internet has changed the face of education and commerce. But computers are not autonomous agents, rather they require humans to function and the human side of information systems cannot be underestimated in its impact on the way computers affect society. Academics, researchers and practitioners must address the human factors of information system as they strive to improve and understand the influence of computers. In order to appreciate this influence, academics and researchers must have access to the most current research on the human side of information technology. The chapters in this book contain the most up to date findings about how computer function and influence is affected by the human element. From users’ motivations to use information technology to the influence of cultural paradigms on their use, the authors of these chapters share their expertise and provide insightful practical and theoretical guidance.

Chapter 1 entitled, “Beyond Models of National Culture in Information Systems Research” by Michael Myers and Felix Tan of University of Auckland (New Zealand) challenges information systems researchers to go beyond models of national culture. The authors propose a dynamic view of culture that sees culture as contested, temporal and emergent. Specifically the authors offer a critique of the concept of national culture and offer an alternative view.

Chapter 2 entitled, “Human Centered Methods in Information Systems: Boundary Setting and Methodological Choice” by Steve Clarke and Brian Lehaney of the University of Luton (United Kingdom) attempts to determine the context and scope of an information systems study and choosing an intervention strategy based on the findings. The authors describe the process of boundary setting where boundaries are determined through critical participant analysis. The chapter also describes alternative potential intervention strategies and concludes with a discussion and critique of the available approaches.

Chapter 3 entitled, “The Human Side of Information Development: A Case of an Intervention at a British Visitor Attraction” by Brian Lehaney, Steve Clarke and Vikki Kimberlee of University of Luton Business School (United Kingdom) and Sarah Spencer-Matthews of Swineburne University of Technology (Australia) outlines an approach to a more human-centered approach to information systems
based on an empirical study of visitor attractions in the United Kingdom. The chapter presents analysis of a failed tourism database marketing information system and similar successful systems and illustrates the value of technology enabled database marketing.

Chapter 4 entitled, “Human Factors in Interface Design: An Analytical Survey and Perspective” by Qiyang Chen and Vinai Sharma of Montclair State University (USA) discusses the issues of human factors affecting interface design. The chapter addresses the challenges that systems analysts face and presents strategies to incorporate human factor engineering into the process of system analysis and design. The authors finally discuss user performance and mental models.

Chapter 5 entitled, “Motivation for Using Information Technology” by Donaldo de Souza Dias of the Federal University of Rio de Janeiro (Brazil) reports on data gathered from MBA, undergraduate students in business administration and school students analyzing motivations for using microcomputers. The chapter investigates three motivations: perceived usefulness, perceived ease of use and perceived enjoyment. The results reported in the chapter suggest that school students have greater enjoyment using microcomputers than MBD or undergraduate students and that undergraduate students in business administration have the greatest perception of the usefulness of microcomputers.

Chapter 6 entitled, “Towards a Theory-Based Measurement of Culture” by Detmar Straub and Karen Loch of Georgia State University, Roberto Evaristo of University of Illinois, Elena Karahanna of University of Georgia and Mark Srite of University of Wisconsin, Milwaukee (USA) proposes a theory-based conceptualization and measurement of an individual’s culture and a method of measuring the strength of a particular cultural feature as part of the data gathering in positivist research. The authors indicate that social identity theory provides a useful theoretical framework to identify, integrate, measure and aggregate cultural influences and values.

Chapter 7 entitled, “Personal Information in Privacy and Internet Technology” by Edward Szewczak of Canisius College (USA) explores personal information privacy on the Internet in terms of the technological challenges facing individual businesses and government regulators to protect this privacy. The chapter further describes the ongoing debate between privacy advocates and technology growth enthusiasts. By discussing the various forums in which privacy issues exist, the author provides insights into this timely issue.

Chapter 8 entitled, “The Everyday Practice of Information: Tales from the Field” by Andrew Wenn of Victoria University of Technology (Australia) argues that information is not something that should be strictly defined. Rather, information is something that should be understood through the practices by which it is constructed by professionals such as librarians or computer professionals. The chapter presents a series of exhibits demonstrating how the word information is used within the context of libraries, by librarians and library users.

Chapter 9 entitled, “Cultural Problems in Applying SSM for IS Development” by Trevor Moores of Emporia State University (USA) and Frank Gregory, Independent
Consultant (Thailand) reports a case study that highlights the problems of applying the confrontational method, soft systems methodology in Hong Kong. The chapter identifies three main problems with this methodology: group discussions were avoided, interviews were conducted in multiple languages and high staff turnover made it difficult to develop and maintain mature stakeholder views.

Chapter 10 entitled, “Between Individuals and Teams: Human Resource Management in the Software Sector” by Pat Finnegan of University of Cork and John Murray of Deloitte and Touche Tomhatsu (Ireland) examines human resource management practices in the software industry in Ireland. The chapter reports the results of a survey of the 100 largest software organizations about their human resource practices and focuses on two organizations, one representing an example of poor practices and one representing preferred practices.

Chapter 11 entitled, “Theoretical Classification of Technological Frames: A Diagnostic Tool to Incorporate Information Technology Into Organizations” by Jeimy J. Cano of Newport University (USA) makes a structural analysis of relationships among individuals, technology and organizations and reviews the implications of technological understanding. Additionally, the chapter suggests a technological frame classification and establishes a practical knowledge base for both practitioners and educators which presents new alternatives to be integrated into business strategies.

Chapter 12 entitled, “Organizational Actions, Computer Attitudes, and End-User Satisfaction in Public Organizations: An Empirical Study” by Adel Aladwani of Kuwait University (Kuwait) reports the results of a field study that investigated the relationship among organizational actions, computer attitudes, and end-user satisfaction in public organizations. The results reported show that computer attitudes have a positive direct influence on end-user satisfaction. The findings also indicate that management advocacy has positive direct effects on computer attitudes and end-user’s satisfaction. The authors then offer directions for practice and future research.

Chapter 13 entitled, “Hiring in the Post-Reengineering Environment: A Study Using Situationally Conditioned Belief” by Laura Lally of Hofstra University and Brian Garbushian of Frederic Harris, Inc. (USA) reports on the results of a study conducted using Situationally Conditioned Belief (SCB). The results indicate that employers are seeking more sensitive information about job candidates, especially for managerial jobs and that candidates for managerial jobs are willing to provide this sensitive information. However, the authors indicate that a substantial gap exists for both operational and managerial candidates between the number of information candidates are willing to reveal and the amount desired by employers.

Chapter 14 entitled, “The Effect of Attitudes, Goal Setting and Self-Efficacy on End User Performance” by I.M. Jawahar and B. Elango of Illinois State University (USA) discusses the results of a study investigating end users’ attitudes toward working with computers, the effects of goal setting and self-efficacy on end user performance. The results demonstrate that attitudes towards working with computers, goal setting and self-efficacy significantly influence end user performance.
Chapter 15 entitled, “Getting the Spirit of Office Technologies! Does the Internal Organization Environment Support or Constrain?” by Huub J. M. Ruel of the University of Twente (Netherlands) reveals the results of a study conducted in four offices. The study attempted to answer the query does the internal organization support or constrain the role of information technology appropriation. The results confirm that a clear spirit is positively related to the level of appropriation and that this relationship is more positive among users who experienced less change in the internal organizational environment. Although the results discussed do not completely confirm the initial hypotheses, the authors offer another significant explanation for the discrepancy in their findings.

Chapter 16 entitled, “The Effect of Individual Differences on Computer Attitudes: An Empirical Study” by Claudia Orr, David Allen and Sandra Poindexter of Northern Michigan University (USA) reports the results of a study examining the relationship between computer attitudes and experience, demographic/educational variables, personality type and learning style of 214 students enrolled in a university computer literacy course.

Chapter 17 entitled, “The Importance of Having a Multidimensional View of IT-End Users Relationships for the Successful Restructuring of IT Departments” by A.C. Leonard of the University of Pretoria (South Africa) is based on a research study conducted to look into the working relationship between IT departments and their end users. The chapter describes these relationships as intriguing and complex and indicates that these relationships should be managed as multi-dimensional entities. The chapter concludes with a brief evaluation of the recommendations made by a consulting group for the restructuring of an IT department experiencing various problems providing quality service to its end users.

Chapter 18 entitled, “Computer Mediated Communication – The Power of Email as a Driver for Changing the Communication Paradigm” by Dianne Willis of Leeds Metropolitan University (United Kingdom) looks at current communication and working practices within a higher education institution in the United Kingdom, namely Leeds Metropolitan University. The chapter reports the results of a survey conducted to elicit people’s feelings about the use of email and their predictions of future patterns of communication developing within the institution.

Chapter 19 entitled, “The Influence of Experience, Culture and Spatial Visualization Ability on Users’ Attitudes and Anxiety Towards Computer Use” by Pieter Blignaut, Theo McDonald and Janse Tlmie of the University of Orange Free State (South Africa) presents an analysis of the relationship between the attitudes towards computer related tasks, computer anxiety and special visualization ability of a group of first year computer science students based on culture and computer experience.

Chapter 20 entitled, “Ethics, Authenticity and Emancipation in the Information Systems Development” by Stephen Probert of Cranfield University (United Kingdom) describes the authors research on the philosophical concept of authenticity which is used as a framing device for providing an interpretation of the aspects of both ethical
and practical action on the part of information systems (IS) professionals. The author looks specifically about whether or not IS professionals act authentically or simply in strict adherence to their professional code of ethics or with a series of methodological precepts.

Chapter 21 entitled, “Deception and Reality: A Challenge for the Information and Knowledge Management Function” by W. Hutchinson of Edith Cowan University and M. Warren of Deakin University (Australia) investigates the dilemma that information management faces in ensuring the integrity of the data supplied, the information derived from that data and the knowledge created from the systems. The author looks specifically at the importance of avoiding deceptions based on data manipulation in the world of electronic information systems.

Chapter 22 entitled, “Computer Mediated Communication in Universities and Further Education Establishments — A Comparison of Use and Utility” by Elayne Coakes of University of Westminster and Dianne Willis of Doncaster College (United Kingdom) looks at the use of computer mediated communication (CMC) in Colleges of Further and Higher Education in the United Kingdom. The data is based on a survey of 30 institutions and focuses on the use of email in support of the communication process.

Chapter 23 entitled, “Rewarding Knowledge Workers: An Empirical Investigation of the Cognitive Effects of the Reward System on IT Planning Effectiveness” by Sofiane Sahraoui of the American University of Sharjah (United Arab Emirates) identifies critical dimensions of the reward system used to leverage the intellectual assets of knowledge workers. The author identifies IT planning as a key process by which this is accomplished. The chapter also offers a new conceptual of IT planning within a knowledge-intensive environment where informal and distributed planning is the vehicle through which knowledge workers are involved in planning.

Understanding the impact and influence of the human element in information technology and systems is key to improving them. From the lack of women in the discipline of information systems to how to make a Web site more user friendly, the chapters in this book address the many facets of user relationships to the information systems and technology they use. The chapters address motivations for using email and Web sites as well as providing practical guidance for departments desiring to restructure their IT departments. The ethical and cultural dimensions of the human factor are also discussed in depth. From maintaining privacy to the broad based influence of information, his book provides essential practical and theoretical information for academics, students, researchers and practitioners alike striving to better understand and improve the human element’s influence on information systems.

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