Introduction: Technology, model and tourism

Cheng Li

Tourism School,
and
Center for Tibetan Studies,
Sichuan University,
29# Wangjiang Road, Chengdu,
Sichuan, 610064, P.R. China
E-mail: chengli@scu.edu.cn

Technology and model applications play an increasing role in contributing to the development of tourism research (Buhalis and Law, 2008; Stamboulis and Skayannis, 2003). Effective technology and models are desired in all sectors to resolve multistage, multiplayer, and multi-objective tourism management problems (Lindberg and Johnson, 1997; Sautter and Leisen, 1999; Selin and Chavez, 1995).

Due to the multidisciplinary nature of tourism management, this special issue's strategies are to invite and encourage techniques and models from various disciplines that include ecology, environment, informatics, economics, management, psychology, and sociology to resolve tourism management issues. The special issue aims to establish an effective channel of communication between decision-makers and academics, and thus to expand frontiers of knowledge in and contribute to the literature on tourism management and to meet the needs of accelerating technological change and changes in the global economy. Consequently, all papers in this special issue of the *International Journal of Services Technology and Management (IJSTM)* take into account the technology and model applications in tourism management, and attempt to answer how tourism might relate to the technology and model of novel approaches for improving tourism management.

The first paper, 'VITRO: a flexible and innovative architecture for virtual travel agent information systems' by Assimakopoulos, Dimitriou and Xanthopoulos. Due to the operation of virtual tourism enterprises (VTE) requires the existence of a flexible virtual travel agent (VTA) information system, the research reports a flexible and innovative architecture of a VTE called VITRO to serve as a paradigm for the analysis, design and implementation of efficient and flexible VTA information systems. The authors conclude that the architecture will enable effective information management and dynamic packaging service provision.

The second paper, 'Distance effects and product feature differentiation in tourism duopoly' by Ou, Chang and Lee. Through dealing with the effect of friction of geographic distance, cognitive distance and endogenous spillover effect, this paper tries to answer how to increase the cognitive proximity between tourism companies and their potential tourists' psychological status that would exert an influence of reducing the impact of the effect of friction of geographic distance on the tourists' determinants in tourism destination choice.

The third paper, 'Ecotourism frangible areas and a measurement model of frangibility' by Cheng. Aiming at the ecotourism frangibility, this paper defines ecotourism frangibility according to the threats and risks that natural resources are experiencing from human economic activities, restructures the concept of ecotourism frangible areas, reveals the nature of ecotourism frangible areas and propose an evaluation model of ecotourism frangibility for the implementation of a sustainable development of ecotourism.

The fourth paper, 'The impact of travel product transaction types on customer relational benefits' by Tsaur and Yen, tries to answer whether the scientific management of technology is replacing manpower completely suitable for the travel industry, and with respect to the different transaction types of travel products, what kind of customer relational benefits do consumers perceive. Although the introduction of technological methods is a trend in the service industry, the paper indicates that interpersonal transaction is rated significantly higher than internet and TV shopping in the three dimensions of customer relational benefits.

Europe is one of the most important tourism regions in the world. For assessing the tourism industry of EU-25 member states, adopts the data envelopment analysis (DEA) model and multidimensional scaling (MDS), the fifth paper, 'Efficiency analysis of EU-25 member states as tourist destinations' by Lozano and Gutiérrez, presents the efficiency scores and projects the EU-25 member states onto a two-dimensional space to visualise their relative market positions and relationships.

The sixth paper, 'Residents' culture-creative industries in Taiwan' by Chung, Chen and Hsu, examines the relationship among local identity, community participation, attitude of local resident and the culture-creative industry development in Taiwan. This paper reveals that local mores, values, and customs positively impact the development of a culture-creative industry, and the authors argue that, Taiwan must place on strengthening public relationships, nurturing local identity, and fomenting community participation for culture-creative industry in the future.

With the internet offering deeper and wider applications, online customer reviews have become an important source by which to obtain feedback on products and services. Based on data mining approach that further explores reviews about travel destinations, the seventh paper, 'Feature extraction of travel destinations from online Chinese-language customer reviews' by Ye, Law, Li and Li, analyses the customer reviews that are posted by Chinese speakers about travel destinations. Experiments were conducted using datasets comprised of the reviews of three travel destinations in mainland China that had been posted on the internet. The results of the experiments carried out in this study indicate that the proposed approach can dramatically improve the integrated performance of the extraction of destination features from Chinese travel reviews.

The eighth paper, 'GIS applications to resort morphology' by Liu, Wall, and Zhang, uses GIS and remote sensing methods to document land use change in two coastal resorts in China, and shows how GIS techniques can be used to process both spatial and attribute data, to map morphological features, and analyses changes in the morphological characteristics of resorts. This paper suggests and illustrates some promising directions for GIS applications in studies of resort morphology and associated implications for resort management and development planning.

Despite the importance of brand trust in e-commerce, little is known about what causes brand trust in an online environment for travel products. The ninth paper, 'A model of online trust for travel products' by Choi and Au, examines the effects of e-brand image and user's web experience on online brand trust, and how these constructs affect purchase satisfaction.

The tenth paper is 'Public reaction to large-scale projects in Chinese heritage sites and its impact on decision-making: research framework, technological path and prospects' by Cheng. The public reaction to large-scale projects in Chinese heritage sites is an important content of political democratisation in Chinese society. Based on technological and model methods, this paper proposes a design and prospect on the research framework and technological path of impacts on decision-making by public reaction under the background of large-scale projects in Chinese heritage sites.

References

Buhalis, D. and Law, R. (2008) 'Progress in information technology and tourism management: 20 years on and 10 years after the internet – the state of e-tourism research,' *Tourism Management*, Vol. 29, No. 4, pp.609–623.

Lindberg, K. and Johnson, R.L. (1997) 'Modeling resident attitudes toward tourism', *Annals of Tourism Research*, Vol. 24, No. 2, pp.402–424.

Sautter, E.T. and Leisen, P. (1999) 'Managing stakeholders – a tourism planning model', *Annals of Tourism Research*, Vol. 26, No. 2, pp.312–328.

Selin, S. and Chavez, D. (1995) 'Developing an evolutionary tourism partnership model', *Annals of Tourism Research*, Vol. 22, No. 4, pp.844–856.

Stamboulis, Y. and Skayannis, P. (2003) 'Innovation strategies and technology for experience-based tourism', *Tourism Management*, Vol. 24, No. 1, pp.35–43.