UNDERSTANDING THE SUSTAINABILITY OF VIRTUAL COMMUNITY: MODEL DEVELOPMENT AND EMPIRICAL TEST

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Understanding the Sustainability of Virtual Community: Model Development and Empirical Test

探討虛擬社群的持續發展：
理論演化及驗證

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Abstract

With the proliferation of information and communication technologies, there is an expanded opportunity for the public to be involved in knowledge exchange. However, the creation of an online social space (e.g., virtual community) does not guarantee that knowledge exchange will actually take place. The success of a virtual community depends primarily on whether members are willing to continue to use the community, as well as to share and adopt knowledge. If there are a lot of participants who are willing to stay and contribute their knowledge in the virtual community, this will improve the likelihood of connecting to individuals who are able and willing to help.

The motivation of this study is to better understand the sustainability of virtual communities, specifically, user continuance behaviors. Given the limited research in the area of information systems continuance, this study seeks to divulge the factors that shape the continuance of a virtual community, and the continuance of knowledge adoption and knowledge sharing behaviors.

The first research model (User continuance intention with the virtual community) uses four key theoretical backgrounds and incorporates the key constructs from the literature of the IS continuance model, relationship marketing, social influence, and uses and gratifications to explain user intention to continue using the virtual community. The second research model (User continuance intention of knowledge adoption) extends the information adoption model in the continuance stage and

explains user intention to continue adopting and using knowledge in the online discussion forum. Finally, the third research model (User continuance intention of knowledge sharing) builds upon the Batson's framework of the act for public good and explains user intention to continue sharing knowledge in the online discussion forum. This model also takes the user evaluation process into consideration and incorporates in the investigation constructs like disconfirmation and satisfaction.

The empirical research was conducted in Hong Kong Education City (www.hkedcity.net). Hong Kong Education City (HKed City) is a leading and one-stop education portal with a vision to build Hong Kong into a learning city. An invitation email with a URL to the online questionnaire was sent to the potential respondents who are primary and secondary school teachers in Hong Kong. A total of 315 respondents filled in the online questionnaire. Among the respondents, there were 144 knowledge adopters and 60 knowledge contributors. The survey data was analyzed using Partial Least Squares. The measurement models were first assessed, and then the structural models were evaluated.

The results of the first model show that the relationships proposed in the research model are largely supported. In particular, satisfaction and group norms exert significant effects on user continuance intention, and purposive value and self-discovery are the two key values that both explain satisfaction and group norms. The results of the second research model also provide support to the hypothesized relationships. User satisfaction and information usefulness have significant effects

on user intention to continue adopting knowledge in an online discussion forum, whilst information usefulness is determined by both information quality and source credibility. Finally, the third research model empirically demonstrates that moral obligation and commitment (sense of belonging) have the strongest influence on user continuance intention. The results also provide support to the expectancy confirmation theory, where users evaluate and compare their experiences with their expectations. User satisfaction is affected by both disconfirmations of helping others and reciprocity, while knowledge self efficacy is determined by the disconfirmation of helping others.

This research seeks to provide important theoretical and practical contributions. On the theoretical side, most existing studies only addressed the concern of user acceptance of online social structures for knowledge sharing and adoption. This study is one of the very first studies that adopts a comprehensive approach to explain user continuance behaviors, including both knowledge adoption and knowledge sharing in a virtual community. In addition, the research models use theories from different theoretical perspectives, providing support to an integration of cross-disciplinary studies in virtual community research. On the practical side, the results of this study provide virtual community designers some tangible recommendations for helping their members to continue to share and adopt knowledge.

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