Keywords: Marketing strategy, Customer satisfaction, Service quality, Price, Mathematical model, Empirical research

This study attempts to develop a theoretical model and employ empirical method for investigating the impact of marketing strategy on customer satisfaction. This study focuses on the indirect effects of a marketing strategy on consumer satisfaction via the price and service quality. To clarify, this study employs the concept of natural logarithms and the Lagrange function to develop a conceptual model and derive an optimal marketing strategy. We further develop a questionnaire and distribute to a randomly drawn sample to illustrate the contributions of this mathematical model. In addition, this study also utilizes the concept of game theory to develop a model in order to identify the global marketing strategy in a competitive environment.

Based on mathematical model and empirical study, this study intends to advance four issues related to marketing strategy. First, the influence of marketing strategy is contingent on the share of loyal customer for a firm. Second, rivals’ price and service quality polices may dominate firm’s marketing strategy. Third, the optimal guideline of marketing strategy given limited resources will be derived to provide a direction for allocating the strategic resources. Finally, structural equation modeling will be employed to examine the interrelationships among research constructs in order to illustrate the viability and contributions of the mathematical model.