E-Satisfaction Estimation: A Comparative Analysis Using AHP and Intuitionistic Fuzzy TOPSIS

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ABSTRACT

In this competitive atmosphere, internet marketing serves as an effective alternate trade network that businesses can focus on to get direct access to their target customers. Online buying facilitates shoppers to purchase goods and services right away from the merchants over the internet and without human interference. Consumers find produce of their preference with just click of a button. A complete series of merchandise from various dealers with their prices get exhibited to the buyers for their choice. But, is competitive prices and good product features sufficient for the buyers for their buying decisions? This article attempts to answer this ambiguous condition and try to realize the vital aspects for buyers’ satisfaction. A customer satisfaction index (ECCSI) is studied to comprehend the features of online satisfaction and with a comparative analysis using analytical hierarchy process (AHP) and intuitionistic fuzzy TOPSIS (IFT), these different e-satisfaction indices are ranked to get an overall view of preferences of the customers.

KEYWORDS

AHP, Customer Preference, E-Satisfaction, ECCSI, Food E-Retail, Intuitionistic Fuzzy TOPSIS

INTRODUCTION

Today businesses are making efforts to subsist in this challenging and taxing business affair. E-marketing aids as an operational alternative that businesses can concentrate on to come into direct contact with the shoppers. Driven by in-depth smartphone penetration, the introduction of 4G networks and growing customer capital, the e-commerce market in India is likely to grow to $ 188 billion by the year 2025, (IBEF, 2017). Shoppers easily find produce of their preference on these retail websites with just a click. A complete series of merchandise from various vendors with their prices get exhibited to the buyers for their choice making. It has become an integral part of life for many people. The overall figure for e-customer was 50 million in 2015 and is poised to rise by 3.5 times to 175 million by 2020. In India, e-retail is expected to occupy nearly 25 per cent of total organized retail. It is projected to hit a figure of $60 billion in gross marketing, denoting a total value of $240 billion by 2020, (Businessline, 2016).

E-business may further be classified into the various groups. B2B is concerned with line of work between enterprises, aiming transactions between the organization and its business cohorts. B2C e-services are concentrated between the business firms and consumers, like online retailing. C2C involves different types of e-commerce between particular consumers and may be demonstrated by an individual conducting online auctions or commercials involving sales. C2B is the sporadic kind

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of e-commerce that relates to issuing from the customers part, in particular shop windows, proposals of purchases that are consequently answered back by enterprises.

This paper focusses majorly on online food retail business, B2C model of e-commerce. Even though food e-retailing is a reasonably new concept in India, it is growing by leaps and bounds. In 2016, India positioned fifth among the prominent marketplaces in Asia Pacific at $135 million in terms of growth. (Das, 2017). Giant online corporates are venturing in the online food market. The already existing players includes Bigbasket, Grofers, and Amazon etc. (Kulkarni & Thimmaya, 2017). Amazon maneuvers to push in around $500 million in the food retail in India. Alike foreign direct investment strategies are being floated by Bigbasket and Grofers also. According to (Kulkarni & Thimmaya, 2017) online food retail market has been chiefly subdued by three major players, Amazon, Bigbasket and Grofers. Flipkart is also making efforts to re-entry into the online food retailing segment. A website augments the reliability and credibility of businesses, makes it appear more adept and supports as a great marketing scheme to spread the e-word of mouth about the trade. Thus, it is a precise, operative and apparent platform for both the consumers and the vendors to associate with each other for purchasing and retailing of merchandises.

Internet marketing aids as an alternative operative trade network that businesses can concentrate for an unperturbed medium to target clients. It empowers consumers to purchase merchandises and services directly from the vendors over the internet, with minimum human interferences. The complete product assortment from diverse vendors and prices get exhibited to the customers for making their choices. But, is competitive prices and good product quality sufficient for the buyers for taking their buying decisions? The solution to this problem is not that easy to retort as the internet buyer behavior itself is a very intricate subject. (Anshu & Loveleen, 2017)

In case of e-retail, raising consumers satisfaction level and gaining their trust and ultimately making them loyal towards their brand has turned out to be the strategic factor concerned with the online retailer survival. The viewpoint of modern management is of the idea that the satisfying the consumers is the underlying principles of enterprise success. These days increasingly number of businesses target shopper’s satisfaction as their principle objective (Mihelis, Grigoroudis, & Siskos, 2001). A customer satisfied doing online purchase from a specific e-store is expected more to shop there over again. Hence, customer satisfaction and their retention has developed into a more and more vital concept throughout the pure click, brick & click and brick and mortar business model as well. It is essential to recognize the aspects that enterprise shoppers’ satisfaction and their selection of the online retailers.

The paper tries to resolve this ambiguous state and try to find the vital features for satisfying the shoppers. Also, how the contending e-retailers are exploiting these features to tell themselves apart. In this paper study of the E-Commerce Customer Satisfaction Index Model (ECCSI) is done for understanding the aspects of online customer satisfaction and with comparative analysis using AHP and Intuitionistic Fuzzy TOPSIS these different e-satisfaction indices are ranked. Also, different food e-retailers are studied and are mapped on how well they satisfy the customers and accomplish their goal of establishing themselves in the market place.

The paper is segregated in to various sections, Introduction being the first section. The next section covers the Literature review and studies the work done by different researchers in this field. This section also elaborates the different models and tools applied for the research work. The following section deals with the proposed methodology, where the method and process adopted for carrying out the research work has been discussed. This section details about the approaches followed for collection of information. We then cover in detail the analysis and interpretation part of the research work. This section shows the in-depth analysis and explanation done with the help of AHP and TOPSIS on ECCSI model. The last section deals with the conclusion part and explains the outcome and the implication of the research work.
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