# A Conceptual Framework for Determining Brand Attitude and Brand Equity through Text Analytics of Social Media Behavior



### Sonali Bhattacharya

Symbiosis Centre for Management and Human Resource Development, Symbiosis International University, India

### Vinita Sinha

Symbiosis Centre for Management and Human Resource Development, Symbiosis International University, India

#### Kaushik Chaudhuri

School of Management and Entrepreneurship, Shiv Nadar University, India

### **Pratima Sheorey**

Symbiosis Centre for Management and Human Resource Development, Symbiosis International University, India

### INTRODUCTION

Kaplan and Haenlein (2010) defined social media as having three components, namely, concept (art, information, or meme); media (physical, electronic, or verbal); and social interface (intimate direct, community engagement, social viral, electronic broadcast or syndication, or other physical media such as print). In this article, we have attempted to develop conceptual frameworks to establish relationship between brand personality and; functional and need motivations as depicted from social media behavior. These frameworks can be used to predict brand attitude and brand equity. We have also tried to establish the link between brand personality and individual users' personality as measured through social media behavior. How individual and brand personality is linked with corporate brand value and brand attitude has been analysed too.

### **BACKGROUND**

Park et al. (2011) studied *who* among health organizations used Facebook to promote health issues, *what* interactive features were being used, *which* social media channels were used in conjunction with Facebook, and

DOI: 10.4018/978-1-4666-5888-2.ch132

how health organizations used Facebook's branding/advertising techniques to manage their self-presentation and social presence online. Non-profit health organizations do not take full advantage of interactive features or other social media channels. Government agencies and schools/universities exhibit the broadest use of interactive features; health care institutions appear more devoted to integrating social media channels with Facebook than the other types of organizations. The Methodist Hospital system was found to be using social media since 2009 to promote and counsel about their public health programs to customers all over the world.

Based on automobile-model data from several leading online consumer reviews that were collected from 2001 to 2008, Chen et al. (2011) established that there are significant differences between the early and mature stages of Internet usage in terms of number of postings and consumer ratings in the relationship of marketing variables, such as price, quality, sales and consumer online-posting behavior. In the early stage of consumer Internet usage, price is negatively correlated with the propensity to post a review. As consumer Internet usage becomes prevalent, however, the relationship between price and the number of online consumer reviews takes a U-shape. Correlation between price and overall rating becomes less significant in the later period.

Social media can potentially be used in health organization and insurance agencies for promoting and advertising. Xiang and Gretzel (2010) studied traveler's use of search engine for travel planning by using a set of pre-defined keywords in combination with nine U.S. tourist destination names and found that social media form substantial part of online tourism in terms of trip planning with the help of search engines.

Kaplan and Haenlien (2011) are of the view that marketing communication through social media can be made most effective through active engagement of the 'marketing havens' that have good knowledge of the market and are willing to proactively disseminate the same to other customers, 'social hubs' who have high social connections and sales persons.

Murdough (2009) defined a frame work of measuring social media: Concept, Design, Deployment and Optimization. Concept phase comprise defining of objectives, key performance indicators and performance benchmarks with the intention of developing customer relationship, learning from customers and assessing and mobilizing purchase intention. Next step is to understand the quality and quantity of information and sentiment generated in the discussion and whether it is converted into purchase decision outcome. A combination of 'enterprise resource tool', 'application programming interface', 'text mining tool' and 'site analytics tool' help in measuring the brand performance in social media

# BRAND PERSONALITY AND BIG FIVE PERSONALITY

Brand Personality is combination of human characteristics associated with users of a brand (Plummer, 1985) as well as product related attributes and product category associations such as symbol characteristics, logos, advertisements, price and distribution channel (Batra et al., 1993). Brand personality effects brand preferences, usage, emotions, trust and loyalty. Aaker (1997) identified five dimensional of brand personalities: sincerity, excitement, competence, sophistication and ruggedness. The five dimensions of brand personality can be summarized under following framework:

Agreeableness and sincerity both capture dimensions of warmth and acceptance, Extroversion and Excitement capture sociability, energy, liveliness;

Table 1. Aaker's Brand Personality Framework (Aaker, 1997)

Goldberg (1990, page 1216) defined five dimensions of Big Five Personality which are as follows:	
Neuroticism	"The general tendency to experience negative effects such as fear, sadness, embarrassment, anger, guilt, and disgust"
Extraversion	"In addition to liking people and preferring large groups and gatherings, Extroverts are also assertive, active and talkative. They like excitement and stimulation and tend to be cheerful in disposition. They are upbeat, energetic, and optimistic."
Openness to Experience	"Active imagination, aesthetic sensitivity, attentiveness to inner feelings, and preference for variety, intellectual curiosity, and independence of judgment"  Conscientiousness: "A more active process of planning, organizing, and carrying out tasks The conscientious individual is purposeful, strong-willed, and determined scrupulous, punctual, and reliable."
Conscientiousness	"a more active process of planning, organizing, and carrying out tasks The conscientious individual is purposeful, strong-willed, and determined scrupulous, punctual, and reliable."
Agreeableness	"Primarily a dimension of interpersonal tendencies. The agreeable person is fundamentally altruisticsympathetic to others and eager to help them, and believes that others will be equally helpful in return."

Conscientiousness and Competence encapsulate dependability and security. Matzler et al. (2011) have established that neuroticism impact negatively word-of-mouth publicity and customer satisfaction.

# SOCIAL MEDIA BEHAVIORAL CONSTRUCT FOR BIG FIVE PERSONALITY

There are several researches connecting social media behavior to Big Five Personality

Hughes et al. (2012) applied various dimensions of personality types (Neuroticism, Extraversion, Openness-to-Experience, Agreeableness, Consci-

11 more pages are available in the full version of this document, which may be purchased using the "Add to Cart" button on the publisher's webpage:

www.igi-global.com/chapter/a-conceptual-framework-for-determining-brandattitude-and-brand-equity-through-text-analytics-of-social-mediabehavior/112540

### **Related Content**

### Software Engineering and the Systems Approach: A Conversation with Barry Boehm

Jo Ann Lane, Doncho Petkovand Manuel Mora (2008). *International Journal of Information Technologies and Systems Approach (pp. 99-103).* 

www.irma-international.org/article/software-engineering-systems-approach/2542

### Methods and Techniques of Data Mining

Ana Funesand Aristides Dasso (2021). Encyclopedia of Information Science and Technology, Fifth Edition (pp. 749-767).

www.irma-international.org/chapter/methods-and-techniques-of-data-mining/260226

## E-Government Development at the Local Level in Australia Using a Framework for Connected E-Government

Qiuyan Fan (2015). Encyclopedia of Information Science and Technology, Third Edition (pp. 2719-2725). www.irma-international.org/chapter/e-government-development-at-the-local-level-in-australia-using-a-framework-for-connected-e-government/112690

## Using RFID and Barcode Technologies to Improve Operations Efficiency Within the Supply Chain

Amber A. Smith-Ditizioand Alan D. Smith (2018). *Encyclopedia of Information Science and Technology, Fourth Edition (pp. 5595-5605).* 

www.irma-international.org/chapter/using-rfid-and-barcode-technologies-to-improve-operations-efficiency-within-the-supply-chain/184260

### Prominent Causal Paths in a Simple Self-Organizing System

Nicholas C. Georgantzasand Evangelos Katsamakas (2012). *International Journal of Information Technologies and Systems Approach (pp. 25-40).* 

www.irma-international.org/article/prominent-causal-paths-simple-self/69779