

RESEARCH ARTICLE

Examining Paradigmatic Differences on Attitude Formation and Change: Evidences from Telecommunications Sector in Oman

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Abstract

The underlying dimensions of attitude formation have been largely attributed to moderator and methodological approaches. Methodological approach involves consumer attitude formation based on consumers' direct experiences with the product and services. On the other hand moderator approach focuses on intervening variables that impacts consumer attitude even if the consumer does not have direct experience with the products and services. Consumers from the telecommunications sector in Oman were surveyed and findings have significant managerial implications which indicate that the moderator variables can significantly impact consumer decision making. The presentation of the multiple regression models explains 59 % of the relationship between attitude strength and moderator model. On the other hand the presentation of the multiple regression models explains 61 % of the relationship between attitude strength and methodological model.

Keywords: *Affective, Attitude, Cognitive, Moderator approach, Methodological approach.*

Introduction

Attitude as a construct has been at the center of many investigations especially due to its ability to influence consumer purchase decisions. Researchers have been particularly interested to know how attitudes have been serving as an instrument for product or brand evaluations by consumers. The paradigmatic divide stems from the debate on how far attitude has been able to predict consumer purchase behavior. On one side of the paradigmatic divide researchers argue that attitude is quite a good predictor of purchase behavior, while others debate on the inconsistency in attitude behavior (A-B) relationship. Researchers argue that if the consumers have direct experiences with the products or services the attitude behavior relationship is stronger. On the other hand, researchers argue that even in the absence of direct experience moderators or intervening variables improve the attitude-behavior consistency. This study examines the paradigmatic divide and examines a number of moderating variables to understand consistencies and inconsistencies in A-B relationships. Telecommunication sector in Oman which has been de-regularized recently in 2005 is an ideal research setting for investigation as the majority of young consumers are attitude driven and lack of differentiation in products and services in this sector provides an unbiased setting to understand the role moderating variables.

Telecom Sector in Oman

Telecommunication industry in Oman is in a revolutionary stage and after the privatization of the telecom sector in 2005 a number of new competitors have entered into the telecommunication industry. Oman Telecommunications Company (Omantel), the government sector monopoly company (now privatized with 49% private equity) and the focus of this research faces competition from not only the local new entrants but also international companies such as Nawras Telecom which is a firm based in Qatar. Oman Mobile the mobile service provider is a subsidiary of Oman Telecommunications Company. As of January 2009, the customer base of Oman Mobile consists of approximately 1.7 million subscribers. It is in this sector that the competition is really intense.

Literature Review

The study of different dimensions of attitude has been categorized in two different ways in the literature. The former, where evaluative dimension of attitude characterized by direct experiences was critical to investigations was termed as 'methodological'. Through this approach the researchers approached attitude-behavior relationship from an evaluative variable perspective. They support the view that attitude was pretty good predictor of behavior. However,

deficiencies were found in the concept and many researchers particularly Ajzen and Fishbein [1] critiqued the model saying that these researchers have not been able to adequately measure attitude and behavior constructs.

The affect of attitude on consumer purchase behavior meant that researchers such as Day and Deutscher [2], and Krishnan and Smith [3] studied attitude as an independent variable and found strong correlations with purchase behavior (dependent variable). This was in response to the criticism leveled by Crespi [4] who had criticized that attitude and behavioral relationship on attitudinal data as 'soft' and insufficient to explain and predict behavior. Many researchers particularly Fazio and Zanna [5], studied 'attitude' from a 'moderator' perspective and disputed the belief that attitudes are good predictors of behavior. In their view attitude was a poor predictor of behavior and there were other variables that moderated the relationship between attitude and behavior. Some of the intervening variables they pointed out were 'self-monitoring tendency', and attitude accessibility [6]. Most of the recent researchers that would be discussed in the later part of the review have focused on indentifying the 'moderator variables' that helped the researchers to explain the non-evaluative dimensions of attitude and resultant behavior.

Methodological and Moderator Perspectives

Most prominent among these researchers have been the 'Fazio model' [7]. The basic assumption underlying the model was that direct experiences with the product / brand generate more predictive behaviors, while indirect experiences are poor predictors. When attitudes are developed through indirect experiences, intervening variables or moderators play on role in shaping attitudes and hence behavior is to a large extent is dependent on the moderators. Fazio [5] postulated that 'accessibility' is a critical moderator that represents the non-evaluative dimension of attitude and is more related to indirect experiences.

Having studied and established the relationship between the two, the researchers were interested to know whether attitudes can be changed using external stimuli. Having done that, researchers such as Alden, Steenkamp, and Batra [8] and Chesebro [9] studied "attitude" as a dependent variable. Various form of external stimuli particularly effect of advertising was studied as an independent variable to investigate whether it can change brand evaluations and consequently

attitudes. They logically argued that if advertisements can change brand evaluations in a positive way, then it can positively affect purchase behavior resulting in a higher chance of purchase [10].

However, researchers such as Fazio and Zanna [5] had already established the fact that attitudes can influence purchase behavior in two ways. Similar to researches done later had pointed that attitude has both the evaluative / valence and non-evaluative dimension such as attitude 'accessibility' and attitude 'confidence'. In a later research termed the non-evaluative dimensions as "moderators of attitude-behavior" consistency. This model was further tested by Laczniaik and Teas [11] and their accessibility- diagnosticity framework was found to be relevant for consumer research on attitudes.

Laczniaik and Teas [11] model of 'accessibility-diagnosticity' attitude is a result of some form of evaluation in the memory and upon representation of the object the attitude becomes more overt. Attitude accessibility represents that strength of association. The stronger this association, the more likelihood, that the previously formed attitude will be activated in a behavioral situation.

Researchers such as Laczniaik and Teas [11] supported Fazio's assumptions that 'attitude accessibility' will influence whether consumers would adopt attitude activation or selective perception. He argues that more accessible attitudes are more likely to be activated in a behavioral situation and hence are more likely to influence purchase behavior. However, that attitude accessibility is higher in cases of direct experience than in cases of indirect experience. In another study Fazio and Olson [12] concluded that more accessible attitudes are better predictors of purchase behavior.

Many researchers extended their investigations on the 'Fazio model' and attempted to investigate ways to increase attitude accessibility. Researchers such as Ferle and Wei-Na Lee [13] and Yang [14] found that 'repeated expressions' using an external stimulus can enhance attitude accessibility. In this case it was inferred that attitude based on indirect experience can be made as accessible as based on direct experience. They tried to prove that by enhancing attitude accessibility through an external stimulus like a repeat advertisement, the non evaluative dimensions and indirect experience can be made equally good predictors of consumer purchase behavior. Actually Fazio model [12] reconciled the

two paradigmatic contradictions by stating that although direct exposure and evaluative dimension of attitude-behavior relationship may be more established but this relationship is not as direct as it seems to be. It is influenced by moderators such as attitude accessibility and the same degree of attitude-behavioral predictability can be achieved by operationalizing the constructs that shape this relationship. Thus they (ibid) provided a form and opportunity to practitioners to influence and shape this attitude and influence consumer purchase decisions. The moderator approach was perhaps the answer to numerous studies conducted earlier, which did not find strong correlations between attitude and overt behavior. Researchers, in the first half of the 20th century, such as Gutman and Vinson [15], spent considerable efforts in designing reliable measurement techniques for the measurement of attitude. Once the correlation values were found to be low, researchers in the latter half of the 20th century conducted researches on finding the reasons for low correlations values.

The empirical evidence of low correlations came from researches done by Fazio and Zanna [12]. The correlation values for direct experience subjects were .54 while for indirect experience subjects it was .20. Although the confidence levels were not strong, the one with the direct experience was stronger. Although even the former value was not significantly high it established that consumers with direct experience such as product use, tests, sampling and other evaluation behaviors created higher consistency of attitude behavior (AB) relationships. Some of the prominent investigations in this direction were done by [6]. However, these researchers lacked empirical validity, were unorganized and not well integrated from an attitude-behavior (A-B) consistency perspective. On the other hand, researchers such as Jahng, Jain, and Ramamurthy, [16] attempted to prove that indirect experiences such as advertising, personal selling presentations exposure to displays, packages and point of purchase material and word of mouth have been equally effective and reduced inconsistencies between A-B relationships. They argue that the information richness of today's world has successfully bridged this gap. Taking cue from these researches Swinyard and Smith [17], Karjalainen, Mattila, and Penttinen [18] and Yang [14] this study combines together a number of intervening variables that influenced the attitude and behavior linkages.

Mobile Telephony

Later these studies were advanced and factors that are relevant in consumer decision making process especially related to mobile telephony were included in various researches. Researchers such as Yang [14] pointed out that Technology Acceptance Model (TAM) originally proposed by Davis et al. [19] which was applicable to electronic commerce can be extended to mobile commerce as well. He is supported by Coursaris and Hassasnein [20] who also were of the opinion that mobile commerce is a sub-set of electronic commerce and similar technology models can be applied in its study. Their (ibid) primary argument is that since the mobile telephony is at the diffusion stage consumers are adopting new technology as means for social gratification or group identification. People are observing others and following the trend. The models of technology acceptance were forwarded by Orlikowski and Iacono [21] called diffusions of innovation later developed by Rogers [22]. Various quantitative studies have adopted technology acceptance model [19] to study the adoption patterns and influences. The Technology acceptance model is shown through the fig. below:

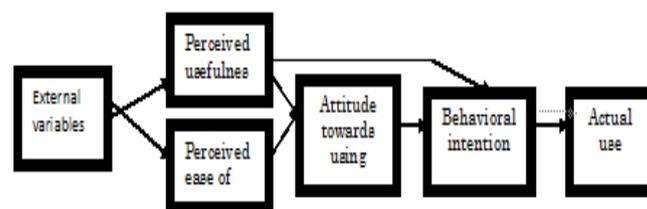


Fig. 1: Technology acceptance model based on Davis [1989]

Venkatesh and Davis [23] extended the original TAM model including three social influences on the model (later called TAM 1 and TAM 2). These social influences were subjective norm, voluntariness and image. Using these three variables [14] later hypothesized that all the three variables have an influence on consumer attitudes. Subjective norm has been identified similar to reference group influence by Venkatesh and Davis [23]. They (ibid) argued that "people choose to perform behavior, even if they are not themselves favorable towards the behavior or its consequences if they believe that one or more than one referents think they should and they are sufficiently motivated to comply with the referents" (p 87). Similarly consumers would also accept a technology or a related products or service for building their image by identifying with a group or to obtain social status and hence

and has an important influence on consumer attitudes.

All these researches reiterated that situation is something which the consumers do not expect in such situations and it changes attitudes. Therefore, situation variances were recorded where situations were independent of influences on a person and other external stimuli. Therefore it logically precedes that 'situation' along with other intervening variables/moderators affect attitude-behavior consistency or inconsistency for that matter.

To summarize this concept the researchers such as Venkatesh and Davis [23] and Yang [14] concluded that various situational inputs may result in varied behavioral output which may be helpful in explaining attitude-behavior inconsistency. The managerial implications of these findings suggested that if situations are identified and made favorable consumers brand related decisions can be influenced. Similar researches done by DuFrene et al. [24] indicated that the predictive power of 'situational models' were accepted to be satisfactory with a predictive accuracy of almost 50% in best situations.

Methodology

Although a construct like 'attitude' demands an epistemologically grounded perspective in interpretivist philosophy and the abstract construct demands subjective explanation, this research could not ignore its limitations in terms of measurement. Therefore a realist perspective with influences of positivism was adopted to facilitate measurement and enhance validity [25]. Positing the research into realist philosophy meant that quantitative strategies became dominant and hence a cross-sectional research design was adopted. Quantitative methods provided a framework for the study and statistical persuasion became critical to validity. The primary research tool that was adopted was questionnaire survey using five point Likert scale. Data was collected from 200 consumers of various telecom products and services in Oman.

Reliability

A total of 15 items (all scale data) were subjected to alpha test to ensure reliability. The reliability test of the interval scaled data showed a high internal consistency as the Cronbach Alpha value was 0.711 which is by all means highly desirable as suggested by Saunders et al. [26]. Homoscedasticity was checked using Tabachnik and Fidell's [27] and Pallant's [28] recommendations through Leven's test (.642 and

.744) and multi-collinearity through tolerance levels and variation inflationary factor (VIF) and desirable scores (tolerance less than 10 and VIF greater than 2.5) was achieved. There was no auto-correlation detected in the data as was indicated through the Durbin Watson Test (1.981 and 1.882). These tests indicated that there were no violations of the assumptions of regression equations.

Findings and Data Presentation

The findings indicate that there is a strong and positive relationship between direct experience dimensions and attitude strength. The presentation of the multiple regression models (table 2) explains 61% (adjusted R square) of the relationship between dependent and independent variables in this model. Product purchase the highest beta score of .379 (p value .001) contributes maximum towards attitude strength. On the other hand variables such as advertising (.000), (highest with a beta score of 3.84) word of mouth (.025), representation from reference group (.001), brand image and situational influences (.003) showed significant relationships thereby impacting attitude strength. The findings indicate that there is also a strong and positive relationship between indirect experience dimensions and attitude strength. The presentation of the multiple regression models (table 3) explains 59 % (adjusted R square) of the relationship between attitude strength and moderator model. On the other hand the presentation of the multiple regression models (table 3) explains 61 % (adjusted R square) of the relationship between attitude strength and methodological model.

Discussion

Although differences may exist in the literature between methodological and moderator approaches, this research provides adequate evidence that both the approaches are relevant in influencing attitude strength and each one can be used effectively. Direct experiences particularly product purchase showed dominant influence on attitude formation. Hoyer & MacInnis [29] suggests that only two or three important beliefs about a product dominate in the formation of attitudes and those less important beliefs provide little additional input. Most marketers believe in assigning weight to each attribute according to what consumers feel important in that product [30]. In this scenario the evaluative dimensions play an important role. Therefore if the moderator variables are unable to represent the major beliefs, the external stimulus has a weak

influence on attitude formation as the consumers are focused on evaluative dimensions. This research like researches done by Supphellen, [10] proved that non-evaluative dimensions are equally important and can influence attitude strength. Advertisements mostly with affective appeal in an undifferentiated telecommunications sector showed considerable impact on attitude formation. In an earlier research Tahseen [31] elaborated the effectiveness of affective appeal

which influenced consumer purchase decisions. Walther et al. [32] viewed both affect and cognition as a reciprocal system, which views consumer processes as both dynamic and interactive and any of the elements can be either a cause or effect of change at any time. The discussion leads us to understanding that there is a strong relationship between affect, cognition and environment. Any attempt to analyze

Table 1: Correlation values of each independent variable on the dependent variable (attitude strength) P >.05

Causal variable	Correlation coefficient (r)	Coefficient of determination %	P value
Advertising	.733(**)	.537	.000
Personal selling	.431(*)	.185	.009
Exposure to displays	.555(**)	.308	.005
Packaging	.445(**)	.198	.009
Word of mouth	.613(**)	.375	.004
Representation from reference groups	.474(**)	.224	.008
Product purchase	.893(**)	.079	.000
Product trial	.736(**)	.541	.001
Samples	.582(**)	.338	.005
Image	.292	.085	.010
Situational influences	.211	.044	.011

Table 2: Regression on direct experiences (methodological paradigm) and attitude strength construct (DV) P>.05

Model summary: attitude strength

Model	R	R Square	Adjusted R square	Std. Error of the estimate	Durbin-Watson
1	.802(a)	.651	.619	.68689	1.981

Test of homogeneity of variances

Levene statistic	df1	df2	Sig.
.642	4	195	.689

Model		Un-standardized Coefficients		Standardized coefficients	t	Sig.
		B	Std. error	Beta		
1	(Constant)	.408	.266		1.538	.126
	Product purchase	.406	.086	.379	4.729	.000
	Samples	.123	.075	.119	1.645	.102
	Product trial	-.015	.072	-.013	-.211	.833

Table 3: Regression on indirect experiences (moderator paradigm) and attitude strength construct (DV) P>.05

Model Summary: attitude strength

Model	R	R Square	Adjusted R square	Std. Error of the estimate	Durbin-Watson
1	.744(a)	.612	.599	.68541	1.882

Test of homogeneity of variances

Levene statistic	df1	df2	Sig.
.714	4	195	.729

Model		Un-standardized coefficients		Standardized coefficients	t	Sig.
		B	Std. error	Beta		
1	(Constant)	.408	.266		1.538	.126
	Advertising	.406	.086	.384	4.729	.000
	Personal selling	.123	.075	.119	1.645	.102
	Packaging	-.015	.072	-.013	-.211	.833
	Word of mouth	.169	.075	.159	2.263	.025
	Representation from reference groups	.370	.072	.384	1.229	.001
	Image	.343	.087	.039	1.645	.003
	Situational influences	.123	.056	.119	2.200	.029

consumer behavior without considering all the three aspects would be incomplete [33]. It was therefore not surprising that situational influences proved to be equally effective in impact attitude strength and ultimately consumer decision-making. The common thread across these 'moderator models' was summarized by Solomon [26] as 'information-attitude-intention-purchase'. The models essentially categorize a causal sequence in which the information from advertising, sales promotion and other sources is obtained, classified and interpreted by individual prospective buyer before being transformed via further mental processing into 'attitudinal' and 'intention' structures. It is these structures that are thought to determine purchasing decision styles [34] and purchase outcomes, such as brand choice, store choice, personal selling and image.

Conclusion

Both methodological and moderator approaches are effective in influencing consumer attitudes.

References

1. Fishbein M, Ajzen I (1975) *Belief, Attitude, Intention, and Behavior: An Introduction to Theory and Research*, Reading, MA: Addison-Wesley.
2. Day E (1997) Qualitative research course emphasizes understanding, merits and limitations, *Marketing News*.
3. Krishnan SH, Smith RE (1998) The relative endurance of attitudes and attitude behavior consistency, *Journal of Consumer Psychology*, 7(3):273-98.
4. Crespi I (1977) Attitude measurement, theory and prediction, *Public Opinion Quarterly*, 41:285-94.
5. Fazio R (1990) Multiple processes by which attitudes guide behavior, in Zanna, M. (Eds), *Advances in Experimental Social Psychology*, Academic Press, San Diego, CA, Vol. 23 pp.75-109.
6. Lunt P, Kokkinaki F (1997) The relationship between attitude accessibility and attitude-behavior consistency, *British Journal of Social Psychology*, 36(4):497-505.
7. Fazio RH (1986) How Do Attitudes Guide Behavior? in R.M. Sorrentino and E.T. Higgins eds. *Handbook of Motivation and Cognition: Foundations of Social Behavior*, Guilford Press, New York, pp. 204-243.
8. Alden DL, Steenkamp JBEM, Batra R (2006) Consumer attitudes toward marketplace globalization: Structure, antecedents and consequences, *International Journal of Research in Marketing*, 23(3):227-39.
9. Chesebro JW (2000) Communication technologies as symbolic form, *Journal of Marketing Research*, 7 (3):242-50.
10. Supphellen M (2000) Understanding core brand equity: Guidelines for in-depth elicitation of brand associations, *International Journal of Market Research*, 3(3):319-38.

11. Laczniak RN, Teas K (2001) An examination of measurement context affects in empirically based advertising research.
12. Fazio RH, Olson MA (2003) Implicit measures in social cognition research: their meaning and uses, *Annual Review of Psychology*, 54.
13. Ferle C, Lee W (2003) Attitudes towards advertising, *Journal of International Consumer Marketing*, 15(2):5-23.
14. Yang K (2007) Exploring consumer attitudes towards mobile advertising in Taiwan, *Journal of International Consumer Marketing*, 24(3):24-32.
15. Gutman J, Vinson DE (1979) Values Structures and Consumer behavior, in *Advances in Consumer Research*, vol. 6, ed. William L. Wilkie Association for Consumer Research, pp. 335-339:
16. Jahng JJ, Jain HJ, Ramamurthy KR (2007) Effects of interaction richness on consumer attitudes and behavioral intentions in e-commerce: some experimental results. *European Journal of Information Systems: An Official* 16, (3):254-69.
17. Swinyard WR, Smith RE (1983) Attitude behavior consistency: The impact of products trial versus advertising, *Journal of Marketing Research*, 20(3):257-67.
18. Karjaluoto H, Mattila M, Pentto T (2002) Factors underlying attitude formation towards online banking in Finland.
19. Davis FD (1989) Perceived usefulness, perceived ease of use, and user acceptance of information technology, *MIS Quarterly*, 13:319-40.
20. Coursaris C, Hassanein K (2002) Understanding m-commerce: A consumer centric model, *Quarterly Journal of Electronic Commerce*, 3(3):247-71.
21. Orlikowski WJ, Iacono SZ (2001) Research commentary: Desperately seeking "IT" In IT researches - A call to theorizing the IT artifact. *Information Systems Research* 12(2):121.
22. Rogers EM (2003) *Diffusion of Innovations* (5thEd) The Free Press: New York.
23. Venkatesh V, Davis FD (2000) A theoretical extension of technology acceptance model: Four longitudinal studies, *Management Science*, 46(2):186-204.
24. Du Frene et al. (2005) Changes in consumer attitudes, resulting from participation in permission email campaign, *Journal of current issues in research in advertising*, 27(1):65-75
25. Fisher C (2004) *Writing Research dissertations for Business Students* London: Prentice Hall.
26. Solmon MR (2006) *Consumer Behavior: Buying having being*, UK: Person Education.
27. Tabachnik BG, Fidell LS (2007) *Using Multivariate Statistics*, London: Pearson International Education.
28. Pallant J (2005) *SPSS Survival Manual*. (3rd edition) USA: Open University Press.
29. Hoyer WD, MacInnis DJ (2008) *Consumer Behavior*, USA: Houghton-Mifflin.
30. Voss Kevin E, Eric R Spangenberg, Bianca Grohmann (2003) Measuring the hedonic and utilitarian dimensions of consumer attitude, *Journal of Marketing Research*, 40:310-20.
31. Tahseen Arshi A (2012) Communication model and organizational strategies: do advertisements influence consumer attitude and change, *Journal of Management Research*, 4(4):133-146.
32. Waller et al. (20005) Advertising of controversial products: A cross cultural study, *Journal of Consumer Marketing* 22(1):6-13.
33. Dirk H, Jan DH (2010) *Cognition and Emotion: reviews of current research and theories*. France: Lavoissier, SAS.
34. Foxall Gordon R, Seema Bhate (1993) Cognitive styles and personal involvement of market initiators for 'healthy' food brands: Implications for adoption theory. *Journal of Economic Psychology*, 14:33-56.