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Influence Of Choice Context On Consumer Decision Making In Global Electronic Commerce

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The objective of this paper is to understand how choice context will influence the decision making process of consumers when shopping at electronic shopping malls. This paper provides a framework for exploring context effects on consumer judgment and choice processes in the special case of electronic commerce. First an outline of the judgment process is presented which is used to identify the stages where the context effects may occur. The literature in experimental and social psychology, behavioral decision theory and consumer research are selectively reviewed for evidence regarding context effects on judgment. The approach adopted in this paper borrows directly from at least two converging sources : the cross-functional research in judgment and decision making in consumer behavior and cognitive psychology and the research in marketing issues in electronic commerce. The managerial implications of this research are answers to questions such as how best can the firm exploit this new form of transacting business to maximize its leverage in the market place and increase its market share. The academic contribution of this research on context effects is that it helps to reconcile two diverging research streams on judgment and choice (the economic perspective and the behavioral perspective).

1. Research Objectives And Theoretical Foundations Of The Study

"One must learn by doing the thing, for though you think you know it - you have no certainty, until you try."..(Sopholes, 400 B.C.)

How do consumers browsing the electronic shopping malls on the Internet make their purchasing decisions? This question is of crucial interest to advertisers and marketing people given that the volume of business transactions on the World Wide Web is projected to grow to a value of \$ 3 billion by the year 2000 [Hoffman and Novak, 1996a]. The Internet has the potential to revolutionize global marketing [Quelch and Klein, 1996]. Small firms could set up an Internet web site at a relatively low cost and leverage this Internet presence to reach millions of customers worldwide. The Internet offers significant advantages over traditional marketing channels by providing marketers the ability to transact business with their customers effortlessly, regardless of the fact that they may be in different locations and in different time zones. For products such as software and information-based products, the Internet could serve not only as the medium of communication and transaction of business, but also as the medium of delivery of the product to the user.

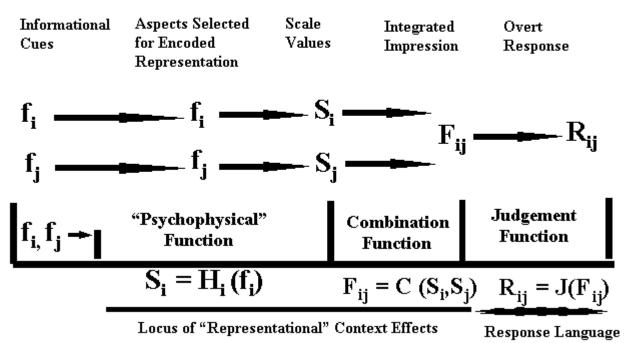
The approach adopted in this paper borrows directly from at least two converging sources : the crossfunctional research in judgment and decision making in consumer behavior and cognitive psychology [Samuelson and Zeckhauser, 1988; Simonson and Tversky, 1992], and the research in marketing issues in electronic commerce [Jarvenpaa and Todd, 1996a, 1996b; Kalakota and Whinston, 1996; Hoffman and Novak, 1996a, 1996b, 1996c; Hoffman, Novak and Chatterjee, 1996; Gupta, 1995; Quelch and Klein, 1996; Armstrong and Hagel, 1996].

Simonson and Tversky, [1992] found that consumer choice is affected by the context in which the decision is made. Consumer decision making involves many different types of judgments. Consumers' judgments of a particular stimulus are usually made in the presence of other stimuli. These other stimuli that are present define the "context" of the decision. Judgments of a stimulus are affected not only by the attributes of the stimulus itself, but also by the other stimuli that accompany it in the judgment context. [Chakravati and Lynch, 1983]. This paper deals largely with "context effects" in judgment and choice. Context effects refer

to instances in which the judgment process or its outcome that are due to other stimuli in the set of available options.

Section 2 outlines the theoretical model of the consumers' decision making process and the application of this model in a broad variety of contexts. The previous research on context effects is also discussed here. Section 3 presents the hypotheses generated from the model. Section 4 outlines the conclusions, the proposed extensions to the research, and the expected contributions of the study to research and practice.

A General Outline of the Context Effects on Judgement and Decision Making



2. Model Of The Consumers' Decision Making Process

The way in which context effects occur in judgments is illustrated in the model above which is adapted from Chakravarti and Lynch (1983). Consumers' overt judgments could be influenced by context in at least three potential ways. First, context may influence which aspects of a stimulus are selected for processing. Context could affect the selection of aspects for processing in two ways. It could bias attentional focus on certain external information or cause selective retrieval of information from long term memory, influencing the contents of short term memory. Second, context may influence the scale values (i.e. the subjective, encoded representations of the stimulus cues). That is, context may influence the category judgments by changing the response language that consumers use to report their subjective judgments [Mellers and Birnbaum, 1982a, 1982b]. Finally, context may influence the judgment function that translates private evaluations to overt ratings. Context may also influence the order in which features are examined in processing rules such as "elimination by aspects" [Tversky 1972].

One of the most counter-intuitive context effects which has been postulated is the effect of context on choice when the newly introduced alternative asymmetrically dominates the previous choice set [Huber, Payne and Puto, 1982; Huber and Puto, 1983; Ratneshwar, Stewart and Shocker, 1987]. These papers investigate the shifts in the shares of an alternative when an asymmetrically dominated alternative is introduced into the choice set. They conclude that a dominated alternative increases the choice proportions

of the alternative that dominates such a placement. If we generalize this to the Internet domain, we have to deal with questions regarding the wisdom of not setting up a web site for an electronic shopping mall. Even though this alternative may be inferior to the traditional marketing channels it would still be useful because of its ability to influence positively the sales through alternative marketing channels.

3. Hypotheses

The hypotheses generated in this section examine the effects which the introduction of a new alternative (electronic shopping) will have on the use of the previously existing alternative choices (retail malls, direct mail catalogs).

Hypothesis 1 : If the consumer lacks experience in shopping on the world wide web, then the context effects of a representational nature will influence the purchase judgment only if the consumer is made aware of the context-dependent attributes of the alternatives prior to making the purchase decision. This awareness could be achieved by cueing the subject about the context dependent attributes by administering a rating scale treatment in which the consumer would rate the alternative choices on the context-dependent attributes and then make his judgment.

What this implies is that if the consumer did not make the rating scale judgment prior to the purchase judgment, then the size of context effects of a representational nature would be negligible, especially if we are dealing with innovative new technologies such as electronic commerce and the Internet. This is in contrast to what we would expect from standard choice behavior. This means that the process of making the pre-purchase judgment makes them aware of the difference in the context attributes of the alternatives.

Hypothesis 2 : If the consumers are familiar with the task (experienced in shopping electronically using web browsers) but are not fully aware of the alternatives, then the context effects will be nullified.

Hypothesis 3 : If the consumer is offered the same products through the traditional marketing channels such as the retail malls or the direct mail catalogs as well as the electronic shopping malls, but the prices posted for the same products at the electronic shopping malls are considerably higher than that for the corresponding products at the retail malls but lower than that of direct mail catalogs, then the consumer may not purchase any merchandise through the electronic shopping malls (since it is the dominated alternative) but he will probably purchase much more merchandise than expected at the retail malls and the direct mail catalogs since he will perceive that he is getting a bargain at these outlets.

4. Contributions And Proposed Extensions Of The Research

4.1 Contributions To Research And Practice

This research has several important implications for the design of marketing strategy by firms. The managerial implications of this research are answers to questions such as how best can the firm exploit this new form of transacting business to maximize its leverage in the market place and increase its market share. How should the firm position its products in the electronic marketplace? Should it position its products as superior in attributes (implying a higher quality to price trade-off) or inferior in attributes as opposed to the conventional channels (the retail malls and the direct mail catalogs)?

The academic contribution of this research on context effects is that it helps to reconcile two diverging research streams on judgment and choice. The economic perspective of rational decision making involves extensive deliberation and a complete evaluation of the important attributes. It results in an optimal choice. The behavioral perspective of decision making is that decisions are largely heuristic in nature, are generally made in the context of incomplete information and usually result in a suboptimal outcome. In this case the

decision maker is treated as an overwhelmed satisficer. This research on context effects provides the middle ground and seeks to reconcile these two opposing stereotypes of decision making.

4.2 Limitations Of The Model

The issues involved in understanding the consumers' decision making process are too complex to do justice to in a simple model which is what has been attempted here. It is critical to understand that in such a complex model, there will be a high degree on interaction effects among the different attributes.

The measure of choice which is conventionally used provides the consumer with only a discrete set of alternatives and fails to capture valuable information regarding the degree by which the chosen alternative is considered to be superior to the other alternatives. We could enhance this measure by using a measure such as the degree of satisfaction with the selected alternative.

4.3 Proposed Extensions To This Research

Most of the research done in this area to date examines the effects of choice context in static choice settings. We need to extend this framework to examine the context effects in a dynamic setting where we could observe the effects of choice context on the search patterns of the subjects. It would be interesting and informative to do research which would link the context effects to the depth of search and to the type of search.

The study of context effects is an important domain for market researchers in view of the growing interest in situational influences on consumer judgment and choice. We intend to study how prior knowledge influences the sensitivity of judgments to context. Finally, we intend to study how context influences the results of measurement methodologies used for gauging consumer perceptions and preferences since these analyses will serve as a useful base for product design and positioning strategies.

> 5. References References available upon request from Rex Eugene Pereira pereira@mail.utexas.edu Phone : (512) 471 1682 Fax : (512) 471 0587