

Perceived Risk Reduction In E-commerce Environments

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Abstract

During the past three decades, the growth of e-commerce has presented marketers with many new arenas for research and application. Certainly e-commerce has become a significant portion of the world economy and in particular the consumer sector. As previous literature has consistently considered perceived risk as a major factor consumer purchase decisions, this research identifies several major components of consumer perceived risk (PR) and their normative implications in the e-commerce environment

As the centrality of perceived risk in consumer purchase decisions has been supported in study after study (Powell 1994; Chaudhuri 2015), perceived risk is well established as an important construct in e-commerce. In the seminal study of perceived risk and Internet purchasing behavior, Powell (1995) created a causal model based on the Theory of Reasoned Action (Fishbein and Azjen 1975). Although perceived risk has long been associated with trust (Nepomuceno, 2014; Detsuch 1958) the two constructs are not identical (Durkheim 1933; Fukuyama 1995). Wang (2001) investigated the level of cue-based trust in an e-commerce environment and found "that lack of trust is one of the main barriers preventing consumers from purchasing from an e-retailer" (p.287). However, he did not attempt to quantify these or other emerging dimensions of perceived risk within e-commerce

As an exploratory step to identify possible PR components, four focus groups were planned and conducted. Sixty-three participants included consumers, IT professionals, students, faculty and staff. Therein, the following possible components were identified. Each was mentioned by at least two of the groups and several were mentioned by all four groups.

Potential Components Identified:

<u>Dimension</u>	<u>Frequency of Mention</u>
1. Company reputation	4
2. Previous purchase	4
3. Return Policy/Guarantees	4
4. Product knowledge	4

5. Word of mouth	3
6. Brand	4
7. Brick & mortar (street address)	2
8. Toll free number	2
9. Net longevity	2
10. Payment options	2
11. Delivery options	2
12. Security seals	2

Since reputation and word-of-mouth appear to be multidimensional constructs, several questions were used to assess each of these sub-dimensions. The final questionnaire of twenty-five items, including the five demographic items, was pre-tested with a convenience sample of 161 self-described Internet users was removed. Principal axis factor analysis, scree plots, and parallel analysis were used to investigate unidimensionality and item groupings. Following, the multi-item construct items were separated and through an orthogonal rotation factor analysis were found to consistently indicate the existence of each factor. Loadings within the resulting matrix ranged from .46 to .84 suggesting that the items represented the factor. Cronbach's Alpha for this pilot study was .91. This finding indicates an acceptable level of reliability on this measure.

Recalling the purpose of our research to identify and quantify the relative effects of each factor on perceived risk as a whole. The instrument asks each subject to rate the importance to their purchase decision of each item on a ten point scale ranging from zero (0) Not Important to ten (10) Very Important. Except for computer knowledge, scale from zero (0) No Experience to ten (10) Very Experienced, the other five demographic items were simply recorded. The second sample consisted of 184 Internet users from four different college disciplines including history, nursing, business and chemistry

Ranked by Mean of Responses

<u>Item</u>	<u>Mean</u>	<u>Std. Deviation</u>	<u>Range</u>
1. Previous Purchase	9.4	0.76	8.2-10
2. Return Policy/Guarantee (2)	9.1	0.67	8.2-10
3. Company Reputation (3)	8.6	1.4	6.4-10
4. Product Knowledge	8.4	2.1	5.8-10
5. Brand	7.8	2.1	4.7-9.1
6. Toll-free Number	7.3	1.8	3.6-9.1
7. Payment Options	6.7	2.6	3.8-9.0
8. Brick & Mortar (3)	6.5	2.3	1.3-7.2
9. Word-of Mouth	5.1	3.4	2.9-8.6
10 Delivery Options	4.1	2.3	1.4-8.9
11. Net Longevity	3.9	1.7	0.0-7.2

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Relevance to Marketing Educators, Researchers and Practitioners:

Additional insight into consumer attitudes, motivations and intentions concerning e-commerce is of continuing value to each of these audiences.

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TRACK: Social Media Marketing/ Electronic Marketing