# THE CHOICE OF CONTENT BY INFORMATION PROVIDERS IN WORD OF MOUTH COMMUNICATIONS

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#### ABSTRACT

Word-of-Mouth communication is an invaluable source of information for consumers. A comprehensive understanding of the flow of market information through interpersonal networks is therefore of unique theoretical and practical importance. Present Word-of-Mouth research is receiver centric, largely ignoring the role of the information provider as a gatekeeper to information dissemination. The objective of this research is to develop a more comprehensive understanding of Word-of-Mouth by modelling the decision making behaviour of information providers. Adopting the network theory general assumption of altruistic exchange motivation, this research uses a choice modelling framework to demonstrate that information providers assign greater utility to (1) information about product features important to the receiver, and (2) information which disconfirms receiver preferences. In addition, these effects are found to be moderated by perceptions about the receiver's knowledge. Existing research has not previously considered information providers' perceptions of receivers as a potential moderator of WOM flow, with the results here suggesting this should be an area of future investigation.

Keywords: Word-of-Mouth; WOM; Information; Provider; Communication; Motivation

Word-of-Mouth (WOM) communication is a central input to consumer decision making (Bansal & Voyer, 2000; Whyte, 1954). Understanding interpersonal exchanges is therefore important for both marketing theory and practice. The vast majority of WOM research has focused on three substantive areas: (1) how information flows through interpersonal networks (Burt, 1980; Granovetter, 1982); (2) the sources and types of information that decision makers seek (Brown & Reingen, 1987; Gilly, Graham, Wolfinbarger, & Yale, 1998; Price & Feick, 1984; Sweeney, Soutar & Mazzarol, 2008); and (3) how this information is used for purchase decisions (Bansal & Voyer, 2000; Still, Barnes Jr., & Kooyman, 1984; Nam, Manchanda, & Chintagunta, 2010). This research largely focuses on the receiver and their need for information. It demonstrates that receivers engage in WOM as an uncertainty reduction strategy during decision making. The literature often explains this phenomenon as a function of the perceived credibility or usefulness of the information source (Grewal, Gotlieb, & Marmorstein, 1994; Jacoby *et al.*, 1994).

Despite consumer preferences for credible information, particularly in WOM communication, individuals are poor knowledge seekers (Graesser, Swamer, Baggett, & Sell, 1996). Generally consumers focus on common rather than unique knowledge, failing to identify what information is missing or needed (Stasser & Titus, 1985). Often their judgements are based on what has been provided whilst ignoring what has been excluded (Islam, Louviere, & Burke, 2007; Kardes, Posavac, & Cronley, 2004). Indeed, this can lead to a 'provision bias', even to the extent that non-diagnostic or irrelevant information can influence product choices (Meyvis & Janiszewski, 2002; Zukier, 1982). Such findings highlight the importance of the search for and use of WOM on the part of receivers, and the inadequacy of that search behaviour. Based on this, it can be argued that practitioners and researchers should balance their focus on receivers with attention to information providers and their choices regarding what information they provide. Supporting this argument is the recognition that information providers are higher order gatekeepers of information (Frenzen & Nakamoto, 1993). Providers have the ability to override the preferences of information seekers by providing alternative information to that requested.

The role of information providers in WOM exchanges remains relatively unexplored in WOM literature (Godes & Mayzlin, 2009). Information providers are motivated to engage in WOM communication for many reasons, including such things as reducing personal anxiety and the desire to help others (Dichter, 1966; Hennig-Thurau, Gwinner, Walsh, & Gremler, 2004; Laughlin & MacDonald, 2010; Sundaram, Mitra, & Webster, 2007). In particular though, network based theories often assert that an altruistic type motive is necessary for the successful maintenance of relationships (Burt, 1980; Granovetter, 1982). Without some basis of altruism among exchange partners, relationship breakdown is all but inevitable leading to social malfunction. Thus, this altruistic type motive is assumed to be the basis for most WOM exchanges.

This research is motivated by the influential nature of WOM on receiver decision making, as well as the centrality of interpersonal networks to the dissemination of information (Frenzen & Nakamoto, 1993; Rogers, 1995). We aim to establish a more complete conceptualisation of WOM by modelling how information providers choose what to communicate under conditions of information scarcity. To do so, it is suggested that while the information that one consumer could provide to another is essentially unlimited, the actual amount of information that they can provide is limited, due to the provider and receiver's cognitive and time limitations (Lussier & Olshavsky, 1979). As a consequence, the provider is forced to make choices about what to communicate. This research not only enhances theoretical understanding, but facilitates new insights and opportunities for WOM management. By understanding what consumers are likely to communicate by WOM, marketers have the ability to meaningfully attempt to influence communication content, rather than just promote increased communication.

In order to gain these insights into provider decision making, a choice model relating information characteristics to receiver characteristics is introduced and tested using an online experiment. Implications of the findings are considered with specific reference to provider information preferences. Of note is how this experiment brings into question the core assumption of altruism underpinning much of the network based literature.

# CONCEPTUAL DEVELOPMENT

# **Information Providers and Information Flow in WOM**

Research has found numerous factors that influence information flow. For examples see Brown & Reingen (1987), Gilly et al. (1998), Kempf & Palan (2006) and Sweeney et al. (2008). While much valuable insight has been gained from these research topics, very little WOM research has attempted to manipulate information content systematically as a variable, despite acknowledging that it varies across networks (Frenzen & Nakamoto, 1993). Most studies do not discuss the nature of the information being transmitted by consumers, or it is held constant as an ex ante construct (Arndt, 1967; Frenzen & Nakamoto, 1993; Gilly et al., 1998). Ultimately, consumers acting as information providers have the ability to choose (a) what content to provide, and (b) how much information to provide (Schwartz, 2004; Ziamou & Ratneshwar, 2002). This research focuses on the first aspect; namely the choices made by an information provider about what information to communicate to another consumer.

#### **A Model for Information Provision**

The choice about what information consumers will provide to others is considered in the current research using Random Utility Theory (RUT). In RUT, choice behaviour is modelled as a function of measurable components (for example, product features) each of which plays a

different role in determining overall judgements about available options. The choices themselves are described as being made based on utility maximisation (Thurstone, 1927). By observing choices and systematically relating these to measurable features, one can gain insight into what determines choice in a particular decision environment. There is some randomness when one observes such choices that cannot be explained or captured. To accommodate the presence of both the measurable and un-measurable components of utility, latent utility ( $U_i$ ) is considered to be a function of both what one can observe to explain choices ( $V_i$ ) and what one cannot ( $\varepsilon_i$ ). The unobserved, or random, component of utility ( $\varepsilon_i$ ) is assumed to conform to a specific distribution for the purposes of estimation. This assumption will be discussed shortly. Thus we can specify that,

$$U_i = V_i + \varepsilon_i \tag{1}$$

RUT assumes that, in order to determine utility, decision-makers consider each option 'i' on 'k' dimensions  $(x_{ki})$  and weight each dimension on the basis of its perceived importance for delivering value  $(\beta_k)$ . Subsequently, the systematic component can be modelled as a linear function and written in matrix form as  $V_i = X_i\beta$  (Ben-Akiva & Lerman, 1985).

The choice of information by providers can be examined within such a framework. First, it is assumed that providers choose to disseminate a particular piece of information among several options, similar to a choice set a consumer faces when deciding among various products. Each option can be assessed prior to dissemination, with a utility value ascribed. The provider then chooses the option that maximises utility.

This model requires expansion on two aspects. First, it is unclear what defines the overall utility of information and how it is maximised. It is assumed that information providers judge each information option in terms of its ability to maximise the benefits to the receiver by improving his or her ability to discriminate among products in line with altruistic motivations. The validity of this assumption is discussed in the next section. Second, it is unclear what dimensions may be used as a basis for evaluating the information. This is analogous to what factors determine the value of a product such as price, brand, package dimensions, etc. This is also considered in the next section allowing us to build a model describing what information consumers choose to provide others.

#### **Information Provider Motivation: The Role of Altruism**

A motivational orientation that is focused on the benefits and costs that an exchange partner may receive, often described as an 'other orientation', is used to characterise altruism in most discussions of WOM motivations (Dichter, 1966; Horowitz *et al.*, 2006; Laughlin & MacDonald, 2010). Altruism reflects the motivation of the provider to give information freely

with no regard for him- or her-self; and has been demonstrated among strangers as well as among those with close interpersonal ties (Constant, Sproull, & Kiesler, 1996). Literature examining communication altruism often focuses on the receiver's desire to respond to an altruistic provider rather than on the provider's original altruistic actions (Euhara, 1995).

Other provider motivations have been considered in the literature. Motivations include the desire to have further involvement with the product, to reduce personal anxiety, or to communicate a liked message previously received (Dichter, 1966; Kamins, Folkes, & Perner, 1997). While the provider's choice to communicate by WOM at an individual level is likely to be more complex than any one of these motivations, we note that theories of social networks and social function broadly assumes altruism as a necessary feature to ensure ongoing relations (Granovetter, 1982). The current model thus assumes that information providers judge the utility of information on its ability to optimise receiver decision-making, an altruistic communication motivation. This assumption forms a reasonable basis to develop a model of the factors determining information utility.

# **Determinants of Information Utility**

Our RUT based framework describes how providers judge each information piece 'i' on a particular dimension 'k'  $(x_{ki})$  and weight each dimension based on its perceived importance for delivering value to receivers  $(\beta_k)$ , as per the altruism assumption. Within this framework, two information characteristics are explored. These are the importance of the product feature which the information concerns, and whether the information (dis)confirms existing preferences.

Information search literature has identified that consumers search for and use product attribute information by decreasing order of attribute importance (Meyer & Sathi, 1985; Saad, 1999; Saad & Russo, 1996). This implies information is more or less valuable depending on whether it references more or less important product features. Some research indicates a direct link between product feature importance and information value for providers, however this relationship is assumed and has not been formally tested (Arndt, 1967; Frenzen & Nakamoto, 1993; Gilly *et al.*, 1998; Grewal *et al.*, 1994).

Taking into consideration the role of product feature importance in determining information utility, it is proposed that information providers will be more likely to infer that the consumer whom they are helping will have a greater utility for information regarding important features relative to less important features (Bettman, Luce, & Payne, 1998; Swait, 2001). In most studies examining information search, importance is determined by the internal preferences of the individual searching (e.g., Saad 1991); in cases of information provision, it is assumed that an information provider must form expectations about what are important features for the receiver. The provider may form this expectation naively using their own preferences as a reference point. Alternatively, they may infer the preferences of the receiver based on previous

interactions with them or what they have been told about them (e.g., they are a vegetarian). In either circumstance, the provision of such information about important product features would allow receivers to make more informed trade-offs among products.

H1 Information providers will assign greater utility to information about an important product feature compared to an unimportant feature.

Research has also identified that disconfirming information is particularly effective in reducing decision risk by improving consumer understanding of alternatives and correcting inaccurate beliefs (Herr et al., 1991; Laczniak, DeCarlo, & Ramaswami, 2001). Disconfirming information is best characterised as that which refutes or corrects a prior perception. For example, a belief that a newly released film is worthwhile seeing based on viewing an enticing preview may be disconfirmed by reading a negative review or hearing the negative opinion of a friend who has already seen it. Beliefs and perceptions are more readily updated by negative, or disconfirming, information (Hogarth & Einhorn, 1992), and it has been found that receiver consumers prioritise its acquisition due to its diagnostic properties (Ahluwalia & Gurhan, 1998). Novelty effects have also been offered as an explanation for preferences for disconfirming information; that is, the novelty of disconfirming information increases its accessibility in memory and therefore its salience in the decision making process (Peracchio & Tybout, 1996; Sternberg, 2001). Subsequently, information providers may display a positive bias toward disconfirming information (Peracchio & Tybout, 1996; Sternberg, 2001). Based on this, it is expected that the altruistic information provider will prioritise disconfirming information when engaging in WOM exchanges.

H2 Information providers will assign greater utility to disconfirming information relative to confirming information.

# The Receiver as a Moderator of Providers' Choices

A large proportion of research into WOM communication focuses on how providers are assessed by those receiving information (Gilly *et al.*, 1998; Grewal *et al.*, 1994; Yale & Gilly, 1995). The emphasis on examining receiver perceptions in the literature suggests that individuals in a WOM exchange do assess the nature of their exchange partner when communicating. This indicates that the presence of such an assessment on the part of the provider is reasonable, and thus important to consider.

Underlying communication decisions is the likely need for the provider to understand the different information requirements of various receivers as this permits them to meaningfully maximise receivers' utility (Kempf & Palan, 2006). Testing for such differential understanding on the part of the provider therefore makes an important contribution to testing the validity of the

underlying framework. To address this knowledge gap, the construct of receiver expertise is introduced.

To discriminate among options and make product choices, novice consumers require basic knowledge of product features. Motivated by decision difficulty, the novice's decision-making process, however, may be simplified to focus on a few critical features, rather than the full range of possible product differences (Bettman *et al.*, 1998). In turn, information providers are likely to favour the provision of information regarding important product features when communicating with novice receivers.

H3 Information providers will assign greater utility to information about an important product feature compared to information about an unimportant feature, more so when the receiver is known to be a novice rather than an expert.

In contrast to the information needs of novices, experts' well-developed preferences may render information about important features irrelevant in assisting them to discriminate among options (Gilliland & Neal, 1993; Johnson & Katrichis, 1988). In addition, the receiver would benefit more from information that is unique and something they do not already know. Therefore, any information that disconfirms commonly held preferences among consumers could be beneficial, relative to information confirming existing knowledge (Ahluwalia & Gurhan, 1998). While this is true for both novices and experts alike, the ability for experts to deal with disconfirming knowledge and integrate it with existing knowledge may lead information providers to believe that experts are better equipped, relative to novices, to deal with the confusion that it creates (Maheswaran & Sternthal, 1990).

H4 Information providers will assign greater utility to receiver preference disconfirming information compared to receiver preference confirming information, more so when the receiver is known to be an expert rather than a novice.

### The Model

We revisit the RUT model of information provision and hypothesise that providers will judge the value of a piece of information 'i' on dimension 'k'  $(x_{ki})$ , and that this is moderated by the characteristics of those receiving this information (Z). It is possible to expand the systematic component of utility such that in matrix form:

$$V_{it} = X_i \beta + Z \xi + (X_i Z) \gamma$$
 (2)

where  $V_{it}$  is the utility of information 'i' to provider 't', Z is a matrix describing characteristics of the receiver; in the two studies that follow, it represents an indication of whether they are an

expert relative to one that is a novice. The random component ( $\varepsilon_i$ ) of latent utility ( $U_i$ ) is assumed to follow a Gumbel distribution, such that differences in the errors then follow a logistic distribution. This results in the multinomial logit (MNL) model (Ben-Akiva & Lerman, 1985):

$$P_{it} = \frac{e^{V_{it}}}{\sum_{j}^{J} e^{V_{jt}}} = \frac{e^{X_{i}\beta + Z\xi + X_{i}Z\gamma}}{\sum_{j}^{J} e^{X_{j}\beta + Z\xi + X_{j}Z\gamma}}$$
(3)

which describes the probability that information 'i' will be prioritised for dissemination by provider 't' from the set of information available, with J pieces available in total. Hypothesis 1 and 2 can be tested by examining the significance of elements in the vector  $\beta$  that relate to the dimensions of importance and (dis)confirmation, respectively. The significance of the  $\beta$  associated with each dimension would indicate that providers are using that dimension when choosing information for communication. Hypotheses 3 and 4 can be tested by examining the estimated parameter  $\gamma$  with significant terms indicating that information providers judge the information features ( $X_i$ ) differently for experts and novices (Z). The inclusion of the parameter  $\zeta$  for the main effect of the expertise of the receiver (Z) on the utility of information i ensures that any extraneous effects arising from the manipulation of expertise do not bias the estimates associated with the research hypotheses.

#### **EXPERIMENTAL APPROACH**

# **Background and Sample Specification**

A choice-based experiment was chosen to test the hypothesised effects as it allowed control over the information provided to respondents and also allowed manipulation of the expertise of the hypothetical receivers between respondents. Three product categories were chosen as the context for these experiments with respondents allocated to complete the experiment in one. Each is a category where WOM is an important information source for consumer decisions. The categories chosen were a high involvement service (holiday package), a high involvement product (personal computer) and a low involvement product with service components (home-delivered pizza).

Participants were university students, randomly assigned to one of six surveys. This sample is considered reasonable as all products examined are relevant to this group (Greenberg, 1987). In total 50 people were sampled in each of the six conditions.

# **Experimental Procedure**

Information statements were developed based on prior research into the importance of features for each of the selected products (Lenk *et al.*, 1996; Severin, 2000). An exploratory study verified the features as being of high or low importance. Statements that confirmed and disconfirmed preferences for each feature were developed and pre-tested. This resulted in eight possible statements per category. Each statement addressed one product feature and one preference substantiation type. Four product features (two of greater importance; two of lesser importance) and two preference substantiation types (confirmation; disconfirmation) for each product category were used. A fractional factorial design ascribed the levels of the attributes to ensure all main effects and two-way interactions could be estimated.

The eight statements for each product category were varied using a balanced incomplete block design (BIBD). The BIBD resulted in 14 choice sets, with four statements in each. In this BIBD each statement occurred 7 times with a pair frequency of 3. Two versions of this experiment were created by priming the respondent to believe that the receiver was either seeking information because (a) as a novice, they had no prior purchase experience and "knew nothing", or (b) as an expert, they had a lot of purchase experience and they were just seeking a "second opinion".

The experiment proceeded as follows. A description of the relevant product was provided to give context to the task and to establish baseline preferences for the (un/important) product features. The baseline preferences were necessary as the information in the statements available for the participant to choose had to later confirm or disconfirm such preferences in a systematic manner. Additional redundant product information was included to mask this objective. The primer for the receiver's expertise was then included followed by the information choice experiment. For each set in the experiment the participant identified the statement that they would choose to communicate by WOM to the receiver described.

#### RESULTS

An MNL was estimated for each product. Main effects and interactions between the information and receiver characteristics were included. These are shown in Table 1.

Table 1								
Model results for the choice of information based on its characteristics								
		Holiday Package		Personal Computer		Delivered Pizza		
Variable		β	s.e.	β	s.e.	β	s.e.	
Intercept		04	.07	47**	.06	57**	.06	
Important	H1:+	.59**	.04	.38**	.04	.17**	.04	
Confirmation	H2:-	26**	.04	22**	.04	.19**	.04	
Important x Confirmation		07	.04	13**	.04	.42**	.04	
Expert		.23**	.07	.15*	.06	.04	.07	
Expert x Important	H3:-	.06	.04	.05	.04	06	.04	

Expert x Confirmation	H4:-	11**	.04	09**	.04	08**	.04
Expert x Important x Confirm		05	.04	05	.04	.00	.04
Log-Likelihood:	Null	-2253.21		-2253.21		-2253.21	
	Model	-2031.93		-2121.95		-2103.33	

Note. The intercepts are coded as 1 for the choice of any statement or zero for no choice to remove any innate propensity to communicate.

The reference value is the choice to not communicate any statement. The name of the parameter indicates the level coded +1 and the alternative coded as 0 for the information and -1 for expertise. \*p < 0.05. \*\*p < 0.01

Hypothesis 1 proposed that providers assign greater priority to information concerning an important feature. In all three categories examined, the 'importance' parameter is both positive and significant, supporting hypothesis 1.

The results for information about holiday packages and personal computers reveal that the parameter estimate labeled 'confirmation' is negative and significant in support of hypothesis 2. By contrast, the same parameter in the home-delivered pizza condition was positive and significant. To investigate this inconsistent result from the home-delivered pizza context, a model was estimated to examine the separate value of each of the eight information statements. This disaggregate model allowed the exploration of each statement to identify if any particular statement was the source of the inconsistency.

	Table 2							
Model results for each statement for the home-delivered pizza category								
			Confirm/					
	Statement	Attribute	Disconfirm	β	s.e.			
1	This shop has one of the largest menu options around.	Range (Important)	Confirm	.41**	.09			
	The pizza shop is very fast at preparing the pizzas for delivery.	Delivery Time (Important)	Confirm	02	.09			
	Most of the pizzas on the menu tend to have very similar toppings.	Range (Important)	Disconfirm	82**	.12			
4	There are a lot of road-works around the shopping centre that may delay delivery.	Delivery Time (Important)	Disconfirm	-1.24**	.14			
	The shop is always happy to deliver soft drink with the pizza.	Drinks (Unimportant)	Confirm	-1.62**	.16			
	The vegetarian pizzas have a great array of vegetable toppings.	Vegetarian (Unimportant)	Confirm	56**	.11			
	The brand of soft drink the shop stocks don't taste nice.	Drinks (Unimportant)	Disconfirm	-1.92**	.19			
	The last couple of times I ordered a vegetarian pizza it had meat on it.	Vegetarian (Unimportant)	Disconfirm	.15	.09			
Log-Likelihood:		No coefficients:	-2253.21					
		Model:	-1996.79					
Note. The reference value is the choice to not communicate any statement. Each statement is dummy coded. $*p < 0.05$ . $**p < 0.01$ .								

Table 2 reveals results that are inconsistent with expectations regarding the estimated value of some statements. Upon reviewing the language of the statements themselves, two phenomena were identified that may account for the different results for this product.

First, in relation to the feature 'the availability of vegetarian alternatives', the statements concerning this seemingly less important feature (statements 6 and 8) have an unexpectedly high propensity to be communicated. This may be explained by the method used in pre-testing to establish the feature's importance. Pre-testing asked individuals to rate this feature's importance to them. On average, respondents indicated it was relatively unimportant (to them). However, in the main experiment, priming indicated that the receiver was interested in this feature. Unlike other product features where this would be interpreted as mere preference, for vegetarian alternatives this is likely to be interpreted as a requirement for vegetarian consumption. Drawing on the assumption in the model that information providers will act in the best interest of receivers, it is reasonable to expect them to treat this feature as important for a receiver who appears to be a vegetarian, even if it is unimportant to themselves. This offers evidence towards the underlying assumption of altruistic motivations on the part of the provider.

The second phenomenon identified in the home-delivered pizza results was a unique language structure not present in the other categories. For the two statements that disconfirmed the important features (statements 3 and 4 in Table 3), the facts contained in the statement are potentially ambiguous. The use of the terms 'may' and 'tend' suggests that the events described have only a probability of occurring. For these statements it can be seen that the propensity to communicate drops dramatically compared to expectations. The results arising from the inclusion of this language structure are also in line with the altruistic assumption in the model. It can be expected that information that is not certain would be less helpful for an uncertain receiver decision-maker, and as a result would not be prioritised for communication by a helpful provider.

These two phenomena suggest that information providers assess information in a manner that considers how it will be useful in terms of the preferences of the receiver, and moves beyond the more general assessment currently described in hypothesis 1 and 2. This altruistic assessment is similar to the arguments underlying hypothesis 3 and 4, but suggests assessments are more extensive than those relating to the knowledge of the receiver and considers their specific tastes, beliefs and practices (e.g., vegetarianism).

We now consider the moderating role of the provider's perceptions of the receiver's knowledge (novice or expert) on their choice to disseminate information. Under hypothesis 3 it was predicted that receiver knowledge would negatively moderate the effects of feature importance. The interaction between the expertise of the receiver and feature importance are insignificant in all categories. Thus, no empirical support for Hypothesis 3 is evident.

Hypothesis 4 proposed that information providers prioritise information that disconfirms existing preferences, more so when the receiver is known to be an expert rather than a novice. The results support this assertion in all three product categories: the interaction terms between the content dimension relating to preference confirmation and the term describing the receivers' expertise were negative and significant.

#### DISCUSSION

This research contributes to our understanding of one of the most important information sources in the marketplace, consumers. Through modeling provider WOM decision making under conditions of information scarcity a greater theoretical understanding of WOM is provided, offering new insights for targeted WOM management.

The results supported the research hypotheses for the most part. Information providers were found to attach higher utility values to communications concerning important product features as well as to disconfirming information. The research also suggests that consumers do indeed make inferences about receiver expertise and that this affects their judgements about the utility of information during WOM. Interestingly however this applies to the provision of disconfirming information, but not to that of information concerning important product features. Specifically, the model demonstrates that information providers value disconfirming information more highly and that this effect is greater for expert receivers. The result that expertise does not moderate the choice of information based on the importance of the product feature it concerns suggests that providers will choose to communicate information concerning important features (as found in Hypothesis 1) irrespective of the expertise of the receiver. This indicates the possible presence of a social norm for the provision of such important information to all receivers, irrespective of their characteristics. What is interesting is the limited nature of this norm to this one information characteristic. Whether this norm persists, and if other norms exist, presents an opportunity for further research.

The results of this research have particularly important implications for the underlying assumption of altruism present in this model and much of the network research. The high utility of information generally concerning important product features and disconfirming existing preferences is entirely compliant with this assumption. Although the support for the altruism assumption seems clear based on these individual results, as it is such a core assumption we opted to investigate it further.

The presence of the moderating effect of receiver expertise on the confirming nature of the information, but not on the importance of the feature that the information concerns, has important implications for our knowledge of exchange motivations. It was expected that the expertise of the receiver would moderate the choice of information concerning more or less important product features. What is interesting was not the support or refutation of any single hypothesis, but the combination of results that we observed here.

Taking a different motivational assumption, if a provider wished to reduce their own anxiety about purchase decisions and confirm their own beliefs about a product, the same information would be prioritised for WOM communication that we observed here. A provider would be more likely to provide information that disconfirms the receiver's preferences, as it would serve the dual role of confirming the providers' own beliefs and preferences for this less commonly known information (Dichter, 1966; Gilliland & Neal, 1993; Johnson & Katrichis, 1988; Sundaram *et al.*, 2007). This would be seen to an even greater extent when communicating with an expert receiver who is in a better position to, in return, confirm those beliefs. Furthermore, such confirmation of own beliefs would most likely be on less important product features as there is less commonly held belief about such features. Thus, in the presence of an expert receiver, if the provider were pursuing this motivation, information concerning more important product features would be of lower utility. Even under this other common motivational form described in the literature, the results in this research are still consistent with the behaviours we would expect in real markets. This suggests these results even have generalisability beyond purely altruistic contexts.

The research results reinforce the importance of segmented communication strategies and the search efficiencies awarded to consumers who engage in WOM. A managerial caveat to this is recognising the important role that information providers play in correcting the preferences of other consumers. A manufacturer or retailer may know more about the objective benefit of a product feature than consumers. For example, a firm may know that '*Pro-Vitamins*' in shampoo offer little benefit to consumers, as vitamins have no impact on the dead cells making up hair, but consumers may not know this (Broniarczyk & Gershoff, 2003). Such incorrect beliefs can often be attributed to the asymmetries of marketplace information. So, marketers relying on asymmetries in information about their products need to be wary as information providers' value disconfirming information on behalf of misinformed receiver-consumers and their WOM communications may counteract such strategies. Of course, some companies position products that do address such misconceptions, and the support of consumers as information providers in highlighting how a new product addresses the negative aspects of prior offerings could be used to obtain competitive advantage.

## CONCLUSIONS AND FUTURE RESEARCH

This research has highlighted the gatekeeper role of information providers in WOM communications. The findings suggest that future research into WOM communication should seek to accommodate both provider and receiver perspectives to achieve greater validity. During interpersonal exchange information providers also face natural demands, such as managing the choice of content in response to the propositions of other consumers (Thomas, 1992).

Conversations involve turn taking, thus accommodating both sender and receiver actions is critical to understanding WOM.

The research approach has also provided a new methodological tool for examining WOM communication. Choice experiments provide the ability to understand the complex but systematic decisions providers make when selecting information for communication to various receivers. Future research can continue to build on this initial methodological application. In everyday WOM, the choice of information is dictated by the knowledge of the consumer providing the information. Not only is a lack of knowledge an impediment to what can be communicated, but issues of recall and cognition need to be recognised (Lynch Jr., Marmorstein, & Weigold, 1988; Stafford *et al.*, 1987). Hence, one potential avenue for future research is to consider a provider's knowledge and recall on his or her decisions regarding what information to communicate by WOM.

Other information dimensions that may affect priorities during information communication can also be included into future research experiments. These may include such things as the linguistic features of the statements communicated by the provider and others that capture the possible economic impact(s) of the information for the receiver. There is a need to develop further understanding of which dimensions are the most critical in determining the nature of the information flows in WOM communication from both the provider and receiver perspectives.

The assumption of altruistic type motivations underlying much of the social network and systems literature also needs expansion. Presently the literature addressing individual level WOM has identified a number of alternative motivations that can drive communication behaviour (Cox & Deck, 2005; Dichter, 1966; Horowitz *et al.*, 2006; Sundaram *et al.*, 2007; Walsh, Gwinner & Swanson, 2004). These have not readily been incorporated into the social network perspectives of WOM function. While altruism clearly presents as one of the core motivations driving WOM communication exploring what other motivations may form part of this core offers an exciting avenue for future research.

A final avenue for future research is the examination of provider perspectives in other forms of WOM. This research emphasised interpersonal WOM, however online, viral and referral communication are growing areas of research interest (De Bruyn & Lilien, 2008; Dwyer, 2007; Laughlin & MacDonald, 2010; Schultz, 2010). The model developed here clearly delineates between motivations and behaviour with regard to WOM. A less personal online environment may lead a provider to be motivated by more selfish desires in their communications, providing information that helps them as much as any receiver (Ho & Dempsey, 2010). Likewise, the more explicit nature of online communication may lead providers to select information more suited to this type of medium (Mazzarol, Sweeney & Soutar, 2007). In both cases different communications may occur. Investigating the possible

differences in provider motivation and behaviour between these communication contexts would provide a rich understanding of how consumers use communication to influence each others' decisions in everyday life.

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