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## **The Effectiveness of Facilitated Business-to-Business Word-of Mouth Marketing Strategies on Target Participants' Information Sharing Behavior**

Pei Xu <sup>a</sup>, Joan Fulton <sup>b</sup><sup>Ⓢ</sup>, Corinne Alexander <sup>c</sup>, and Jay Akridge <sup>d</sup>

<sup>a</sup> *Assistant Professor, Department of Agricultural Science, Business and Dairy, Morrisville State College, Morrisville State College, P. O. Box 901, Morrisville, NY 13408, U.S.A.*

<sup>b</sup> *Professor, Department of Agricultural Economics, Purdue University, 403 West State Street, West Lafayette, IN 47906-2056, U.S.A.*

<sup>c</sup> *Assistant Professor, Department of Agricultural Economics, Purdue University, 403 West State Street, West Lafayette, IN 47906-2056, U.S.A.*

<sup>d</sup> *Glenn W. Sample Dean of College of Agriculture and Professor of Agricultural Economics, Purdue University, 615 West State Street, West Lafayette, IN 47904-2053, U.S.A.*

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### **Abstract**

This study examines the impact of facilitated business-to-business (B2B) word-of-mouth (WOM) on participants' information transmission decisions. We also examine characteristics of WOM participants and determine the types of participants who spread information. Understanding WOM participants' information sharing decisions is extremely important to agribusinesses using WOM in their marketing mix.

For an expendable crop input, the most important factor in determining whether producers share WOM initiative information with peers is how often they are asked for advice by their peers. In contrast, for an expendable companion animal product the most important factor in determining whether veterinarians share WOM initiative information with peers is whether they had a satisfactory experience in the WOM initiative.

**Keywords:** facilitated B2B WOM, effectiveness of facilitated B2B WOM, indirect impact of facilitated B2B WOM, agribusiness firms' information sharing decisions

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<sup>Ⓢ</sup>Corresponding author: Tel: + 1 765-494-0594  
Email: [fultonj@purdue.edu](mailto:fultonj@purdue.edu)

Other contact information: P. Xu: [xup@morrisville.edu](mailto:xup@morrisville.edu)  
C. Alexander: [cealexan@purdue.edu](mailto:cealexan@purdue.edu)  
J. Akridge: [akridge@purdue.edu](mailto:akridge@purdue.edu)

## **Introduction**

Marketing trends have pushed agribusiness marketers toward more focused communications with customers by providing them with tailored information through tactics such as direct mail, telemarketing, personal selling, and facilitated WOM (Kotler and Armstrong, 2006, page 428). Agribusiness marketers have recognized the effect of facilitated word-of-mouth (WOM) information on product and service demand. Most people think about spontaneous conversation when they think of WOM. For example, Rogers (1962) recorded that Oregon farmers sought peers' opinion about a hybrid seed corn product before placing orders. However, WOM conversations among businesses buyers can go beyond the spontaneous and be facilitated to disseminate product information and generate sales. One type of facilitated business to business (B2B) WOM is audio teleconferences (Falwell, 2002; Xu, 2007). WOM audio teleconferences typically last for about an hour with 18 to 20 decision makers or decision making influencers on a conference phone call. The objective of these initiatives is to provide the participants with detailed information on product performance and value in a manner that is credible because it is coming from their peers (rather than from the manufacturer's employees or advertising). A trained facilitator directs the discussion to ensure that it stays focused on the product under consideration and that key points are highlighted. The facilitator does not play the role of promoting the product either positively or negatively. The perceived benefit of this form of marketing is that the business participants feel that they are receiving unbiased information from their peers, who they consider a credible source. The overall objective is to identify how to make WOM marketing a more effective marketing tool for agribusinesses. This study focuses on the indirect impact of facilitated B2B WOM on information sharing behavior of WOM participants, i.e. how an agribusiness can get its customers talking to each other about their product in a positive manner. Our specific objective is to identify the characteristics of customers who are more likely to share information with other customers. First, we distinguish WOM participants who share WOM information with customers from those who do not share at all and second we identify those who share information with many customers. We use two examples, a U.S. crop expendable input where the customers are farmers, and a companion animal product where the decision influencers' are veterinarians. Business marketers can use the results of this study to assist in evaluating their customer databases and segment the customer database to invite those customers, who are more likely to share information, to WOM programs. In this way, agribusiness marketers can get the greatest return on investment of their WOM marketing dollars.

In the following sections, we review facilitated B2B WOM marketing campaigns and WOM opinion leaders' information sharing behavior. We then discuss the conceptual model, the data, and the econometric procedures. Finally, we present results and conclusions.

## **Background**

Studies have validated the importance of WOM information in agribusiness buyers' purchase decisions. An early study by Ryan and Gross (1943) found that corn growers adopted hybrid seed corn based on word-of-mouth persuasion. In a study on farmer acceptance of new farming practices, Wilkening (1956) found that 47% of respondents reported that other farmers are the main source of information in deciding whether to try a new farming technique. Market research by Ciba-Geigy found that the most influential sources that farmers use to make purchase decisions for herbicides were other farmers' "word-of-mouth", followed by dealers, university Extension personnel, salespeople and advertising (Schoeman et al., 1981).

Starting in the late 1960's, business marketers provided B2B WOM teleconferences to improve awareness and facilitate purchase decisions. Schoeman (1981) studied a marketing initiative aimed at a newly introduced corn and soybean herbicide where TeleSession Corporation used long-distance telephone lines to link 8-10 prospective users with two or three current users for an hour-long moderated discussion. These telephone conferences were held among groups of physicians sharing their experiences with new drugs (Silverman, 2001). Telephone conferences have also been held with corn or soybean growers (Schoeman, 1981; Falwell, 2002), veterinarians (Falwell, 2002), and IT engineers (Nicks, 2006).

More recently, several studies have confirmed the importance of WOM information from other farmers on the adoption of specific farm inputs. Falwell (2002) examined farmers' adoption of a newly introduced insecticide product and found that 40% of respondents frequently looked to other farmers (page 47) and 60% felt that information from other farmers were reliable (page 41). The farmer-to-farmer transfer of information has also greatly affected farmers' adoption of integrated pest management (IPM) in Honduran subsistence maize agriculture (Wyckhuys and O'Neil, 2007). Through surveying 120 farmers in four communities in Honduras, Wyckhuys and O'Neil (2007) found that farmers principally learn about IPM through peer-to-peer interaction and larger farm units with higher levels of social participation, social connections and higher social economic status serve more frequently as an information source.

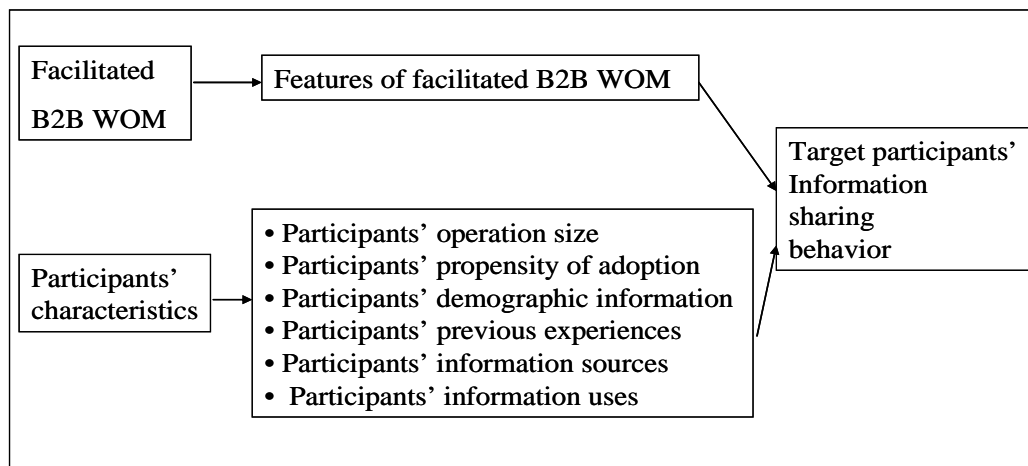
The effectiveness of WOM on information sharing has been connected to opinion leaders being more credible information sources (Rogers 1962). Rogers describes opinion leaders as having "technical competence, social accessibility, and conformity to the system's norms" and thus opinion leaders' WOM has a strong impact on followers' buying decisions (Rogers, 1995, page 26). Several types of opinion leadership were identified including early adopters, innovators, market mavens and experts.

Limited research exists related to information sharing as a result of facilitated B2B WOM marketing of agricultural input products. Falwell (2002) examined the impact of facilitated B2B WOM on participants' information sharing decisions about an insecticide product and an animal health product. He found that WOM teleconferences resulted in a high rate of information sharing: 41% of the participants in the insecticide program (Falwell 2002, page 38) and 69% in the animal health product program shared information with peers (Falwell 2002, page 54).

Martilla (1971) found that age matters when it comes to identifying opinion leaders. He found that business opinion leaders are 40-55 years old, explaining that those who are too young may lack credibility and too old may be not current in the field. File et al. (1994) found that size of the buyers' operations and buyers' satisfaction with the service significantly affected their information sharing decisions. One other type of opinion leadership is the "market maven" who has "information about many kinds of products, places to shop, and other facets of markets, and initiates discussions with consumers and responds to requests from consumers for market information" (Feick and Price, 1987, page 85). Market mavens are found to be heavy media users; they read the most magazines, watched the most television and also used the internet.

## Research Methodology

Firms use marketing programs to influence customers' purchase decisions. When using WOM marketing campaigns firms want to target WOM participants based on their information sharing behavior which may be affected by various factors. As shown in Figure 1, the target participants' information sharing behavior is expected to be influenced by the features of the B2B WOM experience, and the participants' operation size, propensity of adoption, demographic information, previous experiences, information sources and information uses.



**Figure 1:** A Conceptual Model Describing Factors Affecting WOM Target Participants' Information Sharing Behavior

The objective of this data analysis is to identify characteristics of customers who first are more likely to share information with other customers, and second, who will talk to many customers.

### *Variable Selection*

WOM participants' information sharing behavior is expected to be influenced by firm size. Based on the findings of File et al. (1994) smaller operations are expected to be more likely to share WOM information with peers (Size). Innovators and early adopters are more likely to share WOM information with others (Rogers, 1962). Thus WOM participants' propensity to adopt new technology is expected to be positively related to their information sharing behavior (New technology). Previous studies have also suggested that target WOM participants' demographic information, (Age, Gender and Education) are factors that impact information sharing behaviors (Martilla, 1971; Feick and Price 1987, Chan and Misra, 1990). Though as noted by Chan and Misra, the direction and intensity of the relationship between demographics and information sharing behaviors tend to be product specific, we do expect the willing information givers to form a particular demographic segment in this study. We included a variable to take into account the impact of learning-by-doing, i.e. previous experience with the product, on information transmission (Previous experience). Given that a higher level of involvement with a product stimulates information sharing (Chan and Misra, 1990), we expect a positive relationship between previous experience and the likelihood of information transmission.

In addition, participants who are frequently sought for advice by their peers may have more opportunity to share WOM information (Information source). Target participants who rate other farmers as an important information source may also be more likely to communicate WOM information (Other farmer). Target participants' use of email for business purpose represents the involvement of information technology in their operations. Those who use email as an information source may be more likely to share WOM information with peers (Email).

Information from facilitated B2B WOM interacts with the above factors to determine WOM participants' information sharing behavior. A factor describing WOM participants' evaluation of the WOM experience i.e., their willingness to participate in another teleconference is selected to explain their information sharing decisions (Participate again). Satisfied participants are expected to be more willing to transmit information.

### *Data*

Two facilitated WOM campaigns, one involving a U.S. crop expendable input with farmers as primary decision makers and another involving a companion animal product with veterinarians as decision influencers, were evaluated. The crop

expendable input WOM program took place throughout late 2004 and early 2005 with a total of 855 farmers from Indiana, Iowa, Nebraska and Illinois participating in the program (Table 1). A stratified random sample based on distribution by state, of 122 WOM participants were invited for the telephone interview, of which 87 completed the interview resulting in 85 useable responses. The companion animal product WOM program took place throughout May 2005 and June 2005 with a total of 518 veterinarians in 40 states in the U.S. participating in the program. A total of 80 WOM participants were contacted by telephone for the interview, of which 68 completed the interview. One of the criteria for completing the interview was that they remembered having participated in the WOM program. Data were collected via personal interviews conducted over the telephone by a professional market research firm. Note that the telephone surveys were conducted some time after the initiatives in order to measure the longer term behavior change as a result of the WOM initiative. For the U.S. crop expendable input, there were approximately 21 months between the WOM teleconference and the survey of farmer information sharing behavior. For the companion animal product, there were approximately 17 months between the WOM teleconference and the survey of veterinarian information sharing behavior.

**Table 1:** A Summary of WOM Initiative Information and Telephone Survey Information

	Products	
	U.S. Crop Expendable Input	Companion Animal Product
Time of WOM	Nov. 2004 - Jan. 2005	May 2005 - June 2005
Time of telephone survey	Sept. - Oct. 2006	Nov. 2006
Geographic locations	IN, IA, NE, IL	40 states <sup>a</sup>
Occupation of respondents	Growers	Veterinarians
Numbers of participants in the WOM program	855	518
Number of respondents in the telephone survey	122	80
Number of respondents recalled participating in the teleconference	87 <sup>b</sup> (71%)	68 (85%)

1 The 40 states include: AL AR AZ CA CO CT FL GA LA ID IL IN KS KY LA MA MD MI MN MO MS MT NC NE NH NJ NY OH OK OR PA SC TN TX UT VA VT WA WI WV.

2 These 87 observations were used in the ordered logit regression. Two observations were automatically dropped because of missing values for the "Previous Experience" variable and the "Participate Again" variable. Thus the total number of observations in the regression is 85.

### Estimation Model

In order to explain participant information sharing behavior, we used logit analysis which predicts the probability that a participant shares information given a set of characteristics. First we estimated whether or not the participant shared information using the binary logit regression. The binary logit regression of the U.S. crop expendable input estimation and the companion animal product estimation includes a Yes/No dependent variable which is coded as 1 if the respondent shared WOM information with peers and 0 otherwise. Second, we estimated the intensity of information sharing using the ordered logit regression. In the ordered logit regression of the U.S. crop expendable input estimation, the dependent variable is categorical which is coded as 1 if the respondent did not share information with other farmers; 2 if they shared with 1 to 4 other farmers; and 3 if they shared with 5 or more farmers. In the ordered logit regression of the companion animal product estimation, the dependent variable is set equal to 1 if the respondent did not share WOM information; 2 if they shared with 1 or 2 veterinarians; and 3 if they shared with more than 2 veterinarians (Table 2).

**Table 2:** Definitions for Discrete Variables and Preliminary Statistics for the Dependent Variables.

U.S. Crop Expendable Input				Companion Animal Product			
Definition	Category	n	%	Definition	Category	n	%
Did not share information	1	40	46%	Did not share information	1	23	33%
Shared with 1-4 other farmers	2	32	38%	Shared with 1-2 veterinarians	2	14	21%
Shared with 5 or more other farmers	3	13	16%	Shared with more than 2 veterinarians	3	31	46%
<i>Total Respondents</i>		<i>85</i>				<i>68</i>	

This study employs six groups of explanatory variables: 1) evaluations of the WOM experience; 2) demographics; 3) previous experience with the product; 4) participants' tendency to adopt new technologies; 5) participants' information sources and information uses; and 6) leadership positions. Table 3 presents the definitions and summary statistics for all explanatory variables.



**Table 3:** Definitions for Discrete and Continuous Variables and Preliminary Statistics for the Independent Variables

Continuous Variables	Definition	U.S. Crop Expendable			Companion Animal Product		
		Category	N	%	category	n	%
Size	total corn acres in 2004 (unit: thousand acres)	85	0.62		--	--	--
Previous use	2004%=(treated acres)/(total corn acres)	85	0.22		2005 bottles	68	1.46
Discrete Variables	Definition	Category	N	%	category	n	%
Age	0-54 and younger;	0	44	52%	0	35	51%
	55 and older	1	41	48%	1	33	49%
		<b>Total</b>	<b>85</b>		<b>Total</b>	<b>68</b>	
Education	high school or less;	0	35	41%	--	--	--
	more than high school	1	50	59%	--	--	--
		<b>Total</b>	<b>85</b>				
Gender	Female	--	--	--	0	30	44%
	Male	--	--	--	1	38	56%
					<b>Total</b>	<b>68</b>	
Size	number of clients:						
	3,000 or less;	--	--	--	0	33	49%
	more than 3,000	--	--	--	1	35	51%
		<b>Total</b>	<b>68</b>				
Participate again	Favorable;	1	50	59%	1	34	50%
	neutral to unfavorable	0	35	41%	0	34	50%
		<b>Total</b>	<b>85</b>		<b>Total</b>	<b>68</b>	
Other farmers	important sources;	1	58	68%	--	--	--
	unimportant sources	0	27	32%			
		<b>Total</b>	<b>85</b>				
Information source	frequently serve as information source;	1	21	25%	1	8	12%
	Never/sometimes serve as information source	0	64	75%	0	60	88%
		<b>Total</b>	<b>85</b>		<b>Total</b>	<b>68</b>	
New technology	first/one of first to adopt;	1	50	60%	1	46	68%
	wait for a few others, many others or one of the last to adopt	0	35	40%	0	22	32%
		<b>Total</b>	<b>85</b>		<b>Total</b>	<b>68</b>	
Leadership	have leadership positions	1	30	35%	1	11	16%
	do not have leadership positions	0	55	65%	0	57	84%
		<b>Total</b>	<b>85</b>		<b>Total</b>	<b>68</b>	
Email	used email;	1	32	38%	1	46	68%
	did not use email	0	53	62%	0	22	32%
		<b>Total</b>	<b>85</b>		<b>Total</b>	<b>68</b>	

### *The Binary Logit Regression Analysis*

The latent variable model for the binary logit regression for the U.S. crop expendable input estimation is:

$$\begin{aligned}
 n_i = x_i' \beta + \varepsilon_i = & \beta_1(\text{Age}_i) + \beta_2(\text{Education}_i) + \beta_3(\text{Size}_i) + \\
 & \beta_4(\text{Previoususe}_i) + \beta_5(\text{PARTICIPATE AGAIN}_i) + \\
 [1] \quad & \beta_6(\text{OTHER FARMER}_i) + \beta_7(\text{INFORMATION SOURCE}_i) + \\
 & \beta_8(\text{NEW TECHNOLOGY}_i) + \beta_9(\text{LEADERSHIP}_i) + \\
 & \beta_{10}(\text{EMAIL}_i) + \varepsilon_i
 \end{aligned}$$

For the companion animal product estimation is:

$$\begin{aligned}
 n_i = x_i' \phi + \varepsilon_i = & \phi_1(\text{AGE}_i) + \phi_2(\text{GENDER}_i) + \phi_3(\text{SIZE}_i) + \\
 [2] \quad & \phi_4(\text{PREVIOUS USE}_i) + \phi_5(\text{PARTICIPATE AGAIN}_i) + \\
 & \phi_6(\text{INFORMATION SOURCE}_i) + \phi_7(\text{NEW TECHNOLOGY}_i) + \\
 & \phi_8(\text{LEADERSHIP}_i) + \phi_9(\text{EMAIL}_i) + \varepsilon_i
 \end{aligned}$$

The dependent variable is equal to 1 if the participant shared information with peers and 0 otherwise.

### *The Ordered Logit Regression Analysis*

The latent variable model for the ordered logit regression shares the same feature as the binary latent variable model except the definition for the dependent variables is different. The dependent variable has an ordinal feature with unequal distance between categories. The number of peers a respondent shared information with equals  $n_i$  where:

$\alpha_i$  are threshold values;

$$\begin{aligned}
 N_i = 1 & \quad \text{if } n_i \leq \alpha_1 \\
 N_i = 2 & \quad \text{if } \alpha_1 < n_i \leq \alpha_2 \\
 N_i = 3 & \quad \text{if } n_i > \alpha_2
 \end{aligned}$$

[3]

Based on the log (odds) function (Greene 2000), the probability that a participant shares information or not is computed and presented in Table 4. The probability that a participant chooses a specific category, i.e. shares with many peers is presented in Table 5. The marginal effects are presented in Table 6.

### Estimation Results

Performance of the overall model, i.e. the overall model goodness-of-fit, was tested by conducting a likelihood ratio chi-square test (Greene, 2000). The likelihood ratio Chi-square value for the two regressions is low (LR chi-square=12.43 for the U.S. crop expendable estimation, Probability >chi2=0.2575; LR chi-square=8.05 for the companion animal product estimation, Probability >chi2=0.5288), suggesting that the fitted model is not significantly better than the restricted model (the one with all estimated coefficients set to zero). This lack of significance of our overall model goodness-of-fit suggests that the selected factors cannot fully explain the change of information sharing behaviors of the WOM participants. That said, we believe that the lack of significance of our overall model it is likely due to our small samples, 85 observations for the crop expendable input and 68 observations for the companion animal product.

**Table 4:** Estimated Coefficients for Binary Logit Analysis on Decision to Share Information after Participating in a Facilitated B2B WOM

Variables	U.S. Crop Expendable Input	Companion Animal Product
Age	0.384 [0.79]	0.3849 [0.65]
Education	-0.179 [-0.36]	--
Gender		0.2061 [0.37]
Size	0.0004 [0.75]	-0.1218 [-0.21]
Previous use	0.7534 [0.84]	-0.0747 [-1.1]
Participate again	0.1273 [0.25]	1.1364* [1.88]
Other farmer	0.5584 [1.06]	--
Information source	1.4798 ** [2.29]	1.7287 [1.32]
New technology	0.2113 [0.41]	-0.149 [-0.24]
Leadership	-0.0044 [-0.01]	-0.9116 [-1.07]
Email	-0.0379 [-0.07]	-0.1451 [-0.22]
N	85	68
LR chi-square	12.43	8.05
Prob > chi2	0.2575	0.5288

Z-values are reported in brackets

\* - represents a statistical significance at  $\alpha=0.1$

\*\* - represents a statistical significance at  $\alpha=0.05$

In the U.S. crop expendable input estimation, the only significant predictor of information sharing was participants who were frequently asked for advice by their peers which is one measure of opinion leadership (Information source,  $\alpha=0.05$ ). When the effects from other factors are held unchanged, participants who were frequently sought for advice by peers are 4.39 times more likely to share information<sup>1</sup> than participants who were less likely to be asked for information. Effects from all other factors are insignificant in determining participants' information sharing behavior about this product.

In the companion animal estimation, the quality of the WOM experience as measured by the participants' willingness to participate again significantly affects a participant's information sharing behavior (Participate again). Those who were willing to participate in another WOM initiative were more likely to share WOM information with other veterinarians ( $\alpha=0.1$ ). A satisfied WOM participant is 3.12 times more likely to communicate WOM information than a participant who is less satisfied<sup>2</sup>

The binary logit analysis suggests that dominant factors that affect participants' information sharing/not sharing behavior differs between the two WOM initiatives. The information sharing behavior of farmers who are the primary decision maker is mainly influenced by how often their peers ask them for advice which is one measure of opinion leadership. Farmers who are frequently asked for advice are likely to be confident about their value as an information source, which would increase their comfort with sharing information. In contrast, the information sharing behavior of veterinarians is influenced by the WOM experience. When participants had a good experience with the WOM initiative, they were more likely to share this information with others.

Results of the ordered logit regression are presented in Tables 5 and 6. The model goodness-of-fit statistics, the coefficient estimates and the Z test statistics are computed. The likelihood ratio Chi-square value for the U.S. crop expendable input estimation is high (LR chi-square=16.95; Probability >chi2=0.0754), suggesting that a statistically significant overall model goodness-of-fit is obtained. The LR chi-square value for the companion animal product estimation is low indicating that the fitted model is not significantly better than the restricted model which is most likely due to the small sample size.

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<sup>1</sup> Log(odds)=1.4789; odds=EXP(1.4789)=4.39.

<sup>2</sup> Log (odds) = 1.1364; odds=EXP(1.1364)=3.12.

**Table 5:** Estimated Coefficients for Ordered Logit Analysis of the Decision to Share Information after Participating in a Facilitated B2B WOM on Information Sharing Decisions – Shared with More

<i>Variables</i>	<b>US Crop Expendable Input</b>	<b>Companion Animal Product</b>
	1-Did not share information; 2-Shared with 1-4 other farmers; 3 -Shared with 5 or more other farmers	1-Did not share information; 2-Shared with 1-2 veterinarians; 3-Shared with more than 2 veterinarians
Age	0.0356 [0.08]	0.6607 [1.26]
Education	-0.2988 [-0.66]	--
Gender	--	-0.2074 [-0.42]
Size	0.7602* [1.79]	-0.3542 [-0.69]
Previous use	0.9914 [1.27]	-0.0751 [-1.11]
Participate again	0.2286 [0.50]	0.9153* [1.81]
Other farmers	0.6743 [1.36]	--
Information source	1.1296** [2.22]	1.3042 [1.33]
New technology	0.128 [0.26]	-0.129 [-0.24]
Leadership	-0.1036 [-0.24]	0.0807 [0.10]
Email	-0.1226 [-0.24]	-0.3794 [-0.68]
CUT1	1.1463	1.1463
CUT2	3.3497	3.3497
N	85	68
LR chi-square	16.95	10.2
Prob > chi2	0.0754	0.3345

Z-values are reported in brackets

\* - represents a statistical significance at  $\alpha=0.1$

\*\* - represents a statistical significance at  $\alpha=0.05$

**Table 6:** Estimated Marginal Effects

Products	U.S. Crop Expendable			Companion Animal Product		
Outcomes	Did not share information	Shared with 1-4 other farmers	Shared with 5 or more other farmers	Did not share information	Shared with 1-2 vets	Shared with more than 2 vets
Age	-0.0088 [0.1101]	0.005 [0.0621]	0.0038 [0.048]	-0.1406 [0.1105]	-0.022 [0.0244]	0.1626 [0.1273]
Gender	--	--	--	0.0443 [0.1043]	0.0072 [0.0186]	-0.0515 [0.122]
Education	0.0733 [0.1106]	-0.0405 [0.0606]	-0.0328 [0.0514]	--	--	--
Size	-0.1874* [0.1041]	0.1057* [0.0641]	0.0817* [0.0488]	0.0758 [0.1088]	0.0119 [0.0197]	-0.0877 [0.1259]
Previous use	-0.2445 [0.1923]	0.1379 [0.1147]	0.1066 [0.0858]	0.0161 [0.0146]	0.0025 [0.003]	-0.0186 [0.0167]
Participate again	-0.0565 [0.1121]	0.0323 [0.0654]	0.0242 [0.0474]	-0.1946* [0.1054]	-0.0288 [0.0274]	0.2234* [0.1193]
Other farmers	-0.1665 [0.121]	0.1 [0.0799]	0.0665 [0.0465]	--	--	--
Information source	-0.2577** [0.1038]	0.1056** [0.048]	0.1521* [0.0826]	-0.2205* [0.1215]	-0.087 [0.0862]	0.3075 [0.1995]
New technology	-0.0316 [0.1211]	0.018 [0.0696]	0.0136 [0.0517]	0.0275 [0.113]	0.0046 [0.0207]	-0.0321 [0.1333]
Leadership	0.0256 [0.1192]	-0.0146 [0.0686]	-0.011 [0.0507]	-0.0172 [0.1642]	-0.0029 [0.0306]	0.0201 [0.1947]
Email	0.0303 [0.1265]	-0.0172 [0.0727]	-0.013 [0.054]	0.0793 [0.1134]	0.0151 [0.0279]	-0.0943 [0.1393]

\* - represents a statistical significance at  $\alpha=0.1$

\*\* - represents a statistical significance at  $\alpha=0.05$

In the U.S. crop expendable input estimation, two variables are found to have a positive and statistically significant impact on the number of peers a participant shares information with: Information source ( $\alpha=0.05$ ) and Size ( $\alpha=0.1$ ). A participant who was frequently sought for advice by peers is likely to share with many peers about what they learnt from facilitated WOM. The odds of him/her sharing information with 5 or more peers versus the combined no share or share with 1 to 4 peers categories are 3.09 times greater<sup>3</sup> if the participant is frequently asked for

information by peers. The marginal effects indicate that the probability he/she shares with 1-4 other farmers increases by 10.56% and shares with 5 or more other farmers increases by 15.21% if a participant perceived himself/herself as a frequent information source for other growers compared to those who was never or only sometimes asked for advice by others ( $\alpha<0.1$ ) (marginal effects see Table 6).

<sup>3</sup> Log(odds)=1.1296; odds=EXP(1.1296)=3.09.

In addition, size matters. Participants from larger farms as measured by the total corn acres planted in the year before WOM are more likely to share information with many peers. Specifically, if the total corn acres were to increase by 1000 acres, the predicted probability of sharing with 1-4 other farmers increases by 10.57% and sharing with 5 or more other farmers increases by 8.17% ( $\alpha=0.1$ ; marginal effect see Table 6).

In the companion animal estimation, a participant's willingness to participate in the WOM initiative again (Participate again) is the only factor that significantly impacts the number of peers he/she shares information with ( $\alpha=0.1$ ) (Table 5). The probability of sharing with more than 2 veterinarians increases by 22.34% if a participant is willing to participate in another WOM initiative ( $\alpha<0.1$ ) The marginal effects suggest that when a participant was frequently asked for advice by peers (Information source) he/she was also more likely to communicate WOM information with many peers (Table 6). The predicted probability of sharing with more than two veterinarians increases by 30.75% if the participant was often sought for advice by peers ( $\alpha=0.1$ ).

The ordered logit analysis suggests that size is an important factor that determines a farmer participant's likelihood of information sharing about the crop expendable input. Decision makers from larger farms are found to be more likely to share information, and to share information with more peers than participants from smaller farms. In addition, farmers who are an information source for their peers were also more likely to share information. Veterinarians' breadth of information sharing is highly affected by their evaluation for the WOM experience where satisfied WOM participants share information with many peers.

## **Discussion and Conclusions**

This study focuses on the indirect impact of facilitated B2B WOM and specifically the questions of "who shares vs. not share" and "who shares WOM information with many peers". By studying two WOM initiatives, this study provides business marketers with important information to help them understand the effectiveness of facilitated B2B WOM and to better utilize it as a marketing tactic.

Corn growers' information sharing decisions depend to a large extent on whether peers look to them for advice about products or services, which is one measure of opinion leadership. Those who believe they are often looked to for advice are found to be more likely to share what they learnt from WOM initiatives which is consistent with the conclusions of Rogers (1962). In contrast to File et al. (1994), size of the operation has a positive impact on WOM participants' information sharing behaviors. As suggested by Wyckhuys and O'Neil (2007), larger farms may have higher levels of social participation, social connections and higher social economic status and they may have higher potential to serve as information sources. It is noteworthy that the ordered logit regression was statistically

significant, while the binary logit was not, most likely due to the small sample size of 85 observations. With a larger sample size we would expect more robust regression results.

The companion animal product results tell a different story. A participant's willingness to participate in another WOM initiative determines whether he/she shares WOM information or not, and if he/she shares, the number of peers he/she shares information with. Once they decide to share, they are more likely to share with more than two other veterinarians. This finding is consistent with the recommendations of WOM marketing experts. As Sernovitz (2006) notes, "Real people will talk about you when they like you," and "Happy people grow your business." In addition, evidence from the marginal effects analysis suggests that veterinarians who are generally looked for information by peers also exhibit a higher potential to disseminate WOM information which again is consistent with the conclusions of Rogers (1962). Neither the binary logit or ordered logit regressions were statistically significant, again likely due to the small sample of only 68 observations.

The behavior of sharing WOM information or not and the breadth of information sharing are different for growers and veterinarians. In order to improve the efficiency of WOM initiatives, agribusiness marketers should consider the impact of the significant factors when identifying whom to invite. When promoting a crop expendable input, agribusiness marketers will want to invite farmers who are already considered opinion leaders, and especially those farmers with larger operations. When promoting the companion animal product, manufacturing marketers may want to pay more attention to the quality of the WOM initiatives in order to ensure a satisfactory experience for the participants which in turn would lead to more information sharing.

We hypothesize that one reason the WOM initiative experience may matter to veterinarians but not to farmers is that veterinarians play the role of decision influencer rather than decision maker. The veterinarian must feel confident that the information received in the WOM initiative is valuable and unbiased before he or she is likely to share this information with others. For the veterinarians, their reputation and business success depends on being a source of reliable information. In contrast, the farmer is in a position to directly use the information gained in the WOM initiative and may be more confident in interpreting and using the information regardless of the quality of the experience. Thus for farmers, whether or not they pass any of the information along depends on their confidence in being a valuable source of information to other farmers which is derived from being asked for advice by other farmers. This distinction between decision makers and decision influencers has not been explored in academic research and we believe it merits further attention.



Finally, the impact of facilitated B2B WOM on information sharing behavior may change based on the product and the lifecycle stages. In this study, the companion animal product had been launched a very short time prior to the WOM initiative. The crop expendable input had been launched about a year before the initiative. The difference in lifecycle stage and product type may explain the difference in participants' information sharing behaviors. Future studies could compare the impact of WOM initiatives on products in different lifecycle stages and even in different industries. While this study did open up this area by considering two different products, future work could be much more systematic here.

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