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Causal linkages among relationship quality perception, attitude, and behavior intention in a membership organization

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Abstract

Purpose – This study was designed to test two models linking relationship perception, attitude, and behavior-based involvement in a membership organization. This study helps fill a gap in the relationship management literature by exploring the hierarchy of effects among a strategic public some of whom could be characterized as having low involvement.

Design/methodology/approach – After a couple of pilot tests, a state-wide mail survey was conducted. As recommended by several studies, the mail survey for this study was included in a packet with a cover letter and a pre-addressed, pre-stamped return envelope mailed to 2,100 randomly selected current members of the organization. Of the 2,100 members who received questionnaires, 493 usable responses were collected, resulting in a 23.4 per cent response rate.

Findings – For the four relationship quality dimensions used in this study – i.e. control mutuality, satisfaction, trust, and commitment – current members' perceptions of relationship trust and commitment positively influenced their attitudes toward the organization. More importantly, this study demonstrates that the public's perception of commitment can also directly engender supportive behavior toward the organization among members of a key public.

Originality/value – This study was designed to empirically test two models that link relationship quality perceptions, attitude, and behavioral intentions with members in a membership organization based on their levels of involvement. By testing a model of standard sequential order (relationship perceptions → attitude → behavioral intentions), this study found that the originally tested model met the criteria. However, the model was revised based on the modification index and theoretical justification. A new path directly connecting commitment of the relationship quality outcomes to behavioral intentions was added.

Keywords Public relations, Communication management, Perception, Behaviour

Paper type Research paper

Although it took more than ten years, Ferguson's (1984) landmark study has generated research in the topic of relationship management[1]. Her study shifted the paradigm of public relations from its traditional functions (e.g. disseminating information and attaining publicity) to the more meaningful purpose of cultivating stable, long-term, and quality relationships between organizations and their publics. Increasing evidence points to the positive effects of promoting quality relationships through public

relations, including improvement of organizational effectiveness (e.g. Hon, 1997; Huang, 1999), rapid recovery from crisis (e.g. Wilson, 2000), positive impact on publics' attitudes, evaluations, and behaviors (e.g. Ki and Hon, 2007a), and enhancement of an organization's reputation (e.g. Yang, 2007).

Public relations program evaluation measures the impact of an organization's communication on a specific or target public's perceptions of its relationship with the organization (Bruning and Ledingham, 2000). It has been suggested that positive, long-term relationships are valuable to organizations because these relationships are more likely to encourage supportive behaviors (e.g. sales, donations, favorable legislation, and high performance among employees) while also preventing unsupportive behaviors (e.g. boycotts, picketing, and government regulation) among publics (Grunig et al., 2002). Although scholars and practitioners have indicated that maintaining positive and long-term relationships is the litmus test for successful public relations, few studies have empirically determined how positive relationships drive publics' attitudes and behavior.

Recently, Ki and Hon (2007a) evaluated the relationship between a university and its students to explore a causal model linking a public's relationship perceptions, attitude toward the organization, and behavioral intentions using a standard hierarchy of effects model (perception → attitude → behavior). They found that among the six indices proposed by Hon and Grunig (1999), the students' relational perceptions of satisfaction and control mutuality were significant predictors of attitude, which in turn influences behavioral intentions.

Existing literature on the hierarchy of effects explains that different influential sequences among perception, attitude, and behavior occur in low-involvement situations. In other words, a public with low-involvement in an organization-public relationship (OPR hereafter) might demonstrate different sequences. Therefore, this study attempts to find an applicable model to measure organizational relationships with a low-involvement public. Doing so will contribute to the scholarship and practice of public relations. The model tested in this study provides insights into managing publics in a sophisticated manner based on how their levels of involvement lead to more positive relationship outcomes. Developing and testing this model also contributes to theory building in the field. To test the proposed model, this study used structural equation modeling which is a multivariate technique combining aspects of multiple regression and factor analysis to simultaneously estimate a series of interrelated relationships.

Hallahan (2000) argued that most research in public relations has emphasized the importance of communicating with active, involved publics. He called for more attention to publics characterized by lower involvement that are nonetheless still critical to the organization's success. Therefore, this study helps fill a gap in the relationship management literature by exploring the hierarchy of effects[2] among a strategic public some of whom could be characterized as having low involvement.

The Excellence study[3] identified key publics, including employees, media, investors, community, customers, government, members of associations, and donors (Grunig, 2006). Grunig noted that membership organizations have not previously received enough attention in the relationship management literature[4]. In response to this deficiency, a membership organization was used as the focus of this study to explicitly apply and test the linkages among relationship quality perceptions, attitude,

and behavioral intentions. This research tests an alternative model suggested by the existing hierarchy of effects literature that states that relationship perceptions directly affect behavior, which in turn influence attitude (relationship perception → behavior → attitude) among low-involvement publics. The models proposed can potentially provide compelling evidence of these linkages and move theory and practice forward in terms of evaluating the effectiveness of public relations programs.

Literature review
Relationships as perceptions
A relationship is an abstract and elusive construct due to its intangibility. Most of the literature defining the construct has indicated that a relationship is established by individuals' perceptions. For instance, literature on social relationships has measured relationships based on the "individual's viewpoint" (Duck, 1973, p. 147). In negotiation literature, a relationship has been defined as "a subjective experience" (Greenhalgh, 1987, p. 237).

As in other disciplines, the relationship construct, as conceptualized in the public relations scholarship, involves the perceived quality of an OPR. It has been demonstrated that relationship quality outcomes have been captured by measuring the perceptions of the parties involved in the relationships (e.g. Banning and Schoen, 2007; Dougall, 2006; Ki and Hon, 2007a, b). Along the same lines, Broom *et al*. (1997, p. 95) indicated that a relationship is built when the parties involved "have perceptions" about the relationship.

Hon and Grunig (1999) identified four relationship dimensions – control mutuality, satisfaction, trust, and commitment – by measuring publics' perceptions of their relationship with several well-known organizations. Bruning and Ledingham (2000) also assessed OPRs by measuring a public's perceptions of personal, professional, and community relationships. They revealed that the perceptions members of the public had about their personal and professional relationship with the organization strongly influenced the public's assessment of overall satisfaction with the organization. Thus, it is logical to assume that relationships can be measured in terms of the perceptions held by members of a public. Therefore, this study used the relationship quality measures proposed by Hon and Grunig (1999):

- control mutuality;
- satisfaction;
- trust; and
- commitment.

Control mutuality. This dimension has to do with decision making processes and the degree to which the opinion of each party is reflected in the formulation of a final decision. Control mutuality evaluates which party has more power over the other. This study used Hon and Grunig's (1999, p. 3) definition of this dimension: "the degree to which parties agree on who has the rightful power to influence one another". They noted that some level of power inequality might exist, but both the organization and its publics should have some degree of control over the other even in an established relationship (Hon and Grunig, 1999).

Satisfaction. While scholars in relationship research have acknowledged the complexity involved in measuring satisfaction, it was found to be the most frequently used indicator to capture relationship quality (Ki and Shin, 2006). As Ferguson (1984) stated, this dimension is a key variable in studying OPRs, because understanding what contributes to a key public's satisfaction could influence a public relations program's strategy. A satisfying relationship is identified as one in which the benefits from the relationship outweigh the costs (Hon and Grunig, 1999). A public's satisfaction is likely to increase when an organization invests time and resources needed to strengthen its relationship with that public (Ledingham and Bruning, 1998). By adopting Hon and Grunig's (1999) definition, this study conceptualized satisfaction as "the extent to which each party feels favorably toward the other."

Trust. Like other relationship dimensions, trust is a key element. Trust is determined by how much each party can depend on the integrity of the promises made by the other party (Hon and Grunig, 1999). In a similar vein, a public's trust in an organization relies on the extent to which the organization keeps its word (Ledingham and Bruning, 1998). This dimension contains three underlying variables, including integrity[5], dependability[6], and competence[7] (Carnevale, 1995). Using the conceptualization of trust by Hon and Grunig (1999), this study defines trust as "the willingness to rely on the other party in whom one has confidence."

Commitment. In public relations, commitment is defined as "the extent to which one party believes and feels that the relationship is worth spending energy to maintain and promote" (Hon and Grunig, 1999). This indicator is multi-dimensional and includes affective, continuance, and normative commitment[8] (Allen and Meyer, 1990). Affective commitment is positive emotional attachment (Allen and Meyer, 1990). In the case of a membership organization, it can be defined as the extent to which members are emotionally attached to an organization depending on how positive they feel toward the organization. Continuance commitment is "commitment to continue a certain line of action" (Meyer and Allen, 1984, p. 373). Because of this underlying dimension, commitment was found to influence behavioral intentions or behaviors across disciplines (e.g. Ki and Hon, 2007a; MacKenzie *et al.*, 1998). By adopting Ki and Hon's (2007b) conceptualization, this study defines commitment as "the belief that an ongoing relationship with the other party is important enough to warrant maximum efforts at maintaining it."

Attitude
Attitude is one of the most extensively used concepts in social science research, which has proposed numerous though similar definitions of attitude over several decades. Fazio (1989, p. 155) succinctly defined attitude as "an association between a given object and a given evaluation". A commonly adopted definition of attitude is "a learned predisposition to respond in a consistently favorable or unfavorable manner with respect to a given object" (Fishbein and Ajzen, 1975, p. 6). In general, attitude has been considered a latent variable presumed to impact behavior (Fishbein and Ajzen, 1975).

Scholars in public relations have evaluated attitudes of publics to measure the success of a public relations program. Lindenmann (2002) demonstrated that evaluating a public's attitudes is helpful in determining what strategic publics say about something involving their feelings and their future actions. Guided by the relationship management literature (e.g. Grunig *et al.*, 2002), this study assumed that

relationship perceptions lead to attitude, because relationship perceptions indicate the existence of supportive or the absence of unsupportive feelings and behaviors among key publics toward the organization. In particular, this study defines attitude as the "evaluation of an organization by members of a public". This study assumes the relationship quality perceptions held by members of a public will impact the way they feel about the organization.

Behavioral intentions

Behavioral intention is a commonly used concept in social behavior research. Behavioral intention refers to "the immediate determinant of behavior, and when an appropriate measure of intention is obtained it will provide the most accurate prediction of behavior" (Ajzen and Fishbein, 1980, p. 41). Later, Perloff (2003, p. 92) conceptualized behavioral intention as "the intention to perform a particular behavior, a plan to put behavior into effect".

Scholars have often used behavioral intentions rather than measures of actual behavior, because intentions are the most reliable predictor of people's real behavior. Moreover, behavior intentions, behavior, and action are grouped under the same "conative" heading (Ray, 1973). Thus, it was reasonable to use behavioral intentions instead of behavior for the current study.

Hierarchy of effects

This study adopts a hierarchy of effects model to explain the sequential order of influence among relationship perceptions, attitude toward the organization, and behavioral intentions. The theory explains the long-term effect of communication activities as relationship management with special emphasis on promoting stable, long-term relationships between organizations and their strategic publics. The effect determined by the hierarchy of effects theory is precisely the type of communication that researchers believe constitutes public relations activities. Therefore, the theory can be used to measure the effectiveness of public relations by documenting the sequence of effects leading ultimately to supportive behaviors among publics toward organizations.

Although Lavidge and Steiner (1961) established the fundamental theoretical perspective of the hierarchy theory to measure advertising's effectiveness, Palda (1964) was the first to use the term, hierarchy of effects[9] (Barry, 1987). This theoretical perspective originated from social learning (Lavidge and Steiner, 1961) and the diffusion of innovations theory (Rogers, 1995). Furthermore, it has functioned as a major theoretical framework in marketing communication (Barry, 1987; Ray, 1973) and other research areas related to behavioral decision making. Studies in mass communication areas, such as public relations (Ki and Hon, 2007a) and political communication, have actively applied this perspective (Chaffee and Roser, 1986).

Three primary classifications – cognition (= perception), affect (= attitude), and behavior – are involved in the hierarchy of effects. They are parallel to the three major levels of the typical attitude structure components of "cognitive", "affective", and "conative" (Ray, 1973). The cognitive element involves variables such as attention, awareness, comprehension, and learning. Although some studies considered these to be somewhat different variables (e.g. Kintsch, 1970), they all have typically fallen under the cognitive category (Ray, 1973). The affective component includes the

variables of interest, evaluation, attitude, feeling, conviction, and yielding. Finally, the conative category includes the intention, behavior, and action variables (Ray, 1973).

While some disagreement exists concerning the order of effect with which the three components are arranged, this theory states that communication effects occur through a series of steps, including cognition, affect, and behavior (CAB) (Lavidge and Steiner, 1961). Cognitive reaction is thought to precede the effect on attitude, which precedes a behavioral reaction (Ray, 1973). Attitude is a reasoned product of perception and is a reliable predictor of behavior (Chaffee and Roser, 1986). Herein, public relations practice is considered a communication activity, so that the theory of a hierarchy of effects can be applied to explain how public relations effects can occur.

While the theory of hierarchy of effects has not been extensively applied in public relations scholarship, some researchers have attempted to connect relationship perceptions, attitude, and behavior. For example, Banning and Schoen (2007) measured the effects of relationships between an art museum and its public to determine the differences in behavioral intentions between those who continue their museum membership and those who do not. They found that relationship perceptions serve as a predictor of publics' behavior. Ki and Hon (2007a) applied the theory of hierarchy of effects to test linkages among relationship perceptions, attitude, and behavior between a university and its students. Their findings indicated that relational perceptions of control mutuality and satisfaction are predictors of positive attitudes among students, which in turn lead to supportive behaviors toward the university. This study adopted the hierarchy of effects framework Ki and Hon (2007a) used and posited the following research question:

RQ1. What model can be used to link relationship quality perceptions, attitude, and behavioral intentions in a membership organization?

Based on the theory of hierarchy of effects, the following two hypotheses were posed:

H1. A public's perceptions of its relationship with the organization will influence the public's attitude toward the organization.

H2. A public's attitude toward the organization will influence the public's behavioral intentions.

Involvement. In addition to the traditional sequential model explained above (cognition → affect → behavior), several alternative arrangements of these three factors have been suggested (Ray *et al.*, 1973). From the available alternatives, this study adopted a low-involvement hierarchy to explain the sequential influence of public relations on the members of a low-involvement public. Therefore, the current study adopted a low-involvement hierarchy to determine the best sequence model for the linkages between relationship perceptions, attitude, and behavior for low-involvement publics.

The concept of involvement is widely used in psychology, organizational behavior, marketing and communications. Hupfer and Gardner (1971) defined involvement as a general level of interest in or concern about an issue without reference to a specific position. Houston and Rothschild (1978) explained that individuals' response to involvement is a function of enduring personal involvement or a need derived from a value in the individual's hierarchy of needs. Barki and Hartwick (1989, p. 61) did a comprehensive review of the use of the involvement concept in these disciplines and

showed that it converged as "a subjective psychological state, reflecting the importance and personal relevance of an object or event". Along these lines, the present study defines involvement as a member of public's relevance or interest in an organization.

The low-involvement hierarchy. The low-involvement hierarchy is also called the cognitive-conative-affective model. Krugman (1965) refuted the standard sequential order in the hierarchy of effects model, which is conceptually similar to Fishbein's theory of reasoned action[10]. Krugman (1965) developed the low-involvement hierarchy to explore why television advertisements demonstrated significant combination effects on the viewer although experimental research seemed to reveal only minimal effects on an individual's attitude change.

According to the theory, when individuals are in a low involvement condition, they might proceed directly to action following their cognitive impact without involving reasoned action, and this process is then followed by attitude change. In other words, minimal awareness comes first, followed by behavior, and then attitude process.

The theory of the low-involvement hierarchy of effects can be applied to OPRs. Take for example how a member of a public who is only marginally aware of his or her relationship with the American Cancer Society or of the organization itself will donate money to a breast cancer prevention program sponsored by the American Cancer Society. Although that member of the public did not form any attitude toward the organization prior to their donation (behavior), he or she is more likely to establish a positive attitude toward the organization to justify their behavior after the fact.

Applying this theory to an OPR, members of a public who have just started a relationship with an organization or have been in the relationship for only a short period of time demonstrate a more minimal awareness of the relationship or even the organization than those who have been in a relationship with an organization for a long period of time. Although members of the public did not demonstrate any attitude toward the organization initially or prior to starting the relationship with the organization, they are more likely to develop a positive attitude toward the organization in order to support their choice of involvement.

The behavioral intentions in this study are based on the low-involvement hierarchy theory, which assumes that the relationship perceptions of a low-involvement public with an organization (meaning in a relationship with that organization for a short period of time) might affect the behavior of members of that public toward the organization. Also, their attitude toward the organization might be affected by their behavioral intentions. Based on this logic, the following two hypotheses were suggested:

H3. For a public experiencing low-involvement, the public's relationship perceptions will positively influence the public's behavioral intentions.

H4. For a public experiencing low-involvement, the public's behaviors will positively influence the public's attitude toward the organization.

Methodology

This study was designed to test causal linkages among relationship perceptions, attitude, and behaviors in a membership organization and the effect of involvement on the model proposed. The membership organization in this study is the Florida Farm

Bureau (referred to as FFB hereafter), the largest agricultural organization in the state. The organization is an independent, non-governmental, and voluntary organization which represents its members, who are primarily farmers and ranch families. The FFB represents 64 county farm bureaus in Florida (Florida Farm Bureau Federation, 2010). Cultivating positive and long-term relationships with members is vital to membership organizations like FFB, because the life and power of these organizations are rooted in their membership. The population of this study is the FFB's current membership, consisting of about 140,000 members who constitute a key public for all of the organization's public relations programs.

Pilot test

Before main data collection, a pilot test was conducted online to establish the readability and quality of the questionnaire items. An e-mail invitation for the pilot test was sent to 140 current members of the organization, but 16 e-mails failed to be delivered. Among the 124 valid samples, 28 members responded. Based on the feedback they provided, the questionnaire was revised.

Main survey

A statewide mail survey was conducted. As recommended by several studies (e.g. Kanso, 2000), the mail survey for this study was included in a packet with a cover letter and a pre-addressed, pre-stamped return envelope mailed to 2,100 randomly selected current members of the organization. Additionally, a brief pre-notice postcard was sent to each of the 2,100 individuals one week before the survey packet was sent, and a follow-up reminder was sent one week after the packet was mailed. Of the 2,100 members who received questionnaires, 493 usable responses were collected, resulting in a 23.4 per cent response rate. The completed questionnaires were reviewed and 24 of them that indicated response set were removed. For data analysis, listwise deletion was used for missing variables, which consequently reduced the final sample size to 432.

Measures

Relationship perceptions. For each of the four relationship indices adopted from Hon and Grunig (1999) – control mutuality, satisfaction, trust, and commitment – a nine-point Likert-type scale was used for responses to each questionnaire item, ranging from "Strongly disagree" (1) to "Strongly agree" (9) with a midpoint of (5) representing Neutral, while no verbal labels for scale points two through four or six through eight were specified.

Attitude. Attitude toward the organization is defined as the public's overall evaluation of the organization. Operationalization of attitude for this study was based on Burgoon *et al.* (1978) and evaluated using a nine-point scale as described above. The following statements were used to measure attitude ("Members' impression of the State Farm Bureau is favorable." "Members' impression of the State Farm Bureau is negative," "The State Farm Bureau is useful to members," and "Members dislike the State Farm Bureau.").

Behavioral intentions. In a membership organization, the primary goal of a public relations program is membership retention. Although the scales measuring behavioral intentions were taken from Zeithaml *et al.* (1996), they were significantly modified to fit the purposes of this research and the organization's goal. Three items were developed

that used the same nine-point Likert scale as the other measurement items. The statements measuring current members' behavioral intentions were the following: ("Members would recommend membership in the State Farm Bureau to other farmers." "Members would retain their membership in the State Farm Bureau even if membership in a comparable association were available." "Members would like to retain their membership with the State Farm Bureau for at least another five years.").

Involvement. Although there are several different ways of measuring involvement (Day *et al.*, 1995), this study measures involvement based on the number of years each individual has been a member of the organization. As postulated by several scholars, the longer an individual is involved as a member in a particular organization, the greater is the level of his or involvement with the organization or its activity (Evans, 1994; Zaichkowsky, 1985). Respondents were categorized into two levels of involvement (high and low involvement) determined by calculating the cutoff points from the average years of membership as reported by all respondents. The average number of years of membership was 25, so members with less than 25 years were assigned to the low-involvement group.

Although one could argue that 25 years is generally not considered a short-term relationship, reducing the cutoff point was not possible as this study need to compare and contrast two models based on an acceptable level of involvement. Reducing the cutoff point would result in insufficient number of cases needed for the data analysis techniques used in this study. Furthermore, the mission of some membership organizations, such as the one studied here, aimed to produce lifetime memberships, so in these cases 25 years is an acceptable cut off point for the average years of membership.

Reliabilities of the measures. Cronbach's alphas for the initial indices were as follows: control mutuality (eight items) = 0.92, satisfaction (eight items) = 0.91, trust (eight items) = 0.92, commitment (seven items) = 0.88, attitude (four items) = 0.92, and behavioral intention (three items) = 0.87.

During exploratory factor analysis, measurement items were deleted if they:

- were extracted as the second factor of the intended factor;
- indicated opposite signs of factor loading coefficients among the other items in the intended factors; and
- had factor loading values of less than 0.65 with the other items of their respective subscales.

Cronbach's alphas for the variables were as follows: control mutuality (eight items) = 0.92, satisfaction (eight items) = 0.91, trust (seven items) = 0.92, commitment (six items) = 0.89, attitude (four items) = 0.92, and behavior (three items) = 0.87.

Demographic profile

Several demographic questions were asked, including items about respondents' sex, age, level of education, and ethnicity. The participants in this study represented a wide variety of backgrounds. The respondent group was 32.2 per cent female and 67.8 per cent male. Most (96.5 per cent) of the participants indicated that they were Caucasian; 1.9 per cent responded Native American, and 1.5 per cent chose either African American or Latino. The mean age of the participants was 63 years old, ranging from a

low of 20 years to a high of 94 (SD = 13.63). The number of years of membership ranged from less than one year to 75 years (M = 25, SD = 14.29).

Data analysis
To test if the proposed models fit the data, this study used structural equation modeling (SEM), a multivariate technique combining aspects of multiple regression and factor analysis to simultaneously estimate a series of interrelated relationships (Hair *et al.*, 1998). Kaplan (2000, p. 3) conceptualized SEM as "a melding of factor analysis and path analysis into one comprehensive statistical methodology". The great advantage of this statistical analysis is its capacity to accommodate measurement error directly into the estimation of a series of dependent variables (Hair *et al.*, 1998). A two-step procedure of SEM was used. The first stage estimates the measurement model, which establishes a relationship between latent (unobserved or factor) variables[11] and multiple observed items through confirmatory factor analysis. The second stage estimates the structural model, which uses the measurement model estimated in the first stage (Hair *et al.*, 1998; Kenny, 1979; Kline, 2005).

Model fit. To measure the extent to which the proposed models fit the observed data, several criteria were used as Hu and Bentler (1999) suggested. The most widely used model estimator is maximum likelihood (ML) (Bollen, 1989; Chou and Bentler, 1995). ML is appropriate to use for large samples because it assumes normality of the sample distribution, which leads to normal error distribution (Hu *et al.*, 1992).

First, this study used the ratio of χ^2 to the degree of freedom because χ^2 is quite sensitive to sample size (Bollen, 1989). A value less than five of the ratio is considered to be a good fit (Bollen, 1989). Other common fit indices are as follows: comparative fit index (CFI), goodness of fit index (GFI), normed fit index (NFI), root mean square error of approximation (RMSEA), and root mean square residual (RMR). For CFI, GFI, and NFI, values range from 0 to 1.00; higher values indicate better fit; 0.90 and above is generally accepted as a good fit. RMSEA values close to 0.08 or less typically indicate good fit (Byrne, 2001; Kline, 2005). RMR should be smaller than 0.05. Regression coefficients for the hypothesized structural relations were reported with their statistical significance. Significant alpha levels for all tests were 0.05.

Results
This study used composite variables that were produced from principal component analysis for the latent variables with multiple items for making the proposed causal model more parsimonious and easier for convergence. Principal component scores were used for the six factors – four indicators for relationship quality outcomes, one for attitude, and one for behavioral intentions – meaning that the six constructs were treated as six observed variables.

Table I demonstrates the correlation matrix and descriptive statistics for all six variables. The composite scores were used to calculate the correlations. The descriptive statistics indicated that the average for items measuring members' attitude toward the organization is higher than the average scores for the majority of the relationship measurement items. The mean score for the attitude measure was 8.00 (SD = 1.36), whereas the average for the relationship measures range between 7.10 (SD = 1.61 for control mutuality) and 7.47 (SD = 1.38 for commitment). The average for the behavioral intentions items (M = 7.76, SD = 1.55) is lower than the average for those measuring members' attitude toward the organization. Overall, members of the

organization evaluated their relationship with the organization positively, and these relationship perceptions are consistent with their attitude and behavioral intentions.

Testing proposed models
The outcome of CFA is presented in Table II which shows a six-factor model with 36 items without correlating error terms between the errors of the observed variables. The magnitude of the factor loadings demonstrated that all items of each variable in the CFA demonstrated highly strong loadings. All items had higher than 0.60 standardized loadings. All factor loadings in the standardized solutions were statistically significant at $p < 0.05$.

The first model tested had four exogenous variables – control mutuality, satisfaction, trust, and commitment – and two endogenous variables – attitude and behavioral intentions. Table III shows the results of structural equation models for the linkages between relationship perceptions, attitude, and behavioral intentions. *H1* relates to the link between members' perceptions of the OPR and attitude, and *H2* deals with the link between members' attitude and behavioral intentions. Both hypotheses were strongly supported. Of the four relationship indicators, commitment most strongly and significantly affected attitude, followed by trust ($\beta = 0.33$ and $\beta = 0.28$, $p < 0.05$). Also, attitude was found to be a strong predictor of behavioral intentions ($\beta = 0.79$, $p < 0.001$).

As shown in Table IV, according to the given fit indices, the fit of the model, including CFI, GFI, and NFI, met the satisfaction level. Although it can be said that the proposed model fits the data, this study determined that the model should be revised based on the modification index, which suggested that adding a path from commitment to behavioral intentions would improve the model significantly. There is also some theoretical justification for including this path in the model. Garbarino and Johnson (1999) discovered that customers' perceptions of commitment directly affected future behavioral intentions.

As shown in Table III, the newly added path (commitment $\rightarrow$ behavioral intentions) in the revised model had a significant impact ($\beta = 0.50$, $p < 0.001$). Moreover, compared to the original model, the fit measures were greatly improved: from 0.97 to 0.99 for CFI, from 0.93 to 0.99 for GFI, and from 0.97 to 0.99 for NFI, as demonstrated in Table III. All of the non-significant fits in the originally tested model reached significant fit indices as follows: from 22.97 to 2.57 for the ratio of Chi-square to the degree of freedom, from 0.25 to 0.07 for RMSEA, and from 0.06 to 0.01 for RMR. According to the statistical analysis, the revised model was better than the initial model.

	Mean	SD	1	2	3	4	5	6
1. Control mutuality	7.10	1.61	–					
2. Satisfaction	7.43	1.47	0.92[*]	–				
3. Trust	7.28	1.53	0.92[*]	0.92[*]	–			
4. Commitment	7.47	1.38	0.83[*]	0.88[*]	0.89[*]	–		
5. Attitude	8.00	1.36	0.81[*]	0.81[*]	0.82[*]	0.80[*]	–	
6. Behavior	7.76	1.55	0.73[*]	0.75[*]	0.76[*]	0.78[*]	0.78[*]	–

Note: [*] $p < 0.01$

Table I.
Correlation matrix among relationship perceptions, attitude and behavior intentions

	Variable	Factor loading
Control mutuality $\alpha = 0.92$	____ believes the opinions of members are legitimate	0.83
	____ neglects members. (R)	0.75
	When dealing with members, ____ has a tendency to throw its weight around (R)	0.77
	____ really listens to what members have to say	0.82
	____ seems to ignore members' opinions in the decisions that affect members. (R)	0.80
	When members interact with ____, members feel that they have some sense of control.	0.78
	____ cooperates with members	0.88
	Members have influence with the decision makers at ____.	0.78
Satisfaction $\alpha = 0.91$	Both ____ and members benefit from their relationship	0.81
	Members are dissatisfied with their interaction with ____. (R)	0.73
	Members are happy with ____	0.81
	Generally speaking, members are unhappy with the relationship ____ has established with them. (R)	0.77
	Members enjoy dealing with ____	0.82
	____ fails to satisfy members' needs. (R)	0.79
	Members feel they are important to ____.	0.81
	In general, nothing of value has been accomplished by ____ for members. (R)	0.76
Trust $\alpha = 0.92$	____ treats members fairly and justly	0.85
	Whenever ____ makes an important decision, members know ____ will consider the decision's impact on members	0.86
	____ can be relied on to keep its promises to members	0.86
	____ takes the opinions of members into account when making decisions	0.87
	Members feel very confident about ____ abilities	0.84
	Sound principles guide ____'s behavior	0.79
	____ misleads members. (R)	0.72
Commitment $\alpha = 0.89$	____ is trying to maintain a long-term commitment to members	0.85
	____ wants to maintain a positive relationship with members	0.83
	Compared to other farm organizations, members value their relationship with ____ the most	0.80
	Members would rather work with ____ than without it	0.86
	Members want to have a relationship with ____	0.72
	Members feel a sense of loyalty to ____	0.79
Attitude $\alpha = 0.92$	Members' impression of ____ is favourable	0.92
	Members' impression of ____ is negative (R)	0.90
	____ is useful to members	0.89
	Members dislike ____ (R)	0.89
Behavior $\alpha = 0.87$	Members would recommend membership in ____ to other farmers	0.90
	Members would retain their membership in ____ even if membership in a comparable association were available	0.87
	Members would like to retain their membership with ____ for at least another five years	0.90

Note: The name of an organization should be replaced with the blank ____

Table II.
Measurement items and factor loadings

Path	Initial model		Revised model	
	Standardized coefficients	Standardized errors	Standardized coefficients	Standardized errors
Control mutuality → Attitude	0.14	0.08	0.14	0.08
Satisfaction → Attitude	0.14	0.09	0.14	0.09
Trust → Attitude	0.28[*]	0.09	0.28[*]	0.09
Commitment → Attitude	0.33[**]	0.07	0.33[**]	0.07
Attitude → Behavioral intentions	0.79[**]	0.03	0.37[**]	0.03
Commitment → Behavioral intentions[a]	N/A		0.50[**]	0.05

Note: [a] The new path is added in the revised model; [*] $p < 0.05$; [**] $p < 0.001$

Table III.
Tested model linkages among relationship quality perception, attitude, and behavioral intentions

Fit index	Criteria	Fit statistics	Initial model	Fit statistics	Revised model
Chi-square	≥ 0.05	91.88	$p < 0.001$; df = 4	7.70	$p < 0.01$; df = 3
Chi-square/df	≤ 5	22.97		2.57	
CFI	≥ 0.9	0.97		0.99	
GFI	≥ 0.90	0.93		0.99	
NFI	≥ 0.90	0.97		0.99	
RMSEA	≤ 0.08	0.25		0.07	
RMR	≤ 0.05	0.06		0.01	

Note: CFI = Comparative Fit Index; GFI = Goodness of Fit Index; NFI = Normed Fit Index; RMSEA = Root Mean Squared Error Residual; RMR = Root Mean square Residual

Table IV.
Fit measures of linkages among relationship quality perception, attitude, and behavioral intentions

Linkages among relationship perceptions, attitude, and behavioral intentions of low-involvement groups

The last two hypotheses explored the sequential order of relationship perceptions, attitude, and behavioral intentions of members of a public who indicated a shorter relationship with the organization, which was defined as low-involvement. *H3* indicates that for a low-involvement public, relationship perceptions will positively affect behavioral intentions[12], and *H4* indicates that attitude is positively affected by behavioral intentions. The model tested had four exogenous variables – control mutuality, satisfaction, trust, and commitment – and two endogenous variables – attitude and behavioral intentions (Figure 1).

Table V shows the results of structural equation models for the linkages between relationship perceptions, behavioral intentions, and attitude for a low-involvement group. The two proposed hypotheses were partially supported. Among four relationship indicators, only perceptions of commitment strongly and significantly affected behavioral intentions ($\beta = 0.62$, $p < 0.001$). As proposed, behavioral intentions were shown to be a strong predictor of attitude ($\beta = 0.81$, $p < 0.001$). According to the given fit indices, Table VI displays that the fit of the model met satisfactory levels, including CFI, GFI, and NFI. Therefore, it can be said that the proposed model adequately fits the data (see Figure 2 for a visual representation of the model).
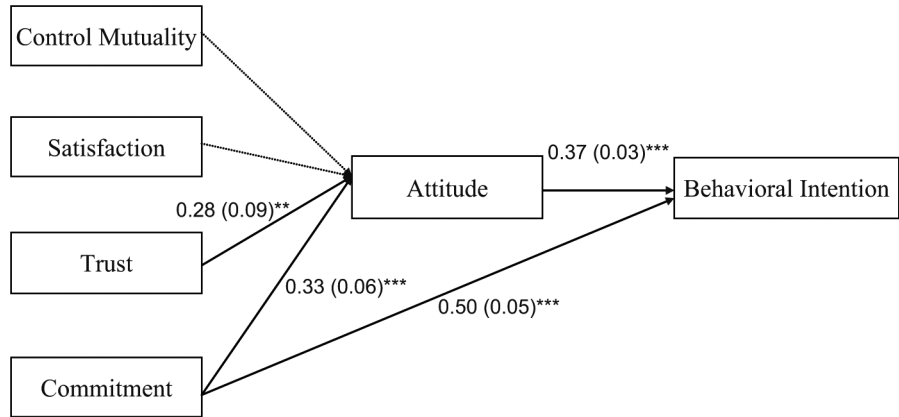
Figure 1.
Revised model linking
relationship quality
outcomes, attitude and
behavioral intention

Notes: Dotted lines indicate non-significant paths. Solid lines indicate significant paths.
The numbers outside parentheses indicate standardized coefficients, and those in
parentheses indicate standardized errors. **$p < 0.01$; ***$p < 0.001$

Path	Standardized coefficient	Standardized error
Control mutuality → Behavior	0.16	0.135
Satisfaction → Behavior	0.22	0.156
Trust → Behavior	−0.15	0.170
Commitment → Behavior	0.62[*]	0.111
Behavioral intentions → Attitude	0.81[*]	0.043

Table V.
Tested model linkages
among perceptions of
relationship quality
perception, attitude, and
behavioral intentions on
low-involvement

Notes: [*] $p < 0.001$

Fit index	Criteria	Fit statistics	
Chi-square	≥ 0.05	61.483	$p ≤ 0.001$; df $= 4$
Chi-square/df	≤ 5	15.371	
Comparative Fit Index (CFI)	≥ 0.90	0.964	
Normed Fit Index (NFI)	≥ 0.90	0.962	
Root Mean Squared Error Residual (RMSEA)	≤ 0.08	0.286	
Root Mean square Residual (RMR)	≤ 0.05	0.086	

Table VI.
Fit measures of linkages
among relationship
quality outcome, attitude,
and behavioral intentions
on low-involved public

Discussion and conclusion
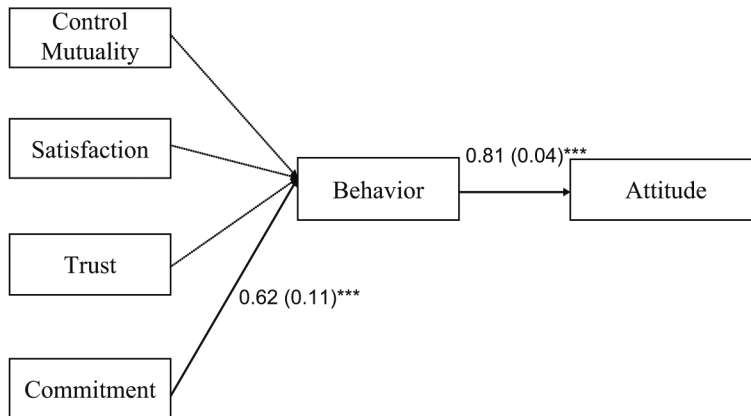### Theoretical and managerial implications
This study was designed to empirically test two models that link relationship quality
perceptions, attitude, and behavioral intentions with members in a membership
organization based on their levels of involvement. By testing a model of standard
sequential order (relationship perceptions → attitude → behavioral intentions), this
study found that the originally tested model met the criteria. However, the model was
revised based on the modification index and theoretical justification. A new path

Notes: Dotted lines indicate non-significant paths. Solid lines indicate significant paths.
The numbers outside parentheses indicate standardized coefficient and those in
parentheses indicate standardized error. $**p < 0.01$; $***p < 0.001$

directly connecting commitment of the relationship quality outcomes to behavioral
intentions was added. The revised model significantly improved the model fit. The
final revised model links relationship perceptions, attitude, and behavioral intentions.
In terms of the model linking perceptions of relationship, behavior, and attitudes for a
low-involvement public, this study discovered that commitment is the only strong
predictor of behavior, which in turn is a strong predictor of attitude.

These results strongly support some of the theoretical assumptions that underlie the
relationship management perspective for public relations theory and practice. The
linkages tested here substantiated assumptions about the effects of OPRs on publics'
supportive attitude and behavioral intentions toward an organization. These linkages
are in effect indicators of public relations effectiveness from a relationship
management perspective.

For the four relationship dimensions used in this study – control mutuality,
satisfaction, trust, and commitment – participants' perceptions of relationship
commitment were key to their positive attitude toward the organization and behavioral
intentions across the two models. More importantly, the final model shows that
perceptions of commitment also can engender supportive behavioral intentions toward
the organization among members of a key public, including even low-involvement
members of that public. Members of the public studied who demonstrated strong
perceptions of relationship commitment were more likely to recommend membership
to others and retain their own membership even if membership in a comparable
association was available. This finding is consistent with those reported in a study of
relational marketing that found that customers' relationship commitment directly
affected their behavioral intentions (Garbarino and Johnson, 1999). This finding
confirms the notion that commitment is most closely related to behavior.

Perceptions of trust also strongly affected members' attitude toward the
organization. A positive attitude and supportive behavioral intentions toward the
organization were influenced by members' perceptions of confidence in and
willingness to rely on the organization.

As found by Garbarino and Johnson (1999), trust and commitment are key predictors of attitude and behavioral intentions for members of a public who have strong relationships with an organization. For members of a public who demonstrate long-term relationships with an organization, perceptions of trust and commitment drive their supportive attitudes and behaviors toward that organization.

Although the sequential model linking perceptions of OPRs, attitude, and behavioral intentions indicates a good fit with the data, some of the proposed theoretical paths between the individual dimensions were not validated in this data set. For example, perceptions of control mutuality and satisfaction had no significant effects on attitude and behavioral intentions. These results are inconsistent with Ki and Hon's (2007a) study, which tested the sequential order of perceptions of OPRs, attitude, and behavioral intentions based on the university-student relationship. The study, which employed attitude as a mediating variable, found that satisfaction and control mutuality were the two key predictors of supportive behaviors.

The insignificant findings related to control mutuality's effect on attitude and behavioral intentions could be explained by the characteristics of the OPR used in this study. As previously mentioned, because there are relatively few opportunities for direct contact between members of this public and the decision makers of the organization, control mutuality might not be reflective of members' attitude and behavioral intentions. This disconnect may be especially true for this study, which focuses on the relationship between state farm bureaus (the organization) and members of a public who belong to a county organization.

The insignificant findings with regard to satisfaction's effect on attitude and behavioral intentions might come from the sequential order of satisfaction, trust, and commitment. As determined in this study, satisfaction is a predictor of trust, and trust generates commitment. Since most of the organization's members had already formed perceptions of trust and commitment, satisfaction might be at the foundation of the relationship between the organization and its members. As these publics experience repeated satisfaction over several years, perceptions of trust and commitment increase.

On a pragmatic level, the findings of this study could be beneficial to membership-based organizations interested in improving relationship quality among members which in turn helps generate supportive attitudes and behaviors toward the organization. Although members with different levels of involvement might go through different routes toward supportive attitudes and behaviors, perceptions of relationship commitment were found to be the key predictor. Hence, organizations should focus their communication strategies on improving relationship commitment. Several studies have uncovered that providing assurances is the most effective strategy for cultivating relationship commitment between two entities (Canary and Stafford, 1992, 1993; Ki and Hon, 2009; Stafford and Canary, 1991). So, organizations should use elements of this strategy which might include providing responses to members' concerns, communicating to the members how significant they are to the organization, and providing opportunities for members to raise issues and propose solutions related to policy and decision making.

Although this study found commitment as a key factor of positive attitude in both low-involvement and high-involvement groups, it does not mean that public relations professionals should consider the other three relationship indicators (e.g. control mutuality, satisfaction, and trust) any lesser. As shown by previous

studies (e.g. Jo, 2006; Ki and Hon, 2007b), public relations professionals should use this evidence to inform and create more effective strategies based on different relationship stages. For example, satisfaction is more important in the beginning of relationship, so organizations should emphasize on building satisfaction in the early stages of relationship building. It might be logical to assume that a member who has recently joined the organization is likely to be involved at a lower level. In this case, communication strategies which can improve the level of mutual-satisfaction between the organization and its new member should be more effective in fostering more positive attitudes and supportive behaviors.

Limitations and future research
Although this study is original and compelling in several ways, limitations exist that can nonetheless guide future research endeavors. First, even though random sampling was used, the data were collected from only one membership organization. To improve external validity, the models tested here should be applied to a variety of OPRs.

Second, involvement, which was measured in terms of the length of membership with the organization, might not necessarily assess the strength of the relationship between members of the public and the organization. Although some members of a public demonstrate long-term membership in an organization, they might not be actively engaged in the relationship. In other words, it is possible that some respondents continue their membership but refrain from active participation. On the other hand, although some members of a public may have had relationships with the organization for only a short period of time, they could be actively involved in their relationship with the organization.

Future research should differentiate between members of a public based on their level of involvement, not only the length of their membership. Grunig and Hunt (1984) suggested three categories of publics based on situational theory – latent, aware, and active – that could be applied in future studies. However, the similarities in findings for commitment and trust between the high- and low-involvement groups in this study also substantiate Hallahan's (2000) contention that inactive publics might be appropriate targets for public relations efforts. Clearly, future research should continue to examine how publics' level of involvement in the relationship affects relationship perceptions and how these perceptions drive their attitude and behavior.

Lastly, this study tested two models based on the "hierarchy of effects" theory. Future research may want to consider examining the role of involvement level as a mediator (Antil, 1984). Comparing the possible outcomes there with the empirical findings in this study may provide a more comprehensive understanding and validation of the important role of involvement for organizational-public relationship building and maintenance.

Notes
1. In the field of public relations, relationship management is nurturing and cultivating relationships between an organization and its strategic publics.
2. A hierarchy of effects is the name of a theory, which explains that communication effects occur through a number of stages. Since theory can provide a meaningful description of the connections between relationship perception, attitude, and behavior as a series of stages that members of a public might go through, this theory is appropriate for this study.

3. The Excellence study, which was sponsored by the International Association of Business Communicators (IABC), began in 1986 to identify the key characteristics of excellent communication programs in organizations, and attributes of organizations, which support such excellence. The outcomes of the study have served as the foundation for much theoretical research in public relations. See more details at the following web site. http://www.iabc.com/researchfoundation/reports.htm#excellence

4. The other publics that should be explored by applying relationship concepts are media relations and consumer elations (Grunig, 2006).

5. Integrity is defined as the belief that both parties involved in the relationship are fair and just.

6. Dependability refers to the belief that the other party will do what they say they will do.

7. Competence describes the degree to which an organization has the ability to do what it says it will do (Author2 and Author (f)).

8. In public relations scholarship, continuance and affective commitment have been used to measure commitment. However, normative commitment has not yet been explored.

9. For a detailed description of the historical development of the hierarchy of effects, see Barry (1987). He categorized three development steps of the hierarchy of effects – early development, modern development, and challenge and defense (Barry, 1987, p. 252). The current study adopted the framework of the theory for the modern development stage since the hierarchy of effects model in the early development stage focuses on only immediate outcomes or effects. The focus of communication effects in public relations deals with the long-term outcomes.

10. The basic concept of the "theory of reasoned action" is the collection of attitude toward behavior and subjective norms that cause behavioral intentions, which drive behavior (Fishbein, 1980). For a detailed description of the theory of reasoned action, see Fishbein (1980).

11. Latent variables are the underlying constructs that cannot be directly measured by any one set of measures, but they are hypothesized to affect particular observed variables in the measurement model (Holbert and Stephenson, 2002). However, the latent variables are what researchers want to capture, but these cannot be measured by any one form of observed variable (Duncan, 1975).

12. In this study, behavior was measured as behavioral intentions because both concepts are categorized as "conative". Therefore, behavior and behavioral intentions are treated equally.

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