NETWORK DRIVERS OF INTERCUSTOMER SOCIAL SUPPORT

Hulda G. Black
University of Kentucky, huldagblack@uky.edu

Recommended Citation
https://uknowledge.uky.edu/gradschool_diss/143

This Dissertation is brought to you for free and open access by the Graduate School at UKnowledge. It has been accepted for inclusion in University of Kentucky Doctoral Dissertations by an authorized administrator of UKnowledge. For more information, please contact UKnowledge@lsv.uky.edu.
ABSTRACT OF DISSERTATION

Hulda G. Black

The Graduate School

University of Kentucky

2011
NETWORK DRIVERS OF INTERCUSTOMER SOCIAL SUPPORT

ABSTRACT OF DISSERTATION

A dissertation submitted in partial fulfillment of the requirements for the degree of Doctor of Philosophy in the College of Business and Economics at the University of Kentucky

By
Hulda G. Black

Lexington, Kentucky

Co-Directors: Dr. Scott W. Kelley, Gatton Endowed Professor of Marketing and Dr. Steven J. Skinner, Rosenthal Professor of Marketing

Lexington, Kentucky

2011

Copyright © Hulda G. Black 2011
ABSTRACT OF DISSERTATION

NETWORK DRIVERS OF INTERCUSTOMER SOCIAL SUPPORT

Customers in a service setting sometimes seek support from other customers; recent research has demonstrated this phenomenon. This research also found that intercustomer social support has a positive impact on consumer health, as well as the financial returns for the company. Given these positive effects for firms and customers, organizations can benefit from fostering social connections among their customers. While past research has investigated the positive consequences of intercustomer social support, little research to date has investigated the firm’s strategic role in fostering intercustomer social support. The current research seeks to understand key tactics a firm can use to promote intercustomer social support. Using network theory, the present research investigates the impact of network drivers on different dimensions of intercustomer social support. Results demonstrate that identification with the company, employees and customers is significantly associated with levels of instrumental intercustomer social support. Further, the number of customer ties, along with the amount of information flow and the strength of these ties, all impact instrumental and social/emotional social support. Last, this research presents the positive effects that intercustomer social support has on various customer, firm and co-creation outcomes. Contributions to marketing theory and managerial implications are also presented.

KEYWORDS: Intercustomer Social Support, Customer Networks, Network Theory, Organizational Identification, Co-creation

Hulda G. Black
Student’s Signature

4/1/2011
Date
NETWORK DRIVERS OF INTERCUSTOMER SOCIAL SUPPORT

By

Hulda G. Black

Dr. Scott W. Kelley
Co-Director of Dissertation

Dr. Steven J. Skinner
Co-Director of Dissertation

Dr. Merl Hackbart
Director of Graduate Studies

4/1/2011

Date
RULES FOR THE USE OF DISSERTATIONS

Unpublished dissertations submitted for the Doctor’s degree and deposited in the University of Kentucky Library are as a rule open for inspection, but are to be used only with due regard to the rights of the authors. Bibliographical references may be noted, but quotations or summaries of parts may be published only with the permission of the author, and with the usual scholarly acknowledgements.

Extensive copying or publication of the dissertation in whole or in part also requires the consent of the Dean of the Graduate School of the University of Kentucky.

A library that borrows this dissertation for use by its patrons is expected to secure the signature of each user.

Name
Date

________________________________________________________________________
________________________________________________________________________
________________________________________________________________________
________________________________________________________________________
________________________________________________________________________
________________________________________________________________________
________________________________________________________________________
________________________________________________________________________
________________________________________________________________________
________________________________________________________________________
________________________________________________________________________
________________________________________________________________________
________________________________________________________________________
________________________________________________________________________
________________________________________________________________________
________________________________________________________________________
________________________________________________________________________
________________________________________________________________________
DISSEmmATION

Hulda G. Black

The Graduate School
University of Kentucky
2011
NETWORK DRIVERS OF INTERCUSTOMER SOCIAL SUPPORT

DISSERTATION

A dissertation submitted in partial fulfillment of the requirements for the degree of Doctor of Philosophy in the College of Business and Economics at the University of Kentucky

By
Hulda G. Black

Lexington, Kentucky

Co-Directors: Dr. Scott W. Kelley, Gatton Endowed Professor of Marketing and Dr. Steven J. Skinner, Rosenthal Professor of Marketing

Lexington, Kentucky

2011

Copyright © Hulda G. Black 2011
Dedicated to Kyle, an incredible husband, amazing father, and my teammate in life...without him, none of this would have been possible. Go Team.
ACKNOWLEDGEMENTS

The following dissertation, while an individual work, benefited from the insights and direction of several people. First, my dissertation co-chairs, Scott Kelley and Steve Skinner, exemplify the high quality scholarship to which I aspire. In addition, Leslie Vincent, marketing committee member, provided timely, instructive comments and evaluation at every stage of the dissertation process. Her dedication to this research proved invaluable and allowed me to complete this project on time. Next, I wish to thank Seth Noar and Deborah Chung, outside committee member and examiner, respectively. Each individual provided insights that guided and challenged my thinking, substantially improving the finished product.

In addition to this technical and instrumental assistance, I received equally important support from my family and friends. My husband, Kyle, provided on-going support throughout the entire process. Without his passion for education, I would never have pursued this degree in the first place. His dedication to our family built the foundation for which I was able to achieve this dream. Further, I’d like to thank my parents, Oliver and Carolyn Grin, for supporting my educational journey from its infancy stages through to the present time. Without their support, leadership and direction, this dream would not have been possible. Last, I’d like to thank my brothers, father and mother-in-law, and countless friends for their words of encouragement and support throughout this adventure.

The acknowledgements would not be complete without thanking my cohort, Emily Plant and Jason Rowe, for their support throughout this entire program. Finally, I wish to thank the Lexington Athletic Club and its members for allowing me to conduct this research at their organization and forfeiting precious personal time to complete the surveys.
# TABLE OF CONTENTS

LIST OF TABLES .................................................................................................................... ix

LIST OF FIGURES ................................................................................................................... x

CHAPTER ONE, Introduction ................................................................................................. 1
  Background .......................................................................................................................... 1
  Research Gap ...................................................................................................................... 3
  Research Study ..................................................................................................................... 4
  Contributions ....................................................................................................................... 5
  Overview ............................................................................................................................... 6

CHAPTER TWO, Literature Review ....................................................................................... 8
  Introduction .......................................................................................................................... 8
  Conceptual Foundation ....................................................................................................... 8
  Intercustomer Social Support .............................................................................................. 9
    Social Support .................................................................................................................. 10
    Social Support: Structural vs. Functional ......................................................................... 11
    Social Support from Service Providers and Third Places ............................................... 15
  Intercustomer Social Support ............................................................................................ 17
  Social Networks ............................................................................................................... 19
    Basic Concepts ............................................................................................................... 20
    Social Network-Based Studies in Marketing .................................................................... 24
      Word of Mouth .............................................................................................................. 27
      Group Social Structure ............................................................................................... 27
      Brand Communities ..................................................................................................... 28
  Identification ...................................................................................................................... 28
    Conceptualization ......................................................................................................... 29
    Empirical Findings ......................................................................................................... 30
      Antecedents .................................................................................................................. 31
      Consequences .............................................................................................................. 34
  Chapter Summary ............................................................................................................. 34

CHAPTER THREE, Conceptual Framework ......................................................................... 35
  Introduction ......................................................................................................................... 35
  Overarching Framework ................................................................................................... 35
Network Theory ................................. 37
Conceptual Framework ........................................ 38
Network Identification ........................................ 39
    Organizational Identification .................................. 39
    Customer Identification ....................................... 41
Customer Ties ........................................... 44
    Strength of Ties .............................................. 46
Customer-Employee Ties ..................................... 48
Outcomes of Intercustomer Social Support ............ 49
    Consumer and Firm Outcomes .......................... 50
    Future Co-creation Intentions .......................... 51
Control Variables ........................................ 53
    Relationship with the Organization .................. 53
    Individual Difference Variables ....................... 54
Chapter Summary ........................................ 55
CHAPTER FOUR, Methodology ................................ 56
    Introduction .................................................. 56
    Research Setting ........................................... 56
    Research Design ........................................... 57
        Sampling Procedures and Data Collection .......... 57
        Research Instrument .................................. 58
Measurement of Research Variables ................... 59
    Network Identification Variables ....................... 59
        Customer-Company Identification .................... 59
        Customer-Employee Identification ..................... 60
        Customer-Customer Identification .................... 60
    Network Ties ............................................. 60
        Customer Ties and Customer-Employee Ties .......... 61
        Strength of Ties ........................................ 61
Intercustomer Social Support ........................... 61
    Outcome Variables ......................................... 62
        Patronage & Expenditures ............................. 62
LIST OF TABLES

Table 2.1, Definitions of Social Support .........................................................11
Table 2.2, Functions of Social Support Ties ......................................................14
Table 2.3, Intercustomer Social Support – Key Outcomes ................................18
Table 2.4, Basic Concepts and Definitions ........................................................21
Table 2.5, Relational Contents ...........................................................................22
Table 2.6, Types of Networks ...........................................................................23
Table 2.7, Selection of Customer Social Network Findings ..............................25
Table 2.8, Organizational Identification – Select Definitions ...........................30
Table 2.9, Organizational Identification – Key Research Findings ..................32
Table 5.1, Demographics of Respondents .........................................................70
Table 5.2, CFA Results for Intercustomer Social Support .................................73
Table 5.3, CFA Results for Identification ..........................................................75
Table 5.4, Correlations between Intercustomer Social Support and Identification ..............................................76
Table 5.5, Discriminant Validity Tests .............................................................77
Table 5.6, CFA Results for Subjective Well Being ...........................................79
Table 5.7, CFA Results for Customer Satisfaction ...........................................80
Table 5.8, CFA Results for Future Behavioral Intentions .................................81
Table 5.9, CFA Results for Future Intentions to Co-Create ..............................82
Table 5.10, Main Effect Results .......................................................................86
Table 5.11, Interaction Results .........................................................................87
Table 5.12, Summary of Support for Antecedent Hypotheses .........................91
Table 5.13, Summary of Support for Outcomes Hypotheses ............................95
LIST OF FIGURES

Figure 2.1, Illustration of Ego-Centric Network .............................................. 24
Figure 3.1, Research Model ............................................................................. 40
Figure 5.1, Interaction Graphs for Strength of Ties and Instrumental Social Support….89
Figure 5.2, Interaction Graphs for Strength of Ties and Instrumental Social Support ....90
Figure 5.3, Model Results for Instrumental Intercustomer Social Support ...............92
Figure 5.4, Model Results for Social Emotional Intercustomer Social Support ........93
CHAPTER ONE
INTRODUCTION

BACKGROUND

Traditionally, the study of marketing has focused on the exchange of tangible resources, embedded value and the transaction (Bagozzi 1974; Vargo and Lusch 2004). Firms offer a product, determine a value, and an exchange occurs. While this has been a central focus of marketing for the past few decades, recent perspectives are focusing on service provision rather than goods provision as the fundamental unit of exchange. Specifically, firms are recognizing that they must offer a unique value to customers in order to gain a competitive advantage. This change in perspective is a direct result of consumers being more connected, involved and informed (Prahalad and Ramaswamy 2004b). From a service dominant logic perspective, customers are the co-creators of unique value and a service-centered view is customer oriented and relational (Vargo and Lusch 2004). No longer is the firm determining the value; the customer and firm are jointly creating and determining the value of the product or service. “A firm cannot create anything of value without the engagement of individuals” (Prahalad and Ramaswamy 2004a, p. 5). Therefore, firms must consider how they can engage customers in order to create a unique value for their customers. Answering this question correctly can lead to the development of a sustainable competitive advantage.

Past frameworks on customer loyalty indicate that ultimate loyalty to an organization is a combination of: 1) perceived product superiority; 2) personal fortitude; and 3) social bonding (Oliver 1999). Social bonding refers to high levels of community within an organization; it is based on the idea that individuals have a sense of community when they share the same consumption behaviors as others (McAlexander et al. 2003; McAlexander et al. 2002; Schouten and McAlexander 1995). To develop this ultimate loyalty and social bonding among customers, organizations must focus on two key areas: 1) all possible linkages in the organization; and 2) all points of co-creation through the service (Prahalad and Ramaswamy 2004c; Ramaswamy 2009). In a typical organization, multiple organizational linkages exist. For example, between the: employee and customer; employee and management; customer and management; and among customers. While past research has focused on key interaction points between the customer and the
firm, little research has focused on the impact of “other customers” on the service experience. With this emerging dominant logic towards engagement and interconnectivity among organizational participants (Vargo and Lusch 2004), a key goal for marketing researchers is to investigate the impact and formation of these organizational linkages among customers. Recent research has begun to explore this concept by extending the concept of social support to customers (Rosenbaum 2008).

While social bonding refers to high levels of community among customers, social support among customers refers to any level of resource exchange among customers. This concept is discussed in more detail below, as well as within the literature review.

In the psychology and health communication literature, social support has been conceptualized as “social resources that individuals perceive to be available, or that are actually provided to them, by nonprofessionals in the context of both formal support groups and informal helping relationships” (Cohen et al. 2000, p. 4). Past research in marketing has investigated social support that occurs in the service firm. For example, Adelman and Ahuvia (1995) investigated social support between customers and service employees. They found a significant relationship between social support received from service employees and the customer’s willingness to recommend the service. More recently, Rosenbaum (2008) has researched the impact of customers forming bonds with other customers. In one study, he demonstrated that increased levels of social support among customers in a service setting can lead to improved health outcomes for customers and increased financial returns for the service firm (Rosenbaum 2008).

Rosenbaum (2008) coined the term, return on community, to represent this combination of consumer health outcomes and firm level financial outcomes. Despite the positive impact that intercustomer social support has on these outcomes, research has not investigated how the firm can encourage social support among customers in order to maximize its impact on customer and firm outcomes. This research seeks to fill this gap by investigating strategic drivers of intercustomer social support.

With the increasing emphasis on engagement and interconnectivity (Vargo and Lusch 2004), social network theory provides a theoretical backdrop to couch the present research. Using social network theory, the present research empirically tests strategic drivers to intercustomer social support from the social networks and identification literatures. The social networks perspective deals with the actual existence of the
connections among customers, along with the types of information flow that occurs across these linkages. The identification literature looks at the connection that customers can form with an organization, and the subsequent positive effect this can have on the firm. In addition to the proposed antecedents, this research further contributes to the intercustomer social support literature by investigating outcomes of intercustomer social support. Specifically, this research examines customer outcomes, firm outcomes, as well as co-creation outcomes.

Given the severity of the current financial, housing and health problems facing consumers and businesses, researchers must continue to investigate how firms can strategically benefit the customer, while at the same time improving the firm’s financial return. As Rosenbaum’s research suggests, one antecedent to both outcomes is through intercustomer social support (Rosenbaum 2008). Given that customer-to-customer support is a recent addition to the marketing literature, there is still a vast amount to be researched in this area. The present research expands the nomological net surrounding intercustomer social support by investigating strategic drivers of intercustomer social support, along with customer and firm level outcomes.

**Research Gap**

Social support research in psychology and health communication has focused almost entirely on receiving social support from family and friends (c.f. Albrecht and Goldsmith 2003; Brissette et al. 2002; Heaney and Israel 2002). Marketing researchers have extended this paradigm to customers receiving social support from service employees (Adelman and Ahuvia 1995; Kang and Ridgway 1996) and from third places (Rosenbaum 2006; Rosenbaum et al. 2007). It is only recently that research on customer-to-customer social support groups, or intercustomer social support, has surfaced (Rosenbaum 2008; Rosenbaum and Massiah 2007). This recent research demonstrates a positive linkage between intercustomer social support and consumer well-being and financial returns for the firm. Specifically, this research has demonstrated a positive linkage between intercustomer social support and: 1) weekly patronage; 2) monthly expenditures; 3) subjective well-being; 4) future behavioral intentions; and 5) customer satisfaction. Given these positive effects of intercustomer social support, firms
seeking to gain a sustainable competitive advantage would benefit from socializing their customers.

Despite these positive findings regarding the consequences of intercustomer social support, little research has been conducted on the firm’s role in intercustomer social support, or the strategic drivers of intercustomer social support. Therefore, the primary research question addressed in this research is:

*What are the key strategic drivers of intercustomer social support?*

Using a social network perspective, the social networks and identification literatures are used to derive antecedents of intercustomer social support.

Additionally, this research investigates outcomes of intercustomer social support. Past research has already demonstrated the positive impact of intercustomer social support on consumer health outcomes and firm financial outcomes (Rosenbaum 2008). Since the effects of intercustomer social support on these outcomes have only been studied once, the present research seeks to confirm these past findings. Additionally, this research extends upon these outcomes by investigating additional customer, firm and co-creation outcomes. Therefore, the secondary research question address in this research is:

*How does intercustomer social support impact customer, firm and co-creation outcomes?*

This research tests a research model to empirically address these research questions.

**Research Study**

To address the primary research question, the current research uses social network theory to develop a research model that integrates the social networks, identification, and intercustomer social support literatures. First, this research empirically tests that a customer’s identification with the company, the employees, and other customers impact intercustomer social support. Next, a customer’s number of ties with customers and the amount of information exchanged is tested to have a positive effect on intercustomer social support. Specifically, this effect on social/emotional support is moderated by the strength of ties. Last, the amount of connections a customer has with employees is tested to negatively moderate this effect on instrumental support.
To empirically address the secondary research question, the current research draws on previously studied outcomes, as well as theoretically derived co-creation outcomes. On the customer side, this research studies the impact of intercustomer social support on patronage frequency, subjective well-being and customer satisfaction. Firm level outcomes include customer referrals, expenditures, and future behavioral intentions. Last, the research investigates the impact of intercustomer social support on a customer’s future intentions to co-create, including ability, role clarity and perceived value of future co-creation.

A cross-sectional field study in a health club is used to test the research model. This research setting selection was based on key contextual boundaries. Specifically, in order to investigate drivers of intercustomer social support, it was necessary to select a research setting where intercustomer social support already exists. Past research has shown that intercustomer social support is present within a health club setting (Rosenbaum 2008). Additionally, members of a health club typically patronize the facility multiple times per week. This increased interaction with the organization increases the opportunities for customers to interact with other customers.

Surveys were administered to members of a local health club. The survey instrument (Appendix B) included both sociometric and psychometric measures. Name generator techniques (Knoke and Yang 2008) were used to develop rosters on customer and employee ties, while established scales were used to measure identification, intercustomer social support, outcome, and control variables. Psychometric properties of all measures were scrutinized using confirmatory factor analysis. Additionally, customer surveys were matched with secondary data on patronage, spending and referrals from the health club. Given that multiple independent variables are predicting the same dependent variables, seemingly unrelated regression (SUR) was used to test the network and identification drivers of intercustomer social support. To empirically test the secondary research question, structural equation modeling was used to test the relationships among the multiple independent and dependent variables.

CONTRIBUTIONS
The current research study contributes to marketing theory, as well as marketing practice. First, this research contributes to the theoretical foundation of intercustomer
social support. The concept of intercustomer social support has been in the marketing literature for only a few years; therefore, research is needed to expand on the nomological network surrounding this concept. Specifically, past research has investigated the outcomes of intercustomer social support, yet research is needed to understand what drives intercustomer social support in an organization. Additionally, this research theoretically contributes to the social networks and co-creation literatures by expanding on the types of connections among customers that can occur in an organization. Past literature has primarily examined the support linkages between customers and the organization, not among customers (e.g. Adelman and Ahuvia 1995). Last, this research investigates additionally outcomes of intercustomer social support to further understand the network surrounding intercustomer social support.

The present research also contributes to marketing practice. As Rosenbaum (2008) demonstrated, intercustomer social support can improve the firm’s financial return. In a society where customers are continuously informed and connected, organizations can benefit from understanding how to embed customers into their organization. Intercustomer social support provides one way to do this. If firm’s can understand how to foster and engender intercustomer social support in their organizations, customers can become more embedded in the organization. For the organization, this can lead to increased consumer spending, loyalty, word-of-mouth, and the ability to charge higher prices. Additionally, intercustomer social support can improve consumer health outcomes, such as health and well-being. These positive outcomes for consumers can lead to a sustainable competitive advantage for the organization.

OVERVIEW

Chapter two reviews the intercustomer social support, social networks, and identification literatures. The purpose of this chapter is to synthesize past research in order to theoretically derive strategic drivers of intercustomer social support. Chapter three develops a research model based on these three literature streams. Specifically, the customer’s network and level of identification are proposed to impact intercustomer social support. Next, chapter four details the methodology that is used to empirically test the research model, and chapter five presents the results of this empirical analysis. Last,
chapter six concludes with a discussion of results, contributions to marketing theory, managerial implications, limitations and future research.
CHAPTER TWO
LITERATURE REVIEW

INTRODUCTION

This purpose of this chapter is to review three streams of literature: intercustomer social support, social networks and identification. Network theory is used in chapter three to develop a framework of key drivers of intercustomer social support based on network ties and identification. These literatures are reviewed following a brief introduction.

CONCEPTUAL FOUNDATION

Traditionally, the study of marketing has focused on the exchange of tangible resources, embedded value and the transaction (Bagozzi 1974; Vargo and Lusch 2004). While this has been a central focus of marketing for the past few decades, recent perspectives, like service dominant logic (SDL), are focusing on service provision rather than goods provision as the fundamental unit of exchange. SDL defines services as the application of specialized competencies (knowledge and skills) through deeds, performance and processes. SDL is based in resource-advantage theory (Hunt and Morgan 1995; Hunt and Morgan 1997), market-based assets (Srivastava et al. 2001; Srivastava et al. 1998) and the capabilities perspective (Day 1994; Day 2000). The underlying premise of SDL is that service provision, as oppose to goods provision, should be the fundamental focus of marketing. Two key fundamental premises of SDL are: 1) the customer is always the co-creator of unique value; and 2) a service-centered view is customer oriented and relational (Vargo and Lusch 2004). These two premises emphasize the importance of connections and relationships within a service organization. Service provision can be viewed as a result of the connections among the organization, its employees and its customers. Further, value is a function of the customer’s experiences across these connections rather than the product itself (Ramaswamy 2009). To summarize, the focus is shifting away from the tangible product toward intangibles, such as interactivity, connectivity and ongoing relationships (Vargo and Lusch 2004). Organizations can gain a sustained competitive advantage over competitors by promoting
these relationships, and thereby improving customer experiences and the customer’s perceived value of the service or product.

In order to develop this atmosphere, organizational leaders must take a critical role to create and initiate a connected environment for their organization, employees and customers. “Becoming a co-creative organization requires enabling organizational links” among leadership, employees and customers (Ramaswamy 2009, p. 36). In organizations where customers interact with each other, this includes enabling and promoting links among customers, or intercustomer social support. Therefore, organizations can encourage the co-creation experience by encouraging network connections among their customers. When customers of an organization connect, they not only can create unique experiences of value with other customers, they also have the opportunity to provide support for each other. Given this importance of establishing linkages, a social network perspective provides a relevant backdrop to couch the present research.

Intercustomer social support represents an opportunity that firms can capitalize on to create a unique customer experience. Recent research on intercustomer social support (Rosenbaum 2008) found that social support among customers can lead to positive joint customer and firm level outcomes. Despite these positive outcomes for the firm and the customer, little research has been conducted regarding the key drivers of intercustomer social support within the service setting. Based in social network theory, this research investigates strategic drivers of intercustomer social support in two fundamental areas: network ties and identification. Before the theoretical rationale for these two areas is developed in chapter three, a review of the literature on these areas, as well as intercustomer social support is presented.

**Intercustomer Social Support**

Research on intercustomer social support stems directly from past research on social support; therefore, a review of intercustomer social support must begin with a summary of social support literature. Research in marketing has also studied social support received from service providers. Given this, this portion of the literature review is broken up into three sections: social support, commercial social support and intercustomer social support.
Social support research dates back over six decades and across as many disciplines, including anthropology, epidemiology, medicine, nursing, psychology and sociology. Due to the various backgrounds and approaches taken by these researchers, the conceptualization of social support still remains ambiguous (Uchino 2004). The broadness the social support conceptualization is reflected in the following quote:

“Social support in not, however, an easily definable term. People use the term social support, or the phrase social support, to refer to a wide variety of phenomenon that characterize the social environment, or the people who surround individuals in their network” (Helgeson 2003, p. 25)

Table 2.1 presents several definitions of social support from different disciplines. The most common definition in the literature refers to social support as the “social resources that individuals perceive to be available, or that are actually provided to them, by nonprofessionals in the context of both formal support groups and informal helping relationships” (Cohen et al. 2000, p.4).
Table 2.1
Definitions of Social Support

<table>
<thead>
<tr>
<th>Citation</th>
<th>Definition</th>
</tr>
</thead>
<tbody>
<tr>
<td>Cohen, Gottlieb, &amp; Underwood (2000)</td>
<td>Social resources that individuals perceive to be available, or that are actually provided to them, by nonprofessionals in the context of both formal support groups and informal helping relationships</td>
</tr>
<tr>
<td>Adelman, Ahuvia, and Goodwin (1994); Adelman &amp; Ahuvia (1995)</td>
<td>Verbal and nonverbal communication that facilitates a service exchange by reducing a customer’s uncertainty, improving a customer’s self-esteem, or enhancing a customer’s feelings of connectedness to others</td>
</tr>
<tr>
<td>Kang and Ridgeway (1996)</td>
<td>Extend social support to commercial marketplace; commercial relationships can provide social support to elderly consumers</td>
</tr>
<tr>
<td>Taylor et al. (2004)</td>
<td>The perception or experience that one is loved and cared for, esteemed and valued, and part of a social network of mutual assistance and obligations</td>
</tr>
<tr>
<td>Cohen (2004)</td>
<td>Provision of psychological and material resources intended to benefit an individual’s ability to cope with stress</td>
</tr>
<tr>
<td>Uchino (2004)</td>
<td>Defined to include both the structures of an individual’s life (e.g. group membership) and the more functions they may serve (e.g. emotional support)</td>
</tr>
<tr>
<td>Helgeson (2003)</td>
<td>Supportive ways different people behave in the social environment</td>
</tr>
</tbody>
</table>

**Social Support: Structural vs. Functional**

In a comprehensive review of social support and outcomes, Cohen and Wills (1985) distinguished among two broad conceptualizations and measurements of social support: structural and functional. When scholars refer to the social environment, they are typically distinguish between structural and functional conceptualizations of social support (Helgeson 2003; Uchino 2004). Structural conceptualizations measure the actual existence of social ties, while functional ties examine the function or purpose of the tie (Cohen and Wills 1985; Uchino 2004).

Overall, structural measures of social support reflect what many marketing researchers have termed a social networks perspective. In other words, the structural conceptualization of social support refers to the actual existence of the social relationship
Other health communication researchers have also used the term *social integration* (Heaney and Israel 2002) to reflect the structural aspects of social support. Research on the structural aspects of social support has centered around family, households, and close friendships (Uchino 2004). The underlying relationship between social integration and outcomes centers on the fact that people who are more socially integrated have a stronger sense of self identity and worth of life (Thoits 1983). In other words, social integration helps individuals to understand their social roles and therefore promotes positive outcomes (Uchino 2004). There are numerous ways to operationalize the structural portion of social support. Examples of these measures include: size of the network, amount of contact with network members, type of contacts, density of the network, centrality of the actor, multiplexity, reciprocity and strength of ties (Berkman et al. 2000; Brissette et al. 2000; Brissette et al. 2002; Heaney and Israel 2002; Uchino 2004). Other comprehensive measures have been developed to study the variety of the ties. For example, the social network index (SNI) asks respondents to complete questions about four sources of social integration: 1) marriage; 2) contact with close friends and relatives; 3) church membership; and 4) informal and formal group memberships (Berkman and Syme 1979; Uchino 2004). Social network operationalizations, especially the SNI, have predicted mortality and morbidity (Berkman et al. 2000; Uchino 2004).

Functional conceptualizations of social support represent the actual functions that a social tie represents (Cohen and Wills 1985; Uchino 2004). The different taxonomies of these social functions differ according to various researchers. Most researchers distinguish among three functions of social support ties; however, the three specific functions differ depending on the scholar. Table 2.2 provides an overview of these functions. For example, some scholars distinguish among instrumental, information, and emotional support (Heaney and Israel 2002; House and Kahn 1985). On the other hand, other scholars differentiate among instrumental, companionship and emotional support (Helgeson 2003; Rook 1984; Rosenbaum and Massiah 2007). Between these two taxonomies, the difference lies from comparing informational and companionship. Despite the difference, these taxonomies are actually very similar. Companionship has been merged with emotional support in previous research (Suurmeijer et al. 1995).
Other researchers differentiate among six resources for social support: material aid, guidance, feedback, physical assistance, social participation, and intimate interaction (Barrera 1980; Barrera 1981; Rosenbaum 2008). Despite having twice as many categories, one can still see the comparison between the 3-category taxonomy versus the 6-category taxonomy. For example, material aid and guidance relate closely to instrumental support. Feedback and physical assistance result from having slightly stronger connections, which typically occur in companionship. Last, social participation and intimate interaction parallel the emotional support, or the social-emotional support described previously. Regardless of the types of socially supportive resources, it is apparent that types of social support exist along a continuum, with basic instrumental support on one end and emotional support on the opposite end of the continuum. Although the exact function of different ties differs among scholars, most agree that supportive ties provide the function of emotional support, information support, tangible support, and belonging support (Uchino 2004).
Table 2.2¹
Functions of Social Support Ties

<table>
<thead>
<tr>
<th>Resource</th>
<th>Definition</th>
<th>Example</th>
</tr>
</thead>
<tbody>
<tr>
<td>Instrumental</td>
<td>Provision of material aid</td>
<td>Financial assistance; help with daily tasks</td>
</tr>
<tr>
<td>Informational</td>
<td>Provision of relevant information intended to help the individual cope with current difficulties</td>
<td>Advice and guidance in dealing with problems</td>
</tr>
<tr>
<td>Emotional</td>
<td>Expression of empathy, caring, reassurance, and trust</td>
<td>Emotional expression and venting</td>
</tr>
<tr>
<td>Companionship</td>
<td>Provision of partner for activities</td>
<td>Workout partner (some researchers have merged companionship and emotional support into a single dimension: social-emotion support)</td>
</tr>
<tr>
<td>Material Aid / Tangible Support</td>
<td>Ability for people to borrow money or valuable objects from others</td>
<td>Borrowing money (similar to instrumental)</td>
</tr>
<tr>
<td>Guidance</td>
<td>Provision of personal advice</td>
<td>Advice and guidance (this is similar to Information)</td>
</tr>
<tr>
<td>Feedback</td>
<td>Provision of positive feedback; provides people with interesting and valuable information about themselves</td>
<td>Giving positive feedback to others</td>
</tr>
<tr>
<td>Physical Assistance</td>
<td>Provision for help with personal tasks</td>
<td>Driving someone to work</td>
</tr>
<tr>
<td>Social Participation</td>
<td>Provides people with feelings of fun and relaxation (also called companionship)</td>
<td>Hanging out and having fun with others</td>
</tr>
<tr>
<td>Intimate Interaction</td>
<td>Person’s ability to share personal concerns and feelings with another person (also called emotional support)</td>
<td>Discussion of personal and intimate facts</td>
</tr>
</tbody>
</table>

¹Barrera (1980); Cohen (2004); Rossenbaum & Massiah (2007); Unchino (2004)

The purpose of this research is to investigate the role of the firm in social support among customers. Given this, it seems that firms would be interested in both the structural and functional aspects of social support. In terms of the structure of social
support, firms need to understand whether intercustomer social support does in fact exist in their business. Beyond the structure, firms must understand the function the social ties among customers play (e.g. emotional, informational, tangible). By understanding what function the social relationships represent, the firm can determine a strategic role to emphasize and promote the functions that exists among their customers.

**SOCIAL SUPPORT FROM SERVICE PROVIDERS AND THIRD PLACES**

Social support research in marketing has largely investigated the social support that customers receive from service providers. Given the inseparability of many services, it is understandable that customers seek social support from service providers (e.g. hairdressors; Price and Arnould 1999). While marketing research on customers receiving social support from service providers is limited, the research available demonstrates the positive impact social support can have on outcomes. For example, Adelman and Ahuvia (1995) investigated the supportive role of dating service managers in the initial introductory service offering of matchmaking. They found that social support was a key antecedent of satisfaction with the director and word of mouth. Further, Gentry and Goodwin (1995) found that consumers lean on funeral directors for social support following the death of a loved one. Other research demonstrated that customer-to-service provider relationship ties can develop into friendship ties between customers and their hair-stylists (Price and Arnould 1999). Overall, this research demonstrates that social support can occur between the individual service provider and the customer.

Another stream of related research looks at the social support received from the organization, as a whole as opposed to the individual service provider; this literature is reviewed in the following paragraphs.

Within the field of sociology and marketing, social support has also been studied in the context of third places. The term *third places* was coined by Ray Oldenburg (1999). Third places is defined as “public places that host the regular, voluntary, informal, and happily anticipated gatherings of individuals beyond the realms of home and work” (Oldenburg 1999, p. 16). Third places are typically smaller, locally owned establishments where regular customers gathering to utilize the service and socialize with each other. Furthermore, these third places tend to become customers *home away from home* (Oldenburg 2001).
In an effort to understand why consumers become attached to third places, Rosenbaum (2006) used grounded theory methodology to develop a framework to understand this phenomenon. Through in-depth interviews with customers and owners of a small diner, Rosenbaum found that customers assign three different meanings to the service establishment: place-as-practical, place-as-gathering, and place-as-home. The framework proposes that customers assign these place meanings to the service establishment based on whether the establishment satisfies a consumption, companionship, or emotional support need. For example, at the most basic level, consumers visit an establishment to satisfy a physical need, such as food. When a customer views the establishment as satisfying a basic need, s/he identifies the business with a place-as-practical meaning. Alternatively, when a customer views an establishment as satisfying social needs, such as preventing loneliness, then they identify the business with a place-as-gathering meaning. Last, when the customer sees the establishment as satisfying emotional needs, such as providing emotional support, then they see the business with a place-as-home meaning (Rosenbaum 2006). Overall, framework proposes a positive relationship between social support received from people within the third place and subsequent loyalty to that establishment. Given this, firms who wish to socialize their customers may wish to strategically choose to develop a servicescape that promotes a place-as-gathering or place-as-home atmosphere.

In addition to the grounded theory methodology, Rosenbaum (2006) also surveyed customers of the service establishment to empirically test the relationship between social support from customers and employees and attitudes/behaviors towards the establishment. Results revealed that the level of companionship/emotional support received was a significant positive predictor of their commitment toward the business and their satisfaction/loyalty toward the business. Overall, this research found that social support from customers and service employees can satisfy a consumer’s social and emotional needs.

While Rosenbaum (2006) found that customers use third places to satisfy social and emotional needs, more research was still needed to understand why consumers are motivated to seek social support in service establishments. In the initial qualitative research, customer interviews revealed that social and emotional supportive needs in a commercial setting usually stemmed from social and emotional loneliness (Rosenbaum
In order to further understand what leads to commercial third place attachment and further test the social support from third places framework, Rosenbaum and colleagues (2007) developed and tested a model of how socially supportive destructive events (e.g. divorce, illness, retirement) can lead customers to find social support from service establishments. This research found that customers in a small diner who experienced socially destructive events were able to counter this social and emotional loneliness through social support from customers and employees at the diner (Rosenbaum et al. 2007).

**INTERCUSTOMER SOCIAL SUPPORT**

As is demonstrated from the previous review, social support has been studied in multiple contexts, including health and the service provider. In this research, social support is typically conceptualized in regards to support received from family, friends and the service provider. Rosenbaum and Massiah (2007) extended the research on social support to investigate situations when customers receive support from other customers. Prior to this research, scholars had investigated customers receiving support from other customers; however, this research primarily focused on the fact that customers seek support from other customers during memorable, emotional, pleasurable, boring, or nerve-racking experiences that are shared among the customers (e.g. during rafting trips; Arnould and Price 1993; skydiving adventures; Celsi et al. 1993; Harley-Davidson gatherings; Schouten and McAlexander 1995).

Rosenbaum and Massiah (2007) sought to extend the notion of customers receiving support from other customers by going beyond the existence of social support to investigate the consequences of intercustomer social support. Specifically, Rosenbaum & Massiah (2007) investigate intercustomer social support as an antecedent to customer voluntary performance. Customer voluntary performances (CVP) are helpful, discretionary behaviors that customers perform to support the firm’s ability to deliver service quality (Bailey et al. 2001; Bettencourt 1997; Hsieh et al. 2004). Examples of customer voluntary performance include positive world of mouth, loyalty, and offering suggestions (Rosenbaum and Massiah 2007). In their study, they found that customers who received social, emotional and instrumental support from other customers were more likely to display CVP through customer citizenship (participation,
cooperation, WOM/loyalty) and customer care (empathy, responsibility). In conclusion, a key consequence of intercustomer social support is CVP. This can lead to improved service quality and decreased marketing costs for the business.

| Table 2.3  
<table>
<thead>
<tr>
<th>Intercustomer Social Support – Key Outcomes</th>
</tr>
</thead>
<tbody>
<tr>
<td>Group Cohesion among Customers (+)</td>
</tr>
<tr>
<td>Enhanced Well-being (+)</td>
</tr>
<tr>
<td>Customer Satisfaction (+)</td>
</tr>
<tr>
<td>Loyalty/WOM (+)</td>
</tr>
<tr>
<td>Willingness to Pay (+)</td>
</tr>
<tr>
<td>Switching (ns)</td>
</tr>
<tr>
<td>Likelihood to Complain (ns)</td>
</tr>
<tr>
<td>Monthly Spending (+)</td>
</tr>
<tr>
<td>Customer Citizenship: Participation (+)</td>
</tr>
<tr>
<td>Customer Citizenship: Cooperation (+)</td>
</tr>
<tr>
<td>Customer Citizenship: Loyalty (+)</td>
</tr>
<tr>
<td>Customer Care: Empathy (+)</td>
</tr>
<tr>
<td>Customer Care: Responsibility (+)</td>
</tr>
</tbody>
</table>

In another study, Rosenbaum (2008) investigate intercustomer social support in a local arcade, a Gold’s gym, and Curves. This research found that people can acquire six different types of social support from others: intimate interaction, social participation, physical assistance, feedback, guidance, and material aid (Bandera 1980, 1981). Using an aggregate measure of these six dimensions for intercustomer social support, Rosenbaum (2008) found that social support among customers can lead to increased satisfaction with the firm, loyalty to the firm, willingness to pay, weekly patronage of a gym, monthly spending at a gym, and a person’s subjective well-being. Overall, he found that intercustomer social support can benefit the customers and the firm in these service settings (Rosenbaum 2008). Table 2.3 summarizes the findings regarding intercustomer social support.
The previous summary has placed social support in a framework of research that has been conducted. This review reveals that most studies have investigated the functions of social support and the outcomes of social support and intercustomer social support. Specifically, past research has found positive effects of intercustomer social support on group cohesion, satisfaction loyalty with the firm, word of mouth, willingness to pay more, sense of well-being and expenditures (Rosenbaum 2008). Despite the recent research on the positive effects of intercustomer social support, a gap still exists in the literature; research has not addressed what strategies a firm can use to foster intercustomer social support. Two key areas are reviewed to discover drivers of intercustomer social support: social networks and identification. These areas are reviewed in the following sections.

**SOCIAL NETWORKS**

The underlying importance of a social network perspective is its emphasis on the relationships between individuals, groups or entities. When examining the relational content among different actors or organizations, the social network perspective is a useful paradigm to couch the discussion. Several underlying concepts make social networks a distinct research area (Borgatti and Foster 2003; Brass et al. 2004). First, the underlying, driving force in social networks is the focus on the relationships, not the attributes of the actor. It is these network connections that can help explain the behavior, attitudes, and perceptions of those actors involved (Burt 1992; Knoke and Yang 2008). Furthermore, the social network perspective recognizes that actors (people/organizations) are embedded in a network; this network may constrain the actor or allow for opportunity. Resources (information, advice) flow through the network because resources are unevenly distributed throughout the network. This social network perspective allows a researcher to examine the structure and pattern of relations surrounding the actors and how this structure affects certain organizational functions or individual behaviors.

As stated previously, social support encompasses the resources that an individual perceives to be available, or is available to them from another person (Cohen et al. 2000); therefore intercustomer social support is the resources that customers perceive to be available from other customers. In other words, intercustomer social support stems from
an individual’s social connections or their social network with other customers. In order for intercustomer social support to exist, a customer must have connections with other customers. Without these connections, customers would not be able to perceive any resources available to them. On the other hand, the existence of these ties does not necessarily signify that resources or support flow across these linkages. For example, two church members may sit in the same pew at church every Sunday, yet they may never exchange more than the passing of the offering plate. In order for intercustomer social support to exist, customers must be connected and resources must flow between the customers. Therefore, a customer’s social connections to other customers are a necessary but not sufficient condition for intercustomer social support. The next section of this reviews basic concepts of social networks, as well as empirical findings from the social network literature.

**Basic Concepts**

Several concepts and definitions are unique to the social network perspective. The follow section reviews these basic concepts; table 2.4 is provided as a quick reference to these terms. First, an *actor*, is a term used in social networks to describe either an individual or a collective identity. Therefore, an actor could signify an individual, organization, object, event, etc. (Knoke and Yang 2008). When the relationship being examined exists among two actors, this is called a *dyadic* relationship. The connections (or lack of) among three actors is referred to as a *triad*. Finally, when the research is concerned with investigating the social connections among a set of actors and the connections among them, this entire structure is referred to as the *social network* (Wasserman and Faust 1994).

*Tie strength* is one of the most frequently cited network concepts in the literature. According to Granovetter (1973), tie strength is the combination of time, emotional intensity, intimacy (mutual confiding), and reciprocal services of the relationship. Other researchers have also indicated the *multiplexity* among actors is an indicator of tie strength (e.g. Brass et al. 1998).
Table 2.4
Basic Concepts and Definitions

<table>
<thead>
<tr>
<th>Concept</th>
<th>Definition</th>
</tr>
</thead>
<tbody>
<tr>
<td>Actor</td>
<td>Individual, corporate or collective social units (Knoke and Yang 2008; Wasserman and Faust 1994)</td>
</tr>
<tr>
<td>Dyad</td>
<td>Composed of two actors (Wasserman and Faust 1994)</td>
</tr>
<tr>
<td>Triad</td>
<td>Composed of three actors and the (possible) ties among them (Wasserman and Faust 1994)</td>
</tr>
<tr>
<td>Group</td>
<td>Collection of all actors on which ties are to be measured (Wasserman and Faust 1994)</td>
</tr>
<tr>
<td>Tie Strength</td>
<td>Combination of time, emotional intensity and intimacy (Granovetter 1973)</td>
</tr>
<tr>
<td>Multiplexity</td>
<td>Extent to which two actors are linked together by more than one relationship (Brass 1995)</td>
</tr>
<tr>
<td>Reciprocity (Symmetry)</td>
<td>Extent to which relationship is bi-directional (Brass 1995)</td>
</tr>
<tr>
<td>Frequency</td>
<td>How many times, or how often the link occurs (Brass 1995)</td>
</tr>
<tr>
<td>Social Network</td>
<td>Structure composed of a set of actors, some of whose members are connected by one or more relations (Knoke and Yang 2008, p. 8)</td>
</tr>
</tbody>
</table>

When a pair of actors are linked via multiple connections (e.g. work, neighbors, etc.), this relationship is said to be *multiplex* (Brass et al. 1998). Based on these characteristics, the theory further distinguishes between strong ties and weak ties. *Strong ties* are associated with trust, ease of communication, established norms and support (e.g. Krackhardt 1992). *Weak ties* are non-redundant, cost effective and valuable for diffusion of information (e.g. Granovetter 1973). *Symmetric* relationships are also considered stronger than asymmetric relationships. Symmetry in a relationship refers to the flow of relationship in the dyad. In a symmetric or reciprocal relationship, information would flow from A to B, and from B to A (Brass et al. 1998; Scott 2000). Communication and
friendship networks are examples of symmetric relationships. Asymmetric relationships can occur when one actor in the dyad holds a status position; this person of status then has the opportunity to exercise power over the other actor (Brass et al. 1998). An asymmetric relationship in a service organization may exist when one customer looks to another customer for advice regarding performing the service. *Frequency* of interaction refers to how often the connection occurs between a pair of actors, while *reciprocity* of the connection refers to the two way flow of information and resources between actors (Brass 1995). As multiplexity, frequency and symmetry of the connection increase, the tie between actors grows stronger (Brass 1995).

The *relation* is the specific type of connection or tie that exists among actors. There are countless types of *relations* among actors, and the type varies depending on the theoretical nature of the research. A few types of relations are given in Table 2.5. For example, relations may be based on transactions, sentiments, authority or kinship (Wasserman and Faust 1994). Relation can also involve instrumental exchanges, or be based on kinship, such as marriages and relatives (Knoke and Yang 2008).

<table>
<thead>
<tr>
<th><strong>Type of Relational Content</strong></th>
<th><strong>Description</strong></th>
</tr>
</thead>
<tbody>
<tr>
<td>Individual evaluations</td>
<td>Friendship, liking, respect (Wasserman and Faust 1994)</td>
</tr>
<tr>
<td>Transactions</td>
<td>Transfer of material resources (e.g. lending, borrowing; buying or selling) (Knoke and Yang 2008; Wasserman and Faust 1994)</td>
</tr>
<tr>
<td>Transfer Non-Material Resources</td>
<td>Communications; sending/receiving information (Wasserman and Faust 1994)</td>
</tr>
<tr>
<td>Instrumental</td>
<td>Actors contact each other to acquire goods, information, advice, etc. (Knoke and Yang 2008)</td>
</tr>
<tr>
<td>Sentiment</td>
<td>Actors expressing feelings of affection, admiration, hostility, etc. (Knoke and Yang 2008)</td>
</tr>
<tr>
<td>Authority/power</td>
<td>When certain actors have rights and obligations to issue/obey commands of other actors (Knoke and Yang 2008)</td>
</tr>
<tr>
<td>Kinship</td>
<td>Marriage, relatives (Knoke and Yang 2008; Wasserman and Faust 1994)</td>
</tr>
</tbody>
</table>
Social network research also distinguishes among different types of networks (see Table 2.6). A one-mode network examines the content of ties among a set of actors, while a two-mode network involves the measurement among two sets of actors. The present research focuses on a specific type of network referred to as the ego-centric network. This network examines the connections of a single actor, called the ego, to other actors, termed alters. The ego-centric network has also been referred to as one’s personal network (Wasserman and Faust 1994).

<table>
<thead>
<tr>
<th>Type of Network</th>
<th>Description</th>
</tr>
</thead>
<tbody>
<tr>
<td>One-Mode Network</td>
<td>Involves measurements on a single set of actors</td>
</tr>
<tr>
<td>Two-Mode Network</td>
<td>Involves measurements on two sets of actors, or a set of actors and a set of events</td>
</tr>
<tr>
<td>Ego-centered Network</td>
<td>Consists of a focal actor, termed ego, and a set of actors connected to the ego, termed alters (also called personal network)</td>
</tr>
</tbody>
</table>

As mentioned earlier, the present research focuses on the customer’s relationships with other customers; therefore, this research is concerned with the study of the customer’s ego-centric or personal network. Figure 2.1 provides an illustrative example of customer A’s ego-centric network. In this example, customer A’s ego-centric network consists of social ties to eight other customers.
The previous portion of this review has demonstrated the relevance of the social network perspective, as well as outlined the key concepts necessary when investigating one’s social network. The remaining portion of the review on social networks focuses on network-based studies in marketing. Since the focus on the present research is to focus on the social connections among individuals, specifically customers, the following review primarily focuses on findings from research in the consumer context. While there have also been studies examining networks among organizations (Houston et al. 2004; Hutt et al. 1988; Ronchetto et al. 1989) and distribution channels (Dahlstrom and Ingram 2003; Rindfleisch and Moorman 2003; Skinner and Guiltinan 1985; Wathne and Heide 2004), this research is not particularly relevant to the present research question. The following section reviews network based studies in marketing that focus on the consumer. Table 2.7 summarizes these findings.
## Table 2.7
Selection of Customer Social Network Findings

<table>
<thead>
<tr>
<th>Citation</th>
<th>Type</th>
<th>Relational Content</th>
<th>Key Finding</th>
</tr>
</thead>
<tbody>
<tr>
<td>Reingen et al. (1984)</td>
<td>Empirical</td>
<td>Multiple</td>
<td>Multiplex cliques serve as better predictors of brand congruence than uniplex cliques</td>
</tr>
<tr>
<td>Reingen and Kernan (1986)</td>
<td>Empirical</td>
<td>Referral; Communication</td>
<td>Stronger ties are more likely to be used than weaker ties when providing referral information for service</td>
</tr>
<tr>
<td>Brown and Reingen (1987)</td>
<td>Empirical</td>
<td>Referral; Communication</td>
<td>Tie strength and homophily are positively related use of referral source</td>
</tr>
<tr>
<td>Ward and Reingen (1990)</td>
<td>Empirical</td>
<td>Multiple</td>
<td>Structure of social ties within a group impact the formation of shared beliefs among those groups</td>
</tr>
<tr>
<td>Frenzen and Nakamoto (1993)</td>
<td>Empirical</td>
<td>Multiple</td>
<td>Flow of information among actors is influenced by the social structure</td>
</tr>
<tr>
<td>Sirsi, Ward and Reingen (1996)</td>
<td>Empirical</td>
<td>Friendship</td>
<td>Found that cultural forces shape reasoning among group members; interaction between social structure and belief sharing</td>
</tr>
<tr>
<td>McAlexander, Schouten and Koenig (2002)</td>
<td>Conceptual</td>
<td>Brand</td>
<td>Marketers can strengthen loyalty and brand communities by encouraging shared customer experiences</td>
</tr>
<tr>
<td>Reference</td>
<td>Methodology</td>
<td>Type</td>
<td>Findings</td>
</tr>
<tr>
<td>--------------------------------------------------------------------------</td>
<td>-------------</td>
<td>---------</td>
<td>--------------------------------------------------------------------------</td>
</tr>
<tr>
<td>McAlexander, Kim and Roberts (2003)</td>
<td>Empirical</td>
<td>Brand</td>
<td>Brand community is a key driver of customer loyalty</td>
</tr>
<tr>
<td>Lowrey, Otnes and Ruth (2004)</td>
<td>Empirical</td>
<td>Multiple</td>
<td>Gift-givers are influenced by third parties when selecting gifts for recipients</td>
</tr>
<tr>
<td>Dholakia, Bagozzi and Pearo (2004)</td>
<td>Empirical</td>
<td>Virtual</td>
<td>Social benefits and purposive value are key drivers to participation in network-based online communities</td>
</tr>
<tr>
<td>Algesheimer, Dholakia and Herrmann (2005)</td>
<td>Empirical</td>
<td>Brand</td>
<td>Identification with a brand community leads to greater engagement and normative community pressure</td>
</tr>
<tr>
<td>Moore, Moore and Capella (2005)</td>
<td>Empirical</td>
<td>Communication</td>
<td>Higher perceived service atmospherics lead to a more positive interactions with other customers</td>
</tr>
<tr>
<td>Palmatier (2008)</td>
<td>Empirical</td>
<td>Multiple</td>
<td>Customer contact density within the firm had increased impact on customer value</td>
</tr>
<tr>
<td>Goldberg et al. (2009)</td>
<td>Empirical</td>
<td>Multiple</td>
<td>Consumers with large number of ties tend to adopt products earlier in the diffusion process</td>
</tr>
</tbody>
</table>
Overall, research on consumer’s social networks has focused on three main areas: word-of-mouth communications, group social structure, and brand communities.

**Word of Mouth**

A key area of marketing research on consumers involves the investigation of word-of-mouth networks. Since word-of-mouth is a key source of positive and negative information flow, marketers have been especially interested in how one’s social connections influence word-of-mouth and referral information flow. Reingen and Kernan (1986) found that individuals who need referral information for an existing service were more likely to use their close, strong personal connections as oppose to their weaker ties. Brown and Reingen (1987) found that tie strength and homophily were positively correlated with use of referral sources. This information demonstrates that individuals are more likely to reach out to those close to them when in need of a recommendation for a product or service. Last, Moore, Moore and Capella (2005) found that positive service atmospherics has a positive impact on customer-to-customer interactions. High contact service firms that improve atmospherics may be able to improve on word-of-mouth activity.

**Group Social Structure**

In terms of group social structure research, Reingen et al. (1984) demonstrated that groups of consumers with multiple types of interactions with the same people (e.g. multiplex relationships) was a better predictor of brand congruence than uniplex cliques. In other words, individuals were more likely to use the same brand as a friend if they were tied to that friend in multiple different ways (e.g. neighbor and friend). Other research has found that the structure of social ties among group members influence the formation of shared beliefs among these group members. These findings indicate that shared cognitive beliefs among a social group are an underlying mechanism to brand choice (Ward and Reingen 1990). These group findings of shared beliefs have also been demonstrated through cultural forces (Sirsi et al. 1996) and brand communities (Schouten and McAlexander 1995). In other research, Dholakia and colleagues (2004) found that social benefits and purposive value were key drivers to participation in online communities. This research showed that managers may benefit by forming social networks based on customers’ specific goals and needs. Overall, this research on group
social structure demonstrates positive outcomes for organizations who capitalize on the shared beliefs and stronger connections of the social network.

Brand Communities

The research on brand communities looks at the social connections that exist among individuals that are centered on a brand (e.g. Harley-Davidson). Therefore, brand communities represent a strong connection to the brand; however, the connections among customers can vary in strength. In an ethnographic study of Harley Davidson motorcycle owners, Schouten and McAlexander (1995) sought to understand what they termed subcultures of consumption. Through fieldwork, they found the customers do indeed structure themselves around consumption activities, products categories, or even brands. They found that these groups of consumers use their relationships to derive a certain understanding of the brand. In other words, customer’s connections with other customers can influence their understanding of the product or service. Qualitative and quantitative research in a brand community (Jeep) empirically demonstrated support that customers form network connections with the brand, the product and other customers (McAlexander et al. 2002). Research also shows that brand identification positively influences: 1) membership continuance intentions and behavior; 2) community recommendation intentions and behavior; and 3) community participation intentions and behavior (Algesheimer et al. 2005). Last, Palmatier (2008) found that customers who had multiple contacts with an organization were less likely to switch providers and had increased levels of value.

The previous section has reviewed the social network perspective, along with key network-based studies in marketing. As stated previously, network ties are a necessary but not sufficient condition for intercustomer social support to exist. Identification represents another key area of influence on intercustomer social support. This literature is reviewed in the following section.

Identification

Creating a unique value for their customers requires that organizational leaders focus on all linkages within the service process where unique value can be created. For example, organizations should focus on enabling all linkages in the organization, including the link between employees and the company, between employees and the
customer, among employees, and among customers (Ramaswamy 2009). Research on organizational identification has focused on links between the organization and its employees and customers. Social identification with an organization goes beyond mere organizational commitment to represent the sharing of self-defining attributes (Homburg et al. 2009). This shared identification among the organization, employees and customers enhances the customer’s overall experience; thereby, create a unique value. Given this, identification research represents a key area of research to review for drivers of intercustomer social support. Over the past few decades, a depth and breadth of research has been published on organizational identification. This section reviews this research.

**CONCEPTUALIZATION**

Organizational identification has been defined in multiple ways. Table 2.8 provides a sampling of these definitions. Despite a number of definitions, the underlying theme represents organizational identification as the link between the organization and one’s self-concept. This link may occur cognitively (e.g. Ashforth and Mael 1989), emotionally (e.g. O’Reilly and Chatman 1986), or both (e.g. Van Dick 2001). In other words, organizational identification occurs when an individual has a “perception of oneness with or belongingness to” the organization (Ashforth and Mael 1989, p. 34). Typically, the individual believes s/he shares defining attributes with the organization.

While organizational/customer identification appear to be similar to organizational/customer commitment, these constructs are conceptually distinct. The key difference is that identification involves a self-definitional component for the individual. Commitment does not represent the perception of oneness or self-concept that identification does (Ashforth and Mael 1989; Homburg et al. 2009). Further, empirical evidence supports this distinction between commitment and identification (e.g. Van Knippenberg and Sleebos 2006). Last, a meta-analytic review found that organizational commitment and organizational identification had different results with respect to outcome variables (Riketta and Van Dick 2005).
**EMPirical Findings**

Researchers have used a social identity approach (e.g. Tajfel and Turner 1986) as a basis to investigating the concept of organizational identification. This approach involves a theoretical framework that is based on the relationships among the self-concept, the group, and intergroup phenomena (Bergami and Bagozzi 2000). The fundamental assumption regarding the social identity approach is that group membership contributes to self-definition (Homburg et al. 2009). The social identity approach is based in two separate theories: self-categorization theory (e.g. Haslam et al. 2000) and social identity theory (e.g. Tajfel and Turner 1986).

<table>
<thead>
<tr>
<th>Citation</th>
<th>Definition</th>
</tr>
</thead>
<tbody>
<tr>
<td>Ashforth &amp; Mael (1989)</td>
<td>Cognitive perception of oneness with or belongingness to the organization</td>
</tr>
<tr>
<td>Dutton, Dukerick &amp; Harquail (1994)</td>
<td>Process of incorporating the perception of oneself as a member of an organization into one’s general self-definition; degree to which individual perceives s/he share similar defining attributes with the focal organization</td>
</tr>
<tr>
<td>Homburg, Wieseke &amp; Hoyer (2009)</td>
<td></td>
</tr>
<tr>
<td>Riketta (2005)</td>
<td></td>
</tr>
<tr>
<td>O’Reilly &amp; Chatman (1986)</td>
<td>Degree of attraction and desire to maintain an emotionally satisfying self-defining relationship with the organization</td>
</tr>
<tr>
<td>Van Dick (2001)</td>
<td>Part of the individual’s self-concept that comes from the cognitive knowledge of his/her membership in groups and the emotional importance of that membership</td>
</tr>
</tbody>
</table>

Self-categorization theory indicates that people who have a desire to simplify the world categorize people into groups (e.g. clubs, occupation), while social identity theory posits that people strive to enhance their self-concept and self-esteem by improving their social identity. Researchers find that individuals have stronger identification with organizations that preserve their self-concept, provide distinctiveness and enhance their self-esteem (Dutton et al. 1994).
Self-categorization theory assumes that people can have multiple group memberships; therefore, a common group that has been researched is a person’s place of employment (e.g. Bergami and Bagozzi 2000). Other areas of identification research include alumni and their alma maters (e.g. Mael and Ashforth 1992) and customers identification and an organization (e.g. Ahearne et al. 2005). More recent literature has used the term employee identification to refer to the link between employees and their employer. Similarly, customer identification signifies the identification between customers and the organization. Last, the term member identification has also been used by researchers when the research context involves a formal membership to an organization. Through this research on identification, key antecedents and consequences to organizational identification have been supported (see Table 2.9). These results are detailed in the following sections.

**Antecedents**

Overall, research on the antecedents of organizational identification can be divided into two broad categories: characteristics of the organization and characteristics of the individual. In terms of characteristics of the organization, organizational prestige has been studied the most frequently. Multiple researchers, both conceptually and empirically, have demonstrated the positive impact that organizational prestige has on identification (Bergami and Bagozzi 2000; Bhattacharya et al. 1995; Bhattacharya and Sen 2003; Dutton et al. 1994; Mael and Ashforth 1992; Riketta 2005). Other organizational antecedents to identification include the distinctiveness of the organization (Bhattacharya and Sen 2003; Mael and Ashforth 1992) and external image of the firm (Ahearne et al. 2005; Dutton et al. 1994). In terms of individual level characteristics, a key antecedent to identification is the length of the relationship with the organization (Mael and Ashforth 1992; Riketta 2005). Other antecedents to organizational identification include frequency of contact (Bhattacharya et al. 1995) and satisfaction with the organization (Mael and Ashforth 1992). Overall, antecedents to organizational identification support the notion that perceptions of shared attributes and distinctions between the organization and the individual positively impact organizational identification.
## Table 2.9
Organizational Identification – Key Research Findings

<table>
<thead>
<tr>
<th>Identification Type</th>
<th>Citation</th>
<th>Research Type</th>
<th>Relationship of Correlate</th>
<th>Correlate</th>
</tr>
</thead>
<tbody>
<tr>
<td></td>
<td></td>
<td></td>
<td></td>
<td>Organizational Prestige (+)</td>
</tr>
<tr>
<td></td>
<td></td>
<td></td>
<td></td>
<td>Intraorganizational Competition (-)</td>
</tr>
<tr>
<td></td>
<td></td>
<td></td>
<td></td>
<td>Satisfaction with the Organization (+)</td>
</tr>
<tr>
<td></td>
<td></td>
<td></td>
<td></td>
<td>Tenure (+)</td>
</tr>
<tr>
<td></td>
<td></td>
<td></td>
<td></td>
<td>Sentimentality (+)</td>
</tr>
<tr>
<td></td>
<td></td>
<td></td>
<td></td>
<td>Donations (+)</td>
</tr>
<tr>
<td></td>
<td></td>
<td></td>
<td></td>
<td>Willingness to Recommend (+)</td>
</tr>
<tr>
<td></td>
<td></td>
<td></td>
<td></td>
<td>Confirmation with services (+)</td>
</tr>
<tr>
<td></td>
<td></td>
<td></td>
<td></td>
<td>Length of membership (+)</td>
</tr>
<tr>
<td></td>
<td></td>
<td></td>
<td></td>
<td>Visibility of membership (+)</td>
</tr>
<tr>
<td></td>
<td></td>
<td></td>
<td></td>
<td>Participations in similar organizations (-)</td>
</tr>
<tr>
<td></td>
<td></td>
<td></td>
<td></td>
<td>Contact (+)</td>
</tr>
<tr>
<td></td>
<td></td>
<td></td>
<td></td>
<td>Donation (+)</td>
</tr>
<tr>
<td></td>
<td></td>
<td></td>
<td></td>
<td>Company’s identity distinctiveness (+)</td>
</tr>
<tr>
<td></td>
<td></td>
<td></td>
<td></td>
<td>Company’s identity prestige (+)</td>
</tr>
<tr>
<td></td>
<td></td>
<td></td>
<td></td>
<td>Company’s identity attractiveness (+)</td>
</tr>
<tr>
<td></td>
<td></td>
<td></td>
<td></td>
<td>Company loyalty (+)</td>
</tr>
<tr>
<td></td>
<td></td>
<td></td>
<td></td>
<td>Company promotion (+)</td>
</tr>
<tr>
<td></td>
<td></td>
<td></td>
<td></td>
<td>Customer recruitment (+)</td>
</tr>
<tr>
<td></td>
<td></td>
<td></td>
<td></td>
<td>Resilience to negative information (+)</td>
</tr>
<tr>
<td></td>
<td></td>
<td></td>
<td></td>
<td>Stronger claim on company (+)</td>
</tr>
<tr>
<td>Identification</td>
<td>Authors</td>
<td>Type</td>
<td>Antecedents</td>
<td>Outcomes</td>
</tr>
<tr>
<td>------------------</td>
<td>----------------------------------</td>
<td>---------</td>
<td>-----------------------------------------------------------------------------</td>
<td>--------------------------------------------------------------------------</td>
</tr>
<tr>
<td>Customer</td>
<td>Ahearne, Bhattacharya &amp; Gruen (2005)</td>
<td>Empirical</td>
<td>Construed external image of the company (+)</td>
<td>Perceived salesperson characteristics (+)</td>
</tr>
<tr>
<td></td>
<td></td>
<td></td>
<td>Perceived company characteristics (+)</td>
<td></td>
</tr>
<tr>
<td></td>
<td></td>
<td></td>
<td></td>
<td>Customer extra role behaviors (+)</td>
</tr>
<tr>
<td>Identification</td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Identification</td>
<td></td>
<td></td>
<td>Organization Stereotypes (+)</td>
<td></td>
</tr>
<tr>
<td></td>
<td></td>
<td></td>
<td>Correlates</td>
<td>Affective Commitment (joy) (+)</td>
</tr>
<tr>
<td></td>
<td></td>
<td></td>
<td></td>
<td>Affective Commitment (love) (-)</td>
</tr>
<tr>
<td></td>
<td></td>
<td></td>
<td></td>
<td>Organization-based Self-esteem (+)</td>
</tr>
<tr>
<td></td>
<td></td>
<td></td>
<td></td>
<td>Organizational citizenship behaviors (+)</td>
</tr>
<tr>
<td>Identification</td>
<td></td>
<td></td>
<td></td>
<td>Performance (+)</td>
</tr>
<tr>
<td></td>
<td></td>
<td></td>
<td>Antecedents</td>
<td>Organizational Tenure (+)</td>
</tr>
<tr>
<td></td>
<td></td>
<td></td>
<td></td>
<td>Organizational Prestige (+)</td>
</tr>
<tr>
<td></td>
<td></td>
<td></td>
<td>Outcomes</td>
<td>Intent to Leave (-)</td>
</tr>
<tr>
<td></td>
<td></td>
<td></td>
<td></td>
<td>In-role Performance (+)</td>
</tr>
<tr>
<td></td>
<td></td>
<td></td>
<td></td>
<td>Extra-role Performance (+)</td>
</tr>
<tr>
<td></td>
<td></td>
<td></td>
<td></td>
<td>Job Involvement (+)</td>
</tr>
<tr>
<td>Employee</td>
<td>Riketta (2005)</td>
<td>Meta</td>
<td>Antecedents</td>
<td></td>
</tr>
<tr>
<td>Identification</td>
<td></td>
<td></td>
<td>Organizational Tenure (+)</td>
<td></td>
</tr>
<tr>
<td></td>
<td></td>
<td></td>
<td>Organization Prestige (+)</td>
<td></td>
</tr>
<tr>
<td></td>
<td></td>
<td></td>
<td>Outcomes</td>
<td></td>
</tr>
<tr>
<td></td>
<td></td>
<td></td>
<td>Intent to Leave (-)</td>
<td></td>
</tr>
<tr>
<td></td>
<td></td>
<td></td>
<td>In-role Performance (+)</td>
<td></td>
</tr>
<tr>
<td></td>
<td></td>
<td></td>
<td>Extra-role Performance (+)</td>
<td></td>
</tr>
<tr>
<td></td>
<td></td>
<td></td>
<td>Job Involvement (+)</td>
<td></td>
</tr>
<tr>
<td>Identification</td>
<td></td>
<td></td>
<td></td>
<td>Customer Orientation (+)</td>
</tr>
<tr>
<td></td>
<td></td>
<td></td>
<td>Antecedents</td>
<td>Perceived organizational prestige (+)</td>
</tr>
<tr>
<td></td>
<td></td>
<td></td>
<td></td>
<td>Construed External Image (+)</td>
</tr>
<tr>
<td></td>
<td></td>
<td></td>
<td></td>
<td>Self-continuity (+)</td>
</tr>
<tr>
<td></td>
<td></td>
<td></td>
<td></td>
<td>Self-distinctiveness (+)</td>
</tr>
<tr>
<td></td>
<td></td>
<td></td>
<td></td>
<td>Self-enhancement (+)</td>
</tr>
<tr>
<td></td>
<td></td>
<td></td>
<td>Outcomes</td>
<td>Contact frequency with organization (+)</td>
</tr>
<tr>
<td></td>
<td></td>
<td></td>
<td></td>
<td>Cooperation with other members (+)</td>
</tr>
<tr>
<td></td>
<td></td>
<td></td>
<td></td>
<td>Competition with out-group members (-)</td>
</tr>
<tr>
<td></td>
<td></td>
<td></td>
<td></td>
<td>Organizational citizenship behaviors (+)</td>
</tr>
<tr>
<td>Member</td>
<td>Dutton, Dukerich &amp; Harquail (1994)</td>
<td>Conceptual</td>
<td></td>
<td></td>
</tr>
<tr>
<td>Identification</td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
</tbody>
</table>
Consequences

Research on outcomes of organizational identification has focused on employee and customer behaviors. In terms of employees, research has found support that organizational citizenship (Riketta 2005), turnover (Mael and Ashforth 1995), organization-based self-esteem (Bergami and Bagozzi 2000), work motivation and performance (Van Knippenberg 2000), customer-company identification and customer orientation (Homburg et al. 2009) are consequences of employee identification.

In terms of customer identification, the social identity approach was first applied to consumers by Bhattacharya and Sen (2003) who developed a conceptual framework for consumer-company identification. They propose that increased similarities between the company identity and the consumer identity lead to increased customer-company identification; this then improves company loyalty, recruitment, and company promotion. Empirical testing of this conceptual framework found that customers do indeed identify with companies. This identification has strong, positive consequences, such as product utilization and customer referrals of the company (Ahearne et al. 2005). In a recent empirical study, Homburg, Wieseke and Wayne (2009) integrated employee identification and customer identification into an overall model of the service-profit chain; they found that employee identification with the company was strongly related to customer-company identification. Furthermore, a higher level of customer-company identification also increased the customer’s willingness to pay, which therefore improves the company’s financial returns.

While this research on social identity focuses on employee identification and customer identification, it has implications for the relationships among customers as well. The previous theoretical foundation is used to derive hypotheses for the impact of identification on intercustomer social support.

CHAPTER SUMMARY

This chapter has reviewed intercustomer social support, social networks, and organizational identification. The following chapter uses this literature to derive theoretical antecedents of intercustomer social support. These antecedents directly stem from literature on social networks organizational identification.

Copyright © Hulda G. Black 2011
CHAPTER THREE
CONCEPTUAL FRAMEWORK

INTRODUCTION

Intercustomer social support has been shown to improve financial returns for the organization, as well as improve consumer outcomes (Rosenbaum 2008). Given these positive benefits for the firm and the consumer, managing and promoting intercustomer social support is a viable marketing strategy for organizations where customers have the opportunity to interact with each other. If firms can create a culture where intercustomer social support can thrive, then customers become more loyal to the organization, making it less likely for them to defect. Past frameworks on customer loyalty indicate that ultimate loyalty to an organization is a combination of: 1) perceived product superiority; 2) personal fortitude; and 3) social bonding (Oliver 1999). Social bonding refers to high levels of community within an organization; it is based on the idea that individuals have a sense of community when they share the same consumption behaviors as others (McAlexander et al. 2003; McAlexander et al. 2002; Schouten and McAlexander 1995). Therefore, social bonding and intercustomer social support are both mechanisms for customers to connect with each other and share important information; however, social bonding refers to high levels of community while intercustomer social support can occur at varying intensities depending on the customer. Therefore, intercustomer social support can be seen as an initial step to building customer-to-customer relationships and customer loyalty. Unfortunately, little research has been conducted to understand what can enhance social support among customers. The purpose of this research is to fill this gap by investigating key network drivers that can promote intercustomer social support and therefore impact firm and customer outcomes.

OVERARCHING FRAMEWORK

Traditionally, the study of marketing has focused on the exchange of tangible resources, embedded value and the transaction (Bagozzi 1974). While this has been a central focus of marketing for the past few decades, recent perspectives are focusing on service provision rather than goods provision as the fundamental unit of exchange (Vargo and Lusch 2004). This trend towards service provision is attributable to a more
“connected, informed, and active consumer” (Prahalad and Ramaswamy 2004b, p. 4). As consumers become more connected, they are taking a more active role in determining the value of a transaction, instead of letting the firm determine the value. In the service dominant logic terminology, the customer is the co-creator of unique value (Vargo and Lusch 2004). Intercustomer social support represents a co-creation opportunity for organizations. Co-creation opportunities are points through the service experience where firms can create unique value for the customer (Payne et al. 2008). Given this background, the co-creation literature provides an insightful framework to investigate the drivers of intercustomer social support.

While the term co-production has been in the literature for years, it is only recently that the term co-creation has taken its place. While both terms signify essentially the same thing, the latter represents a more service-centered view, while the former has a more goods-focused perspective (Payne et al. 2008). Co-creation refers to the idea that value is not created by the firm and disseminated to the customer. Instead, value is created jointly by the firm and the customer. Given this, relationships become a central focus to creating unique value (Vargo and Lusch 2004). This trend towards co-creation in organizations is leading firms to focus on customer experiences, rather than the product or service (Prahalad and Ramaswamy 2004c). The interaction and support that occurs among customers provides one avenue to enhance the customer’s experience in the organization.

In order to improve the customer experience and enhance co-creation opportunities, organizations must continue to focus on service provision. According to the key premises of service dominant logic, competitive advantages can be gained through the application of knowledge and skills, as well as by being customer oriented and relational (Vargo and Lusch 2004). Intercustomer social support represents a key source of knowledge and skills for the customer and the firm. Customers can seek informational support about how to improve their co-creation experience with the organization. Additionally, organizations can use these connections to improve their service offering and internally market new information to their customers. By encouraging intercustomer social support, firms are focusing on relationships, a key premise of service dominant logic (Vargo and Lusch 2004). Therefore, organizations must seek to connect customers and establish linkages among customers, while at the
same time encouraging the flow of new information through these connections. Given the focus on the relationships among customers, network theory provides a key theoretical backdrop to develop the overall research model.

**NETWORK THEORY**

The primary research question for this project is to understand what drives intercustomer social support. Given this focus on connections among customers, social network theory provides a critical theoretical foundation for this research. The underlying, driving force in social network theory is the focus on relationships and flow among actors, not the attributes of the actor themselves (e.g. Borgatti and Foster 2003; Brass et al. 2004). Intercustomer social support is defined along similar lines in that the focus is on the relationships and resource flow among customers, not the specific individual traits of the customer. These relationships provide customers (actors) with the ability to acquire new information and discover new opportunities through their interaction with other customers (actors). Another benefit of the network approach that is relevant to this context is its ability to consider the substantive content of the linkages among actors. This relational perspective focuses on the “assets that are rooted in these relationships” (Tsai and Ghoshal 1998, p. 465). These relations can be examined through assessment of an individual’s egocentric network (direct connections), or by examining the complete network (direct and indirect connections) surrounding an individual (Knoke and Yang 2008). In contrast to the relational view, the structural view focuses on the actors’ location within the network, while the node perspective (also called cognitive view) focuses on the characteristics of the actor (Mayhew 1980; Tsai and Ghoshal 1998). In the relational view, linkages among actors act as a channel for information and resources to flow from one entity to another (Wasserman and Faust 1994). Resources (information, advice) flow through the network because these resources are unevenly distributed throughout the network (Brass et al. 1998).

Network theory fits into the entire co-creation experience that organizations strive to create. The linkages among customers and the firm represent a key co-creation opportunity where firms have the ability to create a unique customer experience through these relationships. Also, these connections allow the organization and the customers increased access to the knowledge and skills of other customers, as well as the
organization itself. By examining the content and existence of these relationships from a social network perspective, this research determines what types of linkages are most beneficial for firms seeking to encourage intercustomer social support.

**CONCEPTUAL FRAMEWORK**

In order to increase the support among customers and therefore access to information, firms must understand what motivates customers to connect with each other. In an attempt to better understand what motivates customers to interact with other customers, twenty interviews were conducted with customers at a member-based service organization. Customers were asked why they did (or did not) like to talk with other customers. Two common answers surfaced. The first common theme centered on friendship, community, and social companionship. One customer responded, “These people are my family, I can relate to them.” The second common theme centered on the actual existence (or lack of) of the connections in the first place. For example, some responded, “I don’t like to talk to people” or “I only talk to people when they talk to me.” It seems that while some people are concerned with building a network of friends, others are just as concerned with not forming tight connections with other customers.

These two common themes lead to two key areas of network drivers for this research. First, the community and oneness themes that prevailed can be subsumed under a larger theme of social identification. Social identification refers to the “perceived oneness” a person has with a group or organization (Dutton et al. 1994). In other words, a person can perceive ‘oneness’ with multiple actors in the network, including the organization, the employees, or other customers. It is the person’s identification with the network that exists among all actors and entities in an organization. The second theme deals with the actual existence of the linkages among customers. The linkages can be operationalized in numerous ways, including number of contacts, size of the customer network, and amount of information exchanged in the relationship (Scott 2000). Therefore, this research examines two key areas of network drivers: network identification and customer ties.

Figure 3.1 presents the research model that is developed in the following sections. This research model addresses the primary and secondary research questions presented in Chapter 1. The primary research question investigates network drivers of intercustomer
social support. The secondary research question investigates and confirms outcomes of intercustomer social support. Based on the co-creation framework and network theory, two main areas were identified to influence intercustomer social support: identification and customer ties. To answer the secondary research question, co-creation outcomes are developed, along with previously investigated customer and firm level outcomes. Specific hypotheses are developed in the following sections.

**NETWORK IDENTIFICATION**

Network theory and the co-creation literature demonstrate that relationships and knowledge are critical components to offering unique co-creation opportunities and building unique customer value. Social identification with the firm and other customers provides one way to encourage more relationships and access to information, and therefore the ability to capitalize on co-creation opportunities. Social identification can occur with any actor or entity in the organization’s network, including the organization, the employee or other customers.

**Organizational Identification**

Organizational identification refers to the connection between an individual and an organization (Dutton et al. 1994). Individuals feel this connection when they perceive themselves to have similar defining attributes as the organization. For example, an organization may take an active role in raising money for cancer research. An individual who is passionate about cancer research would have a stronger identification with this organization.
Figure 3.1: Research Model

**Network Drivers**
- Network Identification
  - Company
  - Employees
  - Customers
- Customer Ties
  - Number
  - Amount Info
- Customer Employee Ties
- Strength of Customer Ties

**Intercustomer Social Support**
- Instrumental
- Social/Emotional

**Outcomes**
- **Customer**
  - Patronage Frequency
  - Well-Being
  - Customer Satisfaction with Organization
- **Firm**
  - Customer Referrals
  - Expenditures
  - Future Behavioral Intentions
- **Co-Creation**
  - Ability in Future Co-Creation
  - Role Clarity in Future Co-Creation
  - Perceived Value of Future Co-Creation

**Individual Control Variables**
- Relationship Duration
- Customer Familiarity with the Service Offering
- Customer Expertise with the Service Offering
- Level of Extroversion
Researchers have used a social identity approach (e.g. Tajfel and Turner 1986) as a basis to investigate the concept of identification with a company. The fundamental assumption regarding the social identity approach is that group membership contributes to self-definition (Homburg et al. 2009). The social identity approach is based in two separate theories: self-categorization theory (e.g. Haslam et al. 2000) and social identity theory (e.g. Tajfel and Turner 1986). Self-categorization theory indicates that people who have a desire to simplify the world categorize people into groups (e.g. clubs, occupation), while social identity theory posits that people strive to enhance their self-concept and self-esteem by improving their social identity. Social identity research finds that people can do this through their identification with groups (Tajfel and Turner 1986).

Past research on social identification has centered around two areas: employee-company identification and customer-company identification. For a more detailed review of past research on organizational identification, see Table 2.9 in chapter two.

**Customer Identification**

Bhattacharya and Sen (2003) were the first to apply social identification research to consumers by developing a conceptual framework for consumer-company identification. They propose that increased similarities between the company identity and the consumer identity lead to increased customer-company identification; this then improves company loyalty, recruitment, and company promotion. Empirical testing of this conceptual framework found that customers do indeed identify with companies. This identification has strong, positive consequences, such as product utilization and customer referrals of the company. In other words, customers who identify more with the company are more likely to purchase more and recommend the company (Ahearne et al. 2005). In a recent empirical study, Homburg, Wieseke and Wayne (2009) integrated employee-company identification and customer-company identification into an overall model of the service-profit chain; they found that employee identification with the company was strongly related to customer-company identification. Furthermore, a higher level of customer-company identification also increased the customer’s willingness to pay, which therefore improved the company’s financial returns. Researchers have found that individuals have stronger identification with organizations that preserve their self-concept, provide distinctiveness and enhance their self-esteem (Dutton et al. 1994). A strong self-concept and self-esteem is likely to accompany a
customer’s identification with the organization. This enhanced confidence enhances a person’s ability to offer support to other customers. Therefore, the overall prediction for this research is that a customer’s increased identification with the company, the employees, and other customers leads to increased levels of intercustomer social support. 

**Customer-Company Identification.** Social identity theory posits that individuals identify with certain groups (Tajfel and Turner 1986). Past research has shown that individuals identify with organizations. The social identification literature shows that customers do identify with organizations. This identification can be strong enough to impact extra-role behaviors (e.g. word-of-mouth, customer recruitment; Ahearne et al. 2005). Therefore, strongly identified customers are more likely to act in benefit of the company by offering support to other customers. Intercustomer social support can be classified as an extra-role behavior because it is not typically conceptualized in the consumer’s script. Customers who identify with the organization have an increased oneness and sharing of attributes. Therefore, as a customer’s identification with a company increases, the customer is more likely to help other customers just as the organization would help the customers. Therefore, the following is predicted:

Hypothesis 1: A customer’s identification with the organization is positively associated with levels of instrumental and social/emotional intercustomer support.

**Customer-Employee Identification.** While customers identification with the organization has been empirically studied (e.g. Ahearne et al. 2005), customers’ identification with boundary-spanning employees has not been empirically tested. However, past research has shown that similarity between the service provider and customer can improve service specific behaviors, such as compliance (Dellande et al. 2004). Customers and service employees are central to the co-creation process within a service firm. When customers identify with an employee, they have an avenue to seek support within the service setting. Therefore, as customers’ identification with boundary spanners in an organization increases, these customers seek support from the employees, rather than other customers. This is especially true with basic, instrumental level support. However, identification with employees with also impact levels of intercustomer social emotional support because employees are always at the organization; this allows the customer to seek all levels of support from the employee. Therefore, customers who identify with
employees do not seek support from other customers since they already have access to these resources from their identification with the boundary spanning personnel. Therefore, the following is predicted:

Hypothesis 2: A customer’s identification with the employees is negatively associated with levels of instrumental and social/emotional intercustomer support.

**Customer-Customer Identification.** Intercustomer social support is derived from customers interacting with other customers. Therefore, in addition to the identification a customer has with the organization and with its boundary spanning employees, it is also important for customers to identify with other customers in the organization. A review of the identification literature reveals no past research on customer-to-customer identification; however, employee identification in work groups and organizations has been studied extensively. Employee identification with the organization has been shown to positively impact work-related outcomes, such as performance and job involvement (Riketta 2005). Further, employees’ identification with their workgroups has a positive impact on work behavior (Ellemers and Rink 2005). Therefore, it can be deduced that when customers identify with other customers, there is be a positive impact on behaviors. While most of the research has focused on employee issues, the notion of identifying with peers has been addressed within the network literature, under a concept referred to as homophily.

Homophily is the phenomenon that similar people tend to interact with similar others (McPherson et al. 2001). Evidence for homophily has been found for age, sex, education, prestige, social class, tenure, function, religion, professional affiliation and occupation (e.g. Brass 1995; Ibarra 1992; McPherson et al. 2001). Similarity among actors is believed to ease communication, increase predictability of behavior and encourage trust and reciprocity (Brass 1995). Therefore, when customers share attributes with other customers, they are be more likely to seek out support from these customers. Extremely dissimilar customers may create barriers to communication and social support. Therefore, based on social identification and network theory, the following is hypothesized:
Hypothesis 3: The stronger the customer-customer identification, the stronger the customer’s level of intercustomer social support.

The previous section has identified network identification drivers of intercustomer social support. The following section develops network drivers based on the actual existence of the customer connections.

CUSTOMER TIES

The underlying importance of a social network perspective is its emphasis on the relationships between individuals, groups or entities. Prior to developing the relationship between customer ties and intercustomer social support, it is important to distinguish between these two distinct constructs. Recall that social support is the “social resources that individuals perceive to be available, or that are actually provided to them, by nonprofessionals in the context of both formal support groups and informal helping relationships” (Cohen et al. 2000, p. 4). Therefore, intercustomer social support is the resources that customers perceived to be available or that are actually provided to them by other customers. In order for intercustomer social support to exist, a customer must have connections with other customers. Without these connections, customers would not be able to perceive any resources available to them. On the other hand, the existence of these ties does not necessarily signify that resources flow across these linkages. For example, two church members may sit in the same pew at church every Sunday, yet they may never exchange more than the passing of the offering plate. In order for intercustomer social support to exist, customers must be connected and resources must flow between the customers. Therefore, customer ties are a necessary but not sufficient condition for intercustomer social support.

Given that customer connections are a necessary condition of intercustomer social support, a customer’s linkages with other customers in the organization have an increased impact on the support a customer receives from other customers; however, this relationship is not necessarily monotonically increasing. The amount of intercustomer social support also depends on the amount of resources that flow among the customers. Relationships in a network can range from simple to complex (Knoke and Yang 2008). For example, two individuals standing in the same room would be considered ‘linked’ because they are standing in the same room. This type of relationship that is based on
one interaction is referred to as *uniplex*. A *multiplex* relationship occurs when more than one type of interaction exists among individuals (Brass et al. 1998). For example, two individuals may be standing in the same room and also be co-workers. The amount and type of resource flow among customers depends on the complexity of the relationship.

When using a social network approach, a key issue is to define the boundaries of the connections. In this case, the boundaries are limited to those customers within the organization. Within a closed setting (e.g. an organization), individuals are more likely to be connected to individuals who are geographically close to them (Feld and Carter 1998). Therefore, customers in an active service setting are more likely to seek support from those who are engaging in the service at the same time as themselves. This is analogous with “consumption communities” that have been studied in the branding literature. Individuals who share a sense of community (e.g. the organization) are more likely to have similar consumption values regarding the product or service (McAlexander et al. 2003; McAlexander et al. 2002; Schouten and McAlexander 1995). As customers within an organization create more connections with other customers, they are building their sense of community. At the same time, they are increasing their opportunity to receive resources from other customers. Therefore, it is predicted that the number of customer ties has a positive impact on intercustomer social support.

As stated previously, customer connections are a necessary but not sufficient condition for intercustomer social support. The amount of resource flow is also critical to increasing intercustomer social support. Recall that a relational network view focuses on the specific substantive connection, or the “relational content” among actors. These relationships can take on many forms including: friendship, respect, kinship and communication (Knoke and Kuklinski 1982). An individual might have a high number of connections, but may never utilize those contacts for information. On the other hand, customers may have only a few relationships within the organization, but they may seek a great deal of support from these connections. Therefore, it is important for customers to be connected to individuals that create opportunities for resource flow. This present research focuses on the substantive content of the linkage to determine the amount of information flow between customers.

Social capital provides another mechanism to examine the impact of customer connections on intercustomer social support. Social capital is the notion that one’s social
contacts create opportunities for personal benefit (e.g. Borgatti and Foster 2003; Coleman 1988). As the amount of social contacts and information flow between customers increase, the customers’ social capital increases. This increase in social capital increases the opportunities for customers to access relevant information for their personal benefit. This increase in access and interaction allows the customer increased opportunities to seek support from other customers; therefore, the amount of information exchanged among customers should positively impact intercustomer social support. In summary, the following is predicted:

Hypothesis 4: A customer’s: a) number of customer ties, and b) amount of information exchanged is positively associated with levels of instrumental and social/emotional intercustomer support.

The previous section has hypothesized key network drivers of intercustomer social support. While these main effects are important for organizations to understand, it is also vital that organizations understand potential moderators to these relationships. The following section investigates two potential moderators of the relationship between customer ties and intercustomer social support.

Strength of Ties

Tie strength is one of the most frequently cited network concepts in the literature. According to Granovetter (1973), tie strength is the combination of time, emotional intensity, intimacy (mutual confiding), and reciprocal services of the relationship. Other researchers have also indicated the multiplexity among actors is an indicator of tie strength (e.g. Brass et al. 1998). Based on these characteristics, the theory further distinguishes between strong ties and weak ties. Strong ties are associated with trust, ease of communication, established norms and support (e.g. Krackhardt 1992). Weak ties are non-redundant, cost effective and valuable for diffusion of information (e.g. Granovetter 1973). Symmetric relationships are also considered stronger than asymmetric relationships. Symmetry in a relationship refers to the flow of relationship in the dyad. In a symmetric or reciprocal relationship, information would flow from A to B, and from B to A (Brass et al. 1998; Scott 2000). Communication and friendship networks are examples of symmetric relationships. Asymmetric relationships can occur when one actor in the dyad holds a status position; this person of status then has the
opportunity to exercise power over the other actor (Brass et al. 1998). An asymmetric relationship in a service organization may exist when one customer looks to another customer for advice regarding performing the service.

Recall from the literature review that intercustomer social support is typically conceptualized into three functions: instrumental, social and emotional with the latter two frequently studied as one function. Instrumental support provides individuals with practical help, assistance with mundane activities, or financial aid, while social/emotional support provides individuals with companionship and an outlet to express one’s emotions and feelings (Cohen et al. 2000). Given the differences in these two functions of social support, the strength of ties should impact each type differently. A strong tie is characterized by trust, ease of communication, frequency of contact and reciprocity of information (Granovetter 1973; Krackhardt 1992). When a customer has increased contact with other customers and communication flows back-and-forth among them, they are more likely to seek a higher level of support than if the relationship occurred infrequently or was asymmetric. Strong ties are also characterized by increased emotional intensity (Granovetter 1973) and socio-emotional support (Hansen 1999). An individual is more likely to share confidential information across strong ties. Therefore, strong ties are more likely to result in more social/emotional support than informational or instrumental support. On the other hand, weak ties allow for increased access to novel information. Weak ties are more likely to be used to discover new information or to seek advice from an expert (Granovetter 1973).

In addition to the basic theory behind strong ties and weak ties, the search-transfer problem provides another social network lens to examine the impact of strength of ties on intercustomer social support. When individuals in a network are searching for new information, their weak ties provide more search benefits than their strong ties (Hansen 1999); this makes sense given weak ties provide increased access to novel information (Granovetter 1973). However, when this new information needs to be “transferred” across actors, the transfer difficulty depends on the complexity of the information to be shared (Hansen 1999). As the information to be transferred among actors becomes increasingly dependent and noncodified, stronger ties are necessary for efficient knowledge transfer. However, when the information being transferred is independent and codified, tie strength is not significant (Hansen 1999). The complexity
of information transfer is analogous to the complexity of intercustomer social support. Instrumental social support refers to mundane tasks and information; it is more independent and codified. On the other hand, social/emotional support deals with one’s feelings and emotions and is therefore more dependent and noncodified. As such, strong ties should have an increased impact on social/emotional support, while weak ties should impact instrumental support. Given this, the following is predicted:

Hypothesis 5: Strength of ties: a) positively moderates the relationship between network ties and social/emotional intercustomer support, and b) negatively moderates the relationship between network ties and instrumental intercustomer support.

**Customer-Employee Ties**

Given the inseparability of services, the employee and the customer are frequently present in the service setting at the same time. This provides the customer opportunities to form connections with employees, as well as with other customers. Recall that strength of ties reflects the frequency, emotional intensity and reciprocity that exists among actors (Granovetter 1973). These relationships require time and energy for an individual to maintain these connections. When customers form linkages with an employee(s), they are investing time and energy into establishing the relationship(s). An individual only has so much time and energy to invest into these connections throughout an organization. A customer’s connection with an employee provides an avenue to seek out supportive resources. For example, an individual who knows a waitress at a restaurant may trust their opinion on an entrée more than a frequent customer whom he does not know. As customers connect with employees and exchange resources, they are less likely to invest more time and energy to seek this information from other customers in the organization. On the other hand, the customer’s connection to the employee is still based on the single interaction occurring with the business, not on an independent friendship. Therefore, it would be characterized as a uniplex relationship, or more of a weak tie (Brass et al. 1998). This means that a customer would be less likely to seek social/emotional support from the employee. Given this, the following is hypothesized:
Hypothesis 6: A customer’s non-customer network ties within the organization negatively moderates the relationship between customer ties and instrumental intercustomer social support. It does not impact the relationship between customer ties and social/emotional support.

**Outcomes of Intercustomer Social Support**

The primary purpose of the present research is to investigate firm-level strategies for promoting intercustomer social support using a co-creation framework. In addition to this primary research question, the secondary research question involves the impact of intercustomer social support on consumer and firm level outcomes. Past research has shown that intercustomer social support has a positive impact on *return on community*. Return on community represents “the health outcomes to customers and financial outcomes to firms that materialize when customers receive social support from other customers in service establishments” (Rosenbaum 2008, p. 179). These findings are grounded in social support theory which contends that one’s socially supportive network has a positive impact on one’s health (c.f. Uchino 2004). These positive outcomes for the consumer then lead to increased patronage and spending in the service organization (Rosenbaum 2008).

In addition to previously studied consumer and firm level outcomes, it is important to add to the literature by investigating new consequences of intercustomer social support. With the increasing emphasis on co-creation in service provision and the customer determining the value of the service (Vargo and Lusch 2004), elements of the customer’s *future intentions to co-create* are relevant to this research. Additionally, a co-created organization involves enabling linkages across all members of the organization, as well as into the extended networks of the actors (Prahalad and Ramaswamy 2004c). Therefore, it is important to investigate customer’s willingness to bring other individuals into the organization. The following sections detail the impact of intercustomer social support on customer outcomes, firm outcomes, as well as future intentions to co-create outcomes.
Consumer and Firm Outcomes

As mentioned previously, past research has investigated the impact of intercustomer social support on consumer health outcomes and firm financial returns (Rosenbaum 2008). Since only one study has investigated this relationship, this research seeks to confirm these past findings. Specifically, the present research seeks to confirm findings that intercustomer social support had a positive impact on: 1) patronage of the organization; 2) expenditures at the organization; 3) customer well-being; 4) future behavioral intentions; and 5) customer satisfaction with the organization.

These findings are grounded in social support theory which contends that one’s socially supportive network has a positive impact on one’s health (c.f. Uchino 2004). As customers receive support (e.g. social/emotional, instrumental) from other customers, they should feel better about their situation. They feel better about themselves and desire to continue to maintain this positive feeling. Further theoretical support for these relationships can be found in the co-creation literature. As an organization seeks to focus on the customer experience and co-create a unique value for the customer, the customer realizes an increase in knowledge and specialized skills (Vargo and Lusch 2004). This unique value and experience should lead to increase patronage, perceptions of well-being and satisfaction with the organization.

These positive consumer health outcomes can also be attributable to social capital theory. Recall that social capital is the notion that one’s social contacts create opportunities for personal benefit (Borgatti and Foster 2003; Coleman 1988). Organizational researchers have shown that interpersonal networks have a positive impact on job satisfaction, performance, getting ahead and leadership (e.g. Brass et al. 1998). These interpersonal networks in organizations are analogous to the customer’s supportive network in a service organization. As customers become more socially bonded and increase their support of each other, they create opportunities for personal benefit. Therefore, based on social support theory, the co-creation framework, and social capital theory, the following is predicted:

Hypothesis 7: Intercustomer social support has a positive impact on the customer’s a) patronage frequency; b) well-being, and c) satisfaction with the organization.
The positive impact on customers also leads to positive returns for the service organization. As the customers feel better and patronize the organization more frequently, this results in increased expenditures at the organization. Furthermore, customers are more likely to spread positive word-of-mouth because they desire to bring more people into their organizational network. While future behavioral intentions towards the organization act only as an intentions measure, one can also examine actual word-of-mouth via customer referrals. Positive customer word of mouth represents a key marketing tool that service organizations can capitalize on to expand their customer base. Customer referrals indicate actual business that is brought to the organization, as oppose to simple word-of-mouth among friends. Many firms have begun to reward current customers for direct referrals to the service, and reward programs have demonstrated a positive impact on referrals (Ryu and Feick 2007).

As customers interact with other customers in the service setting, they are increasing their involvement in the co-creation process. Additionally, they are increasing their knowledge and specialized skills regarding the service (Vargo and Lusch 2004). The customer’s involvement in intercustomer social connections enhances their unique experience with the service firm, which should positively impact evaluations of the organization (Prahalad and Ramaswamy 2004c). Further, customers, who engage in intercustomer connections, are more involved in the service process, which makes it more likely for them to take credit for the successful encounter (Bendapudi and Leone 2003). The combination of these outcomes makes it likely that the customer desires to enhance their co-creation experience by bringing others into the organization. Therefore the following is predicted:

Hypothesis 8: Intercustomer social support has a positive impact on the firm’s level of: a) customer referrals; b) expenditures; and c) future behavioral intentions.

**Future Co-creation Intentions**

Past research has determined that a customer’s future intentions to co-create are determined by their ability, role clarity, and perceived value for future co-creation (Meuter et al. 2005). Ability to engage in future co-creation is defined as the customers’ knowledge and skills that allow them to perform the co-creation process correctly (Meuter et al. 2005). Role clarity for future co-creation refers to the customer’s clear...
understanding of the “procedures, goals, criteria, and knowledge of consequences are clear to a customer and influence his/her likelihood of future co-creation (Dong et al. 2008, p. 126). Drawing on customer socialization theory (Claycomb et al. 2001), the involvement of customers with other customers can be seen as an element of organizational socialization. This customer socialization allows the customer to gain a better understanding of their role in the co-creation process. Consistent with a key foundational premise of service dominant logic (Vargo and Lusch 2004), intercustomer social support increases the customers’ specialized knowledge and skills. As this knowledge and specialized skills increases, the customer gains a better understanding of their role in the organization, which therefore improves their role clarity and ability. This increase ability and role clarity also improves the customer’s perceptions of unique value. Therefore, the following is hypothesized:

Hypothesis 9: Intercustomer social support is positively related the customer’s: a) ability in future co-creation; b) role clarity in future co-creation; and c) perceived value of future co-creation.

Recall that instrumental support deals with practical advice and assistance with mundane activities while social/emotional support provides a person with a partner for activities and an outlet for emotions and feelings (Cohen et al. 2000). Given this information, social/emotional intercustomer social support requires a more intense commitment and connection with other customers. A strong tie is necessary to transfer this more dependent, noncodified information (Hansen 1999). Therefore, when customers receive increased social and emotional support from other customers, this indicates an increased number of connections and resource flow among customers. In other words, customers who receive social/emotional support from other customers are more embedded in the organization. On the other hand, instrumental social support is seen as a weaker connection that may not hold across turbulent times (Brass et al. 1998). Given this, social/emotional intercustomer social support is likely to have a stronger impact on outcomes that inherently indicate a more social, emotional involvement, while intercustomer social support has have a stronger impact on more transactional type outcomes. Given this, the following is predicted:
Hypothesis 10: Social/emotional intercustomer social support has a stronger impact on patronage frequency, subjective well-being, and satisfaction with the organization, as well as future behavioral intentions and future intentions to co-create. Instrumental support has a stronger impact on customer referrals and expenditures.

**CONTROL VARIABLES**

Given the importance of understanding how certain network drivers impact intercustomer social support and its subsequent impact on outcomes, it is necessary to review the literature for variables expected to co-vary with key variables in this model. In this section, two categories of variables are presented based on their expectations to impact intercustomer social support or performance outcomes: relationship with the organization and individual difference variables. By including these variables in the analysis, we are able to isolate the unique effects of network drivers on intercustomer social support, as well as intercustomer social support on performance outcomes.

**Relationship with the Organization**

Services are unique in that they require a range of customer participation from their customers. In certain services, a high level of active participation is required (Dellande et al. 2004). For example, a hair salon requires that the customer participate by being present to have his/her hair cut. On the other hand, a health club not only requires that the customer be present, it also requires that the customer engage in a certain level of physical activity in order to gain the benefits on the service. Given this higher level of active participation, certain variables regarding the customer’s relationship with the organization need to be examined.

First, the relationship duration with the organization is a key control variable. Relationship duration refers to the “length of time that the relationship between the exchange partners has existed” (Palmatier et al. 2006, p. 138). As relationship duration increases, relationship quality and trust typically improve (Palmatier et al. 2006). Therefore, a longer relationship with the service organization in itself could lead to more customer connections and increased intercustomer social support. This research controls
for length of relationship in order to isolate the unique effects of customer connections on intercustomer social support.

Along these same lines, this research controls for two key dimensions of consumer knowledge of the service organization’s offering: familiarity and expertise. Customer familiarity refers to the accumulation of experiences with the product or service offering, while expertise refers to the ability to perform product related tasks (Alba and Hutchinson 1987). A customer might be very familiar with the benefits of routine cancer screenings, yet they may have little experience with actually participating in these cancer screenings. Controlling for these dimensions of customer knowledge enables this research to determine the unique effects of intercustomer social support. In addition to these relationship variables, it is important to control for individual difference variables as well.

**Individual Difference Variables**

While there are countless individual variables that could be controlled for, this research focuses on one main control, extraversion, while also examining key demographic variables. By definition, an extrovert is one whose personality is concerned with obtaining gratification from outside the self (Merriam-Webster). In other words, an extrovert is more outgoing and they are energized by being around other individuals. This characteristic alone may lead customers to seek more connections and support from other customers, relative to an introvert. Past research demonstrates this possible correlation. Swickert et al. (2002) found that extraversion has a positive correlation with perceived availability of social support, as well as contact with network members. Another study by Roberts et al. (2008) found that extraversion was correlated with the size of the individual’s support group; however when age was used as a control, this effect disappeared. Given these findings, it is necessary for this research to control for the customer’s level of extroversion in order to determine the unique effects of intercustomer social support. In addition to level of extroversion, this research also measures common demographic variables, such as age, sex and education. Analysis is conducted to determine whether these variables co-vary with levels of intercustomer social support.
CHAPTER SUMMARY

This chapter has developed hypotheses to answer the underlying research questions. Based on a co-creation and network theoretical foundation, hypotheses were derived to predict the impact of network drivers on intercustomer social support. Specifically, this research proposes that network identification, customer-customer ties, strength of ties and customer-employees ties impacts intercustomer social support levels. This research also investigates new co-creation outcomes of intercustomer social support, as well as to confirm past findings. This research predicts that intercustomer social support has a positive impact on both customer and firm level outcomes. The methodology used to test this research model is presented in the following chapter.
CHAPTER FOUR
METHODOLOGY

INTRODUCTION

This chapter details the methodology used to test the research model presented in chapter three. This chapter consists of four sections. The first portion describes the research setting for this research. Second, the research design is presented. Next, the operational measures for the research variables are presented. Last, the chapter wraps up with a discussion of the analytical procedures used to test the research hypotheses.

RESEARCH SETTING

The purpose of this research is to investigate network drivers of intercustomer social support. In order to conduct this research, it was necessary to select a research context where high levels of intercustomer social support already exist. Therefore, certain context characteristics must be met by the research setting. First, intercustomer social support is more likely to occur when the customer has frequent interaction and contact with the company. Second, increased usage of the product or service increases the likelihood of intercustomer social support. Last, the research setting must occur in an organization where customers interact and are exposed to other customers of the organization.

Given these boundary conditions, a health club was chosen as the research for the present research. This setting is a full-service, high-end health club offering weights, cardio, basketball, swimming, racquetball, aerobics, and a cafe. Current membership at the time of this research was approximately 9,000. Given the size, breadth of activities and number of members, this research setting provided ample opportunity for customers to interact. Members of the health club visit the facility an average of 2-3 times per week. Further, it is large enough where management employs strategies to increase membership and retention. Last, measures for intercustomer social support have already been developed for health clubs. These measures demonstrate high reliability and validity.
**Research Design**

This research was a cross-sectional, between subjects field study design (Trochim and Donnelly 2007). Measuring variables in the field offers great realism; however, this design increases threats to internal validity (Trochim and Donnelly 2007). The two main concerns with cross-sectional research center on: 1) validity threats due to common method bias; and 2) the ability to infer causal inference (Podsakoff et al. 2003; Rindfleisch et al. 2008). Three common methods offered to reduce these threats include: 1) multiple respondents; 2) multiple data sources; and 3) multiple periods of time (Rindfleisch et al. 2008). The present research collected data via self-report, as well as from company records; therefore, it used multiple data sources. Recent research also illustrated that under certain circumstances, the results of a cross-sectional research design are comparable to those of longitudinal design (Rindfleisch et al. 2008). Specifically, the authors recommend cross-sectional research when the research includes: 1) externally oriented constructs; 2) low likelihood of response bias; 3) heterogeneous measurement scales; 4) start/end dates are unclear; 5) theoretical foundation is well developed; and 6) nature of argument is between subjects. The theoretical foundation and external nature of the present research constructs have been illustrated in chapter three. Further, the survey instrument found in Appendix B demonstrates various response formats and lengths of scales. Last, the start and end points of intercustomer social support are unclear. Given this, cross-sectional research was an appropriate selection for the research context.

**Sampling Procedures and Data Collection**

The sampling frame included members of a local full-service health club. At the time of the research, the health club maintained a membership of approximately 9,000 members. Despite turbulent economic times and many people forgoing health club memberships, this health club is one of few to recognize continued retention and growth of its membership base in the area.

To gather the information necessary to test the research model, a survey was distributed to members of the health club. Data collection occurred within the service setting. This was done for three reasons. First, the present study focuses on intercustomer social support within a bounded service setting; therefore, it was important
to survey members who actually patronize the health club. Second, on-site recruitment of respondents improves response rates. Last, on-site recruitment ensure identifier numbers were correct (to link surveys to the health club data). For respondents who did not have the time to complete the survey onsite, an option was given to take the survey home and return it by a set deadline. Given the critical importance of matching identifier numbers, members were only allowed to take the survey home once they have filled out the identifier information on the survey.

A common problem with survey research is ensuring adequate participation. Low response rates can lead to nonresponse bias. Nonresponse bias occurs when the respondents who complete the survey have different characteristics than those who do not complete the survey (Armstrong and Overton 1977). Nonresponse bias was tested by “estimating the effects of nonresponse” (Armstrong and Overton 1977, p. 396); this involved comparing early responders to late responders and testing for significant differences in their responses.

Alternatively, researchers offer suggestions to increase response rates, thereby reducing the threat of nonresponse bias. These include incentives (Kanuk and Berenson 1975), survey length (Yammarino et al. 1991), and method of delivery (e.g. mail, in-person; Ibeh et al. 2004). In an effort to increase response rates, the researcher offered aluminum water bottles with the health club’s logo as an incentive to the customers. Further, as mentioned previously, surveys were delivered in person to potential respondents. Last, attempts were made to keep the survey a reasonable length.

To improve reliability and validity of the survey instrument, certain measures were collected from the health club. Specifically, information regarding weekly patronage, monthly expenditures, customer referrals, and length of membership were collected from the health club practice management system. In order to link customer’s surveys to this information, it was necessary for members to provide their membership number. To ensure anonymity, these identifier numbers, not names, were used to link to their accounts.

**RESEARCH INSTRUMENT**

The complete survey instrument can be found in Appendix B. Each section of the instrument corresponds to a specific set of research variables; Appendix A details the
research variables and corresponding items. Structured questions were Likert-type format, as well as fixed alternative format. Prior to administering the survey instrument to members of the health club, the entire survey instrument was scrutinized and reviewed by expert faculty judges. Feedback was solicited regarding item wording and confusion. Additionally, as detailed below, all scales were based on established scales in the literature. This information was used to edit and refine the survey instrument.

**MEASUREMENT OF RESEARCH VARIABLES**

The following section describes the measurement of the research variables. Measurement refers to the “rules for assigning symbols to objects so as to represent quantities of attributes” (Nunnally and Bernstein 1994, p. 3). All of the scales presented below are based on previously developed scales. In certain contexts, scales were adapted and/or combined to measure the desired research variable. These adaptations are noted in the following section. A complete list of all items with categories can be found in Appendix A. The final survey instrument can be found in Appendix B. Psychometric properties of all measures were tested. Procedures for this process can be found under the section entitled *Measurement Validity*.

**NETWORK IDENTIFICATION VARIABLES**

For this study, three identification variables are proposed to influence intercustomer social support: customer-company identification, customer-employee identification, and customer-customer identification. Data for all three of these measures was collected using self-reported data from customers.

*Customer-Company Identification*

Customer-company identification refers to the sense of connection between the organization and the customer. Customers can have self-definitional needs partially filled by the companies they patronize (Bhattacharya and Sen 2003; Scott and Lane 2000). A 5-item Likert scale adapted from Mael and Ashforth (1992) and also used by Homburg et al. (2009) was used to measure customer’s identification with the organization. This past research reports coefficient alphas of greater than 0.7 (Homburg et al. 2009). Example items included: 1) I strongly identify with this health club; and 2) I feel good to be a customer of this health club.
Customer-Employee Identification

Customer-employee identification has not been explicitly studied in the identification literature; however, definitions and measures can easily be extended from organizational identification. Customer-employee identification refers to the sense of identification or connection a customer has with the boundary-spanning agents of a company. Since no measure existed for this construct, scales from organizational identification were adapted to measure the identification a customer had with an employee. Specifically, items from two existing organizational identification scales were combined to form a 6-item Likert scale (Bhattacharya et al. 1995; Mael and Ashforth 1992). Item wording was changed to reflect a customer’s identification with the employees. Example items included: 1) I strongly identify with the employees of this organization; and 2) The employees make me feel good to be a customer of this organization.

Customer-Customer Identification

A similar procedure was followed to measure the customer-customer identification. Customer-customer identification refers to the sense of connection a customer has with other customers of the organization. Scales for organizational identification were combined and adapted to measure the identification among customers (Bhattacharya et al. 1995; Mael and Ashforth 1992). A 6-item Likert scale was used to measure a customer’s identification with other customers. Item wording was changed to reflect customer’s identification with other customers. Example items included: 1) I strongly identify with other customers of this organization; and 2) I feel attached to other customers of this organization.

Network Ties

Data collection for a member’s network ties was collected using egocentric techniques. In this method, each individual responds to a question(s) that results in the generation of a roster of individuals. The respondent then describes their relationship with the generated names (Knoke and Yang 2008; Reagans and McEvily 2003). The measure used for this research captures the frequency of the interaction with the member, the relationship with the member, as well as the amount of information conveyed. The complete to measure network connections can be found in Appendix B.
**Customer Ties and Customer-Employee Ties**

*Number of customer ties* and *customer-employee ties* is a continuous variable based on the number of connections reported by the member. Members were asked to list all members (employees) they interact with at the health club, regardless of how much or how little. It was not important if the member knew the person’s full name. The member was allowed to write down initials, first name, last name, or descriptors. This is consistent with the *knowing name-generator* method used in egocentric network research. The *knowing name-generator* for this research was bounded by the affiliation network of the health club (Knoke and Yang 2008). The *amount of information* conveyed through a customer’s ties was measured for each individual listed. Respondents were asked to report how much they talk about: 1) working out; 2) social activities; and 3) personal issues with the person listed. Responses varied from 1 (very little) to 5 (very much).

**Strength of Ties**

Respondents were asked to indicate the strength of their connection in terms of communication frequency and type of relationship that exists (Granovetter 1973; Hansen 1999; Reagans and McEvily 2003). These two measures were used to calculate a weighted index. Each relationship was given a weight based on their self-reported relationship. Respondents were asked to classify their relationship with the individual as either: 1) a close acquaintance; 2) a casual acquaintance; or 3) someone they barely know. A close acquaintance was given a weight of 3; a casual acquaintance was given a weight of 2; and someone the member barely knows was given a weight of 1. These weights were multiplied by the communication frequency with the particular individual to generate the index for strength of ties. A higher index indicates a stronger tie.

**Intercustomer Social Support**

Intercustomer social support refers to the support customers receive from other customers in the organization. Past research in marketing has used the Social Support Questionnaire for Transactions (SSQT) to measure intercustomer social support (Doeglas et al. 1996; Suurmeijer et al. 1995). Rosenbaum and Massiah (2007) adapted the SSQT to fit transactions occurring in a gym. Their research revealed a two-factor structure for intercustomer social support: social/emotional support and instrumental support. This
two factor conceptualization parallels past research on social support (Suurmeijer et al. 1995). The first factor, social/emotional support, has 11 items. Past research demonstrates a coefficient alpha of .93 (Rosenbaum and Massiah 2007). Sample items from this scale include: 1) How often do members in the gym reassure you about things?; and 2) How often do members of the gym sympathize with you?. The second factor, instrumental support, is comprised of 6 items. Sample items included: 1) How often do members from the gym lend you small amounts of money?; and 2) How often do help you do odd jobs just as moving furniture or driving you somewhere? Coefficient alpha reliability for the instrumental scale has been demonstrated at .90 (Rosenbaum and Massiah 2007). For both scales, respondents are instructed to circle the most appropriate response: 1-seldom/never; 2-now and then; 3-regularly; 4-often. For this research, seldom/never is defined as less than once a month; now and then as 2-4 times per month; regularly as once per week; and often as more than twice per week.

**OUTCOME VARIABLES**

*Patronage & Expenditures*

Similar to Rosenbaum (2008), members were asked the average number of times they patronize the health club in a week, as well as their average monthly expenditures. To further validate these responses, this information was also collected from the health club management system.

*Well-being*

Customer’s subjective well-being was measured using the 14-item Ontario Health Survey (John 2004). This scale asks respondents to report how often they felt certain emotions over the past 12 months on a 4-point scale: *hardly ever, less than half the time, more than half the time, most of the time*. This measure taps consumer’s perceived stress, state of morale, perceived health status, satisfaction about relationships, interest in life, control of emotions and energy. Example items included: 1) I felt reasonably relaxed; 2) I was worried about my health.

*Customer Satisfaction with the Organization*

Customer satisfaction was measured using an 11 item customer scale specifically developed for health clubs (Kelley and Davis 1994). Items ask the respondents to rate items on a seven-point very dissatisfied (1) to very satisfied (7) scale. Example items
included: 1) workout/fitness equipment; 2) ability of employees; and 3) knowledge of employees.

Customer Referrals

Members are rewarded for referring customers to the health club with a free month of membership. To measure the number of customer referrals, respondents were asked how many times they have received a free month for referring friends to join the health club. In addition, this data was collected from the health club management system.

Future Behavioral Intentions

Future behavioral intentions refers to the customers future loyalty intentions, future intentions to spread word-of-mouth, their propensity to switch service providers, likelihood to complain, and their likelihood to pay higher prices (Zeithaml et al. 1996). The customer’s future behavioral intentions were measured using a 13-item Likert. Respondents were asked to respond how likely they are to do the following on a (1) strongly disagree to (7) strongly agree scale. Example items included: 1) To say positive things about this health club to other people; and 2) To complain to other members if I experience a problem with this health club.

Future Intentions to Co-Create

Customer’s future intentions to co-create refer to their: 1) ability; 2) role clarity; and 3) perceived value in future co-creation (Dong et al. 2008; Meuter et al. 2005). Measures for these three constructs were adapted from previous research to fit the present research context (Dong et al. 2008). All three constructs were measured using a Likert scale with endpoints of (1) strongly disagree to (7) strongly agree. Additionally, all three have demonstrated coefficient alphas greater than 0.7 (Dong et al. 2008; Meuter et al. 2005).

Customer’s ability in future co-creation was measured using 3-item, Likert scale. Example items included: 1) I am fully capable of using the service offerings at this health club; 2) I am confident in my ability to use the service offerings at this health club.

Customer’s role clarity in future co-creation was measured using a 5-item Likert scale. Example items included: 1) I feel certain about how to use the service offerings at this health club properly; 2) I know what is expected of me if I am using the services of this health club.
Last, customer’s perceived value in future co-creation was measured using a 4-item Likert scale. Example items included: 1) Using the services of this health club would provide me with personal feelings of worthwhile accomplishment; and 2) Using the services of this health club would provide me with feelings of enjoyment.

**CONTROL & DEMOGRAPHIC VARIABLES**

In addition to the previously mentioned items, various demographic and control variables were also measured. Standard demographic items were asked using a fixed-format question. These items assessed age, gender, education, and income. Additionally, the following controls were also measured.

**Length of Relationship**

The member’s length of membership (in years) was measured using a single item question. This data was also obtained from the health club’s management system.

**Consumer Familiarity**

To measure consumer familiarity, or the consumer’s exposure to the service, a product class knowledge scale was adapted based on Beatty and Talapade (1994). The adapted scale consisted of three items. Sample items included: 1) I have a lot of experience with health clubs; and 2) I would describe myself as being very familiar with health clubs. Respondents responded on a 5 point strongly disagree/agree scale.

**Consumer Expertise**

Consumer expertise was measured using an existing three item scale developed originally by Park, Mothersbaugh and Feick (1994). Scale items were adapted to fit the health club context. Sample items included: 1) How much do you feel you know about working out at health clubs?; and 2) Compared to a personal trainer, how much do you feel you know about working out at health clubs? Respondents answered on a 9-point very little/very much scale.

**Consumer Level of Extroversion**

The respondent’s level of extroversion was measured using the extroversion items of the Big Five Inventory Scale (John and Srivastava 1999). The Big Five Inventory Scale asks respondents on a 5-point scale how much they agree/disagree with certain personal descriptors. For extroversion, sample items included: 1) I see myself as someone who is talkative; and 2) I see myself as someone who is outgoing and sociable.
**Measurement Validity**

Validity refers to whether the measures capture the intended construct (Peter 1981; Viswanathan 2005). Therefore, a measure is valid “when the differences in observed scores reflect true differences on the characteristic one is attempting to measure and nothing else” (Churchill 1979, p. 196). There is no way to directly measure validity; instead one must evaluate several aspects of a measure to ensure its validity. These include: 1) the domain of observables (e.g. the items) related to the construct; 2) the extent to which the items measure the same construct, and 3) the extent to which measure results are consistent with theory (Nunnally and Bernstein 1994; Viswanathan 2005). These three aspects correspond to content validity, reliability, and construct validity, respectively.

**Content Validity**

The first step to verify measurement validity is to assess content validity. To ensure content validity, researchers must follow proper procedures to delineate the content domain, subjectively judge the content, and assess items to see if they make sense (Churchill 1979; Viswanathan 2005). All scales used in the present research were adapted based on previously developed scales; no scales were developed from scratch. To ensure content validity for adapted scales, expert faculty judges evaluated all scales that were adapted to ensure content validity. After content validity was assessed, reliability and construct validity was assessed.

**Reliability**

Reliability assesses the degree to which measures are free from random or unsystematic error (Viswanathan 2005). Reliability is a necessary, but not a sufficient condition for validity (Peter 1981). Churchill (1979) recommends using multi-item measures to enhance reliability of a measure. Therefore, this research employed multi-item measures for key independent and dependent constructs. Coefficient alpha was used to directly assess reliability. Coefficient alpha is the mean of all possible split-half reliability coefficients (Cronbach 1951). Alpha indicates the extent to which the items have high communalities; however, it does not measure the dimensionality of the construct (Cortina 1993). Therefore, it is recommended to test the dimensionality of the measure prior to calculating alpha (Anderson and Gerbing 1988). A reliability coefficient of .70 is recommended as a minimum (Nunnally and Bernstein 1994). All
scales used in this research have demonstrated reliabilities greater than 0.7 in previous research.

*Construct Validity*

Construct validity refers to whether the measure behaves as it is expected to in relation to other established constructs. Construct validity is not an empirical measure; however, convergent and discriminant validity can be used to support construct validity. *Convergent validity* occurs when different measures of the same construct are positively correlated (Peter 1981), while *discriminant validity* is evidenced when measures of different constructs have a limited correlation. This research followed the guidelines offered by Anderson and Gerbing (1988) and Fornell and Larcker (1981) to test for each type of validity.

**Analytical Procedures**

The purpose of this section is to provide an overview of the analytical procedures for the research model. Since all scales were adapted from previously developed scales, confirmatory factor analysis was used to verify the psychometric properties of the measurement scales. The research model was then tested using seemingly unrelated regression and structural equation modeling. These procedures are discussed in detail in the following sections.

*Confirmatory Factor Analysis*

Prior to estimating the measurement model, unidimensionality of each scale was assessed using confirmatory factor analysis (CFA). Unidimensional measures are critical in theory development and testing (Anderson and Gerbing 1988). The measurement model was estimated and tested using *Amos 18*. Each item’s loading were restricted to its a priori factor and allowed to correlate freely with other factors (Anderson and Gerbing 1988; Kline 2005). Chi-square, along with CFI, GFI and RMSEA were examined to assess adequate fit. After reliability and dimensionality of the measures was established, seemingly unrelated regression and structural equation modeling was used to test the hypotheses and the overall research model.
Seemingly Unrelated Regression: Testing the Antecedents

After confirming the reliabilities and dimensionality of the measurement scales, seemingly unrelated regression (SUR) was used to test the antecedents of intercustomer social support (H1-H4). Standard multiple regressions may yield biased results because the same independent variables are predicting both dependent variables. This leads to a greater likelihood of correlated errors (Zellner 1962). To estimate the models, standard ordinary least squares was used. Given that all independent variables appear in both equations, ordinary least squares estimators are equivalent to generalized least squares estimators (Reibstein and Gatignon 1984), so either method can be used. Last, all independent variables that constitute an interaction term were mean-centered to mitigate the potential threat of multicollinearity (Aiken and West 1991).

The following equations were estimated using STATA to formally test the hypotheses that network identification and network ties impact dimensions of intercustomer social support:

\[
\begin{align*}
\text{Instr.} &= \alpha + \beta_1 X_1 + \beta_2 X_2 + \beta_3 X_3 + \beta_4 X_4 + \beta_5 X_5 + \beta_6 X_6 + \beta_7 X_7 + \beta_8 X_8 + e + c \\
\text{Soc/Emt.} &= \alpha + \beta_1 X_1 + \beta_2 X_2 + \beta_3 X_3 + \beta_4 X_4 + \beta_5 X_5 + \beta_6 X_6 + \beta_7 X_7 + \beta_8 X_8 + \beta_9 X_9 + \beta_{10} X_{10} + e + c
\end{align*}
\]

where:

- \text{Instr.} = \text{Instrumental intercustomer social support}
- \text{Soc/Emt.} = \text{Social/emotional intercustomer social support}
- \alpha = \text{constant}
- X_1 = \text{Customer-company network identification}
- X_2 = \text{Customer-employee network identification}
- X_3 = \text{Customer-company network identification}
- X_4 = \text{Number of customer ties}
- X_5 = \text{Amount of information from customer ties}
- X_6 = \text{Strength of customer ties}
- X_7 = \text{Customer-employee ties}

Structural Equation Modeling

To test the multiple and interrelated relations among intercustomer social support and the outcome variables (H7-H9), structural equation modeling was used. The
objective of SEM is to see how well the observed covariances match the specified model. The closer the values are to replicating the covariances, the better the model fit. The hypothesized outcomes of intercustomer social support consist of several latent constructs, each with multiple items measuring each construct, and multiple hypotheses; therefore, SEM is the most appropriate statistical analysis (Hair et al. 1998).

Prior to model estimation, data was analyzed for multivariate normality and kurtosis (Hair et al. 1998). Then, statistical software (AMOS) used iterative methods to obtain estimates of the free parameters that converge on the covariance matrix of the observed data. The closer the implied covariance matrix (from model estimation) is to the observed covariance matrix (from observed data), the better the model fit. The difference between these matrices results in the residual matrix. A perfectly fit model would mean that the implied matrix and observed matrix are equal, thus resulting in no residual matrix (Hoyle 1995). These estimated parameters were used to formally test the customer and firm level outcomes (H5-H10).

**SAMPLE SIZE**

Sample size plays an important role in the estimation and interpretation of the SEM portion of the results. Therefore, it is necessary to have an adequate sample size in order to ensure proper testing of the outcome portion of the research model. While there is no specific criterion for determining the appropriate sample size, many scholars recommend a minimum sample size of 200 (Hair et al. 1998; Kline 2005). Other suggestions recommend a minimum of five, but preferably 10, respondents for every parameter to be estimated. Therefore, as model complexity increases, the sample size should increase as well (Hair et al. 1998). Between intercustomer social support and the outcome variables, there are eleven latent variables, with eighteen estimated parameters, which lead to a recommended sample size of 180. Given the final sample size of 331, sample size should not pose a threat in the analysis.

**CHAPTER SUMMARY**

This chapter has presented the methodology for data collection and analysis used to test the research model. Results in relation to the network driver and intercustomer social support hypotheses are presented in the following chapter.
CHAPTER FIVE
RESULTS

INTRODUCTION
The purpose of this chapter is to present the results of the data analysis procedures. First, the sample is presented, along with a discussion of non-response bias. Next, data preparation, measurement validation, and hypothesis testing is discussed. Finally, the chapter concludes with presentation of the overall research model, as well as a summary of the overall results.

SAMPLE
The sampling frame includes members of a local full-service health club. The health club maintains a membership of approximately 9,000 members. Over the course of one week, the primary investigator presented herself at the health club to pass out surveys to its members. Careful consideration was taken to tap into various hours of operation. Data was collected on Monday, Tuesday and Wednesday from 6am – 8pm, and Thursday from 6am-1pm. The only potential members missed were members who attend only on weekends; however, a discussion with management reassured the investigator that members who come in over the weekend are also there throughout the week during the scheduled collection times. In all, the primary investigator spent approximately fifty hours at the health club asking members to complete the survey.

Members were asked to participate and were offered a water bottle as an incentive to complete the survey. Upon completion of the survey, members were given a bright blue, aluminum water bottle with the health club’s logo. At the end of the week, 336 members had filled out the survey; members varied across gender, age, income and education. Respondents were equally split between male (50.8%) and female (49.2%). In terms of age, the youngest person to complete the survey was 18, while the oldest was 88. The median age was 42 years with a standard deviation of 15.4. Next, income was also distributed across varying levels. Approximately 23% of the participants’ annual household income was less than $50,000, while 36% of participants fell in the $50,000-$100,000 category. Twenty-three percent reported an annual income between $100,000 and $150,000, with the remaining 18% reporting an income of greater than $150,000.
Education was also distributed across a wide range; 8.8% of respondents held a high school degree or less; 14.8% had some college education, while 9.4% held an associate’s degree and 30.5% held a bachelor’s degree. Last, 10.3% had completed some graduate school, while 18.7% had a Master’s degree and 8.5% had a terminal degree (i.e. M.D., Ph.D). All these descriptive statistics demonstrate a diverse sample of participants across gender, age, income and education. Table 5.1 summarizes the gender, income and education demographics.

<table>
<thead>
<tr>
<th>Demographics of Respondents</th>
<th>%</th>
</tr>
</thead>
<tbody>
<tr>
<td><strong>Gender</strong></td>
<td></td>
</tr>
<tr>
<td>Male</td>
<td>50.8</td>
</tr>
<tr>
<td>Female</td>
<td>49.2</td>
</tr>
<tr>
<td><strong>Income</strong></td>
<td></td>
</tr>
<tr>
<td>$ 0 – 49,999</td>
<td>23.2</td>
</tr>
<tr>
<td>$ 50,000 – 99,999</td>
<td>35.8</td>
</tr>
<tr>
<td>$100,000 – 149,999</td>
<td>23.0</td>
</tr>
<tr>
<td>$150,000 and greater</td>
<td>18.0</td>
</tr>
<tr>
<td><strong>Education</strong></td>
<td></td>
</tr>
<tr>
<td>High school degree or less</td>
<td>8.8</td>
</tr>
<tr>
<td>Some college education</td>
<td>14.8</td>
</tr>
<tr>
<td>Associate’s degree</td>
<td>9.4</td>
</tr>
<tr>
<td>Bachelor’s degree</td>
<td>30.5</td>
</tr>
<tr>
<td>Some graduate school</td>
<td>10.3</td>
</tr>
<tr>
<td>Master’s degree</td>
<td>18.7</td>
</tr>
<tr>
<td>Terminal degree</td>
<td>8.5</td>
</tr>
</tbody>
</table>

**NON-RESPONSE BIAS**

When conducting survey research, it is always critical to assess the non-response bias in the sample. Nonresponse bias was tested by “estimating the effects of nonresponse” (Armstrong and Overton 1977, p. 396); this involved comparing early responders to late responders and testing for significant differences in their responses. If no significant differences are detected, this method suggests that non-response biases are not a factor in the data. The reasoning behind this is that late responders are similar to non-responders when it comes to survey collection. Given this, the means across key constructs were compared for the first 25% of respondents against the last 25% of respondents. There were no significant mean differences (p < .05) found across the key research variables, so non-response bias does not appear to be an issue for this data set.
**Final Survey**

The final survey instrument can be found in Appendix B. Each section of the instrument corresponds to a specific set of research variables; Appendix A details the research variables and corresponding items. Structured questions were Likert-type format, as well as fixed alternative format. Prior to administering the survey instrument to members of the health club, the entire survey instrument was scrutinized and reviewed by expert faculty judges. Additionally, eight individuals, who were not members of the health club, pre-tested the survey. Their feedback was used to clarify item wording, as well as to obtain an estimate of how long the survey took to complete. This information was used to edit and refine the survey instrument (Appendix B).

**Data Preparation**

Surveys were turned into the primary investigator upon completion. The researcher immediately confirmed that the participant had provided their health club membership number. This was necessary to link participants to the secondary data provided by the health club. In the majority of cases, participants did not have a problem providing the researcher with their health club membership numbers. The finished surveys were coded and entered into a Microsoft Excel spreadsheet. This data was then imported into PASW (formerly SPSS) Statistics 18.0 for analysis.

When entering the data, the researcher noted that in five cases, participants skipped the middle 2-4 pages of the survey. Given the breadth of information missing from these participants, these five cases were deleted, providing for a final sample of 331. For other participants, missing data fields were left blank. For the remaining sample of 331, missing data was minimal. Across the 98 research variables, 15 variables had some missing data. This missing data came from eight participants, providing for a final percentage of missing data of less than 0.2% across all Likert scale questions. Giving the random appearance of the missing data, multiple imputation analysis was used in PASW 18.0 to fill in the missing data fields for the Likert scale items.

**Measurement of Research Variables**

The following section describes the measurement purification of the research variables. All of the scales presented below are based on previously developed scales
that have been adapted and/or combined to measure the desired research variable. Psychometric properties of all measures are tested and presented in the following section. The correlation table can be found in Appendix C.

**INTERCUSTOMER SOCIAL SUPPORT**

Intercustomer social support refers to the support customers receive from other customers in the organization. This study used an established scale adapted by Rosenbaum and Massiah (2007) to fit transactions occurring in a gym. The social/emotional scale consists of 11 items, while the instrumental scale has six items. For the social/emotional scale, all 11 items were subjected to principal components analysis with varimax rotation. The rotated factor structure, along with low item loadings, clearly indicated that items 9 and 10 loaded on an alternate factor. After deleting these items, the remaining nine items were subjected to confirmatory factor analysis in AMOS 18.0. All nine items had standardized loadings > 0.6 and squared multiple correlations of > 0.4. Additionally, α = 0.93, composite reliability = 0.93, and average variance extracted was 0.59 (see Table 5.2). These results indicate a good measure of social/emotional intercustomer social support.

Similarly, a principal components analysis, followed by a confirmatory factor analysis was run for instrumental intercustomer social support. Two items, item one and six had low standardized loadings (<0.5) and were deleted. The final scale consisted of four items, with standardized loadings > 0.7 and squared multiple correlations of > 0.5. Additionally, α = 0.88, composite reliability = 0.90, and average variance extracted was 0.68 (see Table 5.2). Using average variance extracted, standardized loadings and composite reliability output, both scales met recommendations for convergent validity (e.g. Fornell and Larcker 1981).

Both scales were also combined to run an overall model fit for the two factor model. Goodness-of-fit was demonstrated for the overall measure of intercustomer social support (GFI = 0.91; CFI = 0.95; RMSEA = 0.083). Correlation between the two constructs was 0.447 (see Table 5.4). Given the high correlation between these two constructs, it is important to establish discriminant validity between instrumental social support and social/emotional social support. Discriminant validity is evident when the average variance extracted for each construct exceeds the squared factor correlation.
(Fornell and Larcker 1981). Since the average variance extracted for instrumental (0.68) and social emotional (0.59) both exceed the squared factor correlation between them (0.200); discriminant validity is established. Table 5.5 illustrates discriminant validity among all identification and intercustomer social support constructs.

### Table 5.2

**CFA Results for Intercustomer Social Support**

<table>
<thead>
<tr>
<th>Factor Item</th>
<th>α</th>
<th>CR</th>
<th>AVE</th>
<th>SL</th>
<th>SMC</th>
</tr>
</thead>
<tbody>
<tr>
<td><strong>Instrumental Social Support</strong></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>1. How often do members from the gym lend you small amounts of money?</td>
<td>0.88</td>
<td>0.90</td>
<td>0.68</td>
<td>.713</td>
<td>.508</td>
</tr>
<tr>
<td>2. How often do members from the gym help you do odd jobs such as helping you move furniture, drive you somewhere, etc.?</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>3. How often do members from the gym lend you small things, like tools, or something like that?</td>
<td></td>
<td></td>
<td></td>
<td>.895</td>
<td>.801</td>
</tr>
<tr>
<td>4. How often do members in the gym lend you valuable things?</td>
<td></td>
<td></td>
<td></td>
<td>.776</td>
<td>.603</td>
</tr>
<tr>
<td><strong>Social Emotional Social Support</strong></td>
<td>0.926</td>
<td>0.93</td>
<td>0.59</td>
<td></td>
<td></td>
</tr>
<tr>
<td>1. How often do members in the gym reassure you about things?</td>
<td></td>
<td></td>
<td></td>
<td>.758</td>
<td>.574</td>
</tr>
<tr>
<td>2. How often do members in the gym tell you not to lose courage?</td>
<td></td>
<td></td>
<td></td>
<td>.663</td>
<td>.439</td>
</tr>
<tr>
<td>3. How often do members in the gym perk you up or cheer you up?</td>
<td></td>
<td></td>
<td></td>
<td>.746</td>
<td>.557</td>
</tr>
<tr>
<td>4. How often do members in the gym give you advice in the right direction?</td>
<td></td>
<td></td>
<td></td>
<td>.756</td>
<td>.571</td>
</tr>
<tr>
<td>5. How often do members in the gym lend you a friendly ear?</td>
<td></td>
<td></td>
<td></td>
<td>.777</td>
<td>.604</td>
</tr>
<tr>
<td>6. How often to members in the gym show their understanding to you?</td>
<td></td>
<td></td>
<td></td>
<td>.879</td>
<td>.773</td>
</tr>
<tr>
<td>7. How often to members in the gym sympathize with you?</td>
<td></td>
<td></td>
<td></td>
<td>.862</td>
<td>.743</td>
</tr>
<tr>
<td>8. How often to members in the gym give you information or advice?</td>
<td></td>
<td></td>
<td></td>
<td>.895</td>
<td>.554</td>
</tr>
<tr>
<td>9. How often can you rely on other members in the gym?</td>
<td></td>
<td></td>
<td></td>
<td>.776</td>
<td>.475</td>
</tr>
</tbody>
</table>

Where α=Cronbach’s alpha; CR=composite reliability; AVE=average variance extracted; SL=standardized loading; and SMC=squared multiple correlation.
**NETWORK IDENTIFICATION VARIABLES**

All items for network identification (customer-company, customer-employee, and customer-customer) were adapted from established scales (Bhattacharya et al. 1995; Mael and Ashforth 1992). Initial scales for identification measures consisted of five items for customer-company identification and six items each for customer-employee and customer-customer identification. Each scale was subjected to principal components analysis with varimax rotation. Analysis of item loadings revealed that one item needed to be deleted from customer-company identification. All items for customer-employee and customer-customer identification were kept. Next, each scale was subjected to confirmatory factor analysis in AMOS 18.0. Results demonstrated that all standardized loadings were > 0.6, with squared multiple correlations all > 0.4. Further, $\alpha = 0.89, 0.91$ and 0.91 for customer-company, customer-employee and customer-customer identification scales, respectively. Composite reliability measures were 0.90, 0.90 and 0.91, while average variance extracted equaled 0.66, 0.62 and 0.63, respectively. This output (Table 5.3) provides evidence of convergent validity. Discriminant validity is also established because the average variances extracted (0.66, 0.62, and 0.63) all exceed the squared factor correlations. See Table 5.5 for exact squared multiple correlations.
Table 5.3
CFA Results for Identification

<table>
<thead>
<tr>
<th>Factor Item</th>
<th>CR</th>
<th>AVE</th>
<th>SL</th>
<th>SMC</th>
</tr>
</thead>
<tbody>
<tr>
<td>Customer-Company Identification</td>
<td>0.89</td>
<td>0.90</td>
<td>0.66</td>
<td></td>
</tr>
<tr>
<td>1. I strongly identify with the LAC.</td>
<td></td>
<td></td>
<td>.670</td>
<td>.449</td>
</tr>
<tr>
<td>2. It feels good to be a member of the LAC.</td>
<td></td>
<td></td>
<td>.897</td>
<td>.805</td>
</tr>
<tr>
<td>3. I like to tell others that I am a member of the LAC.</td>
<td></td>
<td></td>
<td>.866</td>
<td>.750</td>
</tr>
<tr>
<td>4. The LAC is a good fit for me.</td>
<td></td>
<td></td>
<td>.807</td>
<td>.652</td>
</tr>
<tr>
<td>5. I feel attached to the LAC.</td>
<td></td>
<td></td>
<td>.795</td>
<td>.632</td>
</tr>
<tr>
<td>Customer-Employee Identification</td>
<td>0.91</td>
<td>0.90</td>
<td>0.62</td>
<td></td>
</tr>
<tr>
<td>1. I strongly identify with employees of the LAC.</td>
<td></td>
<td></td>
<td>.746</td>
<td>.556</td>
</tr>
<tr>
<td>2. The employees of the LAC make me feel welcome as a member of the LAC.</td>
<td></td>
<td></td>
<td>.628</td>
<td>.394</td>
</tr>
<tr>
<td>3. I feel attached to the employees of the LAC.</td>
<td></td>
<td></td>
<td>.759</td>
<td>.577</td>
</tr>
<tr>
<td>4. When someone criticizes the LAC employees, it feels like a personal insult.</td>
<td></td>
<td></td>
<td>.820</td>
<td>.673</td>
</tr>
<tr>
<td>5. The LAC employees’ successes are also my successes.</td>
<td></td>
<td></td>
<td>.885</td>
<td>.783</td>
</tr>
<tr>
<td>6. When someone praises an LAC employee, it feels like a personal compliment.</td>
<td></td>
<td></td>
<td>.843</td>
<td>.711</td>
</tr>
<tr>
<td>Customer-Customer Identification</td>
<td>0.91</td>
<td>0.91</td>
<td>0.63</td>
<td></td>
</tr>
<tr>
<td>1. I strongly identify with members of the LAC.</td>
<td></td>
<td></td>
<td>.689</td>
<td>.475</td>
</tr>
<tr>
<td>2. The members of the LAC make me feel welcome as a member of the LAC.</td>
<td></td>
<td></td>
<td>.637</td>
<td>.405</td>
</tr>
<tr>
<td>3. I feel attached to the members of the LAC.</td>
<td></td>
<td></td>
<td>.798</td>
<td>.637</td>
</tr>
<tr>
<td>4. When someone criticizes the members of the LAC, it feels like a personal insult.</td>
<td></td>
<td></td>
<td>.826</td>
<td>.682</td>
</tr>
<tr>
<td>5. Other members’ successes are also my successes.</td>
<td></td>
<td></td>
<td>.898</td>
<td>.806</td>
</tr>
<tr>
<td>6. When someone praises another LAC member, it feels like a personal compliment.</td>
<td></td>
<td></td>
<td>.871</td>
<td>.758</td>
</tr>
</tbody>
</table>

Where \( \alpha \)=Cronbach’s alpha; CR=composite reliability; AVE=average variance extracted; SL=standardized loading; and SMC=squared multiple correlation.

**DISCRIMINANT VALIDITY**

While the previous sections have demonstrated discriminant validity among the identification factors, as well as between instrumental and social emotional intercustomer social support, it is important to establish discriminant validity across the two constructs. Identification refers to the sense of connection one has with the organization, employee or customer. This can be construed as very similar to the support one perceives from
other customers in the organization (intercustomer social support). To assess how closely these concepts are related, the correlation was run among these five constructs. Table 5.4 shows these correlations. Customer-customer identification is highly correlated ( > 0.5) with social/emotional intercustomer social support.

<table>
<thead>
<tr>
<th>Table 5.4</th>
<th>Correlations between Intercustomer Social Support and Identification</th>
</tr>
</thead>
<tbody>
<tr>
<td>Instrumental</td>
<td>Social Emotional</td>
</tr>
<tr>
<td>Social Emotional</td>
<td>0.447</td>
</tr>
<tr>
<td>Customer-Company Identification</td>
<td>0.158</td>
</tr>
<tr>
<td>Customer-Employee Identification</td>
<td>0.386</td>
</tr>
</tbody>
</table>

Given the high correlations among multiple constructs, it is important to demonstrate that all types of intercustomer social support and identification are measuring distinct constructs. This can be demonstrated through an assessment of discriminant validity. As mentioned previously, discriminant validity is demonstrated when the average variance extracted from the construct exceeds the squared factor correlation (Fornell and Larcker 1981). Table 5.5 shows that discriminant validity is established in all cases. The average variance extracted for all five intercustomer social support and identification constructs exceeds the squared factor correlation between the respective constructs.
Table 5.5
Discriminant Validity Tests

<table>
<thead>
<tr>
<th></th>
<th>AVE</th>
<th>Instrumental</th>
<th>Social Emotional</th>
<th>Customer-Company Identification</th>
<th>Customer-Employee Identification</th>
</tr>
</thead>
<tbody>
<tr>
<td>Instrumental</td>
<td>0.68</td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Social Emotional</td>
<td>0.59</td>
<td>0.200</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Customer-Company Identification</td>
<td>0.66</td>
<td>0.051</td>
<td>0.135</td>
<td></td>
<td></td>
</tr>
<tr>
<td>Customer-Employee Identification</td>
<td>0.62</td>
<td>0.025</td>
<td>0.177</td>
<td>0.393</td>
<td></td>
</tr>
<tr>
<td>Customer-Customer Identification</td>
<td>0.63</td>
<td>0.145</td>
<td>0.338</td>
<td>0.316</td>
<td>0.472</td>
</tr>
</tbody>
</table>

Where discriminant validity is established when average variance extracted (AVE) exceeds the squared factor correlation (Fornell and Larcker 1981)

**Network Ties**

Data collection for a member’s network ties was collected using egocentric techniques. Each respondent listed the names of members and employees that they interacted with at the health club; the respondent then described their relationship with that particular member/employee.

**Customer Ties and Customer-Employee Ties**

*Number of customer ties and customer-employee ties* was a continuous variable based on the number of connections reported by the respondent. Members were asked to list all members (employees) they interacted with at the health club, regardless of how much or how little. It was not important if the member knew the person’s full name. The member was allowed to write down initials, first name, last name, or descriptors. This is consistent with the *knowing name-generator* method used in egocentric network research. The *knowing name-generator* for this research was bounded by the affiliation network of the health club (Knoke and Yang 2008). Customer ties ranged from zero, where members reported not interacting with any other members to 49. Mean for customer ties was 6.1 connections, with a standard deviation of 5.2. Employee ties ranged from zero, where members reported not interacting with employees to 16. Mean for employee ties was 3.1, with a standard deviation of 2.6.

To calculate *amount of information*, respondents were asked how much they talk about: 1) working out; 2) social activities; and 3) personal issues with the member/employee listed. Responses varied from 1 (very little) to 5 (very much). These
answers were then totaled across each tie and across all member ties to come up with the total amount of information per respondent. This number was then averaged over the number of customer ties reported for that member. Amount of information for respondents ranged from 0 to 15, with a mean of 8.5 and standard deviation of 3.4.

Last, *strength of ties* was calculated based on a weighted index. Each relationship was given a weight based on their self-reported relationship. Respondents were asked to classify their relationship with the individual as either: 1) a close acquaintance; 2) a casual acquaintance; or 3) someone they barely know. A close acquaintance was given a weight of 3; a casual acquaintance was given a weight of 2; and someone the member barely knows was given a weight of 1. These weights were multiplied by the communication frequency with the particular individual, and then summed across all customer ties to generate a total strength of tie. A higher number indicates stronger ties for the respondent. Total strength of ties for respondents ranged from 0 to 222, with a mean of 34.2 and standard deviation of 29.9.

**OUTCOME VARIABLES**

**Patronage & Expenditures**

Secondary data for the respondents was obtained from the health club. The health club reported the total number of visits for the previous six months. Patronage ranged from zero (new members) to 256 visits, with a mean of 65.9 and standard deviation of 46.4. Secondary data also included total spending for the previous calendar year; this included dues as well as any house charges. Spending ranged from $40 to $1440, with a mean of $602 and standard deviation of 279.

**Well-being**

Customer’s subjective well-being was measured using the 14-item Ontario Health Survey (John 2004). This measured consumer’s perceived stress, state of morale, perceived health status, satisfaction about relationships, interest in life, control of emotions and energy. This measure presented some difficulty because each factor was measure by two items, one reversed scored, which tended to confuse respondents. After analyzing all items using principal components analysis, it was determined that the best measure of overall subjective well-being was the six items measuring perceived stress,
state of moral and energy. These six items had $\alpha = .79$; see Table 5.6 below for summary of items and output statistics.

<table>
<thead>
<tr>
<th>Factor Item</th>
<th>$\alpha$</th>
<th>CR</th>
<th>AVE</th>
<th>SL</th>
<th>SMC</th>
</tr>
</thead>
<tbody>
<tr>
<td>Subjective Well Being</td>
<td>0.79</td>
<td>0.80</td>
<td>0.40</td>
<td></td>
<td></td>
</tr>
<tr>
<td>1. I felt reasonably relaxed. (+)</td>
<td></td>
<td></td>
<td>.723</td>
<td>.522</td>
<td></td>
</tr>
<tr>
<td>2. I felt tense, or on edge. (-)</td>
<td></td>
<td></td>
<td>.704</td>
<td>.496</td>
<td></td>
</tr>
<tr>
<td>3. I felt cheerful and light headed. (+)</td>
<td></td>
<td></td>
<td>.495</td>
<td>.245</td>
<td></td>
</tr>
<tr>
<td>4. I felt rather low. (-)</td>
<td></td>
<td></td>
<td>.591</td>
<td>.350</td>
<td></td>
</tr>
<tr>
<td>5. I have been feeling full of pep and energy. (+)</td>
<td></td>
<td></td>
<td>.559</td>
<td>.312</td>
<td></td>
</tr>
<tr>
<td>6. I felt exhausted, worn out or at the end of my rope. (-)</td>
<td></td>
<td></td>
<td>.612</td>
<td>.375</td>
<td></td>
</tr>
</tbody>
</table>

Where $\alpha=$Cronbach’s alpha; CR=composite reliability; AVE=average variance extracted; SL=standardized loading; and SMC=squared multiple correlation.

Customer Satisfaction with the Organization

Customer satisfaction was measured using an 11 item customer scale specifically developed for health clubs (Kelley and Davis 1994). A principal components analysis of all 11 items revealed that three items loaded on an alternate factor. A review of these three items (items 1, 2 and 4) revealed that they all dealt with equipment, while the remaining eight items dealt with the members’ satisfaction with the relationships with the health club (employees, recovery, etc.). Therefore, the three items dealing with satisfaction with the equipment were deleted since this research focuses on relationships with people and organizations. The remaining eight items all had high standardized loadings ($> 0.7$); $\alpha = .941$. Items and corresponding statistics for customer satisfaction with the health club are summarized below in Table 5.7.
Table 5.7
CFA Results for Customer Satisfaction

<table>
<thead>
<tr>
<th>Factor Item</th>
<th>α</th>
<th>CR</th>
<th>AVE</th>
<th>SL</th>
<th>SMC</th>
</tr>
</thead>
<tbody>
<tr>
<td>Customer Satisfaction (with the following):</td>
<td>0.94</td>
<td>0.94</td>
<td>0.67</td>
<td></td>
<td></td>
</tr>
<tr>
<td>1. The ability of employees.</td>
<td></td>
<td></td>
<td></td>
<td>.800</td>
<td>.640</td>
</tr>
<tr>
<td>2. The willingness of employees to provide</td>
<td></td>
<td></td>
<td></td>
<td>.887</td>
<td>.786</td>
</tr>
<tr>
<td>service.</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>3. The promptness of employees.</td>
<td></td>
<td></td>
<td></td>
<td>.843</td>
<td>.711</td>
</tr>
<tr>
<td>4. The courtesy of employees.</td>
<td></td>
<td></td>
<td></td>
<td>.834</td>
<td>.695</td>
</tr>
<tr>
<td>5. The knowledge of employees.</td>
<td></td>
<td></td>
<td></td>
<td>.872</td>
<td>.760</td>
</tr>
<tr>
<td>6. The attention provided me by this health</td>
<td></td>
<td></td>
<td></td>
<td>.837</td>
<td>.700</td>
</tr>
<tr>
<td>club.</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>7. The degree to which this health club cares</td>
<td></td>
<td></td>
<td></td>
<td>.778</td>
<td>.606</td>
</tr>
<tr>
<td>about me.</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>8. This health club’s ability to correct service</td>
<td></td>
<td></td>
<td></td>
<td>.700</td>
<td>.490</td>
</tr>
<tr>
<td>problems.</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
</tbody>
</table>

Where α=Cronbach’s alpha; CR=composite reliability; AVE=average variance extracted; SL=standardized loading; and SMC=squared multiple correlation.

Customer Referrals

Members are rewarded for referring customers to the health club with a free month of membership. To measure the number of customer referrals, the health club reported how many free months each member had received over the course of their membership. The number of free months (customer referrals) ranged from zero to five, with a mean of 0.5.

Future Behavioral Intentions

Future behavioral intentions was measured using an established 13-item scale that measures a customer’s level of loyalty, their propensity to switch service providers, likelihood to pay higher prices and their likelihood to complain (Zeithaml et al. 1996). Principal components analysis revealed the same factor structure as Zeithaml et al. (1996). Items 1-5 measured loyalty to the health club (α = .90); items 6 & 7 measured propensity of respondent to switch service providers (r = .52); items 8 & 9 captured customer’s likelihood to pay more (r = .713), and last, items 10-13 measured respondents likelihood to complain (α = .75). One item in respondents’ likelihood to complain was deleted due to low standardized loading and squared multiple correlations. These results are consistent with the established scale (Zeithaml et al. 1996).
## Table 5.8
CFA Results for Future Behavioral Intentions

<table>
<thead>
<tr>
<th>Factor Item</th>
<th>zero</th>
<th>CR</th>
<th>AVE</th>
<th>SL</th>
<th>SMC</th>
</tr>
</thead>
<tbody>
<tr>
<td><strong>Loyalty</strong></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>1. To say positive things about the LAC to other people.</td>
<td>0.90</td>
<td>0.91</td>
<td>0.67</td>
<td>.866</td>
<td>.750</td>
</tr>
<tr>
<td>2. To recommend the LAC to someone who seeks my advice.</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>3. To encourage others to do business with the LAC</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>4. To consider the LAC as my first choice when deciding on a gym.</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>5. To continue my membership with the LAC in the next few years.</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td><strong>Switch</strong></td>
<td>0.52*</td>
<td>0.70</td>
<td>0.54</td>
<td>.634</td>
<td>.401</td>
</tr>
<tr>
<td>1. To discontinue my membership with the LAC in the next few years.</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>2. To take some of my business to a competitor of the LAC that offers better prices.</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td><strong>Pay More</strong></td>
<td>0.71*</td>
<td>0.84</td>
<td>0.72</td>
<td>.801</td>
<td>.644</td>
</tr>
<tr>
<td>1. To continue to do business with the LAC even if its prices increased somewhat.</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>2. To pay higher prices for LAC membership compared to other health clubs with similar offerings.</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td><strong>Complain</strong></td>
<td>0.75</td>
<td>0.74</td>
<td>0.48</td>
<td>.670</td>
<td>.447</td>
</tr>
<tr>
<td>1. To switch to a competitor if I experienced a problem with the LAC.</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>2. To complain to other members if I experienced a problem with the LAC’s service.</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>3. To complain to external agencies, such as the Better Business Bureau, if I experienced a problem with the LAC.</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
</tbody>
</table>

Where α=Cronbach’s alpha; CR=composite reliability; AVE=average variance extracted; SL=standardized loading; and SMC=squared multiple correlation; * = Pearson correlation.

**Future Intentions to Co-Create**

Customer’s future intentions to co-create refer to their: 1) ability; 2) role clarity; and 3) perceived value in future co-creation (Dong et al. 2008; Meuter et al. 2005). Measures for these three constructs were adapted from previous research to fit the present research context (Dong et al. 2008). Principal components analysis revealed that all items loaded on the appropriate construct, except for one reversed scored item in customer’s role clarity in future co-creation. Low loadings and squared multiple correlations confirmed that this item needed to be deleted. Customer’s ability in future co-creation was measured using the 3-item scale, α = 0.94. Customer’s role clarity in
future co-creation was measured using 4 items, $\alpha = 0.88$. Last, customer’s perceived value in future co-creation was measured using 4 items, $\alpha = 0.91$. All items demonstrated standardized loadings > 0.6 and squared multiple correlations > 0.4. Table 5.9 below summarizes these statistics.

<table>
<thead>
<tr>
<th>Factor Item</th>
<th>$\alpha$</th>
<th>CR</th>
<th>AVE</th>
<th>SL</th>
<th>SMC</th>
</tr>
</thead>
<tbody>
<tr>
<td><strong>Ability</strong></td>
<td>0.94</td>
<td>0.94</td>
<td>0.84</td>
<td></td>
<td></td>
</tr>
<tr>
<td>1. I am fully capable of using the services of the LAC.</td>
<td></td>
<td></td>
<td></td>
<td>.932</td>
<td>.869</td>
</tr>
<tr>
<td>2. I am confident in my ability to use the services of the LAC.</td>
<td></td>
<td></td>
<td></td>
<td>.963</td>
<td>.927</td>
</tr>
<tr>
<td>3. Working out at the LAC is well within the scope of my abilities.</td>
<td></td>
<td></td>
<td></td>
<td>.844</td>
<td>.712</td>
</tr>
<tr>
<td><strong>Role Clarity</strong></td>
<td>0.88</td>
<td>0.89</td>
<td>0.67</td>
<td></td>
<td></td>
</tr>
<tr>
<td>1. I feel certain about how to use the services of the LAC properly.</td>
<td></td>
<td></td>
<td></td>
<td>.911</td>
<td>.830</td>
</tr>
<tr>
<td>2. I know what is expected of me when I use the services of the LAC.</td>
<td></td>
<td></td>
<td></td>
<td>.895</td>
<td>.801</td>
</tr>
<tr>
<td>3. The steps to using the services of the LAC are clear to me.</td>
<td></td>
<td></td>
<td></td>
<td>.825</td>
<td>.681</td>
</tr>
<tr>
<td>4. I am NOT sure how to use the services of the LAC club properly.</td>
<td></td>
<td></td>
<td></td>
<td>.616</td>
<td>.410</td>
</tr>
<tr>
<td><strong>Perceived Value</strong></td>
<td>0.91</td>
<td>0.92</td>
<td>0.74</td>
<td></td>
<td></td>
</tr>
<tr>
<td>1. Continuing to attend the LAC would provide me with personal feelings of worthwhile accomplishment.</td>
<td></td>
<td></td>
<td></td>
<td>.889</td>
<td>.791</td>
</tr>
<tr>
<td>2. Continuing to attend the LAC would provide me with feelings of enjoyment.</td>
<td></td>
<td></td>
<td></td>
<td>.903</td>
<td>.815</td>
</tr>
<tr>
<td>3. Continuing to attend the LAC would provide me with feelings of independence.</td>
<td></td>
<td></td>
<td></td>
<td>.784</td>
<td>.615</td>
</tr>
<tr>
<td>4. Continuing to attend the LAC would allow me to have increased confidence in my skills.</td>
<td></td>
<td></td>
<td></td>
<td>.852</td>
<td>.727</td>
</tr>
</tbody>
</table>

Where $\alpha$=Cronbach’s alpha; CR=composite reliability; AVE=average variance extracted; SL=standardized loading; and SMC=squared multiple correlation.

**CONTROL VARIABLES**

The member’s length of relationship with the health club was obtained from the health club. Membership length ranged from new members, who had just joined in the previous week to 30 years. Average length of membership was 5 years with a standard deviation of 5.4. Consumer familiarity was measured using a three item scale adapted based on Beatty and Talapade (1994). All three items loaded onto one factor with standardized loadings > 0.7. Reliability was established with $\alpha = .822$. Consumer
expertise was measured using an existing three item scale developed originally by Park, Mothersbaugh and Feick (1994). Scale items were adapted to fit the health club context. All three items loaded onto a single factor with standardized loadings > 0.8 and \( \alpha = .802 \). Lastly, the respondent’s level of extroversion was measured using the Big Five Inventory Scale (John and Srivastava 1999). The established scale consists of eight items, three of which are reverse scored. One item demonstrated low loading and was deleted from the analysis. The remaining seven items loaded onto a single factor with standardized loadings > 0.65 and \( \alpha = .874 \).

**Hypothesis Testing**

The previous section has demonstrated the reliability and dimensionality of all latent constructs used in the current research. Given this measurement validation, the hypotheses are now tested using two different analytical tools. The hypotheses related to the antecedents of intercustomer social support are tested using seemingly unrelated regression. Then, the entire model is subjected to structural equation modeling in order to test the outcome hypotheses.

**Seemingly Unrelated Regression: Testing the Antecedents**

Seemingly unrelated regression (SUR) was used to test the antecedents of intercustomer social support (H1-H6). Standard multiple regressions may yield biased results because the same independent variables are predicting both dependent variables. This leads to a greater likelihood of correlated errors (Zellner 1962). To estimate the models, standard ordinary least squares were used. Given that all independent variables appear in both equations, ordinary least squares estimators are equivalent to generalized least squares estimators (Reibstein and Gatignon 1984); therefore, either method can be used. Last, all independent variables that constitute an interaction term were mean-centered to mitigate the potential threat of multicollinearity (Aiken and West 1991).
The following equations were estimated using STATA to formally test the hypotheses that network identification and network ties impact dimensions of intercustomer social support:

\[
\text{Inst.} = \alpha + \beta_1 X_1 + \beta_2 X_2 + \beta_3 X_3 + \beta_4 X_4 + \beta_5 X_5 + \beta_6 X_6 + \beta_7 X_7 + \beta_8 X_8 X_6 + \beta_9 X_7 + e + c
\]

\[
\text{Soc/Emt.} = \alpha + \beta_1 X_1 + \beta_2 X_2 + \beta_3 X_3 + \beta_4 X_4 + \beta_5 X_5 + \beta_6 X_6 + \beta_7 X_7 + \beta_8 X_8 X_6 + \beta_9 X_7 + e + c
\]

where:

- \( \text{Instr.} \) = Instrumental intercustomer social support
- \( \text{Soc/Emt.} \) = Social/emotional intercustomer social support
- \( \alpha \) = constant
- \( X_1 \) = Customer-company network identification
- \( X_2 \) = Customer-employee network identification
- \( X_3 \) = Customer-company network identification
- \( X_4 \) = Number of customer ties
- \( X_5 \) = Amount of information from customer ties
- \( X_6 \) = Strength of customer ties
- \( X_7 \) = Customer-employee ties

**Model Summary Results**

Overall, the above equations explained significant variance. For instrumental social support, \( R^2 = .263 \) (\( p < .0001 \)) without controls and \( R^2 = .281 \) (\( p < .0001 \)) with the controls included in the model. For social emotional intercustomer social support, \( R^2 = .401 \) (\( p < .0001 \)) without controls and \( R^2 = .413 \) (\( p < .0001 \)) with the controls included in the model. The significant \( p \)-values for all four models demonstrate that the variables explained a significant amount of variance for the model. Table 5.10 summarizes these values, as well as the individual effects presented below in the text.

**Main Effect Hypotheses**

The summary table below (5.10) provides the overall results for the main effect hypotheses presented in chapter three. The results for Model 1 are without the controls, while the results for Model 2 include all the control variables. The first main effect hypothesis tested the relationship between the customer’s identification with the company and the respondent’s level of instrumental and social emotional intercustomer social support. Customer-company identification had a positive and partially significant...
relationship with instrumental social support (β = 0.063, p < 0.10) when no controls were included; however this relationship turned insignificant when the controls were included in the model. There was no support for the relationship between customer-company identification and social emotional support. Therefore, H1 was only partially supported.

Hypothesis 2 predicted a negative relationship between customer-employee identification and intercustomer social support. Customer-employee identification did have a negative and significant impact on instrumental social support (β = -0.100, p < 0.01 without controls; β = -0.082, p < 0.5 with controls). There was no significant impact on social emotional support, providing overall partial support for H2.

Last for the identification main effect hypotheses, the impact of customer-customer identification was tested on intercustomer social support. This relationship was positive and significant across both models for instrumental support (β = 0.202, p < 0.01 without controls; β = 0.190, p < 0.01 with controls) and social emotional support (β = 0.258, p < 0.01 without controls; β = 0.250, p < 0.01 with controls). Therefore, H3 was fully supported. All of these identification results support social identity theory that says people strive to enhance their self-concept and self-esteem by categorizing and identifying with groups (Tajfel and Turner 1986).

The next set of main effect hypotheses tested related to the impact of network ties on intercustomer social support. First, the impact of the number of customer ties on intercustomer social support was tested. This relationship was positive and significant across both models for instrumental support (β = 0.023, p < 0.01 without controls; β = 0.029, p < 0.01 with controls) and social emotional support (β = 0.036, p < 0.01 without controls; β = 0.036, p < 0.01 with controls). Therefore, H4 was fully supported. The final main effect hypothesis tested the impact of the amount of information from customer ties on intercustomer social support. This relationship was positive and significant across both models for instrumental support (β = 0.051, p < 0.01 without controls; β = 0.049, p < 0.01 with controls) and social emotional support (β = 0.018, p < 0.05 without controls; β = 0.014, p < 0.10 with controls). Therefore, H4 was supported. This is consistent with the social network perspective and social capital theory in that increased connections and flow of information allows the individual increased opportunities and access to resources (Borgatti and Foster 2003; Coleman 1988). These main effect results are summarized below in Table 5.10.
Table 5.10
Main Effect Results

<table>
<thead>
<tr>
<th></th>
<th>Instrumental Social Support</th>
<th>Social Emotional Support</th>
</tr>
</thead>
<tbody>
<tr>
<td></td>
<td>Model 1</td>
<td>Model 2</td>
</tr>
<tr>
<td>Constant</td>
<td>0.148</td>
<td>0.094</td>
</tr>
<tr>
<td>Main Effects</td>
<td></td>
<td></td>
</tr>
<tr>
<td>Customer-Company</td>
<td></td>
<td></td>
</tr>
<tr>
<td>Identification</td>
<td>0.063*</td>
<td>0.035</td>
</tr>
<tr>
<td>Customer-Employee</td>
<td></td>
<td></td>
</tr>
<tr>
<td>Identification</td>
<td>-0.100***</td>
<td>-0.082**</td>
</tr>
<tr>
<td>Customer-Customer</td>
<td>0.202***</td>
<td>0.190***</td>
</tr>
<tr>
<td>Identification</td>
<td></td>
<td></td>
</tr>
<tr>
<td># Customer Ties</td>
<td>0.023***</td>
<td>0.029***</td>
</tr>
<tr>
<td>Amount Information</td>
<td></td>
<td></td>
</tr>
<tr>
<td></td>
<td>0.051***</td>
<td>0.049***</td>
</tr>
<tr>
<td>Controls</td>
<td></td>
<td></td>
</tr>
<tr>
<td>Length of Membership</td>
<td></td>
<td>-0.016***</td>
</tr>
<tr>
<td>Familiarity</td>
<td>---</td>
<td>-0.048</td>
</tr>
<tr>
<td>Expertise</td>
<td>---</td>
<td>0.026</td>
</tr>
<tr>
<td>Extroversion</td>
<td>---</td>
<td>0.077**</td>
</tr>
<tr>
<td>(R^2)</td>
<td>0.263***</td>
<td>0.281***</td>
</tr>
</tbody>
</table>

*p<0.10; **p<0.05; ***p<0.01 (one-tailed)

Interaction Hypotheses

As stated previously, all terms used in the calculations of interaction terms were mean-centered to prevent issues related to multicollinearity. To test the interaction hypotheses, the mean centered interaction terms were entered into the analysis.

Hypothesis 5 tested the impact of the customer’s strength of ties on the relationship between customer ties and amount of information on intercustomer social support. Strength of ties had a significant interaction on the relationship between customer ties and instrumental support, and the relationship between the amount of information and both instrumental and social emotional support. While these interactions are significant, it is necessary to graph the interactions to interpret the results. Hypothesis 6 tested impact of the number of employee ties on the relationship between customer ties and amount of information on intercustomer social support. None of the interaction terms were significant; thus, H6 was not supported. The interaction results are presented in the
table below, followed by an analysis of the direction of support for the strength of ties interaction term (H5).

<table>
<thead>
<tr>
<th>Interaction Effects</th>
<th>Instrumental Social Support</th>
<th>Social Emotional Support</th>
</tr>
</thead>
<tbody>
<tr>
<td>SOT x Customer Ties</td>
<td>0.001*</td>
<td>0.000</td>
</tr>
<tr>
<td>SOT x Amount Info</td>
<td>-0.001*</td>
<td>-0.001*</td>
</tr>
<tr>
<td>Employee Ties x Customer Ties</td>
<td>-0.004</td>
<td>-0.004</td>
</tr>
<tr>
<td>Employee Ties x Amount Info</td>
<td>0.000</td>
<td>0.000</td>
</tr>
</tbody>
</table>

\[ R^2 = 0.339 \quad \text{Social Emotional Support} = 0.429 \]

*\(p<0.10; **p<0.05; ***p<0.01\) (one-tailed)

To test whether the interaction terms were significant in the direction hypothesized, graphs were drawn for all relationships. Figure 5.1 shows the strength of ties interaction for customer ties and amount of information on instrumental support. When customer ties and amount of information are low, the strength of ties had the same impact on instrumental support; however, as the customer ties and amount of information increased, the level of instrumental support was lower for strong ties than weak ties. Therefore, the highest level of instrumental support occurred when individuals has high levels of weak ties. This is consistent with the search-transfer notion in networks (Hansen 1999) in that individuals use weak ties when searching for new, non-complex information.

In terms of its impact on social emotional intercustomer social support, the strength of ties interaction term was only significant for the relationship between amount of information and social emotional support. For consistency purposes, Figure 5.2 graphs the relationship for both customer ties and amount of information on social emotional support; however, it is important to note that the graph on the left is not significant; therefore, it cannot be interpreted. The graph on the right of Figure 5.2 demonstrates individuals had higher levels of social emotional support with strong ties. This is also consistent with the search-transfer notion in that individuals use strong ties when dealing with complex, noncodified information (Hansen 1999). Overall, H5 was
fully supported for the impact of strength of ties on instrumental support, and partially supported for its impact on social emotional support. It is beneficial to have weak ties when looking for simple, novel support; however, strong ties are necessary when the level of support increases to a social emotional need.

Summary of Antecedents

Overall, the seemingly unrelated regression demonstrated overall support for the hypotheses presented. A summary table (5.12) presents the overall results for the antecedents of intercustomer social support. The implications and limitations of these results are discussed in Chapter 6.
Figure 5.1
Interaction Graphs for Strength of Ties and Instrumental Social Support

[Graph showing interaction between strength of ties and instrumental social support]
Figure 5.2
Interaction Graphs for Strength of Ties and Social Emotional Social Support

Social Emotional

High

Low

Not Significant

# Ties

Few

Weak Ties

2.5

Strong Ties

3.2

Many

Not Significant

Amount of Information

Low

Weak Ties

2.5

High

Strong Ties

3.2

Amount of Information

High

Low
Table 5.12
Summary of Support for Antecedent Hypotheses

<table>
<thead>
<tr>
<th>Main Effect</th>
<th>Instrumental</th>
<th>Social Emotional</th>
</tr>
</thead>
<tbody>
<tr>
<td>H1: Customer-Company Identification</td>
<td>Yes</td>
<td>No</td>
</tr>
<tr>
<td>H2: Customer-Employee Identification</td>
<td>Yes</td>
<td>No</td>
</tr>
<tr>
<td>H3: Customer-Customer Identification</td>
<td>Yes</td>
<td>Yes</td>
</tr>
<tr>
<td>H4: Customer Ties</td>
<td>Yes</td>
<td>Yes</td>
</tr>
<tr>
<td>H4: Amount of Information</td>
<td>Yes</td>
<td>Yes</td>
</tr>
</tbody>
</table>

<table>
<thead>
<tr>
<th>Interaction Effects</th>
<th></th>
<th></th>
</tr>
</thead>
<tbody>
<tr>
<td>H5: Strength of Ties x Customer Ties</td>
<td>Yes</td>
<td>No</td>
</tr>
<tr>
<td>H5: Strength of Ties x Amount of Info</td>
<td>Yes</td>
<td>Yes</td>
</tr>
<tr>
<td>H6: Employee Ties x Customer Ties</td>
<td>No</td>
<td>No</td>
</tr>
<tr>
<td>H6: Employee Ties x Amount of Info</td>
<td>No</td>
<td>No</td>
</tr>
</tbody>
</table>

**Structural Equation Modeling: Testing the Outcomes**

To test the multiple and interrelated relations among intercustomer social support and the outcome variables (H7-H9), structural equation modeling was used. The entire model was estimated using AMOS 18.0. The fit statistics for the overall research model demonstrate a less than adequate fit: $\chi^2 (2518) = 6452, p < .000; \text{CFI} = .784; \text{NFI} = .691; \text{RMSEA} = .069$. Given the complexity of the model and a sample size of 331, these results are not surprising. While a sample size of 331 is large for marketing, it is relatively small given the number of parameters (88) to be estimated. This provides a ratio of 3.75 cases per parameter, and experts recommend a minimum ratio of 5:1, preferably 10:1 (Kline 2005). Since this was the proposed research model and re-specifying with all the outcomes would only improve fit marginally, the results are presented below for this model. Future research will analyze partial models, or parcel measurement scales to increase the ratio of free parameters to cases. This limitation is discussed in detail in the following chapter. The specific results for the impact of intercustomer social support on customer outcomes, firm outcomes, and co-creation outcomes are presented below in the text, as well as shown in Figures 5.3 and 5.4.
Figure 5.3
Model Results for Instrumental Intercustomer Social Support

**Network Drivers**
- **Network Identification**
  - Company
  - Employees
  - Customers
  - \( \beta = .098^* \)
  - \( \beta = -.404^{**} \)
  - \( \beta = .529^{***} \)

- **Customer Ties**
  - Number
  - Amount of Info
  - \( \beta = .623^{***} \)
  - \( \beta = .877^{***} \)

**Intercustomer Social Support**

**Outcomes**

**Customer**
- Patronage Frequency
- Well-Being
- Customer Satisfaction with Organization

**Firm**
- Customer Referrals
- Expenditures
- Future Behavioral Intentions
  - Loyalty (+), Pay More (+), Switch (-), Complain (-)

**Co-Creation**
- Ability in Future Co-Creation
- Role Clarity in Future Co-Creation
- Perceived Value of Future Co-Creation

\( \beta = .152^{***} \)
\( \beta = .109^{**} \)
NS
NS
NS
NS
\( \beta = .081^* \)

NS = Not significant
*** = p < .01
** = p < .05
* = p < .10
Figure 5.4
Model Results for Social Emotional Intercustomer Social Support

Network
- Network Identification
  - Company
  - Employees
  - Customers
  \( \beta = .113^{**} \)
  \( \beta = \text{NS} \)
  \( \beta = .552^{***} \)

Customer Ties
- Number
- Amount Info
  \( \beta = .121^{*} \)
  \( \beta = .25^{**} \)

Intercustomer Social Support
  \( \beta = .138^{***} \)
  \( \beta = .172^{***} \)
  \( \beta = .358^{***} \)

Social Emotional
  \( \beta = .100^{**} \)
  \( \beta = \text{NS} \)
  \( \beta = .280^{***} \)
  \( \beta = .176^{**} \)
  \( \beta = -.160^{**} \)
  \( \beta = -.097^{*} \)

Outcomes
- Customer
  - Patronage Frequency
  - Well-Being
  - Customer Satisfaction with Organization
  \( \beta = .100^{**} \)
  \( \beta = \text{NS} \)
  \( \beta = .280^{***} \)
  \( \beta = .176^{**} \)
  \( \beta = -.160^{**} \)
  \( \beta = -.097^{*} \)

- Firm
  - Customer Referrals
  - Expenditures
  - Future Behavioral Intentions
    - Loyalty (+), Pay More (+), Switch (-), Complain (-)

- Co-Creation
  - Ability in Future Co-Creation
  - Role Clarity in Future Co-Creation
  - Perceived Value of Future Co-Creation

NS = Not significant

*** = p < .01
** = p < .05
* = p < .10
Customer Outcomes

The first set of outcomes tested the impact of intercustomer social support on the customer’s a) patronage frequency; b) well-being, and c) satisfaction with the organization. The customer’s level of social emotional support had a positive and significant impact on patronage frequency (β = .138, p < .001), well-being (β = .172, p < .01), and satisfaction with the organization (β = .358, p < .001); however, the level of instrumental support had no significant impact on patronage frequency, well-being or satisfaction with the organization. Therefore, H7 was supported for social emotional support; however, it was not supported for instrumental support. This makes sense because instrumental social support is not emotionally laden, which means it would not have as much impact on outcomes that are more social and emotional, such as patronage to the club to see friends (social) and perceptions of well-being (emotional).

Firm Outcomes

Next, the impact of intercustomer social support was tested on the level of: a) customer referrals; b) expenditures; and c) future behavioral intentions. The customer’s level of instrumental support had a positive and significant (β = .152, p < .01) impact on customer referrals. Additionally, the customer’s level of social emotional support also had a positive and significant (β = .100, p < .05) impact on customer referrals. Therefore, H8a is supported. For spending, the customer’s level of instrumental social support had a positive and significant (β = .109, p < .05) impact on customer spending; however, there was no significant impact for social emotional support on customer spending.

Last for firm outcomes, the impact on customer’s future behavioral intentions was examined. Recall that future behavioral intentions include the customer’s loyalty, likelihood to switch providers, willingness to pay more, and likelihood to complain. The customer’s level of social emotional support had a positive and significant impact on the customer’s loyalty (β = .280, p < .001) and willingness to pay more (β = .176, p < .01). Also, customer’s level of social emotional support had a negative and significant effect of likelihood to switch (β = -.160, p < .01) and likelihood to complain (β = -.097, p < .10). Instrumental support had no significant impact on loyalty, likelihood to switch, willingness to pay more, or likelihood to complain, which makes sense because these
factors are more social in nature that instrumental. Therefore, H8c was supported for social emotional support, but not for instrumental support.

Co-Creation Outcomes

The last set of outcomes tested investigates the impact of intercustomer social support on the customer’s a) ability in future co-creation; b) role clarity in future co-creation; and c) perceived value of future co-creation. Social emotional support had a positive and significant impact on the customer’s ability (β = .220, p < .001), role clarity (β = .197, p < .001), and perceived value (β = .320, p < .001) in future co-creation. Instrumental social support only had a significant impact on customer’s perceived value in future co-creation (β = .081, p < .10); instrumental support had no significant impact on the customer’s ability or role clarity in future co-creation.

Summary of Outcomes

The overall results (see Table 5.13) for the impact of intercustomer social support on customer, firm and co-creation outcomes demonstrate the strong impact of social emotional intercustomer support on outcomes that have a higher level of social emotional involvement (subjective well-being, patronage frequency, satisfaction, behavioral intentions and future co-creation). On the other hand, outcomes that have less emotional involvement (referrals for a free month and monthly expenditures) were influenced more by instrumental social support. Therefore, H10 is supported in that social emotional support has a greater impact on emotional outcomes and instrumental social support had a greater impact on more instrumental or transactional level outcomes. This has significant managerial implications, which are discussed in the following chapter.

<table>
<thead>
<tr>
<th>Outcome</th>
<th>Instrumental</th>
<th>Social Emotional</th>
</tr>
</thead>
<tbody>
<tr>
<td>H7a: Patronage frequency</td>
<td>No</td>
<td>Yes</td>
</tr>
<tr>
<td>H7b: Subjective well-being</td>
<td>No</td>
<td>Yes</td>
</tr>
<tr>
<td>H7c: Satisfaction with the organization</td>
<td>No</td>
<td>Yes</td>
</tr>
<tr>
<td>H8a: Referrals</td>
<td>Yes</td>
<td>Yes</td>
</tr>
<tr>
<td>H8b: Expenditures</td>
<td>Yes</td>
<td>No</td>
</tr>
<tr>
<td>H8c: Future behavioral intentions</td>
<td>No</td>
<td>Yes</td>
</tr>
<tr>
<td>H9a: Ability in future co-creation</td>
<td>No</td>
<td>Yes</td>
</tr>
<tr>
<td>H9b: Role clarity in future co-creation</td>
<td>No</td>
<td>Yes</td>
</tr>
<tr>
<td>H9c: Perceived value in future co-creation</td>
<td>Yes</td>
<td>Yes</td>
</tr>
</tbody>
</table>
CHAPTER SUMMARY

The overall results demonstrate a positive impact of the customer’s identification and egocentric network on levels of instrumental and social emotional support. Additionally, results show that the customer’s strength of ties moderates this relationship. In terms of the outcomes, overall support was shown for the impact of social emotional support on customer and co-creation outcomes and for the impact of instrumental support on firm outcomes. These results are discussed, along with limitations and future research potential in the following chapter.
CHAPTER SIX
DISCUSSION

INTRODUCTION

The purpose of this chapter is to discuss the results presented in Chapter 5. First, conclusions are drawn for the antecedents and the outcomes of intercustomer social support. Then, theoretical implications are discussed for the overall research model, followed by specific managerial implications that can be applied to the service setting. Last, the chapter concludes with limitations of this research, along with opportunities for future research.

CONCLUSIONS

The primary research question for this research focused on the key drivers of intercustomer social support. Past research has demonstrated the benefits of intercustomer social support, yet no research has investigated what motivates high levels of intercustomer social support. Additionally, given that intercustomer social support is a new construct in the marketing field, this research investigated key outcomes of intercustomer social support. Conclusions for both the drivers and outcomes of intercustomer social support are discussed.

ANTECEDENTS

Overall, this research showed that a customer’s identification with the company, employee and customer impact levels of intercustomer social support. Specifically, the customer’s connection, or feelings of similarity, to other customers was the strongest driver of intercustomer social support. This identification with other customer was positively related to both levels of instrumental and social-emotional intercustomer support. In other words, customers who had strong similarities and connections with other customers had higher levels of intercustomer social support.

Customer’s identification with other actors in the service network is also important when instilling intercustomer social support. This research showed that the customer’s connection with employees is negatively related to instrumental intercustomer social support. In other words, customers seek basic information from employees, not other customers, when they already have a connection with the employee.
However, the level of identification with the employee does not impact the levels of social emotional intercustomer social support. It appears that customer’s connection with employees does not reach the level of social emotional support; therefore, even when customers have connections with employees, customers seek social emotional support from other customers, not the service provider.

Last, the customer’s identification with the organization had the least impact on intercustomer social support. There was a small relationship between this organization identification and instrumental support; however, no relation existed between organizational identification and social emotional support. Therefore, organizations that seek to connect to their customer’s beliefs will see some benefit with instrumental social support. Overall, customer identification was the key identification driver for both types of intercustomer social support; however, employee and organization identification did impact it as well.

The next set of antecedents investigated dealt with the number of customer ties, as well as the amount of information conveyed among those ties. The number of customer ties was a strong predictor of intercustomer social support. As the customer had more connections with other customers, they were more likely to seek out support, both instrumental and social emotional, from these customers. Similarly, as customers shared more information across these connections, they were also more likely to seek instrumental and social emotional support from other customers. Therefore, it is not only the ties but also the information flow between the customers that contribute to increased levels of intercustomer social support. Customers can benefit from increased levels of intercustomer social support by finding other customers with similar interests and sharing information with those customers.

In addition to these antecedents, two moderators were also examined for their impact on intercustomer social support. Interestingly, the number of employee ties had no impact on the level of intercustomer social support received from the customer ties. This is contradictory to what the research predicted. One possibility is that it is not the number of employee ties that impact levels of intercustomer social support, but instead it is the strength of tie with the employee. Since the health club has significantly lower numbers of employees in relation to customers, the strength of tie may impact the
relationship more than the actual number of employee ties. This is discussed in future research.

While the current research did not investigate the strength of employee tie, it did investigate the strength of customer ties. The strength of ties among customers had a more significant impact on social emotional support, than it did on instrumental support. These means that as customers foster and develop stronger connections with other customers, their level of support increases from basic, novel support to more emotional support. On the opposite side, this result also demonstrates that strong ties are not important if instrumental social support is the only goal for a service firm. The discussion of the outcome results demonstrate that instrumental social support was more important that social emotional for predicting levels of customer referrals and customer expenditures. For service firms, this could mean that they do not need to foster strong connections among customers, but simple, basic connections do help to increase the firm’s bottom line.

**OUTCOMES**

This research looked at customer, firm and co-creation outcomes. For all the customer outcomes, social emotional support had a significant impact on the outcomes, while instrumental had none. The customer’s higher level of social emotional intercustomer social support resulted in increased perceptions of well-being, increased patronage to the health club, and increased satisfaction with the organization. From the customer’s perspective, particularly in a health club setting, it is in the customer’s best interest to form strong social and emotional bonds with other customers. This increased social emotional support results in a healthier customer, both in perceptions and also in actual patronage (aka activity) at the health club. From the firm’s perspective, it is the customers who have the strong social emotional connections that have higher satisfaction with the organization.

On the other hand, instrumental social support was a stronger predictor for number of customer referrals as well as total expenditures at the health club. Therefore, from the firm’s financial perspective, the customer’s level of instrumental support appears to help their bottom line more than the customer’s level of social emotional support. The firm can benefit from increased customer referrals and expenditures by
simply encouraging basic connections among customers. The last firm outcome investigated by this research was the customer’s future behavioral intentions. This outcome looked at the customer’s loyalty, likelihood to switch, willingness to pay more, and likelihood to complain. For all these components of future behavioral intentions, social emotional intercustomer support was a stronger predictor than instrumental support. Social emotional support had a positive impact on customer loyalty and willingness to pay more, while it had a negative impact on likelihood to switch and complain. Overall, these results show that both types of intercustomer social support can help the firm’s financial return; however, if service firms cannot foster strong levels of social emotional support, they can still benefit from fostering basic connections among their customers.

**Contributions to Marketing Theory**

Social identity theory and social network perspective are key research areas in the marketing literature. Specifically, both of these perspectives have demonstrated the positive impact that social connections have on countless outcomes. The current research expands these theoretical perspectives by investigating the social connections that occur among customers in a service setting. A recent special issue in the *Journal of Service Research* on Customer Engagement called for more research on customer to customer interactions in offline, in-store settings (Libai et al. 2010); the present research does exactly this by investigating the social drivers and outcomes of the social connections that exist in a health club setting. Research on the construct of intercustomer social support in marketing is new; therefore, this research expands the nomological network surrounding the concept of intercustomer social support, so that researchers can continue to develop knowledge on this important concept in the marketing and social networking literature.

Another theoretical contribution of this research is its expansion of the social identity theory to customer identification. Past research has investigated customer’s identification with the organization and employees (Ahearne et al. 2005; Bhattacharya and Sen 2003); however, research in marketing has not investigated the identification that exists between customers. Given that many services occur in the presence of other customers, it is important to understand how the identification among customers can
impact different outcomes for the firm. The present research contributes to this knowledge gap by extending the social identity research to customers in a service setting.

Last, this research contributes to the Service Dominant Logic perspective that has been predominant in the services marketing literature over the past six years (Vargo & Lusch 2004). A key premise of the service dominant logic is its focus on the relational aspects of service provision, which is the fundamental core of the current research. The connections that form among customers in a service setting are a key relationship that service firms cannot ignore; in fact, service firms who choose to focus on these relationships will find themselves capitalizing on intangibles and developing a sustainable competitive advantage.

**MANAGERIAL IMPLICATIONS**

The current research is filled with recommendations for service managers, specifically for managers of a service setting that customers patronize on a regular basis. First and foremost, this research shows that managers should encourage their customer to identify and interact with each other; even the most basic connections can enhance social support. This can be done in countless ways, depending on the service setting. For example, programming can encourage customers to engage with each other. At a health club, programming may involve offering senior citizen classes, children’s events, group fitness classes, or social events for members to gather. All of these types of programming would not only bring members together to encourage connections, it would also bring members with similar interests together, thereby enhancing their customer-to-customer identification. Other examples of programming include bringing in authors to read books at a bookstore, or offering a weekly happy hour special to regular customers. Businesses could also have special hours for loyal customers, which would allow those customers an opportunity to interact with each other.

Managers can also encourage interaction and identification among customers through social media. Brick-and-mortar stores can benefit from online social media by things such as fan pages on Facebook. These fan pages will help customers to connect with other customers from the service firm. Customers may see other customers within the service setting, and then seek out connection with them online, which may even lead to contacts outside the service setting. Managers can also alter the physical environment
to encourage customers to interact. For example, a health club can set up equipment to encourage members to mingle with each other. Coffee shops and bookstores can alter the furniture arrangement to promote interaction among customers. Service firms can also offer children’s areas, women’s only areas or senior citizens’ areas to encourage customers with similar backgrounds to meet. Last, managers can also incentivize customers to interact and engage with other customers. Contests or sweepstakes, as well as referral incentives would all encourage customers to connect and identify with each other.

Managers may look at this research and immediately think it is impossible to foster deep connections among customers. While this might be a common reaction, managers need to understand that a key finding of this research is that instrumental intercustomer social support has significant and positive implications for a firm’s bottom line. Furthermore, all types of identification and customer connections had an impact on instrumental intercustomer social support. Therefore, on the most basic level, managers can take any one of the above recommendations to connect their customers in an effort to enhance intercustomer social support and improve the firm’s financial returns.

LIMITATIONS

As with all research, this research also suffers from limitations. First of all, this research was conducted in the actual service setting. While this enhances the application and realism of this research, it also limits the researcher’s control. While the researcher had a detailed cover letter for the survey as well as explained the instructions in person, some respondents may still have failed to understand the name generator portion of the survey. For example, it appears that some respondents took the instructions literally (e.g. think of “all” connections), while others were simply satisfied to write a few connections down and continue on with the survey. Last, it appears that some of the reverse-scored items caused confusion among the respondents; this was especially evident with the validation issues surrounding the subjective well-being measure. As with all survey research, it is hard to know how much time constraints impacted the self-report nature of the survey.

Another limitation deals with the secondary data received from the health club. Since the researcher could not physically collect the data herself, the researcher was
relying on the service organization to accurately report the data. As with all data entry procedures, there is the potential for entry error, or mistakenly recording the wrong information in the incorrect spreadsheet cells. The researcher had no ability to double-check secondary data as she was not allowed access to the management system software. Additionally, the secondary data in the health club’s management system may not be 100% accurate. For example, front desk workers may fail to check in members with each visit, which would impact the customer patronage variable. Additionally, cash transactions for juice bar items are not recorded in the member’s account history, which impacts the customer spending variable. While these are limitations present in this research, they were unavoidable given the constraints of the service firm’s management software.

In terms of analysis, sample size is another limitation to this study. While a sample size of greater than 300 is considered large in marketing, it is simply not large enough for use in with such a complex model in structural equation modeling. In this research, the ratio of number of cases: number of free parameters was 3.75:1. Recommended ratio ranges from 5:1 to 10:1 (Kline 2005); therefore, 3.75:1 is too low for use in SEM. Future analysis should analyze partial models or parcel the items to improve the ratio.

Further, this research was conducted in a single service setting, as oppose to multiple service settings. This was unavoidable because it was critical for the researcher to connect customer self-report data to secondary data from the service firm. Last, given the cross-sectional nature of the study, it is hard to conclude specific causal implications of the research. Overall, while this study does suffer from limitations, they were either unavoidable given the nature of the study, or they can be accounted for in future research.

**Future Research**

Given the relative newness of intercustomer social support in the marketing literature, there is a wealth of future research streams that stem from the current research. First, managerial recommendations presented earlier in this chapter should be testing to determine what specific marketing functions can increase the customer’s connections with other customers. In other words, how much does programming, physical
environment, social media or incentives impact levels of intercustomer social support, and which one has the greatest impact? It is likely that the impact of each marketing function depends on the type of service environment. Future research should use current taxonomies of services and place them along a continuum of intercustomer social support. It may be that intercustomer social support is a key sustainable advantage in certain types of service firms; however, other firms gain nothing from it.

Along these same lines, future research should investigate in depth whether the quantity or quality of customer connections is more important. This research began to look at this idea through the actual number of connections versus the strength of ties; however, more research related to the quality of ties can be conducted. Specifically, what type of information flow needs to occur across customer connections in order to foster increased instrumental or social emotional support?

Another frequent question that arose during this research was the impact of negative intercustomer social support. When discussing the research topic with individuals, some responded that they are anti-social and do not like to connect with others. Future research should investigate these particular individuals to see their impact on the firm’s bottom line. Additionally, when researching the specific marketing functions that enhance intercustomer social support; it would be interesting to compare those classifying themselves as “anti-social” to the other customers.

As mentioned before, this research should investigate the impact of the strength of employee ties. While no impact was found for the number of employee ties, it might be that the strength of employee ties does moderate the relationship between customer ties and intercustomer social support. Depending on the results, this could have great managerial implications for service firms because it would be easier to train employee to develop strong ties, then it would be to encourage customers to interact.

Last, future research needs to investigate these research questions in other service contexts. Health club are a unique service environment where customers pay a recurring fee to continuously patronize the facility. Most service facilities do not have this type of payment structure. Additionally, health clubs require a strong, active participation in that customers exert physical energy to workout. Intercustomer social support research should be conducted in other settings to see if conclusions from this research can be generalized to other service contexts.
CHAPTER SUMMARY

This chapter has discussed the results presented in the previous chapter. The current research has both theoretical implications for the marketing literature, as well as recommendations for managers in the service industry. While this research does suffer from some limitations, there are many strong conclusions that can be drawn to contribute to marketing theory and to assist service managers in developing a sustainable competitive advantage. Future research should continue to investigate this concept in a wide range of services in order to enhance and contribute to the field of knowledge on intercustomer social support.
Appendix A: Measurement Items

**Customer-Company Identification**: Indicate the extent to which you agree/disagree with the following statements about this health club (7-point strongly disagree/agree).

1. I strongly identify with the LAC.
2. It feels good to be a member of the LAC.
3. I like to tell others that I am a member of the LAC.
4. The LAC fits well to me.
5. I feel attached to the LAC.

**Customer-Employee Identification**: Indicate the extent to which you agree/disagree with the following statements about the employees of this health club (7-point strong disagree/agree).

1. I strongly identify with employees of the LAC.
2. The employees of the LAC make me feel welcome as a member of the LAC.
3. I feel attached to the employees of the LAC.
4. When someone criticizes the LAC employees, it feels like a personal insult.
5. The LAC employees’ successes are also my successes.
6. When someone praises an LAC employee, it feels like a personal compliment.

**Customer-Customer Identification**: Indicate the extent to which you agree/disagree with the following statements about the other members of this health club (7-point strong disagree/agree).

1. I strongly identify with members of the LAC.
2. The members of the LAC make me feel welcome as a member of the LAC.
3. I feel attached to the members of the LAC.
4. When someone criticizes the members of the LAC, it feels like a personal insult.
5. Other members’ successes are also my successes.
6. When someone praises another LAC member, it feels like a personal compliment.

**Intercustomer Social Support**: Circle the number that best represents the frequency for the following questions. (1 = seldom or never (less than once a month); 2 = now and then (2-4 times/month); 3 = regularly (weekly); 4 = often (more than twice per week)

Social/Emotional Support: Items 1-11

Instrumental Support: Items 12-17

1. How often do members in the gym reassure you about things?
2. How often do members in the gym tell you not to lose courage?
3. How often do members in the gym perk you up or cheer you up?
4. How often do members in the gym give you advice in the right direction?
5. How often do members in the gym lend you a friendly ear?
6. How often do members in the gym show their understanding to you?
7. How often do members in the gym sympathize with you?
8. How often do members in the gym give you information or advice?
9. How often are members in the gym friendly to you?
10. How often do members in the gym make you feel at ease?
11. How often can you rely on other members in the gym?
12. How often do members from the gym lend you small amounts of money?
13. How often do members from the gym drop in to your home for a pleasant visit?
14. How often do members from the gym help you do odd jobs such as helping you move furniture, drive you somewhere, etc.?
15. How often do members from the gym lend you small things, like tools, or something like that?
16. How often do members in the gym lend you valuable things?
17. How often do you do things like walking, shopping, going to the movies or sports, etc. together with other members of the gym?

Network Ties

- Respondents will be asked to generate a list of other customers and employees with whom they interact (see Appendix B for roster)
- For each person listed, respondents will report:
  - The amount of information flow for this contact
  - The type of information (e.g. working out, social, or intimate information)
  - Communication frequency and type of relationship (to measure strength of ties)

Alternate Control Measure:

On average, how many people do you talk to during a typical visit to the Lexington Athletic Club?

_____ less than 1
_____ 1-3
_____ 4-6
_____ 7-9
_____ 10-12
_____ more than 12
**Satisfaction with the Health Club**: Indicate your level of satisfaction with the following items. How would you rate your satisfaction or dissatisfaction with regard to the following (7-point very dissatisfied/satisfied)

1. The workout/fitness equipment available.
2. The appearance of employees.
3. The ability of employees.
4. The performance of workout/fitness equipment.
5. The willingness of employees to provide service.
6. The promptness of employees.
7. The courtesy of employees.
8. The knowledge of employees.
9. The attention provided me by this health club.
10. The degree to which this health club cares about me.
11. This health club’s ability to correct service problems.

**Subjective Well Being**: Think back over the past 12 months, indicate whether you have felt the emotions expressed in each statement (1 = hardly ever; 2 = less than half the time; 3 = more than half the time; 4 = most of the time)

1. I felt reasonably relaxed. (+)
2. I felt tense, or on edge. (-)
3. I felt cheerful and light headed. (+)
4. I felt rather low. (-)
5. My health gave me no concern. (+)
6. I was worried about my health. (-)
7. I felt loved and appreciated. (+)
8. I felt quite lonely. (-)
9. Many interesting things happened. (+)
10. Life was rather boring. (-)
11. I had no problems handling my feelings. (+)
12. It took some efforts to keep my feelings under control. (-)
13. I have been feeling full of pep and energy. (+)
14. I felt exhausted, worn out or at the end of my rope. (-)

**Customer Referrals** (also data from club)

In the past two years, how many times have you received a free month of membership for referring a friend to this health club?

_____ Write in a number

**Weekly Patronage** (also data from club)

On average, how many times per week do you work out at this health club?

_____ Write in number (1-7 days)
**Monthly Expenditures** (also data from club)

Besides your membership fees, how much money do you spend **per month** on food, classes, drinks, and clothing at this health club?

_____ Write in monetary amount

**Future Behavioral Intentions:** How likely are you to do the following? (7-point: not at all likely/extremely likely).

1. To say positive things about the LAC to other people.
2. To recommend the LAC to someone who seeks my advice.
3. To encourage friends and relatives to do business with the LAC.
4. To consider the LAC as my first choice when deciding on a gym.
5. To do more business with the LAC in the next few years.
6. To do less business with the LAC in the next few years.
7. To take some of my business to a competitor of the LAC that offers better prices.
8. To continue to do business with the LAC even if its prices increased somewhat.
9. To pay higher prices for membership than competitors charge for the benefits that I currently receive from the LAC.
10. To switch to a competitor if I experienced a problem with the LAC.
11. To complain to other members if I experienced a problem with the LAC’s service.
12. To complain to external agencies, such as the Better Business Bureau, if I experienced a problem with the LAC.
13. To complain to employees if I experienced a problem with the LAC’s service.

**Future Intentions to Co-Create:** Indicate the extent to which you agree/disagree with the following statements (7-point strongly disagree/agree).

**Ability:** Items 1-3
**Role Clarity:** Items 4-8
**Future Intentions:** Items 9-12

1. I am fully capable of using the services of the LAC.
2. I am confident in my ability to use the services of the LAC.
3. Working out at the LAC is well within the scope of my abilities.
4. I feel certain about how to use the services of the LAC properly.
5. I am **NOT** sure how to use the services of the LAC club properly.
6. I know what is expected of me when I use the services of the LAC.
7. The steps and process to using the services of the LAC are clear to me.
8. Directions are vague regarding how to use the services of the LAC.
9. Continuing to attend the LAC would provide me with personal feelings of worthwhile accomplishment.
10. Continuing to attend the LAC would provide me with feelings of enjoyment.
11. Continuing to attend the LAC would provide me with feelings of independence.
12. Continuing to attend the LAC would allow me to have increased confidence in my skills.
**Relationship Duration** (also data from club)

How long have you been a member at the Lexington Athletic Club? If you joined within the last month, please enter 0-0. _____ years, and ____ months

**Familiarity** 5 point scale strongly disagree / agree

1. I have a lot of experience with health clubs.
2. I would describe myself as being very familiar with health clubs.
3. Health clubs are an everyday part of my life.

**Expertise** 9 point scale: very little / very much

1. How much do you feel you know about *working out at health clubs*?
2. Compared to your friends and acquaintances, how much do you feel you know about *working out at health clubs*?
3. Compared to a personal trainer, how much do you feel you know about *working out at health clubs*?

**Level of Extraversion**

Here are some characteristics that may or may not apply to you. For each statement, please indicate the extent to which you agree or disagree with that statement. (5 point scale: strongly disagree / strongly agree)

I see myself as someone who…

1. Is talkative
2. Is reserved (r)
3. Is full of energy
4. Generates a lot of enthusiasm
5. Tends to be quiet (r)
6. Has an assertive personality
7. Is sometimes shy, inhibited (r)
8. Is outgoing, sociable

**Demographics**

1. Age: ____________________ (write-in)
2. Gender: ____________________ (write-in)
3. What is your highest level of education?
   _____ High School
   _____ Some College
   _____ Associate Degree
   _____ Bachelor Degree
   _____ Masters
   _____ PhD, M.D., Doctorate
4. Which of the following categories best describes your total household income from all sources for the year 2009?
   _____ Less than $25,000
   _____ $25,000-$49,999
   _____ $50,000-$74,999
   _____ $75,000-$99,999
   _____ $100,000-$149,999
   _____ $150,000-$199,999
   _____ $200,000-$249,999
   _____ More than $250,000

5. Including yourself, how many members of your family are members of this health club?
   _____ 1 (I am the only member)
   _____ 2
   _____ 3
   _____ 4
   _____ 5+

6. If you use Facebook, how often do you interact with other health club members via this mechanism (Facebook):
   _____ I do not use Facebook
   _____ Once a month
   _____ Once every two weeks
   _____ 1-2 times per week
   _____ 3-4 times per week
   _____ 5-6 times per week
   _____ Daily
   _____ Multiple times per day
Appendix B: Survey Instrument

Dear LAC Member,

Thank you for participating in this survey. This survey is being conducted by a graduate student in the Gatton College of Business and Economics, University of Kentucky. The graduate student is conducting this research for fulfillment of her doctoral degree in marketing under the guidance of three faculty members. The purpose of this research is to examine factors that impact how much members interact with other members in a health club setting.

Although you will not get personal benefit from taking part in this research study, your responses may help us to understand more about how customers interact in a service setting.

The survey will ask you a series of questions that will take you approximately 20 minutes to complete. You will be asked to list members and employees who you interact with at LAC. Please do not list the individual’s real name. Please use initials or aliases in order to protect the identities of others.

Upon completion of the survey, you will be asked for your membership number. This membership number will only be used to generate a visit history report from Lexington Athletic Club. Lexington Athletic Club will not have access to this survey, and the researcher will not have access to membership names. The only information that LAC will be given is a list of membership numbers. It will not be possible for the researcher, Hulda Black, to connect your membership number with your name. All information collected from the survey will be maintained under lock and key by the researcher. No other party will have access to the information.

Your responses to this survey will be anonymous which means no names will appear or be used on research documents. The research team will not know that any information provided came from you, nor even whether you participated in the study.

Participation in this survey is completely voluntary; refusal to participate will involve no penalty or loss of benefits. You may discontinue participation in the survey at any time without penalty or loss. There are no known risks to participating in this study. No parts of this survey are experimental.

If you have any questions regarding participating in this survey, please contact the researcher, Hulda Black at huldagblack@uky.edu (616-318-3842). If you have concerns regarding your rights as a participant, please contact the University of Kentucky’s Office of Research Integrity at 859-257-9428 or toll free at 866-400-9428.

Before continuing with the survey, please have your membership number or your check-in card number ready. If you do not know your membership number, please obtain it from the front desk prior to continuing.

By continuing with this survey, you are consenting to participate in this research study.
Section I: Member & Employee Relationships:
In the left hand column, please list initials or aliases of all LAC members and employees (membership, front desk, personal trainers, aerobics, etc.) with whom you interact. It is important that you list as many members as possible regardless of how little or how much you interact with them. To ensure confidentiality, please do not list the real names; list initials or an alias name.

<table>
<thead>
<tr>
<th>Member or Employee Initials/Aliases</th>
<th>Is this person a member or employee?</th>
<th>Frequency of contact with this person? (1=very low, 5=very high)</th>
<th>Relationship with this Person?</th>
<th>How valuable is this relationship? (1=not valuable, 5=very valuable)</th>
<th>How often do you discuss the following with this person? (1=not at all, 5=frequently)</th>
</tr>
</thead>
<tbody>
<tr>
<td>1.</td>
<td>☐ Member ☐ Employee</td>
<td>1 2 3 4 5</td>
<td>☐ Close acquaintance</td>
<td>1 2 3 4 5</td>
<td>Working Out 1 2 3 4 5 Social Activities 1 2 3 4 5 Personal Issues 1 2 3 4 5</td>
</tr>
<tr>
<td>2.</td>
<td>☐ Member ☐ Employee</td>
<td>1 2 3 4 5</td>
<td>☐ Close acquaintance</td>
<td>1 2 3 4 5</td>
<td>Working Out 1 2 3 4 5 Social Activities 1 2 3 4 5 Personal Issues 1 2 3 4 5</td>
</tr>
<tr>
<td>3.</td>
<td>☐ Member ☐ Employee</td>
<td>1 2 3 4 5</td>
<td>☐ Close acquaintance</td>
<td>1 2 3 4 5</td>
<td>Working Out 1 2 3 4 5 Social Activities 1 2 3 4 5 Personal Issues 1 2 3 4 5</td>
</tr>
<tr>
<td>4.</td>
<td>☐ Member ☐ Employee</td>
<td>1 2 3 4 5</td>
<td>☐ Close acquaintance</td>
<td>1 2 3 4 5</td>
<td>Working Out 1 2 3 4 5 Social Activities 1 2 3 4 5 Personal Issues 1 2 3 4 5</td>
</tr>
<tr>
<td>5.</td>
<td>☐ Member ☐ Employee</td>
<td>1 2 3 4 5</td>
<td>☐ Close acquaintance</td>
<td>1 2 3 4 5</td>
<td>Working Out 1 2 3 4 5 Social Activities 1 2 3 4 5 Personal Issues 1 2 3 4 5</td>
</tr>
<tr>
<td>6.</td>
<td>☐ Member ☐ Employee</td>
<td>1 2 3 4 5</td>
<td>☐ Close acquaintance</td>
<td>1 2 3 4 5</td>
<td>Working Out 1 2 3 4 5 Social Activities 1 2 3 4 5 Personal Issues 1 2 3 4 5</td>
</tr>
<tr>
<td>7.</td>
<td>☐ Member ☐ Employee</td>
<td>1 2 3 4 5</td>
<td>☐ Close acquaintance</td>
<td>1 2 3 4 5</td>
<td>Working Out 1 2 3 4 5 Social Activities 1 2 3 4 5 Personal Issues 1 2 3 4 5</td>
</tr>
<tr>
<td>8.</td>
<td>☐ Member ☐ Employee</td>
<td>1 2 3 4 5</td>
<td>☐ Close acquaintance</td>
<td>1 2 3 4 5</td>
<td>Working Out 1 2 3 4 5 Social Activities 1 2 3 4 5 Personal Issues 1 2 3 4 5</td>
</tr>
<tr>
<td>9.</td>
<td>☐ Member ☐ Employee</td>
<td>1 2 3 4 5</td>
<td>☐ Close acquaintance</td>
<td>1 2 3 4 5</td>
<td>Working Out 1 2 3 4 5 Social Activities 1 2 3 4 5 Personal Issues 1 2 3 4 5</td>
</tr>
<tr>
<td>10.</td>
<td>☐ Member ☐ Employee</td>
<td>1 2 3 4 5</td>
<td>☐ Close acquaintance</td>
<td>1 2 3 4 5</td>
<td>Working Out 1 2 3 4 5 Social Activities 1 2 3 4 5 Personal Issues 1 2 3 4 5</td>
</tr>
</tbody>
</table>
Member & Employee Relationships Continued: Please continue to list names on this page. If you need additional pages, please ask the distributor.

<table>
<thead>
<tr>
<th>Member or Employee Initials/Aliases</th>
<th>Is this person a member or employee?</th>
<th>Frequency of contact with this person? (1=very low, 5=very high)</th>
<th>Relationship with this Person?</th>
<th>How valuable is this relationship? (1=not valuable, 5=very valuable)</th>
<th>How often do you discuss the following with this person? (1=not at all, 5=frequently)</th>
</tr>
</thead>
<tbody>
<tr>
<td>11.</td>
<td>Member Employee 1 2 3 4 5</td>
<td>□ Close acquaintance □ Casual acquaintance □ Barely know this person</td>
<td>1 2 3 4 5</td>
<td>Working Out 1 2 3 4 5</td>
<td>Social Activities 1 2 3 4 5, Personal Issues 1 2 3 4 5</td>
</tr>
<tr>
<td>12.</td>
<td>Member Employee 1 2 3 4 5</td>
<td>□ Close acquaintance □ Casual acquaintance □ Barely know this person</td>
<td>1 2 3 4 5</td>
<td>Working Out 1 2 3 4 5</td>
<td>Social Activities 1 2 3 4 5, Personal Issues 1 2 3 4 5</td>
</tr>
<tr>
<td>13.</td>
<td>Member Employee 1 2 3 4 5</td>
<td>□ Close acquaintance □ Casual acquaintance □ Barely know this person</td>
<td>1 2 3 4 5</td>
<td>Working Out 1 2 3 4 5</td>
<td>Social Activities 1 2 3 4 5, Personal Issues 1 2 3 4 5</td>
</tr>
<tr>
<td>14.</td>
<td>Member Employee 1 2 3 4 5</td>
<td>□ Close acquaintance □ Casual acquaintance □ Barely know this person</td>
<td>1 2 3 4 5</td>
<td>Working Out 1 2 3 4 5</td>
<td>Social Activities 1 2 3 4 5, Personal Issues 1 2 3 4 5</td>
</tr>
<tr>
<td>15.</td>
<td>Member Employee 1 2 3 4 5</td>
<td>□ Close acquaintance □ Casual acquaintance □ Barely know this person</td>
<td>1 2 3 4 5</td>
<td>Working Out 1 2 3 4 5</td>
<td>Social Activities 1 2 3 4 5, Personal Issues 1 2 3 4 5</td>
</tr>
<tr>
<td>16.</td>
<td>Member Employee 1 2 3 4 5</td>
<td>□ Close acquaintance □ Casual acquaintance □ Barely know this person</td>
<td>1 2 3 4 5</td>
<td>Working Out 1 2 3 4 5</td>
<td>Social Activities 1 2 3 4 5, Personal Issues 1 2 3 4 5</td>
</tr>
<tr>
<td>17.</td>
<td>Member Employee 1 2 3 4 5</td>
<td>□ Close acquaintance □ Casual acquaintance □ Barely know this person</td>
<td>1 2 3 4 5</td>
<td>Working Out 1 2 3 4 5</td>
<td>Social Activities 1 2 3 4 5, Personal Issues 1 2 3 4 5</td>
</tr>
<tr>
<td>18.</td>
<td>Member Employee 1 2 3 4 5</td>
<td>□ Close acquaintance □ Casual acquaintance □ Barely know this person</td>
<td>1 2 3 4 5</td>
<td>Working Out 1 2 3 4 5</td>
<td>Social Activities 1 2 3 4 5, Personal Issues 1 2 3 4 5</td>
</tr>
<tr>
<td>19.</td>
<td>Member Employee 1 2 3 4 5</td>
<td>□ Close acquaintance □ Casual acquaintance □ Barely know this person</td>
<td>1 2 3 4 5</td>
<td>Working Out 1 2 3 4 5</td>
<td>Social Activities 1 2 3 4 5, Personal Issues 1 2 3 4 5</td>
</tr>
<tr>
<td>20.</td>
<td>Member Employee 1 2 3 4 5</td>
<td>□ Close acquaintance □ Casual acquaintance □ Barely know this person</td>
<td>1 2 3 4 5</td>
<td>Working Out 1 2 3 4 5</td>
<td>Social Activities 1 2 3 4 5, Personal Issues 1 2 3 4 5</td>
</tr>
</tbody>
</table>

If you still have more names to write down, please obtain another sheet from the administrator. It is crucial to write down all possible names.
Section II: Circle the number that best represents the frequency for the following questions.
1 = never; 2 = rarely; 3 = now and then; 4 = frequently

<table>
<thead>
<tr>
<th>Question</th>
<th>Never</th>
<th>Rarely</th>
<th>Now and then</th>
<th>Frequently</th>
</tr>
</thead>
<tbody>
<tr>
<td>1. How often do members at LAC reassure you about things?</td>
<td>1</td>
<td>2</td>
<td>3</td>
<td>4</td>
</tr>
<tr>
<td>2. How often do members at LAC tell you not to lose courage?</td>
<td>1</td>
<td>2</td>
<td>3</td>
<td>4</td>
</tr>
<tr>
<td>3. How often do members at LAC perk you up or cheer you up?</td>
<td>1</td>
<td>2</td>
<td>3</td>
<td>4</td>
</tr>
<tr>
<td>4. How often do members at LAC give you advice in the right direction?</td>
<td>1</td>
<td>2</td>
<td>3</td>
<td>4</td>
</tr>
<tr>
<td>5. How often do members at LAC lend you a friendly ear?</td>
<td>1</td>
<td>2</td>
<td>3</td>
<td>4</td>
</tr>
<tr>
<td>6. How often do members at LAC show their understanding to you?</td>
<td>1</td>
<td>2</td>
<td>3</td>
<td>4</td>
</tr>
<tr>
<td>7. How often do members at LAC sympathize with you?</td>
<td>1</td>
<td>2</td>
<td>3</td>
<td>4</td>
</tr>
<tr>
<td>8. How often do members at LAC give you information or advice?</td>
<td>1</td>
<td>2</td>
<td>3</td>
<td>4</td>
</tr>
<tr>
<td>9. How often are members at LAC friendly to you?</td>
<td>1</td>
<td>2</td>
<td>3</td>
<td>4</td>
</tr>
<tr>
<td>10. How often do members at LAC make you feel at ease?</td>
<td>1</td>
<td>2</td>
<td>3</td>
<td>4</td>
</tr>
<tr>
<td>11. How often can you rely on other members at LAC?</td>
<td>1</td>
<td>2</td>
<td>3</td>
<td>4</td>
</tr>
<tr>
<td>12. How often do members at LAC lend you small amounts of money?</td>
<td>1</td>
<td>2</td>
<td>3</td>
<td>4</td>
</tr>
<tr>
<td>13. How often do LAC members drop in to your home for a pleasant visit?</td>
<td>1</td>
<td>2</td>
<td>3</td>
<td>4</td>
</tr>
<tr>
<td>14. How often do LAC members help you do odd jobs such as helping you move furniture, drive you somewhere, etc.?</td>
<td>1</td>
<td>2</td>
<td>3</td>
<td>4</td>
</tr>
<tr>
<td>15. How often do LAC members lend you small things, like tools, or something like that?</td>
<td>1</td>
<td>2</td>
<td>3</td>
<td>4</td>
</tr>
<tr>
<td>16. How often do LAC members lend you valuable things?</td>
<td>1</td>
<td>2</td>
<td>3</td>
<td>4</td>
</tr>
<tr>
<td>17. How often do you do things like walking, shopping, going to the movies or sports, etc. together with other members of LAC?</td>
<td>1</td>
<td>2</td>
<td>3</td>
<td>4</td>
</tr>
</tbody>
</table>
Section III: Indicate the extent to which you agree/disagree with the following statements.

<table>
<thead>
<tr>
<th>Statement</th>
<th>Strongly disagree</th>
<th>Neither agree nor disagree</th>
<th>Strongly agree</th>
</tr>
</thead>
<tbody>
<tr>
<td>1. I strongly identify with the LAC.</td>
<td>1</td>
<td>2</td>
<td>3</td>
</tr>
<tr>
<td>2. It feels good to be a member of LAC.</td>
<td>1</td>
<td>2</td>
<td>3</td>
</tr>
<tr>
<td>3. I like to tell others that I am a member of LAC.</td>
<td>1</td>
<td>2</td>
<td>3</td>
</tr>
<tr>
<td>4. LAC is a good fit for me.</td>
<td>1</td>
<td>2</td>
<td>3</td>
</tr>
<tr>
<td>5. I feel attached to LAC.</td>
<td>1</td>
<td>2</td>
<td>3</td>
</tr>
<tr>
<td>6. I strongly identify with the employees of LAC.</td>
<td>1</td>
<td>2</td>
<td>3</td>
</tr>
<tr>
<td>7. The employees of LAC make me feel welcome to be a member of LAC.</td>
<td>1</td>
<td>2</td>
<td>3</td>
</tr>
<tr>
<td>8. I feel attached to the employees of LAC.</td>
<td>1</td>
<td>2</td>
<td>3</td>
</tr>
<tr>
<td>9. When someone criticizes LAC employees, it feels like a personal insult.</td>
<td>1</td>
<td>2</td>
<td>3</td>
</tr>
<tr>
<td>10. LAC employees’ successes are also my successes.</td>
<td>1</td>
<td>2</td>
<td>3</td>
</tr>
<tr>
<td>11. When someone praises an LAC employee, it feels like a personal compliment.</td>
<td>1</td>
<td>2</td>
<td>3</td>
</tr>
<tr>
<td>12. I strongly identify with members of LAC.</td>
<td>1</td>
<td>2</td>
<td>3</td>
</tr>
<tr>
<td>13. The members of LAC make me feel welcome to be a member of LAC.</td>
<td>1</td>
<td>2</td>
<td>3</td>
</tr>
<tr>
<td>14. I feel attached to the members of LAC.</td>
<td>1</td>
<td>2</td>
<td>3</td>
</tr>
<tr>
<td>15. When someone criticizes the members of LAC, it feels like a personal insult.</td>
<td>1</td>
<td>2</td>
<td>3</td>
</tr>
<tr>
<td>16. Other members’ successes are also my successes.</td>
<td>1</td>
<td>2</td>
<td>3</td>
</tr>
<tr>
<td>17. When someone praises another LAC member, it feels like a personal compliment.</td>
<td>1</td>
<td>2</td>
<td>3</td>
</tr>
<tr>
<td>18. I am fully capable of using the services of LAC.</td>
<td>1</td>
<td>2</td>
<td>3</td>
</tr>
<tr>
<td>19. I am confident in my ability to use the services of LAC.</td>
<td>1</td>
<td>2</td>
<td>3</td>
</tr>
<tr>
<td>20. Working out at LAC is well within the scope of my abilities.</td>
<td>1</td>
<td>2</td>
<td>3</td>
</tr>
<tr>
<td>21. I feel certain about how to use the services of LAC properly.</td>
<td>1</td>
<td>2</td>
<td>3</td>
</tr>
<tr>
<td>22. I know what is expected of me when I use the services of LAC.</td>
<td>1</td>
<td>2</td>
<td>3</td>
</tr>
<tr>
<td>23. The steps to using the services of LAC are clear to me.</td>
<td>1</td>
<td>2</td>
<td>3</td>
</tr>
<tr>
<td>24. Directions are vague regarding how to use the services of LAC.</td>
<td>1</td>
<td>2</td>
<td>3</td>
</tr>
<tr>
<td>25. I am NOT sure how to use the services of LAC properly.</td>
<td>1</td>
<td>2</td>
<td>3</td>
</tr>
<tr>
<td>26. Continuing to attend LAC would provide me with personal feelings of worthwhile accomplishment.</td>
<td>1</td>
<td>2</td>
<td>3</td>
</tr>
<tr>
<td>27. Continuing to attend LAC would provide me with feelings of enjoyment.</td>
<td>1</td>
<td>2</td>
<td>3</td>
</tr>
<tr>
<td>28. Continuing to attend LAC would provide me with feelings of independence.</td>
<td>1</td>
<td>2</td>
<td>3</td>
</tr>
<tr>
<td>29. Continuing to attend LAC would allow me to have increased confidence in my skills.</td>
<td>1</td>
<td>2</td>
<td>3</td>
</tr>
</tbody>
</table>

Continued
Section IV:

How likely are you to do the following?

<table>
<thead>
<tr>
<th></th>
<th>Not likely at all</th>
<th>Neither likely nor un-likely</th>
<th>Extremely likely</th>
</tr>
</thead>
<tbody>
<tr>
<td>1.</td>
<td>1</td>
<td>2</td>
<td>3</td>
</tr>
<tr>
<td>2.</td>
<td>4</td>
<td>5</td>
<td>6</td>
</tr>
<tr>
<td>3.</td>
<td>7</td>
<td></td>
<td></td>
</tr>
</tbody>
</table>

Indicate your level of satisfaction with the following items at LAC. How would you rate your satisfaction or dissatisfaction with LAC with regard to:

<table>
<thead>
<tr>
<th></th>
<th>Very dissatisfied</th>
<th>Neither satisfied Nor dissatisfied</th>
<th>Very satisfied</th>
</tr>
</thead>
<tbody>
<tr>
<td>1.</td>
<td>1</td>
<td>2</td>
<td>3</td>
</tr>
<tr>
<td>2.</td>
<td>4</td>
<td>5</td>
<td>6</td>
</tr>
<tr>
<td>3.</td>
<td>7</td>
<td></td>
<td></td>
</tr>
</tbody>
</table>

<table>
<thead>
<tr>
<th></th>
<th>1</th>
<th>2</th>
<th>3</th>
</tr>
</thead>
<tbody>
<tr>
<td>4.</td>
<td>7</td>
<td></td>
<td></td>
</tr>
</tbody>
</table>

<table>
<thead>
<tr>
<th></th>
<th>1</th>
<th>2</th>
<th>3</th>
</tr>
</thead>
<tbody>
<tr>
<td>5.</td>
<td>7</td>
<td></td>
<td></td>
</tr>
</tbody>
</table>

<table>
<thead>
<tr>
<th></th>
<th>1</th>
<th>2</th>
<th>3</th>
</tr>
</thead>
<tbody>
<tr>
<td>6.</td>
<td>7</td>
<td></td>
<td></td>
</tr>
</tbody>
</table>

<table>
<thead>
<tr>
<th></th>
<th>1</th>
<th>2</th>
<th>3</th>
</tr>
</thead>
<tbody>
<tr>
<td>7.</td>
<td>7</td>
<td></td>
<td></td>
</tr>
</tbody>
</table>

<table>
<thead>
<tr>
<th></th>
<th>1</th>
<th>2</th>
<th>3</th>
</tr>
</thead>
<tbody>
<tr>
<td>8.</td>
<td>7</td>
<td></td>
<td></td>
</tr>
</tbody>
</table>

<table>
<thead>
<tr>
<th></th>
<th>1</th>
<th>2</th>
<th>3</th>
</tr>
</thead>
<tbody>
<tr>
<td>9.</td>
<td>7</td>
<td></td>
<td></td>
</tr>
</tbody>
</table>

<table>
<thead>
<tr>
<th></th>
<th>1</th>
<th>2</th>
<th>3</th>
</tr>
</thead>
<tbody>
<tr>
<td>10.</td>
<td>7</td>
<td></td>
<td></td>
</tr>
</tbody>
</table>

<table>
<thead>
<tr>
<th></th>
<th>1</th>
<th>2</th>
<th>3</th>
</tr>
</thead>
<tbody>
<tr>
<td>11.</td>
<td>7</td>
<td></td>
<td></td>
</tr>
</tbody>
</table>
**Section V:**

Answer the following three questions using the scale provided below:

<table>
<thead>
<tr>
<th>Question</th>
<th>Very little 1 2 3 4 5 6 7 8 9</th>
</tr>
</thead>
<tbody>
<tr>
<td>1. How much do you feel you know about working out at health clubs?</td>
<td>1 2 3 4 5 6 7 8 9</td>
</tr>
<tr>
<td>2. Compared to your friends and acquaintances, how much do you feel you know about working out at health clubs?</td>
<td>1 2 3 4 5 6 7 8 9</td>
</tr>
<tr>
<td>3. Compared to a personal trainer, how much do you feel you know about working out at health clubs?</td>
<td>1 2 3 4 5 6 7 8 9</td>
</tr>
</tbody>
</table>

Indicate the extent to which you agree/disagree with the following statements.

<table>
<thead>
<tr>
<th>Statement</th>
<th>Strongly disagree 1 2 3 4 5</th>
<th>Neither agree</th>
<th>Strongly agree</th>
</tr>
</thead>
<tbody>
<tr>
<td>1. I have a lot of experience with health clubs.</td>
<td>1 2 3 4 5</td>
<td></td>
<td></td>
</tr>
<tr>
<td>2. I would describe myself as being very familiar with health clubs.</td>
<td>1 2 3 4 5</td>
<td></td>
<td></td>
</tr>
<tr>
<td>3. Health clubs are an everyday part of my life.</td>
<td>1 2 3 4 5</td>
<td></td>
<td></td>
</tr>
<tr>
<td>4. I see myself as someone who is talkative.</td>
<td>1 2 3 4 5</td>
<td></td>
<td></td>
</tr>
<tr>
<td>5. I see myself as someone who is reserved.</td>
<td>1 2 3 4 5</td>
<td></td>
<td></td>
</tr>
<tr>
<td>6. I see myself as someone who is full of energy.</td>
<td>1 2 3 4 5</td>
<td></td>
<td></td>
</tr>
<tr>
<td>7. I see myself as someone who generates a lot of enthusiasm.</td>
<td>1 2 3 4 5</td>
<td></td>
<td></td>
</tr>
<tr>
<td>8. I see myself as someone who tends to be quiet.</td>
<td>1 2 3 4 5</td>
<td></td>
<td></td>
</tr>
<tr>
<td>9. I see myself as someone who has an assertive personality.</td>
<td>1 2 3 4 5</td>
<td></td>
<td></td>
</tr>
<tr>
<td>10. I see myself as someone who is sometimes shy, inhibited.</td>
<td>1 2 3 4 5</td>
<td></td>
<td></td>
</tr>
<tr>
<td>11. I see myself as someone who is outgoing, sociable.</td>
<td>1 2 3 4 5</td>
<td></td>
<td></td>
</tr>
</tbody>
</table>

The focus of the following questions is on you, not health clubs or LAC. Think back over the past 12 months of your life; indicate the extent to which you have felt the emotions expressed below:

<table>
<thead>
<tr>
<th>Emotion</th>
<th>Hardly Ever 1 2 3 4</th>
<th>Less than half the time 1 2 3 4</th>
<th>More than half the time 1 2 3 4</th>
<th>Most of the time 1 2 3 4</th>
</tr>
</thead>
<tbody>
<tr>
<td>1. I felt reasonably relaxed.</td>
<td>1 2 3 4</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>2. I felt tense, or on edge.</td>
<td>1 2 3 4</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>3. I felt cheerful and light headed.</td>
<td>1 2 3 4</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>4. I felt rather low.</td>
<td>1 2 3 4</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>5. My health gave me no concern.</td>
<td>1 2 3 4</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>6. I was worried about my health.</td>
<td>1 2 3 4</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>7. I felt loved and appreciated.</td>
<td>1 2 3 4</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>8. I felt quite lonely.</td>
<td>1 2 3 4</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>9. Many interesting things happened.</td>
<td>1 2 3 4</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>10. Life was rather boring.</td>
<td>1 2 3 4</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>11. I was easily able to handle my feelings.</td>
<td>1 2 3 4</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>12. It took some effort to keep my feelings under control.</td>
<td>1 2 3 4</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>13. I have been feeling full of pep and energy.</td>
<td>1 2 3 4</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>14. I felt exhausted, worn out or at the end of my rope.</td>
<td>1 2 3 4</td>
<td></td>
<td></td>
<td></td>
</tr>
</tbody>
</table>
**Section VI: Please answer the following questions about yourself.**

1. In the past year, how many times have you received a free month of membership or gift for referring a friend to LAC? _______ Write in a number

2. On average, how many times per week do you workout at Lexington Athletic Club? _______ Write in number

3. At LAC, how much money do you spend on average per month on the following? (write in monetary amount)
   - Food (juice bar/front desk) $_________
   - Personal Training $_________
   - Children’s Programming (Kids Place, Swim Lessons, etc.) $_________

4. How long have you been a member of Lexington Athletic Club? If you joined within the last month, please enter 0 years, and 0 months. _______ years, and _______ months

5. On average, how many members do you talk to during a typical visit to Lexington Athletic Club?
   - _____ less than 1
   - _____ 1-3
   - _____ 4-6
   - _____ 7-9
   - _____ 10-12
   - _____ more than 12

6. Gender: _____ Male _____ Female

7. Age: ____________________

8. Please check you highest level of education?
   - _____ Less than High School
   - _____ Associates Degree
   - _____ Masters Degree
   - _____ High School
   - _____ Bachelors Degree
   - _____ PhD, M.D., Doctorate
   - _____ Some College
   - _____ Some Graduate School

9. Which of the following best describes your total household income from all sources for the year 2009?
   - _____ Less than $49,999
   - _____ $100,000-$149,999
   - _____ $200,000-$249,999
   - _____ $50,000-$99,999
   - _____ $150,000-$199,999
   - _____ More than $250,000

10. Including yourself, how many members of your family are members of this health club?
    - _____ 1 (I am the only member)
    - _____ 2
    - _____ 3
    - _____ 4
    - _____ 5+

11. If you use Facebook, how often do you interact with other LAC members on Facebook:
    - _____ I do not use Facebook
    - _____ 1-2 times per week
    - _____ 5-6 times per week
    - _____ Less than once a week
    - _____ 3-4 times per week
    - _____ 7 or more times per week

12. LAC Check-in Number (underneath barcode on back of check-in tag):

    _______________

    This information is necessary for survey, please see survey administrator if you do not know your #.

    -Thank you for completing this survey-
## Appendix C: Correlation Matrix

|                           | Mean | SD    | 1    | 2    | 3    | 4    | 5    | 6    | 7    | 8    | 9    | 10   | 11   | 12   | 13   | 14   | 15   | 16   | 17   | 18   | 19   | 20   | 21   | 22   | 23   |
|---------------------------|------|-------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|
| Customer Company Identification | 5.87 | 0.99  | 1.00 |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |
| Customer Employee          | 4.24 | 1.37  | 0.63 | 1.00 |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |
| Customer Customer Identification | 4.53 | 1.30  | 0.56 | 0.69 | 1.00 |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |
| Customer Ties              | 6.13 | 5.25  | 0.15 | 0.12 | 0.27 | 1.00 |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |
| Amount of Information      | 8.99 | 2.74  | 0.10 | 0.10 | 0.15 | -0.08 | 1.00 |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |
| Instrumental ISS           | 1.58 | 0.70  | 0.23 | 0.16 | 0.39 | 0.29 | 0.31 | 1.00 |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |
| Social Emotional ISS       | 2.76 | 0.78  | 0.37 | 0.42 | 0.58 | 0.39 | 0.18 | 0.45 | 1.00 |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |
| Patronage                  | 65.90 | 46.40 | 0.15 | 0.17 | 0.14 | 0.31 | -0.04 | 0.07 | 0.16 | 1.00 |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |
| Well Being                 | 3.13 | 0.54  | 0.10 | 0.09 | 0.15 | 0.16 | 0.02 | 0.15 | 0.17 | 0.25 | 1.00 |      |      |      |      |      |      |      |      |      |      |      |      |      |      |
| Satisfaction               | 5.75 | 1.09  | 0.54 | 0.64 | 0.44 | 0.02 | 0.06 | 0.14 | 0.31 | -0.04 | 0.08 | 1.00 |      |      |      |      |      |      |      |      |      |      |      |      |      |
| Customer Referrals         | 0.54 | 0.93  | 0.09 | 0.05 | 0.04 | 0.06 | 0.07 | 0.12 | 0.10 | 0.19 | -0.01 | 0.08 | 1.00 |      |      |      |      |      |      |      |      |      |      |      |      |
| Expenditures               | 602.55 | 278.80 | -0.12 | -0.03 | -0.04 | 0.10 | 0.00 | 0.06 | -0.01 | 0.06 | 0.08 | -0.03 | 0.16 | 1.00 |      |      |      |      |      |      |      |      |      |      |
| Loyalty                    | 6.37 | 0.83  | 0.66 | 0.48 | 0.36 | 0.12 | 0.03 | 0.18 | 0.24 | 0.14 | 0.10 | 0.61 | 0.04 | -0.01 | 1.00 |      |      |      |      |      |      |      |      |
| Switch                     | 1.84 | 1.20  | -0.43 | -0.28 | -0.22 | -0.11 | 0.07 | -0.07 | -0.12 | -0.16 | -0.15 | -0.31 | -0.07 | -0.04 | -0.52 | 1.00 |      |      |      |      |      |      |      |
| PayMore                    | 4.22 | 1.65  | 0.35 | 0.35 | 0.30 | 0.12 | 0.05 | 0.11 | 0.14 | 0.14 | 0.10 | 0.34 | 0.04 | 0.07 | 0.32 | -0.29 | 1.00 |      |      |      |      |      |      |      |
| Complain                   | 3.96 | 1.34  | -0.30 | -0.35 | -0.19 | 0.01 | 0.05 | 0.01 | -0.04 | -0.11 | -0.07 | -0.31 | -0.02 | 0.03 | -0.24 | 0.31 | -0.31 | 1.00 |      |      |      |      |      |
| Ability Future Co-creation | 6.30 | 1.00  | 0.50 | 0.34 | 0.31 | 0.14 | -0.02 | 0.13 | 0.17 | 0.13 | 0.25 | 0.42 | 0.01 | 0.03 | 0.50 | -0.30 | 0.25 | -0.09 | 1.00 |      |      |      |      |
| Role Clarity Future Co-Creation | 5.89 | 1.12  | 0.39 | 0.31 | 0.18 | 0.08 | -0.02 | 0.03 | 0.07 | 0.15 | 0.19 | 0.45 | 0.00 | -0.07 | 0.46 | -0.31 | 0.27 | -0.22 | 0.68 | 1.00 |      |      |      |
| Perceived Value Future Co-creation | 5.92 | 1.09  | 0.60 | 0.44 | 0.47 | 0.12 | 0.04 | 0.19 | 0.30 | 0.14 | 0.09 | 0.43 | -0.05 | -0.11 | 0.54 | -0.30 | 0.23 | -0.16 | 0.46 | 0.29 | 1.00 |      |      |
| Length of Relationship     | 57.14 | 64.27 | 0.06 | 0.08 | 0.07 | 0.32 | -0.11 | -0.06 | 0.13 | 0.26 | 0.05 | 0.02 | 0.02 | 0.11 | 0.05 | -0.13 | 0.15 | -0.02 | 0.06 | 0.02 | 0.02 | 1.00 |      |
| Familiarity                | 3.92 | 0.91  | 0.10 | 0.12 | 0.09 | 0.10 | 0.00 | 0.04 | 0.02 | 0.16 | 0.27 | 0.01 | -0.11 | -0.01 | 0.09 | 0.01 | 0.02 | 0.09 | 0.22 | 0.23 | 0.11 | 0.08 | 1.00 |      |
| Expertise                  | 6.54 | 1.52  | 0.20 | 0.20 | 0.10 | 0.05 | 0.03 | 0.05 | 0.07 | 0.20 | 0.29 | 0.17 | -0.10 | 0.02 | 0.19 | -0.12 | 0.06 | -0.01 | 0.31 | 0.34 | 0.19 | 0.09 | 0.70 | 1.00 |      |
| Extroversion               | 3.55 | 0.88  | 0.23 | 0.16 | 0.22 | 0.06 | 0.15 | 0.20 | 0.22 | -0.11 | 0.12 | 0.15 | 0.03 | -0.05 | 0.20 | -0.04 | 0.11 | -0.03 | 0.17 | 0.15 | 0.17 | -0.03 | 0.16 | 0.15 | 1.00 |      |
REFERENCES


Cronbach, Lee J. (1951), "Coefficient Alpha and the Internal Structure of Test," Psychometrika, 16 (September), 297-334.


Reingen, Peter H. and Jerome B. Kernan (1986), "Analysis of Referral Networks in Marketing: Methods and Illustrations," Journal of Marketing Research, 23 (November), 370-78.


VITA

Birthplace
East Grand Rapids, MI
May 29, 1980

Education
Graduate Certificate in Health Communication, 2008
Graduate Certificate in Applied Statistics, 2007
University of Kentucky, Lexington, KY

Master of Business Administration, Siedman College of Business, Grand Valley State University, Grand Rapids, MI, 2004
Bachelor of Science, Marketing, Ferris State University, Big Rapids, MI, 2002

Experience
Research/Teaching Assistant, August 2006 – May 2010
University of Kentucky, Lexington, KY

Director of Operations, August 2002 - July 2006
Champion Health and Fitness, Rockford, MI