

# CUSTOMER LOYALTY: INFLUENCES ON THREE TYPES OF RETAIL STORES' SHOPPERS

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## ABSTRACT

*Customer loyalty is a major factor for a firm's success. Loyal customers are less price sensitive. Furthermore, these customers are likely to purchase more frequently, try the firms' other products and bring new customers to the firm. This study examines the relationship of shoppers' characteristics and behavior, and customers' perception of marketing strategy (product, price, place, promotion), customer value (quality, sacrifice) and relationship quality on customer loyalty. Depending on the type of retail store, convenience, department and hypermarket stores' loyalty is influenced by several factors, including different marketing strategies (price deals, distribution intensity) and relationship quality (customer satisfaction, trust, commitment). The results have particular implications for further research and for marketing managers.*

**JEL:** M31

**KEYWORDS:** Customer loyalty, marketing strategy, perceived value, relationship quality

## INTRODUCTION

Loyal customers provide companies a consistent revenue base and reduced expenses. An improvement of 5% in customer retention leads to an increase of 25% to 75% in profits (Reichheld and Sasser, 1990). Furthermore, a firm spends more than five times as much to obtain a new customer than to retain an existing one (Wills, 2009). Moreover, companies can increase revenues with loyal customers. For example, loyal customers are less price sensitive (Reichheld and Teal, 1996). In addition, loyal customers are likely to purchase more frequently, try the firms' other products, and bring new customers to the firm (Reichheld and Sasser, 1990). Thus, loyalty is linked to the success and profitability of a firm (Eakuru and Mat, 2008). Customer loyalty provides a foundation to examine the relationship between customer relationship activities, value creation programs and marketing strategies (Reichheld and Teal, 1996).

Relationship quality reduces buyers' uncertainty and strengthens the relationship between customers and the firm. Relationship quality includes (1) customer satisfaction, (2) trust and (3) commitment (Caceres and Paparoidamis, 2007). Customer satisfaction is an important driver to customer loyalty and to the success of businesses (Oliver, 1997). Studies have found positive evidence showing the direct relationship between customer satisfaction and loyalty (repeat purchase) as being less price sensitivity, having cross-buying behavior and increasing profit (Bloemer and Odekerken-Schröder, 2002; Ibrahim and Najjar, 2008; Oliver, 1997). However, several studies show that satisfied customers do defect (Dimitriades, 2006; Jones, 1996; Woodruff, 1997), and some customers say they are satisfied, but they still purchase elsewhere (Jones, 1996). Customer satisfaction defection is attributed to two factors. First, firms do not deliver enough or the appropriate value to satisfy customers' needs or wants (Roig, Garcia, Tena and Monzonis, 2006). Thus, customer satisfaction measurement without fulfillment of customer perceived value (customer needs and wants) cannot really meet the customer's expectations (Woodruff, 1997). Second, customers can feel a great deal of uncertainty concerning their relationships with firms.

Trust and commitment are two critical factors that enable customers to overcome uncertainty and strengthen their relationship with the firm (Morgan and Hunt, 1994), and in turn, these lead to customer loyalty.

Marketing, as a purpose, is to deliver more value to satisfy customers as well as to build a long-term and mutually profitability relationship with a customer (Kotler, 2005). Lemon, Rust and Zeithaml state that, “value is the keystone of the customer’s relationship with the firm” (2001, p. 22). Value is delivered from three key factors: (1) quality, (2) price and (3) convenience (Lemon et al., 2001). Quality is viewed as goods and services quality. Price is the monetary sacrifice. Convenience (non-monetary sacrifice) relates to all the benefits customers received, such as time saved and effort to do business with the firm (Lemon et al., 2001). Marketing strategies (product, price, place, promotion) create customer perceived value (quality, sacrifice) (Kotler, 2005; Lemon et al., 2001).

The purpose of this research is to advance the understanding of customer loyalty by examining and empirically testing consumer perception of marketing strategy (product, price, place, promotion), customer value (quality, sacrifice) and relationship quality (customer satisfaction, trust, commitment). Therefore, what is the relationship between marketing strategy, perceived value and relationship quality to customer loyalty? This study presents in the following sections a review of the literature, the data and methodology, findings, implications, and conclusions, limitations and future research opportunities.

## **REVIEW OF THE LITERATURE**

A theoretical model and supporting empirical evidence are presented in this literature review. First, a conceptual model is advanced with the relationships between customer loyalty (dependent variable) and marketing strategy, perceived value, and relationship quality (independent variables) (McCarthy, 1971; Morgan and Hunt, 1994; Oliver, 1997; Zeithaml, 1988), or the antecedents of customer loyalty. Second, empirical studies are analyzed to support the conceptual model, and to establish interrelationships between this study’s constructs (Beatson, Lings and Gudergan, 2008; Rust, Lemon and Zeithaml, 2001; Wulf, Odekerken-Schröder and Lacobucci, 2001).

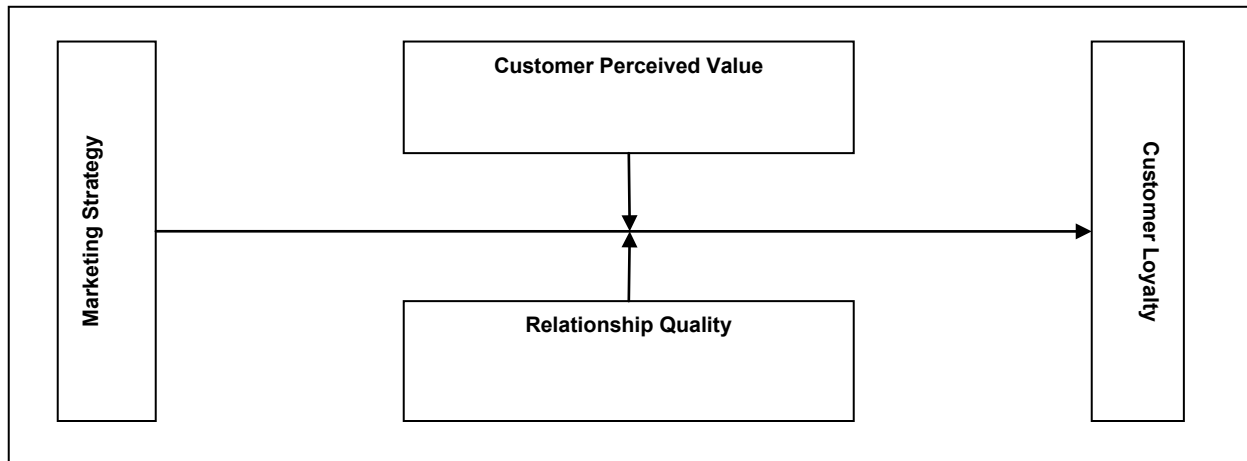
### Conceptual Framework

Loyal customers are important to firms, even critical in that they are less price sensitive (Reichheld and Teal, 1996). Moreover, these customers are likely to purchase more frequently, try the firm’s other product offerings and bring new customers to the firm (Reichheld and Sasser, 1990). These customers play a major role in the firm’s success and profitability (Eakuru and Mat, 2008). Customer loyalty has been theorized as influenced by the firm’s marketing strategy, customer perceived value and relationship quality (Reichheld and Teal, 1996). For this study, Figure 1 depicts the conceptual model for customer loyalty.

Customer loyalty is “a deeply held commitment to rebuy or repatronize a preferred product or service consistently in the future, despite situational influences and marketing efforts having the potential to cause switching behavior” (Oliver, 1997, p. 392). Marketing strategies are the marketing variables (marketing mix elements of price, product, place and promotion) that the firm uses to satisfy target consumer groups at a profit (McCarthy, 1971). Customer perceived value is the “the customer’s overall assessment of the utility of a product based on perceptions of what is received and what is given” (Zeithaml, 1988, p. 14). Furthermore, relationship quality is “an overall assessment of the strength of a relationship and the extent to which it meets the needs and expectations of the parties based on a history of successful or unsuccessful encounters or events” (Smith, 1998, p. 78).

Relationship quality construct includes customer satisfaction, trust and commitment (Caceres and Papparoidamis, 2007). Customer satisfaction is “the consumer’s fulfillment response. It is a judgment that a product or service feature, or the product or service itself, provided (or is providing) a pleasurable level of consumption-related fulfillment, including levels of under-or-over fulfillment” (Oliver, 1997, p. 13). Trust is “when one party has confidence in an exchange partner’s reliability and integrity” (Morgan and Hunt, 1994, p. 23). Moreover, commitment occurs as “an exchange partner believing that an ongoing relationship with another is so important as to warrant maximum efforts at maintaining (the relationship)” (Morgan and Hunt, 1994, p. 23).

Figure 1: Conceptual Model



*This figure depicts the conceptual model for this study. Marketing strategy is the independent construct and customer perceived value and relationship quality as mediating (independent) constructs, while customer loyalty is the dependent construct.*

For this research, the conceptual model will be empirically tested from shoppers in three different types of retail stores – convenience stores, department stores and hypermarkets. Therefore, the constructs will be operationalized accordingly. Customer loyalty is measured by word-of-mouth, price insensitivity and purchase intentions (Bloemer and Odekerken-Schröder, 2002). The five retail dimensions of price, store image, distribution intensity, advertising spending and price deals operationalize marketing strategy (Yoo, Donthu and Lee, 2000). Customer perceived value consists of perceived quality (Yoo et al, 2000) and sacrifice (Cronin, Brady and Hult, 2000). The three dimensions of customer satisfaction, trust and commitment measure relationship quality (Bloemer and Odekerken-Schröder, 2002).

### Empirical Support

Viewing loyalty as an attitude-behavior relationship allows integrated investigation of antecedents of customer loyalty (Dick and Basu, 1994). Studies measure customer loyalty by the behavioral dimensions of word-of-mouth communication, purchase intentions and price insensitivity (Bloemer and Odekerken-Schröder, 2002; Cronin et al, 2000; Ibrahim and Najjar, 2008). Attitudinal components such as perceived value, satisfaction, trust and commitment are the antecedents of customer loyalty (Donio, Massari and Passiante, 2006; Hennig-Thurau, Gwinner, and Gremler, 2002; Ibrahim and Najjar, 2008; Liang and Wang, 2004; Wulf, et al., 2001).

Bloemer and Odekerken-Schröder (2002) examine causal relationships between the marketing mix elements (store image, customer relationship proneness, positive affect), store satisfaction, trust, commitment and customer loyalty (word-of-mouth communication, price insensitivity, purchase intentions) in Belgium mid-sized supermarket stores. The results show that (1) store image, consumer relationship proneness and positive affect have a significant effect on customer satisfaction; (2) trust and

commitment play an important mediating role between satisfaction and customer loyalty; and (3) commitment has the strongest impact on customer loyalty. The authors recommended future studies measure the marketing mix elements as product, price, place and promotion, rather than store image, customer relationship proneness and positive affect.

Furthermore, studies show that customer perceived value directly influences customer satisfaction (Moliner, Sanchez, Rodriguez and Callarisa, 2007) and customer loyalty (Dagger, Sweeney and Johnson, 2007). Perceived value has either a direct impact on trust (Kim, Zhao and Yang, 2008) or an indirect impact on trust through customer satisfaction (Moliner et al., 2007). Value also has an indirect impact on commitment through trust (Kim et al., 2008) or through customer satisfaction (Moliner et al., 2007), and is a mediator between marketing mix elements and customer behavioral intentions (Dagger et al., 2007; Yoo et al., 2000). Moreover, there is a relationships between marketing mix elements and total brand equity through the mediating role of three brand equity dimensions (perceived quality, brand loyalty, brand associations combined with brand awareness) (Yoo et al., 2000). Yoo et al. (2000) found four specific results. First, no direct path is between marketing mix variables and total brand equity but is indirectly affected through the mediating brand equity dimensions of perceived quality. Second, frequent price promotions, such as price deals, have a negative relationship to brand equity. Third, customers perceive high quality products from high advertising spending, high price, good store image and high intensive distribution. Lastly, lowering price decreases customer perceived quality. For example, consumers may perceive that a lower price is a result of reducing quality to maintain profit margins.

Moreover, researchers state that value is a tradeoff between benefits (quality) received and sacrifices made (Cronin et al., 2000; Moliner et al., 2007). Besides receiving benefits of quality, monetary and non-monetary sacrifices are customer value measures. Cronin et al. (2000) conduct a study to examine the effects of service quality, perceived value and customer satisfaction on consumer behavioral intention. Three items measure customer perceived value, (1) the price charged to use this facility, (2) the time required to use the facility and (3) the effort that the customer must make to receive the services. The results indicate that there is not a significant relationship between sacrifice and perceived value. However, the value is primarily received from perceptions of quality. That is, consumers view quality of greater importance than the sacrifices they make.

Therefore, prior customer loyalty studies have examined the relationship between marketing strategy, satisfaction, trust and commitment (Bloemer and Odekerken-Schröder, 2002; Ibrahim and Najjar, 2008; Liang and Wang, 2004). Other studies have found relationships between perceived value and satisfaction (Moliner et al., 2007), trust and commitment (Kim et al., 2008). This study extends the literature by examining the relationship of marketing strategy (price, store image, distribution intensity, advertising spending, price deals), customer perceived value, relationship quality (satisfaction, trust, commitment) on customer loyalty (word-of-mouth communication, price insensitivity, purchase intentions). Hence,

- H<sub>1</sub> Marketing strategy (price, store image, distribution intensity, advertising spending, price deals), customer perceived value, relationship quality (satisfaction, trust, commitment) significantly influence word-of-mouth communication.
- H<sub>2</sub> Marketing strategy (price, store image, distribution intensity, advertising spending, price deals), customer perceived value, relationship quality (satisfaction, trust, commitment) significantly influence price insensitivity.
- H<sub>3</sub> Marketing strategy (price, store image, distribution intensity, advertising spending, price deals), customer perceived value, relationship quality (satisfaction, trust, commitment) significantly influence purchase intentions.
- H<sub>4</sub> Marketing strategy (price, store image, distribution intensity, advertising spending, price deals), customer perceived value, relationship quality (satisfaction, trust, commitment) significantly influence customer loyalty.

While not hypothesized, shopper characteristics and shopping experiences also will be examined as an influence on customer loyalty. Shopping characteristics include gender, age, marital status, educational level, number of people in the household, number of people employed in the household, occupation, shoppers' personal monthly income and household monthly income. Shopping experiences are store spending per visit, shopping frequency at a specific retail store during the last month, and how many other competing retail stores shopped at in the last year.

## DATA AND METHODOLOGY

Customer loyalty researchers encourage further studies in other industries (Liang and Wang, 2004) and other cultures (Caceres and Paparoidamis, 2007). While Liang and Wang (2004) used Taiwan banks and Caceres and Paparoidamis (2007) European businesses, Bloemer and Odekerken-Schröder (2002) surveyed Belgium supermarket shoppers. To further an understanding of customer loyalty, this study samples Taiwanese shoppers at three different types of retail stores – convenience, department, hypermarket/superstore. These stores vary in size, e.g., physical, stock keeping units (SKU), and level of service, e.g., self-, limited-, full-service. For example, convenience stores are small in size and a limited number of products available, self-service and opened most (if not all) hours of the day. Department stores are larger, offering more products, and full-service but have limited hours of opening for shoppers. On the other hand, hypermarkets/superstores are very large in size (the largest of the three for this study), wide and/or deep product assortment offered (the most of the three for this study), limited service and opened most (if not all) hours of the day (Kotler and Keller, 2006). This sampling plan allows the examination of varying levels of retail store size, product offerings (SKU), levels of service, availability to (store hours for) shoppers and other different retail store characteristics.

Three retail stores – 7-Eleven (convenience), Hanshin (department), Carrefour (hypermarket) – in Kaohsiung, the second largest city and in the south region of Taiwan, were the study setting. The sampling frame was quota in that there were an equal number (unweighted) of participants from each store, or 100 respondents for each retailer. The sampling scheme had a balance of participants during the day, e.g., morning, afternoon and evening, and for the 24-hour convenience stores, there were late night shoppers (after 12:00AM) included. Furthermore, this is a proportionate sample of weekday and weekend shoppers for each retailer.

Respondents were at least 18 years of age, and completed a four-part, 56-item questionnaire. First, the questionnaire included a researcher developed 12-question shopper demographic information and shopping characteristics section. Second, a 15-item retail marketing mix instrument developed by Yoo, et al. (2000) was the measure for marketing strategy. The retail marketing mix elements (price, advertising spending, price deals, store image and distribution intensity) were adapted and had three items for each marketing mix element with a 9-point Likert-type scale (1 = Strongly Disagree to 9 = Strongly Agree). Third, nine items were adapted and measured perceived value, 6 items for perceived quality and 3 for sacrifice. A 6-item perceived quality instrument developed by Yoo, et al. (2000) was used for one measure of perceived value. The other measure of perceived value was sacrifice, and had 3 items from a questionnaire developed by Cronin et al. (2000). Perceived quality and sacrifice were measured by a 9-point Likert-type scale (1 = Strongly Disagree to 9 = Strongly Agree). Four, 20 items were adapted and measured relationship quality (11 items) and customer loyalty (9 items). Bloemer and Odekerken-Schröder (2002) developed the instrument. Relationship quality included customer satisfaction (5 items), trust (3 items) and commitment (3 items). Customer loyalty included word-of-mouth communications (3 items), price insensitivity (2 items) and purchase intentions (4 items), the dependent variables. Relationship quality and customer loyalty were measured by a 9-point Likert-type scale (1 = Strongly Disagree to 9 = Strongly Agree).

The sample includes 300 respondents with an equal retailer representation from 7-Eleven ( $n = 100$ ), Hanshin ( $n = 100$ ) and Carrefour ( $n = 100$ ). There were more female shoppers (65.3%) than males. The majority was between 26 years old and 45 years of age (58.4%). Most shoppers were married (63.3%). Many of the respondents had earned a university bachelor degree (63.3%). The majority lived in a household with 4 or more people (69.3%). Almost one-half of the shoppers had two people employed (46.3%) in their household. The participants were most likely a professional (17.3%), housekeeper (16.7%), clerk, salesperson, service worker (15.0%) or administrative position (11.7%). The majority of the respondents had a personal monthly income of less than US\$1,650 – US\$660 or less (24.2%), US\$661 to \$990 (21.7%), US\$991 to \$1,320 (17.7%), US\$1,321 to \$1,650 (10.7%). Most shoppers had a household monthly income between US\$1,321 and \$3,290 (62.7%) with the highest in the range of US\$1,321 to \$1,970 (24.7%). The vast majority of shoppers spent less than US\$98.70 per visit (89.0%) with the highest category being US\$32.91 to \$65.80 (22.1%). Monthly shopping frequency ranged from a low of 4 times (6.3%) to 5 or more times (24.7%). When respondents were asked how many competing retail stores that they had shopped at during the past year, 8.0% only shopped at that store (no competitors) but 29.7% had shopped at 5 or more other stores. See the Appendix for additional shoppers' details of the total sample and for each retail store.

Varimax rotations with Kaiser-Meyer-Olkin criterion (eigenvalue greater than 1.0) were used to examine construct validity and to extract scale items for the retail marketing mix, customer perceived value, relationship quality (satisfaction, trust, commitment) and customer loyalty. Of the 15-item marketing mix instrument, there were three items for each of the five retail elements (Yoo, et al., 2000). Only one item was removed (distribution intensity). Therefore, price, advertising spending, price deals and store image include three items each, and distribution intensity two items. Perceived value used perceived quality with six items (Yoo et al., 2000) and sacrifice with three items (Cronin et al., 2000). Two items were extracted from the perceived quality scale and one item from sacrifice. Hence, perceived value has six items (four perceived quality, two sacrifice). Of the 11-item relationship quality instrument, there were five satisfaction items, three trust items and three commitment items (Bloemer and Odekerken-Schröder, 2002). No items were removed from the relationship quality instrument. The customer loyalty instrument included three word-of-mouth communications items, two price insensitivity items and four purchase intentions items (Bloemer and Odekerken-Schröder, 2002). No items were extracted for word-of-mouth communications; one was removed from price insensitivity and two from purchase intentions. Therefore, customer loyalty includes three word-of-mouth communications items, one price insensitivity item and two purchase intentions items. These constructs were tested for reliability using Cronbach's alpha scores. Marketing mix, relationship quality and customer loyalty easily exceeded the minimum of 0.70 (Nunnally and Bernstein, 1994) with 0.743, 0.841 (satisfaction 0.944, trust 0.911, commitment 0.883) and 0.819, respectively. However, perceived value had a reliability of 0.622, which exceeds the minimum of 0.60 for exploratory analysis (Hair, Black, Babin, Anderson and Tatham, 2006).

## FINDINGS

As a comparative, causal study, this research design has two primary considerations to examine the relationship of marketing strategy, customer perceived value, relationship quality to customer loyalty. First, analysis of variance (ANOVA) using the three retail stores (7-Eleven, Hanshin, Carrefour) were performed that include significantly difference criterion ( $p \leq 0.05$ ) to determine the comparative stores' customer loyalty. The sample ( $N=300$ ) and each of the three sample subsets ( $n=100$  for each store) exceed the 50 respondent group minimum for mean comparison analysis (Hair, et al., 2006).

Second, multiple regression analysis (forward stepwise method) determines which independent variables influences and their strengths that leads to and explains retail stores' customer loyalty. Regression equations for independent variables of 12 shoppers' characteristics (gender, age, marital status, educational level, number of people in the household, number of people employed in the household,

occupation, shoppers' personal monthly income, household monthly income, store spending per visit, shopping frequency, switching stores), 5 retail marketing mix elements (price, store image, distribution intensity, advertising spending, price deals), customer perceived value, satisfaction, trust, commitment and the dependent variables (word-of-mouth communications, price insensitivity, purchase intentions, total customer loyalty) were used with an  $\alpha \leq 0.05$  criteria. The sample ( $N = 300$ ) is greater than the required 218 participants minimum for regression modeling,  $N \geq 50 + 8m$ , where  $m$  is the number of predictors (Green, 1991) and is within the sensitivity tolerance (Hair et al., 2006).

To find significant differences ( $p < 0.05$ ) between convenience (7-Eleven), department (Hanshin) and hypermarket (Carrefour) stores, analysis of variance (ANOVA) with post hoc tests (Scheffé method) was completed for the independent variables – marketing strategy, perceived value, relationship quality with seven variables having significant differences (see Table 1, Panel A). First, Carrefour had better prices than the other two stores. Second, 7-Eleven had greater advertising spending than the other two stores. Third, 7-Eleven and Hanshin had significantly better price deals than Carrefour. Fourth, Carrefour had much higher distribution than Hanshin. Fifth, while Carrefour had a better store image than 7-Eleven and Hanshin, 7-Eleven had a better store image than Hanshin. Sixth, Carrefour had greater perceived value than 7-Eleven and Hanshin stores. Furthermore, 7-Eleven had higher perceived value than Hanshin. Seventh, while 7-Eleven had higher customer trust than Carrefour, Carrefour had significantly higher trust than Hanshin.

For the three dependent customer loyalty variables – word-of-mouth communications, price insensitivity, purchase intentions, two were significant for the three retail stores (see Table 1, Panel B). First, Carrefour had greater word-of-mouth communications than 7-Eleven and Hanshin. Second, 7-Eleven customers indicated significantly higher purchase intentions than Carrefour customers.

Table 1: Retail Stores' Group Comparisons for Independent and Dependent Variables

<b>Panel A: Independent Variables</b>			
<b>Variables</b>	<b>7-Eleven Stores</b>	<b>Hanshin Stores</b>	<b>Carrefour Stores</b>
<b>Marketing Strategy</b>			
Price	5.5567*	4.7000*	5.5733*
Advertising Spending	6.8633*	5.9533*	5.4933*
Price Deals	4.4900*	5.1300*	4.2800*
Distribution Intensity	6.2650	5.7950*	6.3400*
Store Image	5.7000*	5.0667*	6.8967*
<b>Perceived Value</b>	5.3838*	5.0425*	5.9150*
<b>Relationship Quality</b>			
Satisfaction	5.8360	5.6360	5.5940
Trust	6.2967*	5.5367*	6.0267*
Commitment	3.6467	3.7933	3.7267
<b>Panel B: Dependent Variables</b>			
<b>Variables</b>	<b>7-Eleven Stores</b>	<b>Hanshin Stores</b>	<b>Carrefour Stores</b>
<b>Customer Loyalty</b>			
Word-of-Mouth Communications	5.1133*	4.5467*	5.2467*
Price Insensitivity	4.2200	3.6100	3.9100
Purchase Intentions	5.1350*	4.4600	4.7100*

*This table presents ANOVA results by comparing the three types of retail stores. The significance level is shown as  $p < 0.05$ . In Panel A, the measures for marketing strategy, perceived value and relationship quality as independent variables are compared. In Panel B, the measures for customer loyalty as the dependent variables are compared. All variables are measured by a 9-point Likert type scales (1 = strongly disagree to 9 = strongly agree).*

To examine bivariate relationships, Pearson correlation was performed for the independent variables – marketing strategy, customer perceived value, relationship quality. See Table 2. No relationship exceeded .600, an acceptable level for bivariate correlations. There were several inverse relationships, e.g., price and price deals, advertising spending and store image, and price deals and store image.

However, only two of the commitment relationships were positive – price deals and satisfaction. Of the six inverse commitment relationships, only price was significant ( $p < 0.01$ ).

The primary purpose of this study is to determine the influences of customer loyalty for three different types of retail stores (convenience, department, hypermarket). Customer loyalty is measured by word-of-mouth communications, price insensitivity and purchase intentions (Bloemer and Odekerken-Schröder, 2002). Furthermore, this research combined these measures (unweighted) to include customer loyalty.

Table 2: Retail Stores’ Correlations for Marketing Mix, Perceived Value and Relationship Quality

Elements/ Dimensions	Price	Advertising Spending	Price Deals	Distribution Intensity	Store Image	Perceived Value	Satisfaction	Trust	Commitment
Price	1.000								
Advertising Spending	.276*	1.000							
Price Deals	-.035	.199*	1.000						
Distribution Intensity	.167*	.106	.175*	1.000					
Store Image	.317*	-.011	-.030	.449*	1.000				
Perceived Value	.256*	.044	.021	.269*	.433*	1.000			
Satisfaction	-.020	.127**	.246*	.291*	.203*	.154*	1.000		
Trust	.106	.055	.143**	.313*	.320*	.254*	.556*	1.000	
Commitment	-.232*	-.028	.024	-.037	-.046	-.010	.037	-.037	1.000

*This table presents the inter-correlations between the independent study variables relative degree of association (positive and negative). The significance levels are indicated as \*  $p < 0.01$  and \*\*  $p < 0.05$ .*

For 7-Eleven stores (convenience), the word-of-mouth communications (WOM) multiple regression equation found as significant, positive trust and distribution intensity as well as inverse personal monthly income relationships. The equation had an adjusted  $R^2$  of .215, or 21.5% explained variance. See Table 3, Panel A.

For 7-Eleven price insensitivity, perceived value, number of employed household members, customer satisfaction and commitment had positive, significant influences, and explained 20.2% of the variance. See Table 3, Panel B. Commitment, customer satisfaction, number of employed household members and price deals significantly influenced purchase intentions with an adjusted  $R^2$  of .243. See Table 3, Panel C. 7-Eleven convenience stores’ customer satisfaction, number of employed household members and distribution intensity has a significant relationship to customer loyalty, and explained 25.0% of the variance. Therefore, the regression models (Table 3) for 7-Eleven stores (convenience) are:

$$\text{Word-of-Mouth Communications} = 2.051 + 0.322 (\text{trust}) - 0.220 (\text{personal monthly income}) + 0.206 (\text{distribution intensity})$$

$$\text{Price Insensitivity} = -2.973 + 0.249 (\text{perceived value}) + 0.211 (\text{household employed}) + 0.200 (\text{customer satisfaction}) + 0.183 (\text{commitment})$$

$$\text{Purchase Intention} = 0.989 + 0.313 (\text{commitment}) + 0.191 (\text{customer satisfaction}) + 0.239 (\text{household employed}) + 0.226 (\text{price deals})$$

$$\text{Customer Loyalty} = 1.215 + 0.297 (\text{customer satisfaction}) + 0.305 (\text{household employed}) + 0.208 (\text{distribution intensity})$$



Hanshin department store customer loyalty was examined to determine the influences for the four loyalty measures. First, only trust had a significant relationship for WOM with an adjusted  $R^2$  of .192 (see Table 4, Panel A). Second, shopping frequency, price deals, commitment and store spending have significant, positive relationships and switching stores (shopped at competitors) had an inverse influence for price insensitivity with an explained variance of 28.8% (see Table 4, Panel B). Third, customer satisfaction, price deals, shopping frequency and trust have significant, positive relationships, and switching stores and marital status have an inverse influence for purchase intentions with an explained variance of 36.9% (see Table 4, Panel C). Fourth, trust, shopping frequency and price deals has a significant, positive relationship and switching stores a negative influence for customer loyalty with an adjusted  $R^2$  of .412 (see Table 4, Panel D). Hence, the regression models (Table 4) for Hanshin stores (department) are:

$$\text{Word-of-Mouth Communications} = 2.281 + 0.448 (\text{trust})$$

$$\text{Price Insensitivity} = 0.719 + 0.348 (\text{shopping frequency}) - 0.258 (\text{switching stores}) + 0.238 (\text{price deals}) + 0.200 (\text{commitment}) + 0.188 (\text{store spending})$$

$$\text{Purchase Intentions} = 2.608 + 0.203 (\text{customer satisfaction}) + 0.203 (\text{price deals}) + 0.237 (\text{shopping frequency}) - 0.255 (\text{switching stores}) - 0.239 (\text{marital status}) + 0.234 (\text{trust})$$

$$\text{Customer Loyalty} = 1.739 + 0.357 (\text{trust}) + 0.368 (\text{shopping frequency}) - 0.277 (\text{switching stores}) + 0.250 (\text{price deals})$$

Furthermore, Carrefour hypermarket stores were tested as to the influences on customer loyalty. First, trust, price deals, commitment and education level were significant, positive predictors for WOM, and explained 33.0% of the variance (see Table 5, Panel A). Second, commitment, price deals and perceived value has a significant, positive relationship and advertising spending a negative influence for price insensitivity with an adjusted  $R^2$  of .211 (see Table 5, Panel B). Third, customer satisfaction, commitment and price deals were significant, positive predictors for purchase intentions, and explained 30.0% of the variance (see Table 5, Panel C). Fourth, trust, commitment and price deals were significant influences on customer loyalty with an adjusted  $R^2$  of .340 (see Table 5, Panel D). Therefore, the regression models (Table 5) for Carrefour stores (hypermarket) are:

$$\text{Word-of-Mouth Communications} = -1.501 + 0.352 (\text{trust}) + 0.327 (\text{price deals}) + 0.246 (\text{commitment}) + 0.169 (\text{education level})$$

$$\text{Price Insensitivity} = -0.207 + 0.261 (\text{commitment}) + 0.247 (\text{price deals}) - 0.247 (\text{advertising spending}) + 0.194 (\text{perceived value})$$

$$\text{Purchase Intention} = -0.651 + 0.357 (\text{customer satisfaction}) + 0.344 (\text{commitment}) + 0.203 (\text{price deals})$$

$$\text{Customer Loyalty} = -0.369 + 0.306 (\text{trust}) + 0.372 (\text{commitment}) + 0.299 (\text{price deals})$$

A summary of the regression equations for the three retail stores are presented in Table 6. To examine further the differences between convenience, department and hypermarket stores, certain specific and revealing findings were determined for each loyalty dimension (measure) and the results for the four hypotheses. First, trust was a significant, positive influence for word-of-mouth communications for all store types. Furthermore, a second relationship quality variable, commitment, was important for Carrefour. While no marketing strategy element was included for Hanshin, 7-Eleven stores (distribution intensity) and Carrefour (price deals) did include one. Hence,  $H_1$  was partially supported. Second,

commitment had a significant, positive relationship for the three stores' price insensitivity. Customer satisfaction, a second relationship quality variable, was important for 7-Eleven stores. Perceived value was a price sensitivity influence for 7-Eleven and Carrefour stores. While marketing strategy elements were not a significant factor for 7-Eleven stores, price deals were for Hanshin and Carrefour stores, and advertising spending had an inverse influence for Carrefour. Three shopping behavioral characteristics, however, were factors for Hanshin price insensitivity – shopping frequency (positive), store spending (positive), switching stores (negative). Therefore, H<sub>2</sub> was partially supported.

Table 3: Regression Models for 7-Eleven Shoppers' Customer Loyalty

<b>Panel A: Word-of-Mouth Communications</b>					
R <sup>2</sup> = 0.239		Adjusted R <sup>2</sup> = 0.215		Standard Error = 1.30879 F = 10.043 Significant F = 0.000	
Variable	Regression Coefficient	Standard Error	Standardized Coefficient	T-Value	Significance
(Constant)	2.051	0.763			
Trust	0.354	0.103	0.322	3.445	0.001***
Personal Monthly Income	-0.137	0.055	-0.220	-2.471	0.015*
Distribution Intensity	0.204	0.092	0.206	2.205	0.030*
<b>Panel B: Price Insensitivity</b>					
R <sup>2</sup> = 0.234		Adjusted R <sup>2</sup> = 0.202		Standard Error = 1.88198 F = 7.248 Significant F = 0.000	
Variable	Regression Coefficient	Standard Error	Standardized Coefficient	T-Value	Significance
(Constant)	-2.973	1.477			
Perceived Value	0.681	0.258	0.249	2.634	0.010**
Household Employed	0.469	0.203	0.211	2.314	0.023*
Customer Satisfaction	0.293	0.138	0.200	2.114	0.037*
Commitment	0.225	0.112	0.183	2.004	0.048*
<b>Panel C: Purchase Intentions</b>					
R <sup>2</sup> = 0.273		Adjusted R <sup>2</sup> = 0.243		Standard Error = 1.38532 F = 8.938 Significant F = 0.000	
Variable	Regression Coefficient	Standard Error	Standardized Coefficient	T-Value	Significance
(Constant)	0.989	0.771			
Commitment	0.291	0.083	0.313	3.515	0.001***
Customer Satisfaction	0.211	0.099	0.191	2.130	0.036*
Household Employed	0.400	0.154	0.239	2.600	0.011*
Price Deals	0.222	0.091	0.226	2.448	0.016*
<b>Panel D: Customer Loyalty</b>					
R <sup>2</sup> = 0.273		Adjusted R <sup>2</sup> = 0.250		Standard Error = 1.13127 F = 12.013 Significant F = 0.000	
Variable	Regression Coefficient	Standard Error	Standardized Coefficient	T-Value	Significance
(Constant)	1.215	0.630			
Customer Satisfaction	0.270	0.088	0.297	3.076	0.003**
Household Employed	0.420	0.120	0.305	3.487	0.001***
Distribution Intensity	0.182	0.085	0.208	2.146	0.034*

The table shows the regression estimates for 7-Eleven shoppers by word-of-mouth-communications, price insensitivity, purchase intentions and customer loyalty. The significance levels for the independent variables are indicated as \*  $p < 0.05$ , \*\*  $p < 0.01$  and \*\*\*  $p < 0.001$ . Panel A shows Word-of-Mouth Communications = 2.051 + 0.322 (trust) – 0.220 (personal monthly income) + 0.206 (distribution intensity). Panel B presents Price Insensitivity = -2.973 + 0.249 (perceived value) + 0.211 (household employed) + 0.200 (customer satisfaction) + 0.183 (commitment). Panel C shows Purchase Intention = 0.989 + 0.313 (commitment) + 0.191 (customer satisfaction) + 0.239 (household employed) + 0.226 (price deals). Panel D presents Customer Loyalty = 1.215 + 0.297 (customer satisfaction) + 0.305 (household employed) + 0.208 (distribution intensity)

Table 4: Regression Models for Hanshin Shoppers' Customer Loyalty

<b>Panel A: Word-of-Mouth Communications</b>					
$R^2 = 0.200$		Adjusted $R^2 = 0.192$		Standard Error = 1.51012	
		F = 24.550		Significant F = 0.000	
Variable	Regression Coefficient	Standard Error	Standardized Coefficient	T-Value	Significance
(Constant)	2.281	0.617			
Trust	0.492	0.099	0.448	4.955	0.000***
<b>Panel B: Price Insensitivity</b>					
$R^2 = 0.324$		Adjusted $R^2 = 0.288$		Standard Error = 1.81095	
		F = 9.021		Significant F = 0.000	
Variable	Regression Coefficient	Standard Error	Standardized Coefficient	T-Value	Significance
(Constant)	0.719	0.910			
Shopping Frequency	0.536	0.139	0.348	3.849	0.000***
Switching Stores	-0.348	0.121	-0.258	-2.876	0.005**
Price Deals	0.321	0.116	0.238	2.765	0.007**
Commitment	0.231	0.102	0.200	2.260	0.026*
Store Spending	0.176	0.083	0.188	2.116	0.037*
<b>Panel C: Purchase Intentions</b>					
$R^2 = 0.407$		Adjusted $R^2 = 0.369$		Standard Error = 1.35036	
		F = 10.649		Significant F = 0.000	
Variable	Regression Coefficient	Standard Error	Standardized Coefficient	T-Value	Significance
(Constant)	2.608	0.842			
Customer Satisfaction	0.230	0.115	0.203	2.009	0.047*
Price Deals	0.218	0.093	0.203	2.335	0.022*
Shopping Frequency	0.289	0.103	0.237	2.812	0.006**
Switching Stores	-0.273	0.091	-0.255	-2.994	0.004**
Marital Status	-0.795	0.277	-0.239	-2.876	0.005**
Trust	0.260	0.115	0.234	2.259	0.026*
<b>Panel D: Customer Loyalty</b>					
$R^2 = 0.436$		Adjusted $R^2 = 0.412$		Standard Error = 1.07041	
		F = 18.336		Significant F = 0.000	
Variable	Regression Coefficient	Standard Error	Standardized Coefficient	T-Value	Significance
(Constant)	1.739	0.505			
Trust	0.326	0.078	0.357	4.179	0.000***
Shopping Frequency	0.369	0.080	0.368	4.582	0.000***
Switching Stores	-0.243	0.071	-0.277	-3.410	0.001***
Price Deals	0.219	0.072	0.250	3.062	0.003**

The table shows the regression estimates for Hanshin shoppers by word-of-mouth-communications, price insensitivity, purchase intentions and customer loyalty. The significance levels for the independent variables are indicated as \*  $p < 0.05$ , \*\*  $p < 0.01$  and \*\*\*  $p < 0.001$ . Panel A shows Word-of-Mouth Communications = 2.281 + 0.448 (trust). Panel B presents Price Insensitivity = 0.719 + 0.348 (shopping frequency) – 0.258 (switching stores) + 0.238 (price deals) + 0.200 (commitment) + 0.188 (store spending). Panel C shows Purchase Intentions = 2.608 + 0.203 (customer satisfaction) + 0.203 (price deals) + 0.237 (shopping frequency) – 0.255 (switching stores) – 0.239 (marital status) + 0.234 (trust). Panel D presents Customer Loyalty = 1.739 + 0.357 (trust) + 0.368 (shopping frequency) – 0.277 (switching stores) + 0.250 (price deals).

Third, customer satisfaction was a significant, positive influence for the three stores' customer purchase intentions. Each store had a second relationship quality variable included – commitment (7-Eleven and Carrefour) and trust (Hanshin). The only marketing strategy element included in the equations was price deals; it was a significant, positive influence for the three stores. Hence,  $H_3$  was partially supported. Fourth, trust had a significant, positive relationship for Hanshin and Carrefour customer loyalty, and customer satisfaction was for 7-Eleven stores. Carrefour had a second relationship quality variable (commitment) that influenced its customer loyalty. Each store had one marketing strategy element that

had a significant, positive relationship to customer loyalty – distribution intensity (7-Eleven) and price deals (Hanshin and Carrefour). Therefore, H<sub>4</sub> was partially supported.

Table 5: Regression Models for Carrefour Shoppers’ Customer Loyalty

<b>Panel A: Word-of-Mouth Communications</b>					
R <sup>2</sup> = 0.357		Adjusted R <sup>2</sup> = 0.330		Standard Error = 1.19808 F = 13.194	
Significant F = 0.000					
Variable	Regression Coefficient	Standard Error	Standardized Coefficient	T-Value	Significance
(Constant)	-1.501	0.931			
Trust	0.385	0.093	0.352	4.135	0.000***
Price Deals	0.392	0.102	0.327	3.838	0.000***
Commitment	0.213	0.073	0.246	2.911	0.004**
Education Level	0.288	0.144	0.169	1.993	0.049*
<b>Panel B: Price Insensitivity</b>					
R <sup>2</sup> = 0.243		Adjusted R <sup>2</sup> = 0.211		Standard Error = 1.75350 F = 7.617	
Significant F = 0.000					
Variable	Regression Coefficient	Standard Error	Standardized Coefficient	T-Value	Significance
(Constant)	-0.207	1.206			
Commitment	0.305	0.110	0.261	2.773	0.007**
Price Deals	0.400	0.158	0.247	2.539	0.013*
Advertising Spending	-0.262	0.101	-0.247	-2.586	0.011*
Perceived Value	0.430	0.214	0.194	2.008	0.048*
<b>Panel C: Purchase Intentions</b>					
R <sup>2</sup> = 0.321		Adjusted R <sup>2</sup> = 0.300		Standard Error = 1.33965 F = 15.147	
Significant F = 0.000					
Variable	Regression Coefficient	Standard Error	Standardized Coefficient	T-Value	Significance
(Constant)	-0.651	0.807			
Customer Satisfaction	0.445	0.109	0.357	4.088	0.000***
Commitment	0.326	0.080	0.344	4.082	0.000***
Price Deals	0.266	0.115	0.203	2.319	0.022*
<b>Panel D: Customer Loyalty</b>					
R <sup>2</sup> = 0.360		Adjusted R <sup>2</sup> = 0.340		Standard Error = 1.10679 F = 18.027	
Significant F = 0.000					
Variable	Regression Coefficient	Standard Error	Standardized Coefficient	T-Value	Significance
(Constant)	-0.369	0.655			
Trust	0.311	0.085	0.306	3.643	0.000***
Commitment	0.300	0.066	0.372	4.533	0.000***
Price Deals	0.335	0.094	0.299	3.566	0.001***

The table shows the regression estimates for Carrefour shoppers by word-of-mouth-communications, price insensitivity, purchase intentions and customer loyalty. The significance levels for the independent variables are indicated as \*  $p < 0.05$ , \*\*  $p < 0.01$  and \*\*\*  $p < 0.001$ . Panel A shows Word-of-Mouth Communications =  $-1.501 + 0.352$  (trust) +  $0.327$  (price deals) +  $0.246$  (commitment) +  $0.169$  (education level). Panel B presents Price Insensitivity =  $-0.207 + 0.261$  (commitment) +  $0.247$  (price deals) –  $0.247$  (advertising spending) +  $0.194$  (perceived value). Panel C shows Purchase Intention =  $-0.651 + 0.357$  (customer satisfaction) +  $0.344$  (commitment) +  $0.203$  (price deals). Panel D presents Customer Loyalty =  $-0.369 + 0.306$  (trust) +  $0.372$  (commitment) +  $0.299$  (price deals).

Table 6 : Regression Models Summary of Three Retail Types for Customer Loyalty

Loyalty Dimensions	7-Eleven Stores		Hanshin Stores		Carrefour Stores	
	Explained Variance	Significant Influences	Explained Variance	Significant Influences	Explained Variance	Significant Influences
Word- of-Mouth Communications	21.5%	Trust Personal Monthly Income* Distribution Intensity	19.2%	Trust	33.0%	Trust Price Deals Commitment Education Level
Price Insensitivity	20.2%	Perceived Value Household Employed Customer Satisfaction Commitment	28.8%	Shopping Frequency Switching Stores* Price Deals Commitment Store Spending	21.1%	Commitment Price Deals Advertising Spending* Perceived Value
Purchase Intentions	24.3%	Commitment Customer Satisfaction Household Employed Price Deals	36.9%	Customer Satisfaction Price Deals Shopping Frequency Switching Stores* Marital Status* Trust	30.0%	Customer Satisfaction Commitment Price Deals
Customer Loyalty	25.0%	Customer Satisfaction Household Employed Distribution Intensity	41.2%	Trust Shopping Frequency Switching Stores* Price Deals	34.0%	Trust Commitment Price Deals

*This table summarizes the regression models for each measure of customer loyalty and customer loyalty with the explained variance for each model. \* indicates inverse (-) relationship that the independent variable has with the loyalty dimension.*

## IMPLICATIONS

From the comparative (ANOVA) and causal (multiple regression) results, significant differences were found between convenience, department and hypermarket stores' customer loyalty. In comparison, Carrefour (hypermarket) had significantly higher word-of-mouth communications than 7-Eleven and Hanshin (department) stores. On the other hand, 7-Eleven shoppers had significantly higher purchase intentions than Carrefour customers.

Table 7: Independent Variables Influencing Retail Stores' Customer Loyalty

Variables	7-Eleven Stores	Hanshin Stores	Carrefour Stores
<b>Shopper Characteristics</b>			
Marital Status		1	
Educational Level			1
Household Employed	3		
Personal Monthly Income*	1		
Store Spending		1	
Shopping Frequency		3	
Switching Stores*		3	
<b>Marketing Strategy</b>			
Advertising Spending*			1
Price Deals	1	3	4
Distribution Intensity	2		
<b>Perceived Value</b>			
	1		1
<b>Relationship Quality</b>			
Satisfaction	3	1	1
Trust	1	3	2
Commitment	2	1	4

*This table shows the number of each independent variable that is included in each retail store's regression equations. \* indicates inverse (-) relationship that the independent variable has with loyalty.*

Based on the causal results, specific shopper characteristics influence Hanshin customer loyalty. However, particular Carrefour marketing strategies had significant relationships to customer loyalty. See Table 7. Shopper characteristics were not a large influence for customer loyalty, except for Hanshin stores. While marketing strategies were not so much an influence for 7-Eleven, price deals were for Hanshin and Carrefour. Perceived quality was in only one regression equation for 7-Eleven and Carrefour, and in no models for Hanshin. However, relationship quality (customer satisfaction, trust, commitment) was important to the three stores with six in the 7-Eleven models, five in the Hanshin equations and seven for Carrefour. Furthermore, the results of the three types of retail stores provide a basis for specific implications for each format.

For 7-Eleven convenience stores, the higher the number of household members employed and the lower their income increased customer loyalty. These shoppers were somewhat price sensitive (price deals) and expected high-level product assortment (distribution intensity). These findings appear to be factors that convenience stores offer, e.g., close to home shopping locations, available to busy consumers, offer low-priced products. The 7-Eleven customers indicated a much higher level of satisfaction and to some degree a commitment than trust. To increase convenience store customer loyalty, a marketing strategy to increase price deals and more product offerings would be important.

On the other hand, Carrefour has greater loyalty from more educated shoppers who are very price sensitive (price deals) and highly committed, much more than trust and satisfaction. Loyal Carrefour shoppers to some degree are influenced by perceived value, e.g., the benefits gained and sacrifice made (price deals). However, advertising spending has a negative effect on loyalty. This is consistent with prior hypermarket studies in which this inverse relationship occurs with brand equity (Chen and Green, 2009; Green and Chen, 2010). Hypermarkets, therefore, should focus on other promotional strategies, e.g., more price deals, loyalty programs, than advertising spending.

Hanshin department stores' customer loyalty is influenced by several shopping characteristics. Married and those who have been married (widowed or divorced) were more loyal than single shoppers were. The greater the shopping frequency and the more purchasing per store visit are factors that increase their customer loyalty. However, Hanshin shoppers tend to shop at other department stores, and this causes a negative influence on their loyalty. Price deals were an important, and the only significant marketing strategy that increases customer loyalty. Shoppers did not perceive a significant amount of value at Hanshin, but there was a high level of trust and some degree of satisfaction and commitment. To increase customer loyalty, Hanshin must implement strategies to frequent the stores more often, to increase spending during each visit and for customer retention (to minimize or prevent shopping at competitors). Such marketing strategies should include an effective loyalty program and more price deals.

## **CONCLUSIONS, LIMITATIONS AND FUTURE RESEARCH**

The purpose of this study is to advance the understanding of customer loyalty by examining and empirically testing consumer perception of marketing strategy (product, price, place, promotion), customer value (quality, sacrifice) and relationship quality (customer satisfaction, trust, commitment). Data were collected from 300 Taiwanese shoppers at three different types of retail stores – convenience (7-Eleven), department (Hanshin) and hypermarket (Carrefour). Four hypotheses were tested using ANOVAs and multiple regression methods. The results found significant differences between the three types of stores' marketing strategy, perceived value, relationship quality and customer loyalty. Furthermore, specific independent variables were significant influences on customer loyalty. The results partially supported the four hypotheses.

Particular findings were revealed in which certain factors influenced retail stores' customer loyalty. First, relationship quality was a major factor for the three stores. However, this varied by the type of store. For

example, hypermarket shoppers had a high level of commitment that influenced loyalty, while customers trusted department stores, and convenience store shoppers were very satisfied. Second, price deals were an effective marketing strategy for the department stores and hypermarkets in creating customer loyalty. Third, behavioral aspects of shopping frequency, store spending and switching stores (inverse relationship) significantly influenced department store customer loyalty. Fourth, characteristics of convenience stores, e.g., easy access, low-priced products, appear to appeal to households with more members employed and had lower budgets (income) that influenced customer loyalty.

While this research has found specific relationships between shoppers' characteristics and behaviors, marketing strategy, perceived value and relationship quality to customer loyalty, the results have limitations. The sample was in one country, in one city and cannot be generalized. Moreover, only one convenience, department and hypermarket retailer was included in the study. However, this does provide a basis and the opportunity to further an understanding of retail store customer loyalty. For example, future research should be completed in other Asian countries or in other global regions. Convenience, department and hypermarket competitors should be included to determine if the results from this study is unique (different) or consistent (same) with other same retail store types. These opportunities would advance customer loyalty knowledge and provide marketing managers the strategy to retain customers and to build customer loyalty.

## APPENDIX

### Shoppers' Characteristics for Three Retail Stores

Shopper Characteristics	7-11 Shoppers		Hanshin Shoppers		Carrefour Shoppers		Total Shoppers	
	No.	%	No.	%	No.	%	No.	%
<b>Total</b>	100	33.3	100	33.3	100	33.3	300	100.0
<b>Gender</b>								
Male	39	39.0	23	23.0	42	42.0	104	34.7
Female	61	61.0	77	77.0	58	58.0	196	65.3
<b>Age</b>								
18-25	16	16.0	16	16.0	10	10.0	42	14.0
26-35	30	30.0	32	32.0	26	26.0	88	29.4
36-45	26	26.0	27	27.0	34	34.0	87	29.0
46-55	18	18.0	18	18.0	19	19.0	55	18.3
56-65	8	8.0	6	6.0	7	7.0	21	7.0
66 and over	2	2.0	1	1.0	4	4.0	7	2.3
<b>Marital Status</b>								
Single	39	39.0	34	34.0	28	28.0	101	33.7
Married	59	59.0	64	64.0	67	67.0	190	63.3
Widowed	0	0.0	2	2.0	3	3.0	5	1.7
Divorced	2	2.0	0	0.0	2	2.0	4	1.3
<b>Educational Level</b>								
Primary School of below	3	3.0	1	1.0	2	2.0	6	2.0
Junior School	7	7.0	5	5.0	5	5.0	17	5.7
High School	17	17.0	14	14.0	20	20.0	51	17.0
Bachelor Degree	64	64.0	69	69.0	57	57.0	190	63.3
Master's Degree	9	9.0	9	9.0	15	15.0	33	11.0
Doctoral Degree	0	0.0	2	2.0	1	1.0	3	1.0
<b>Number in Household</b>								
1	0	0.0	2	2.0	3	3.0	5	1.7
2	6	6.0	9	9.0	6	6.0	21	7.0
3	22	22.0	21	21.0	23	23.0	66	22.0
4 or more	72	72.0	68	68.0	68	68.0	208	69.3
<b>Number Employed in Household</b>								
1	25	25.0	22	22.0	24	24.0	71	23.7
2	51	51.0	45	45.0	43	43.0	139	46.3
3	10	10.0	15	15.0	13	13.0	38	12.7
4 or more	14	14.0	18	18.0	20	20.0	52	17.3

## Shoppers' Characteristics for Three Retail Stores (Continued)

Shopper Characteristics	7-11 Shoppers		Hanshin Shoppers		Carrefour Shoppers		Total Shoppers	
	No.	%	No.	%	No.	%	No.	%
<b>Occupation</b>								
Corp exec. manager, supervisor	3	3.0	3	3.0	3	3.0	9	3.0
Business owner	3	3.0	2	2.0	4	4.0	9	3.0
Engineer, technician	8	8.0	6	6.0	6	6.0	20	6.7
Professional	16	16.0	14	14.0	22	22.0	52	17.3
Clerk, salesperson, service worker	14	14.0	17	17.0	14	14.0	45	15.0
Operator	7	7.0	3	3.0	8	8.0	18	6.0
Administrative personnel	9	9.0	14	14.0	12	12.0	35	11.7
Industrial labor	4	4.0	5	5.0	4	4.0	13	4.3
Housekeeper	18	18.0	17	17.0	15	15.0	50	16.7
Student	7	7.0	11	11.0	1	1.0	19	6.3
Unemployed	2	2.0	4	4.0	2	2.0	8	2.7
Retired	6	6.0	3	3.0	6	6.0	15	5.0
Other	3	3.0	1	1.0	3	3.0	7	2.3
<b>Personal Monthly Income*</b>								
US\$660 or less	27	27.0	30	30.0	16	16.0	73	24.2
US\$661-\$990	21	21.0	19	19.0	25	25.0	65	21.7
US\$991-\$1,320	19	19.0	21	21.0	13	13.0	53	17.7
US\$1,321-\$1,650	9	9.0	10	10.0	13	13.0	32	10.7
US\$1,651-\$1,970	8	8.0	9	9.0	12	12.0	29	9.7
US\$1,971-\$2,300	6	6.0	3	3.0	5	5.0	14	4.7
US\$2,301-\$2,630	3	3.0	3	3.0	7	7.0	13	4.3
US\$2,631-\$2,960	1	1.0	2	2.0	4	4.0	7	2.3
US\$2,961-\$3,290	2	2.0	1	1.0	2	2.0	5	1.7
US\$3,291 or more	4	4.0	2	2.0	3	3.0	9	3.0
<b>Household Monthly Income*</b>								
US\$660 or less	1	1.0	4	4.0	3	3.0	8	2.7
US\$661-\$1,320	8	8.0	6	6.0	5	5.0	19	6.3
US\$1,321-\$1,970	20	20.0	29	29.0	25	25.0	74	24.7
US\$1,971-\$2,630	19	19.0	16	16.0	18	18.0	53	17.7
US\$2,631-\$3,290	22	22.0	20	20.0	19	19.0	61	20.3
US\$3,291-\$3,950	6	6.0	11	11.0	8	8.0	25	8.3
US\$3,951-\$4,940	14	14.0	7	7.0	14	14.0	35	11.7
US\$4,941-\$5,930	6	6.0	4	4.0	6	6.0	16	5.3
US\$5,931-\$6,580	1	1.0	0	0.0	0	0.0	1	.3
US\$6,581 or more	3	3.0	3	3.0	2	2.0	8	2.7
<b>Store Spending (per visit)*</b>								
US\$3.30 or less	30	30.0	4	4.0	2	2.0	36	12.0
US\$3.31-\$8.20	46	46.0	6	6.0	3	3.0	55	18.3
US\$8.21-\$16.50	14	14.0	6	6.0	11	11.0	31	10.3
US\$16.51-\$32.90	2	2.0	15	15.0	16	16.0	33	11.0
US\$32.91-\$65.80	4	4.0	21	21.0	41	41.0	66	22.1
US\$65.81-\$98.70	3	3.0	21	21.0	22	22.0	46	15.3
US\$98.71-\$148.00	1	1.0	12	12.0	4	4.0	17	5.7
US\$148.01-\$197.40	0	0.0	6	6.0	1	1.0	7	2.3
US\$197.41-\$246.80	0	0.0	4	4.0	0	0.0	4	1.3
US\$246.81-\$296.10	0	0.0	1	1.0	0	0.0	1	0.3
US\$296.11-\$329.00	0	0.0	2	2.0	0	0.0	2	0.7
US\$329.01 or more	0	0.0	2	2.0	0	0.0	2	0.7
<b>Shopping Frequency (last month)</b>								
0	2	2.0	25	25.0	9	9.0	36	12.0
1	8	8.0	28	28.0	30	30.0	66	22.0
2	12	12.0	28	28.0	31	31.0	71	23.7
3	13	13.0	8	8.0	13	13.0	34	11.3
4	6	6.0	5	5.0	8	8.0	19	6.3
5 or more	59	59.0	6	6.0	9	9.0	74	24.7
<b>Switching Stores (last year)</b>								
0	5	5.0	7	7.0	12	12.0	24	8.0
1	9	9.0	10	10.0	18	18.0	37	12.3
2	25	25.0	25	25.0	32	32.0	82	27.3
3	14	14.0	19	19.0	11	11.0	44	14.7
4	6	6.0	11	11.0	7	7.0	24	8.0
5 or more	41	41.0	28	28.0	20	20.0	89	29.7

This table presents the shoppers' demographic information and shopping characteristics for participants in this study. \* indicates 1 NT (Taiwan Dollar) = US\$0.03291 at the time of the survey.



## REFERENCES

- Beatson, A., Lings, I. and Gudergan, S. (2008). Employee behaviour and relationship quality: Impact on customers. *The service Industries Journal*, 28(2), 211-223
- Bloemer, J. and Odekerken-Schröder, G. (2002). Store satisfaction and store loyalty explained by customer- and store-related factors. *Journal of Consumer Satisfaction, Dissatisfaction and Complaining Behavior*, 15, 68-80
- Caceres, R.C. and Paparoidamis, N.G. (2007). Service quality, relationship satisfaction, trust, commitment and business to business loyalty. *European Journal of Marketing*, 41(7/8), 836-867
- Chen, H-C. and Green, R.D. (2009). Marketing mix and branding: Competitive hypermarket strategies. *International Journal of Management and Marketing Research*, 2(1), 17-34
- Cronin, J.J., Brady, M.K. and Hult, G.T.M. (2000). Assessing the effects of quality, value, and customer satisfaction on consumer behavioral intentions in service environments. *Journal of Retailing*, 76(2), 193-218
- Dagger, T.S., Sweeney, J.C. and Johnson, L.W. (2007). A hierarchical model of health service quality: Scale development and investigation of an integrated model. *Journal of Service Research*, 10(2), 123-141
- Dick, A.S. and Basu, K. (1994). Customer loyalty: Toward an integrated conceptual framework. *Journal of the Academy of Marketing Science*, 22(2), 99-113
- Dimitriadis, Z.S. (2006). Customer satisfaction, loyalty and commitment in service organizations: Some evidence from Greece. *Management Research News*, 29(12), 787-799
- Donio, J., Massari, P. and Passiante, G. (2006). Customer satisfaction and loyalty in a digital environment: An empirical test. *Journal of Consumer Marketing*, 23(7), 445-457
- Eakuru, N. and Mat, N.K.N. (2008). The application of structural equation modeling (SEM) in determining the antecedents of customer loyalty in banks in South Thailand. *The Business Review, Cambridge*, 10(2), 129-139
- Green, R.D. and Chen, H-C. (2010). Spousal purchasing behavior as an influence on brand equity. *International Journal of Management and Marketing Research*, 3(2), 1-17
- Green, S.B. (1991). How many subjects does it take to do a regression analysis?. *Multivariate Behavioral Research*, 26(3), 499-510
- Hair, Jr., J.F., Black, W.C., Babin, B.J., Anderson, R.E. and Tatham, R.L. (2006). *Multivariate Data Analysis* (6<sup>th</sup> ed.). Upper Saddle River, NJ: Pearson Prentice Hall
- Hennig-Thurau, T., Gwinner, K.P. and Gremler, D.D. (2002). Understanding relationship marketing outcomes: An integration of relational benefits and relationship quality. *Journal of Service Research*, 4(3), 230-247
- Ibrahim, H. and Najjar, F. (2008). Relationship bonding tactics, personality traits, relationship quality and customer loyalty: Behavioral sequence in retail environment. *The Icfai University Journal of Services Marketing*, 6(4), 1-37

- Jones, T. (1996). Why satisfied customer defect. *Journal of Management in Engineering*, 6(2/3), 11
- Kim, C., Zhao, W. and Yang, K.H. (2008). An empirical study on the integrated framework of e-CRM in online shopping: Evaluating the relationships among perceived value, satisfaction, and trust based on customers' perspectives. *Journal of Electronic Commerce in Organization*, 6(3), 1-19
- Kotler, P. (2005). According to Kotler: The World's Foremost Authority on Marketing Answers Your Questions. New York: AMACOM
- Kotler, P. and Keller, K.L. (2006). *Marketing Management* (12<sup>th</sup> ed.). Upper Saddle River, NJ: Pearson Prentice Hall
- Lemon, K.N., Rust, R.T. and Zeithaml, V.A. (2001). What drives customer equity. *Marketing Management*, 10(1), 20-25
- Liang, C.J. and Wang, W.H. (2004). Attributes, benefits, customer satisfaction and behavioral loyalty – an integrative research of financial services industry in Taiwan. *Journal of Services Research*, 4(1), 57-91
- McCarthy, E. J. (1971). *Basic Marketing: A Managerial Approach* (4<sup>th</sup> ed.). Homewood, Ill., R.D. Irwin
- Moliner, M.A., Sanchez, J., Rodriguez, R.M. and Callarisa, L. (2007). Relationship quality with a travel agency: The influence of the post-purchase perceived value of a tourism package. *Tourism and Hospitality Research*, 7(3/4), 194-211
- Morgan, R.M. and Hunt, S.D. (1994). The commitment-trust theory of relationship marketing. *Journal of Marketing*, 58(3), 20-38
- Nunnally, J.C. and Bernstein, I.H. (1994). *Psychometric Theory*. New York: McGraw-Hill
- Oliver, R.L. (1997). Satisfaction: A Behavioral Perspective on the Consumer. New York: McGraw Hill
- Reichheld, F.F. and Sasser, Jr., W.E. (1990). Zero defections. Quality comes to services. *Harvard Business Review*, 68(5), 105-111
- Reichheld, F.F. and Teal, T. (1996). *The Loyalty Effect: The Hidden Force Behind Growth, Profits, and Lasting Value*. Boston, Mass: Harvard Business School Press
- Roig, J.G.F., Garcia, J.S., Tena, M.A.M. and Monzonis, J.L. (2006). Customer perceived value in banking services. *International Journal of Bank Marketing*, 24(5), 266-283
- Rust, R.T., Lemon, K.N. and Zeithaml, V.A. (2001). Where should the next marketing dollar go? *Marketing Management*, 10(3), 24-28
- Smith, B. (1998). Buyer-seller relationships: Bonds, relationship management, and sex-type. *Revue Canadienne des Sciences de L'administration*, 15(1), 76-92
- Wills, B. (2009). The business case for environmental sustainability (green): Achieving rapid returns from the practical integration of lean & green. *Business Case for Environmental Sustainability*. (accessed February 7, 2011), [available at <http://www.leanandgreensummit.com/LGBC.pdf>]

Woodruff, R.B. (1997). Customer value: The next source for competitive advantage. *Journal of the Academy of Marketing Science*, 25(2), 139-153

Wulf, K. D., Odekerken-Schröder, G. and Lacobucci, D. (2001). Investments in consumer relationships: A cross-country and cross-industry exploration. *Journal of Marketing*, 65(4), 33-50

Yoo, B., Donthu, N. and Lee, S. (2000). An examination of selected marketing mix elements and brand equity. *Journal of the Academy of Marketing Science*, 28(2), 195-211

Zeithaml, V.A. (1988). Consumer perceptions of price, quality, and value: A means-end model and synthesis of evidence. *Journal of Marketing*, 52(3), 2-22

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