



ISSN 0148-2963  
VOLUME 59, NUMBER 12, NOVEMBER 2006



## JOURNAL OF BUSINESS RESEARCH

The relative strength of affective commitment in securing loyalty in service relationships  
*Heiner Evanschitzky, Gopalkrishnan R. Iyer, Hilke Plassmann, Joerg Niessing and Heribert Meffert*

Social capital, customer service orientation and creativity in retail stores  
*Omar Merlo, Simon J. Bell, Bilent Mengüç and Gregory J. Whitwell*

Emotional exhaustion and organizational deviance: Can the right job and a leader's style make a difference?  
*Jay Prakash Mulki, Fernando Jaramillo and William B. Locander*

The role of monitoring in interfirm exchange: Effects on partner unilateral cooperation  
*Cengiz Yilmaz and Ebru Tamer Kabadayi*

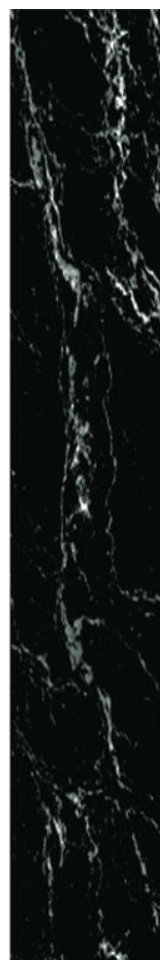
Local linkages and their effects on headquarters' use of process controls  
*Chwo-Ming Joseph Yu, Huang-Che Wong and Yu-Ching Chiao*

Managing relationships in showery weather: The role of umbrella agreements  
*Stefanos Moutzas and David Ford*

When do firms use different types of customer accounting?  
*Johnny Lind and Torkel Strömsten*

Are mergers and acquisitions contagious?  
*Christina Oberg and Johan Holström*

Leisure motives of eating out in night markets  
*Janet Chang and An-Tien Hsieh*



This article was originally published in a journal published by Elsevier, and the attached copy is provided by Elsevier for the author's benefit and for the benefit of the author's institution, for non-commercial research and educational use including without limitation use in instruction at your institution, sending it to specific colleagues that you know, and providing a copy to your institution's administrator.

All other uses, reproduction and distribution, including without limitation commercial reprints, selling or licensing copies or access, or posting on open internet sites, your personal or institution's website or repository, are prohibited. For exceptions, permission may be sought for such use through Elsevier's permissions site at:

<http://www.elsevier.com/locate/permissionusematerial>

## The relative strength of affective commitment in securing loyalty in service relationships

Heiner Evanschitzky<sup>a,\*</sup>, Gopalkrishnan R. Iyer<sup>b</sup>, Hilke Plassmann<sup>c</sup>,  
Joerg Niessing<sup>a</sup>, Heribert Meffert<sup>a</sup>

<sup>a</sup> Marketing Center Muenster, University of Muenster, Am Stadtgraben 13-15, 48143 Muenster, Germany

<sup>b</sup> Florida Atlantic University, 777 Glades Road, Boca Raton, FL 33431, USA

<sup>c</sup> Division of the Humanities and Social Sciences, California Institute of Technology MC 228-77, 1200 E California Boulevard, Pasadena, CA 91125, USA

Received 1 February 2006; received in revised form 1 June 2006; accepted 1 August 2006

### Abstract

While commitment is an important antecedent to customer retention, a broad consensus has yet to emerge on the impacts of constituent dimensions of commitment on loyalty in service relationships. This study explores the impacts of affective and continuance commitment on attitudinal and behavioral loyalty in a service context. Since affective commitment is more positive and governed by free choice, whereas continuance commitment is more the result of perceived economic and psychological benefits of being in a relationship, the results of this study suggest that emotional bonds with customers provide a more enduring source of loyalty as compared to economic incentives and switching costs. © 2006 Elsevier Inc. All rights reserved.

*Keywords:* Relationship marketing; Commitment; Loyalty; Service relationships; Emotional attachment

### 1. Research background and objectives

Relationship marketing approaches, in general, and services research, in particular, assert that obtaining customer loyalty is a preeminent goal for marketing strategy (Dick and Basu, 1994; Gwinner et al., 1998; Reichheld and Sasser, 1990). Researchers often express customer loyalty as repeat purchases (rebuying or repatronizing), but customer loyalty also reflects the customer's attitudinal state of intentions to repurchase (the likelihood of repurchase). Thus, loyalty has at least two essential and distinct components — attitudinal and behavioral. Behavioral loyalty reflects customer actions and involves the measurement of past purchases of the same brand or the same brand-set and/or the measurement of probabilities of future purchase given past purchase behaviors (Ehrenberg, 1988). Attitudinal loyalty, in

contrast, is the consumer's psychological disposition toward the same brand or brand-set and involves the measurement of consumer attitudes (Fournier, 1998; Jacoby and Chestnut, 1978). Both behavioral loyalty and attitudinal loyalty are important concepts for understanding long-term customer relationships, especially when the emphasis does not rest only on understanding past behaviors but is also on predicting future patronage by the customer (Dick and Basu, 1994; Kumar and Shah, 2004; Pritchard et al., 1999).

A logical antecedent to loyalty is the extent to which the customer desires to maintain a continuing relationship with the firm or brand, in other words, customer commitment (Fullerton, 2003; Morgan and Hunt, 1994; Uncles et al., 2003). Commitment is distinct from loyalty because commitment refers more to the economic, emotional and/or psychological attachments that the customer may have toward the brand, store, or service (Thomson et al., 2005). Such attachments are important precursors to loyalty since they are the fundamental appraisal mechanisms by which the customer determines whether and why to have a loyal relationship with a brand or firm (Beatty and Kahle, 1988).

Empirical research on commitment's impact on loyalty finds positive impacts of commitment on various loyalty dimensions

\* Corresponding author. Tel.: +49 251 8322036.

E-mail addresses: [evanschitzky@ifhm.de](mailto:evanschitzky@ifhm.de) (H. Evanschitzky),  
[giyer@fau.edu](mailto:giyer@fau.edu) (G.R. Iyer), [hilke\\_plassmann@hss.caltech.edu](mailto:hilke_plassmann@hss.caltech.edu) (H. Plassmann),  
[joerg.niessing@wiwi.uni-muenster.de](mailto:joerg.niessing@wiwi.uni-muenster.de) (J. Niessing),  
[heribert.meffert@wiwi.uni-muenster.de](mailto:heribert.meffert@wiwi.uni-muenster.de) (H. Meffert).

(Garbarino and Johnson, 1999; Gundlach et al., 1995; Morgan and Hunt, 1994). Beyond its impact on customer loyalty, the construct of commitment is also important in explaining a variety of relationships, including the employee–employer relationship (Allen and Meyer, 1990), manufacturer–distributor relationship (Geyskens et al., 1996), and romantic relationships (Rusbult, 1980). Citing prior research, Fullerton (2003) notes that commitment has also been conceptualized in the marketing literature as a pledge of continuity given by one party to another, the sacrifice faced by a party in the event a relationship ends, or even forsaking alternative options by one or both parties (Anderson and Weitz, 1992; Gundlach et al., 1995).

Some researchers acknowledge two distinct types of commitment — one that is more emotional in nature and another that is more economic in its structure (Allen and Meyer, 1990; Bansal et al., 2004; Fullerton, 2003; Pritchard et al., 1999). The emotional type is labeled affective commitment, and the economic type is labeled calculative commitment. Following Allen and Meyer (1990), affective commitment is the customer's emotional attachment to the brand or organization based on his or her identification with that brand or organization. Customers with strong commitments identify, trust, and are more emotionally connected with the brand or organization than do non-committed customers.

Continuance commitment is the motivational intent to continue the relationship, given high switching costs and scarcity of alternatives (Bendapudi and Berry, 1997). Such a commitment builds from cost-based calculations and results in commitment, not because the customer feels that he or she truly wants to engage in the long-term relationship (as in affective commitment), but because of a need to stay in the long-term relationship when no other comparable alternatives exist or the costs of switching to other options are too high (Meyer and Allen, 1997).

However, the recognition of commitment as a multi-dimensional construct that includes an affective component and a continuance component is quite recent (Fullerton, 2003; Gruen et al., 2000; Harrison-Walker, 2001; Pritchard et al., 1999). Fullerton (2003) finds a significant interaction of affective commitment and continuance commitment on loyalty. Pritchard, Havitz, and Howard (1999) find that commitment conceptualized as “resistance to change” is a key precursor to loyalty. Commitment is also a key antecedent to retention, as noted in studies within marketing (Brown and Peterson, 1993) and in organizational behavior (Reichers, 1985). However, the relative impacts of the two dimensions of commitment on the two loyalty dimensions receive less rigorous attention in the literature. Understanding the relative impacts helps to clarify the inconsistencies in prior research results, and provides strategic managerial guidance on customer loyalty programs.

The current study focuses on the relative impacts of the two commitment dimensions on the two loyalty dimensions. Specifically, customer commitment is composed of affective and continuance dimensions, and customer loyalty includes attitudinal and behavioral loyalty. The study explores the relative importance of each dimension of commitment in obtaining customer loyalty in a service setting. The section below elaborates the model and hypotheses.

## 2. Model and hypotheses

Researchers within the field of marketing have focused attention on identifying the impacts of the unidimensional conception of commitment, as well as on the precursors to the different unidimensional measures of loyalty. However, given that both commitment and loyalty are multi-dimensional constructs, research has ignored the relative impacts of different dimensions of commitment on the varied dimensions of loyalty. Literature from marketing, along with research from the related fields of management and organizational behavior provides sufficient justification for identifying the impacts of affective and continuance commitment on attitudinal and behavioral loyalty.

### 2.1. Effects on attitudinal loyalty

Attitudinal loyalty reflects the customer's psychological disposition toward the same brand or same brand-set. As such, attitudinal loyalty reflects favorable attitudes toward the brand or organization (Dick and Basu, 1994). Attitudinal loyalty towards a brand or firm is enhanced when the relative strength of the attitude toward the brand or firm is stronger as compared with other brands or firms. Building attitudinal loyalty involves more than simple transactional marketing incentives; positive attitudes towards one's brands or firm must be cultivated over a longer term relationship horizon (Kumar and Shah, 2004). Commitment has a significant role in cultivating attitudinal loyalty, since commitment reflects the customers' self-evaluation of the consumption context and the active decision to engage in a long-term relationship with a brand or a firm.

Affective commitment involves the desire to maintain a relationship that the customer perceives to be of value (Morgan and Hunt, 1994). Affective commitment incorporates the underlying psychological state that reflects the affective nature of the relationship between the individual customer and the service provider (Gundlach et al., 1995; Kumar et al., 1995). The identification that the customer feels toward the brand or the firm often translates into positive feelings expressed to others about the brand or firm (Harrison-Walker, 2001). Thus, the emotional attachment that affective commitment entails translates into strong attitudinal loyalty both through the extremity of the attitude (attitude strength) and the extent to which the customer is willing to lock into a specific relationship (attitudinal differentiation) (Dick and Basu, 1994; Fullerton, 2003), as modeled in the hypothesis below.

**H<sub>1</sub>.** Affective commitment has a positive impact on attitudinal loyalty.

Continuance commitment, on the other hand, is the consumer's desire to remain in the relationship when the switching costs are high or when the consumer perceives that other viable alternatives are scarce. In such cases, the consumer, out of habit or inertia, not only continues the long-term relationship with the brand or the firm, but also develops an emotional attachment (Dowling and Uncles, 1997). Thus, consumers may remain in a

relationship solely because they have no reason to evaluate the relationship or to take active measures to seek out alternative relationships. Another reason for continuing the relationship could be the high perceived costs of switching, especially for products or relationships that require extensive investments in learning. Past research shows that high costs are a major factor for remaining in a long-term relationship (Burnham et al., 2003; Jones et al., 2002). Whether due to repeated past behaviors or high switching costs, the consumer may develop an affective response to the service firm and also rule out the possibility of alternative relationships. Therefore:

**H<sub>2</sub>.** Continuance commitment has a positive impact on attitudinal loyalty.

### 2.2. Effects on behavioral loyalty

Affective commitment or the psychological motivation to be in a long-term relationship contributes to feelings of attachment and identification with the brand or the firm (Fullerton, 2003). Such feelings also contribute to a “partnership” relationship between the consumer and the brand or the service firm (Fournier, 1998). The immediate resulting impacts of such feelings are on consumer patronage of the brand or the firm. Moreover, affective commitment is characterized by a desire-based attachment of the customer, meaning that the customer is loyal because she or he wants to be loyal. Past research has shown that the strength of consumers’ attitudes toward a brand is a very good indicator of their brand loyalty behavior (Aaker, 1996; Keller, 1998). In the case of service firms as well, the variety of different benefits realized by the consumer leads to positive attitude toward the service, and to continuing patronage (Gwinner et al., 1998). Therefore:

**H<sub>3</sub>.** Affective commitment has a positive impact on behavioral loyalty.

Continuance commitment, on the other hand, is based more on the consumer’s consumption context, and the consumer may not be directly able to manipulate his or her level of continuance commitment. For example, continuance commitment may result from scarcity of alternatives, that is, the consumer’s desire to maintain a long-term relationship with the firm may be due more to the fact that competing alternatives are not simply available. Jones and Sasser (1995) provide examples of instances where loyalty to a firm may exist despite a low satisfaction level of the consumer experience. They find that the competitive environment affects the satisfaction–loyalty relationship, and in industries such as local telephones and airlines, they note that customer loyalty was high despite low consumer-satisfaction levels, primarily because consumers did not have alternatives. In terms of commitment, the consumer’s desire to maintain the long-term relationship, and the resulting high level of behavioral loyalty, would stem from the absence or scarcity of viable alternatives. Therefore:

**H<sub>4</sub>.** Continuance commitment has a positive impact on behavioral loyalty.

### 2.3. The relative impacts of different forms of commitment

In terms of the two forms of commitment, affective commitment produces a positive valence toward the brand or firm that is based on emotional attachments, while continuance commitment may produce a positive affect that is based more on economic and other contextual circumstances. Relationships formed on the basis of affective commitment hinge on identification and shared values, while those formed on the basis of continuance commitment rely on the dependence of the consumer, either due to lack of alternatives, high switching costs, or other constraints (Bendapudi and Berry, 1997; Gundlach et al., 1995).

Consumer loyalty could be derived from either forms of commitment; however, in terms of the relative strengths of the attachments, affective commitment produces a stronger link to both dimensions of loyalty as compared to continuance commitment. This is because the essence of affective commitment is the emotional attachment to the brand or the firm in a consumption relationship (Fullerton, 2003). Affective commitment involves feelings of attachment, trust, and identification, as compared to continuance commitment, which is based more on dependence and entrapment (Fullerton, 2003). Thus, affective commitment signifies bonding in a context of free will and choice, while continuance commitment signifies realization of benefits in a context of dependence and perceived lack of alternatives.

A positive attitudinal response is more likely obtainable in conditions of free will and choice than in the context of perceived dependence. At the same time, attitudinal responses are more favorable when they build from emotional attachments rather than on economic incentives (Dowling and Uncles, 1997). Also, Fullerton (2003) finds that affective commitment has a positive impact on the consumers’ intentions to advocate on behalf of their relationship partners. In contrast, consumers feeling trapped or dependent in a relationship (i.e., continuance commitment) are less likely to act as advocates on behalf of their partners. Thus, attitudinal commitment would have a greater impact on attitudinal loyalty in comparison with the effects of continuance commitment on attitudinal loyalty.

Favorable attitudes are a better predictor of behavior than are economic incentives or dependence (Dowling and Uncles, 1997; Gwinner et al., 1998). Thus, affective commitment would have a greater impact on attitudinal loyalty than continuance commitment. Therefore:

**H<sub>5</sub>.** The impacts of affective commitment on both attitudinal and behavioral loyalty are greater than the impacts of continuance commitment on attitudinal and behavioral loyalty.

Fig. 1 depicts the conceptual model as well as the two alternative models that this study examines.

## 3. Method and measures

Measures for the key constructs were developed from prior literature. The study adapts the three-item scale of Kumar, Stern, and Steenkamp’s (1995) to measure affective commitment. The three items capture the extent to which customers trust the provider firm, identify with the provider firm, and feel an emotional

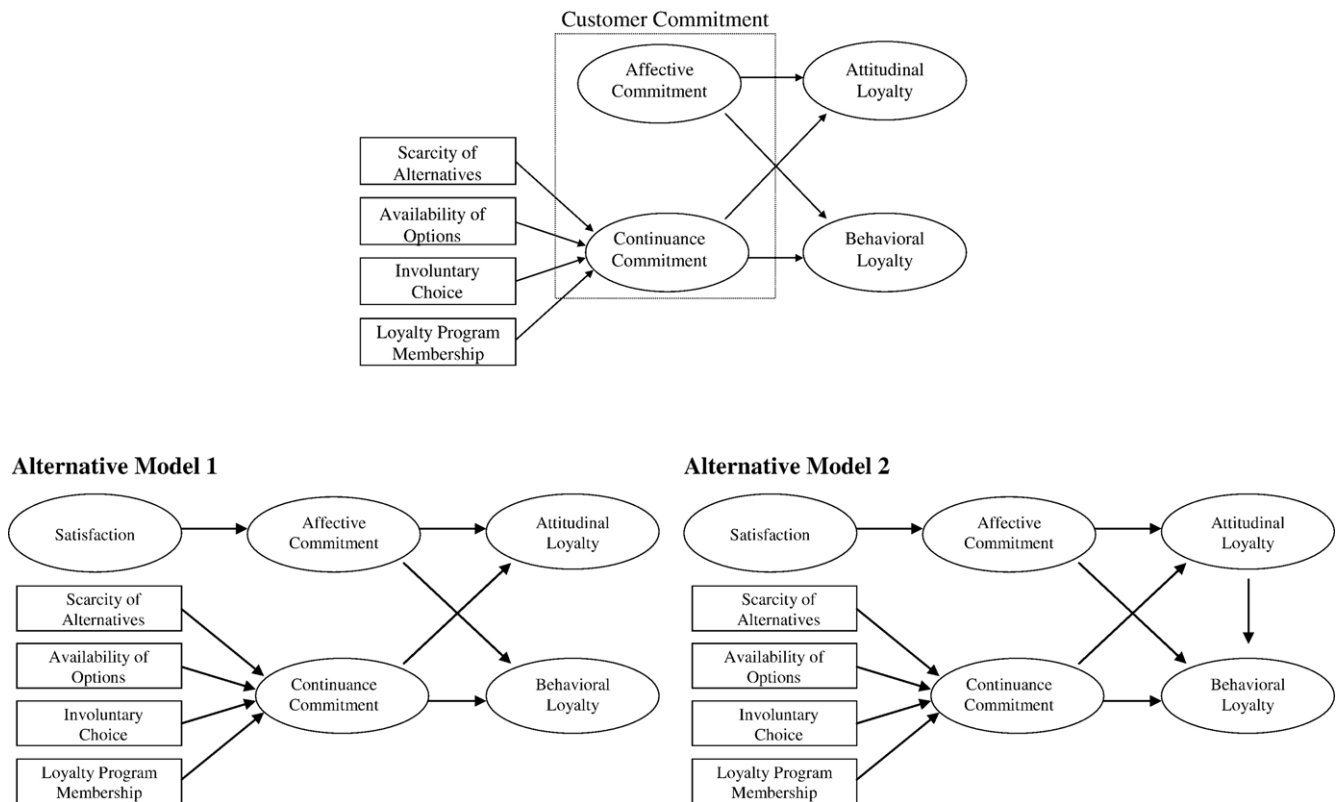


Fig. 1. Panel A: Conceptual model. Panel B: Alternative models.

bonding to the provider firm. The study measures attitudinal loyalty using two indicators of the customer's intention to purchase (Narayandas, 1997). The study measures behavioral loyalty using two items reflecting the actual purchase behavior.

While affective commitment, behavioral loyalty, and attitudinal loyalty have been measured with reflective measurement models, continuance commitment is understood as a formative construct. In a formative measurement model, the measured variables cause the construct as opposed to the commonly used reflective measurement models, where the latent constructs cause the measured variables (Hair et al., 2006). Diamantopoulos and Winklhofer (2001) and Jarvis, MacKenzie, and Podsakoff (2003) provide discussions of the different treatments for formative and reflective constructs. The formative indicators of continuance commitment are the major factors that customers identified as being important in their use of a particular service provider, and include measures for scarcity of alternatives, availability of options, involuntary choice, and loyalty program membership. These formative indicators are context-specific and derived from focus group research conducted prior to the quantitative data collection. The study also measures the overall level of continuance commitment by using a single-item indicator for the customer's commitment to the service provider.

The study measures customers' overall satisfaction with the service provider using two indicators, and measures several demographic variables to compare the sample characteristics with known population characteristics. All items include five-point Likert-type scale responses. Table 1 provides the reflective

indicators for attitudinal loyalty, behavioral loyalty, affective commitment and overall satisfaction. Table 2 provides the formative indicators for continuance commitment in Panel B.

The measures were refined through two focus groups with ten actual customers each. Interviews with ten mass transit experts helped refine the questionnaire for the specific context of mass transit service. A pilot study using 35 customers further refined the questionnaire.

Table 1 provides the means, standard deviations, standardized loading, and composite reliability for the latent constructs, and Table 2 provides the appropriate measurement results for the formative indicators of continuance commitment.

Hypotheses were tested from data collected on customer relationships to a large Western European mass transit service provider. Trained interviewers used an intercept survey to collect data from various regions of one country. After eliminating questionnaires with extensive missing data, the final sample consisted of 2389 observations. Managers at the mass transit service firm compared the sample characteristics along key demographics and reported behavioral dimensions, providing assurance that the sample was representative of their customer base.

A confirmatory factor analysis (CFA) was used to assess the measurement reliability of the reflective constructs of affective commitment, behavioral loyalty, and attitudinal loyalty. Convergent validity was examined through standardized factor loadings, construct reliability, and the variance extracted, as suggested by Bagozzi and Yi (1988) and Hair et al. (2006). All

standardized factor loadings were greater than the minimum acceptable level of 0.5, and only one item had a loading lower than the preferred level of 0.7. The construct reliability for all the reflective measures was greater than 0.7 suggesting adequate internal consistency. Also, the variance extracted for all the factors were greater than 0.5. Taken together, these results suggest adequate evidence of convergent validity. Discriminant validity was also evident, since the variance extracted for each pair of factors was greater than the square of the correlation between each of those two factors (Fornell and Larcker, 1981; Hair et al., 2006). Panel A of Table 2 shows the correlations between the latent constructs, as well as the variance extracted by the CFA.

Apart from the direction of causality from the indicator to the construct, formative measures do not share a common conceptual basis (Hair et al., 2006). Therefore, formative measures are less likely to be highly correlated. Instead, the set of formative indicators must adequately explain the variance in the latent construct. In formative measurement theory, the error in measurement is the inability of the measured variables to fully explain the construct (Hair et al., 2006). As Panel B of Table 2 shows, the four formative indicators of continuance commitment explain about 60% of the variation in the construct and are significant predictors of the overall measure of continuance commitment used in the study. Thus, the formative measurement model for continuance commitment has acceptable validity (Diamantopoulos and Winklhofer, 2001; Hair et al., 2006).

Table 1  
Reflective measures and confirmatory factor analysis results

Measure <sup>a</sup>	Mean	S.D.	Std. loading	Construct reliability
Attitudinal loyalty ( $\alpha=.77$ )				0.866
I would recommend the [service provider] in the future	3.37	1.08	.972	
I will prefer this [service provider] as opposed to others in the future	3.26	0.94	.767	
Behavioral loyalty ( $\alpha=.91$ )				0.913
Amount of use in the past 12 months	3.18	1.19	.950	
Extent of preference as compared to competitors in the past 12 months	2.98	1.06	.881	
Affective commitment ( $\alpha=.75$ )				0.783
I feel that I can trust the [service provider]	3.92	1.16	.817	
I identify with the [service provider]	3.45	1.21	.773	
I feel emotionally attached to the [service provider]	3.01	1.07	.619	
Overall satisfaction ( $\alpha=.75$ )				0.742
I am satisfied with [service provider]	2.50	0.82	.797	
Overall, I am [...] with the [service provider]	2.55	0.83	.739	

<sup>a</sup> All items except those for Behavioral Loyalty were measured using 5-point Likert-type scales, where “1” represented the strongest possible (e.g., “very satisfied” or “very likely”) and “5” the weakest possible (e.g., “very dissatisfied” or “very unlikely”). Behavioral Loyalty items were calculated based on use and preference responses.

Table 2

Panel A: Correlation matrix of the latent constructs				
Continuance commitment	1			
Affective commitment	.12	1		
Attitudinal loyalty	.15	.67	1	
Behavioral loyalty	.49	.65	.69	1
Average variance extracted	.77	.55	.58	.84
All correlations are significant at the .05-level				
Panel B: Correlations for formative indicators and regression to overall indicator				
	Regression coefficient to overall continuance commitment	Correlations between formative indicators		
“I do not own a car”	.65 <sup>a</sup>	1		
“I use the service provider since my employer requires me to do so”	.23 <sup>a</sup>	0.11 <sup>b</sup>	1	
“I use the service provider because there are no alternatives”	.24 <sup>a</sup>	0.13 <sup>b</sup>	0.01	1
“I use the service provider because I have a loyalty rebate card”	.24 <sup>a</sup>	0.14 <sup>b</sup>	0.03	0.01
	$R^2 = .60$			

<sup>a</sup> Significant at .01-level.

<sup>b</sup> Significant at .05-level.

Since the data were obtained from the same informant and three out of the four constructs use subjective measures (only “behavioral loyalty” is measured objectively), a possibility of common method bias (CMB) exists. One of the more commonly used methods to test for CMB reviewed by Podsakoff et al. (2003) was used and the model was estimated again with a single-method first-order factor added to the indicators of the three subjectively evaluated constructs. Results reveal that even with common-method variance controlled, fit-indices and the proportion of variance explained were almost unchanged in the analytical models, and all path coefficients remain significant. Therefore, CMB is not a significant issue in the study.

#### 4. Results

Structural analysis results provide a good fit of the model tested to the data, as indicated by the various fit indices (CFI=.964, TLI=.949, RMSEA=.067, and SRMR=.056). As can be seen from Table 3, affective commitment has positive and significant impacts on both attitudinal loyalty (0.77,  $p<.05$ ) and behavioral loyalty (0.59,  $p<.05$ ), lending support for H<sub>1</sub> and H<sub>3</sub>, respectively. Also, continuance commitment has a weak, yet significant, impact on attitudinal loyalty (.06,  $p<.05$ ), and a relatively strong impact on behavioral loyalty (.43,  $p<.05$ ). Therefore, H<sub>2</sub> and H<sub>4</sub> are supported as well.

To test H<sub>5</sub>, the study uses multi-group causal analysis to compare the two pairs of path coefficients comprising of the effects of each commitment dimension on attitudinal loyalty to

their respective effects on behavioral loyalty. The analysis then includes computing an unrestricted model, and restricted the path under investigation to be equal across subgroups. A difference in relative effects exists if the change in the chi-square value between the unrestricted and restricted is statistically significant. For the restricted model for affective commitment, the critical value of the chi-square difference test was 3.84 and significant ( $p < .05$ ). The impact of affective commitment on attitudinal and behavioral loyalty was significantly greater than the impacts of continuance commitment on the two loyalty dimensions. These results support  $H_5$ .

#### 4.1. Alternative models

The study tests two alternate model fits to the data (as depicted in Panel B of Fig. 1) to check for the robustness of the results. The first model allows satisfaction to be an antecedent to commitment. Prior studies suggest the important antecedent role of satisfaction in securing customer loyalty. However, in a model with commitment as the antecedent to loyalty, Garbarino and Johnson (1999, p. 72) propose that, for high relational customers, commitment is a more appropriate mediator between component attitudes and future intentions than is satisfaction.

Since an intention to repurchase could be the logical a priori to actual repurchase behaviors, the study allowed attitudinal loyalty to be an antecedent to behavioral loyalty in the second alternate model. This model still retains satisfaction as an antecedent to commitment. Both alternate models are non-nested covariance structure models, meaning that the one is not

a constrained version of the other. Therefore, the study evaluates the models by comparing all fit indices, and also uses Akaike's information criterion AIC (Rust et al., 1995).

The results in Table 3 indicate that the two alternate models show acceptable fit with the data. However, the various model fit measures for the focal model are still superior to the two alternate models. Thus, despite the addition of an antecedent variable, viz. satisfaction, and the additional link between attitudinal loyalty and behavioral loyalty, the hypothesized results do not change.

#### 5. Discussion, limitations, and future research

This study measures the relative impacts of two commitment dimensions on the two customer loyalty dimensions that are frequently used in the marketing literature. The introduction of two distinct dimensions of commitment, namely continuance commitment and affective commitment, led to empirical results that support the two-dimensional conceptualization of commitment. Continuance commitment could arise from a lack of alternatives, the presence of a rebate loyalty card, or external incentives or pressures that determined loyalty. However, results indicate that affective commitment, rather than continuance commitment, influences loyalty to a much higher degree. The relatively stronger impact of affective commitment, as compared to continuance commitment, is consistent with the results of other researchers (e.g., Fullerton, 2003). The findings of this study show that affective commitment drives behavioral loyalty. This finding has important implications for recent research within customer loyalty that acknowledges loyalty as being a multi-dimensional construct.

The findings have important implications for managers. Given the relative importance of affective commitment, service providers who focus on increasing patronage merely through economic incentives, such as loyalty discount cards, may not be doing enough to secure customer loyalty. This finding is relevant for the European mass transit context examined here since discounts of as much as 50% off the regular fare prices is a common practice. These providers must therefore focus more on enhancing customer attachment through non-economic means. Affective commitment would contribute to enhancing customer loyalty both in terms of their repurchase intentions as well as their actual repeat patronage behaviors. More importantly, however, the results of this study suggest that strains on the firm's bottom line through providing deep discounts may be inappropriate and relatively less important in securing long-term customer loyalty. Instead, the money may be better spent on loyalty programs that focus on building affective commitment.

Several methods are available for strengthening affective commitment. One method could be the creation of a community of users, either a club or a specific website, through which customers exchange their experiences with the service provider, as well as with other customers. Another method for strengthening affective commitment could be the creation of programs that stress the service provider's brand identity with the customers. Yet another way could be to use loyalty rewards and similar incentives only in the context of a broader program of customer relationship management that emphasizes the

Table 3  
Structural model results for focal and alternative models

Paths tested	Focal model	Alternative model 1	Alternative model 2
Affective commitment → attitudinal loyalty	.766 <sup>b</sup>	.751 <sup>b</sup>	.751 <sup>b</sup>
Affective commitment → behavioral loyalty	.594 <sup>b</sup>	.537 <sup>b</sup>	.249 <sup>b</sup>
Continuance commitment → attitudinal loyalty	.060 <sup>a</sup>	.075 <sup>a</sup>	.075 <sup>a</sup>
Continuance commitment → behavioral loyalty	.426 <sup>b</sup>	.439 <sup>b</sup>	.407 <sup>b</sup>
Attitudinal loyalty → behavioral loyalty	–	–	.431 <sup>b</sup>
Satisfaction → affective commitment	–	.629 <sup>b</sup>	.629 <sup>b</sup>
Satisfaction → continuance commitment	–	.002	.002
Model fit results			
DF	42	63	63
Chi-square/DF	4.580	6.225	6.225
CFI	.964	.938	.938
TLI	.949	.917	.917
AIC	81,360.629	87,269.241	87,269.241
RMSEA	.067	.074	.074
SRMR	.056	.061	.061
$R^2$ (attitudinal loyalty)	.604	.585	.585
$R^2$ (behavioral loyalty)	.604	.591	.668

<sup>a</sup> Significant at .01-level.

<sup>b</sup> Significant at .05-level.

development of stronger attitudinal loyalty rather than short-term repeat purchase behaviors.

As with all empirical studies, this study suffers from some limitations. First, the service context studied was a mass transit service. While many aspects of consumer relationships with service providers can be generalized to other service contexts, the extent of such generalizations may well be limited. In retrospect, however, the mass transit service context allowed exploration of the multiple dimensions of commitment and loyalty within a single context.

The study used cross-sectional survey data, neglecting possible time-lag effects. Replications of the relationships found in this study in different service and cultural contexts would help in identifying the boundary conditions for generalizations to theory. Moreover, longitudinal data would further improve an understanding of the mechanisms influencing different loyalty dimensions. Also, the relationships between commitment and loyalty could be explored for different customer groups, with the groups based on socio-demographic characteristics.

Future research could analyze in more detail the diverse drivers of affective commitment, and could develop more encompassing measures of the construct. Oliver's (1999) four-stage loyalty model suggesting a chain of causation between different loyalty levels would be useful for future longitudinal research to understand the specific impacts of commitment dimensions on the various loyalty stages (Evanschitzky and Wunderlich, 2006). By demonstrating the links between dimensions of commitment and dimensions of loyalty, and the relative importance of affective commitment, this research initiates a move toward a more integrative model of customer commitment and loyalty.

## References

- Aaker D. Building strong brands. Boston, MA: The Free Press; 1996.
- Allen NJ, Meyer JP. The measurement and antecedents of affective, continuance and normative commitment to the organization. *J Occup Psychol Soc* 1990;63(1):1–18.
- Anderson E, Weitz B. The use of pledges to build and sustain customer commitment in distribution channels. *J Mark Res* 1992;29:18–34 [February].
- Bagozzi RP, Yi Y. On the evaluation of structural equation models. *J Acad Mark Sci* 1988;16(1):74–94.
- Bansal HS, Irving PG, Taylor SF. A three-component model of customer commitment to service providers. *J Acad Mark Sci* 2004;32(3):109–250.
- Beatty SE, Kahle LR. Alternative hierarchies of the attitude–behavior relationship: the impact of brand commitment and habit. *J Acad Mark Sci* 1988;16:1–10 [Summer].
- Bendapudi N, Berry L. Customers' motivations for maintaining relationships with service providers. *J Retail* 1997;73(1):15–37.
- Brown SP, Peterson RA. Antecedents and consequences of salesperson job satisfaction: meta-analysis and assessment of causal effects. *J Mark Res* 1993;30:63–77 [February].
- Burnham TA, Fels JK, Mahajan V. Consumer switching costs: a typology, antecedents, and consequences. *J Acad Mark Sci* 2003;31(2):234–50.
- Diamantopoulos A, Winklhofer HM. Index construction with formative indicators: an alternative to scale development. *J Mark Res* 2001;38(2):269–77.
- Dick AS, Basu K. Customer loyalty: toward an integrated conceptual framework. *J Acad Mark Sci* 1994;22:99–113 [Winter].
- Dowling G, Uncles M. Do customer loyalty programs really work? *Sloan Manage Rev* 1997;38:71–82 [Summer].
- Ehrenberg ASC. Repeat-buying: facts, theory and application. New York: Oxford University Press; 1988.
- Evanschitzky H, Wunderlich M. An examination of moderator effects in the four-stage loyalty model. *J Serv Res* 2006;8(4):330–45.
- Fornell C, Larcker DF. Evaluating structural equation models with unobservable variables and measurement error. *J Mark Res* 1981;18(1):39–50.
- Fournier S. Consumers and their brands: developing relationship theory in consumer research. *J Consum Res* 1998;24:343–73 [March].
- Fullerton G. When does commitment lead to loyalty? *J Serv Res* 2003;5(4):333–44.
- Garbarino E, Johnson MS. The different roles of satisfaction, trust, and commitment in customer relationships. *J Mark* 1999;63:70–87 [April].
- Geyskens I, Steenkamp JBEM, Scheer LK, Kumar N. The effects of trust and interdependence on relationship commitment: a trans-atlantic study. *Int J Res Mark* 1996;13:303–17 [October].
- Gruen TW, Summers JO, Acito F. Relationship marketing activities, commitment, and membership behaviors in professional associations. *J Mark* 2000;64(3):34–49.
- Gundlach GT, Arhol RS, Mentzer JT. The structure of commitment in exchange. *J Mark* 1995;59:78–92 [January].
- Gwinner K, Gremler D, Bitner MJ. Relational benefits in service industries: the customer's perspective. *J Acad Mark Sci* 1998;26(2):101–14.
- Hair Jr JF, Black WC, Babin BJ, Anderson R, Tatham R. Multivariate data analysis. 6th ed. Upper Saddle River: Prentice Hall; 2006.
- Harrison-Walker J. The measurement of word-of-mouth communication and an investigation of service quality and customer commitment as potential antecedents. *J Serv Res* 2001;4:60–75 [August].
- Jacoby J, Chestnut RW. Brand loyalty: measurement and management. New York, NY: Wiley; 1978.
- Jarvis CB, MacKenzie SB, Podsakoff PM. A critical review of construct indicators and measurement model misspecification in marketing and consumer research. *J Consum Res* 2003;30:199–218 [September].
- Jones TO, Sasser WE. Why satisfied customers defect. *Harvard Bus Rev* 1995;73:88–99 [November/December].
- Jones MA, Mothersbaugh DL, Beatty SE. Switching barriers and repurchase intentions in services. *J Retail* 2002;76(2):259–74.
- Keller KL. Strategic brand management. Upper Saddle River, NJ: Prentice-Hall; 1998.
- Kumar V, Shah D. Building and sustaining profitable customer loyalty for the 21st century. *J Retail* 2004;80(4):317–30.
- Kumar N, Stern LW, Steenkamp JBEM. The effects of perceived interdependence on dealer attitudes. *J Mark Res* 1995;32:348–56 [August].
- Meyer J, Allen N. Commitment in the workplace: theory, research and application. Thousand Oaks, CA: Sage; 1997.
- Morgan RM, Hunt SD. The commitment–trust theory of relationship management. *J Mark* 1994;58:20–38 [July].
- Narayandas N. Measuring and managing the consequences of customer loyalty: an empirical investigation. Working Paper, vol. 98-003. Cambridge, MA: Harvard Business School; 1997.
- Oliver RL. Whence consumer loyalty? *J Mark* 1999;63:33–44 [Special Issue].
- Podsakoff PM, MacKenzie SB, Yeon LJ, Podsakoff NP. Common method biases in behavioral research: a critical review of the literature and recommended remedies. *J Appl Psychol* 2003;88(5):879–903.
- Pritchard MP, Havitz ME, Howard D. Analyzing the commitment–loyalty link in service contexts. *J Acad Mark Sci* 1999;27(3):333–48.
- Reichers AE. A review and reconceptualization of organizational commitment. *Acad Manage Rev* 1985;10:465–76 [July].
- Reichheld FF, Sasser Jr WE. Zero defections: quality comes to services. *Harvard Bus Rev* 1990;68(5):105.
- Rusbult CE. Commitment and satisfaction in romantic relationships. *J Exp Soc Psychol* 1980;16:172–86.
- Rust RT, Lee C, Valente Jr E. Comparing covariance structure models: a general methodology. *Int J Res Mark* 1995;12:279–91.
- Thomson M, MacInnis DJ, Park CW. The ties that bind: measuring the strength of consumers' emotional attachments to brands. *J Consum Psychol* 2005;15(1):77–91.
- Uncles MD, Dowling GR, Hammond K. Customer loyalty and customer loyalty programs. *J Consum Mark* 2003;20(4/5):294–316.