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# Know Your Customer: How Salesperson Perceptions of Customer Relationship Quality Form and Influence Account Profitability

Firms often utilize salesperson intelligence in marketing strategies to improve sales performance. However, this approach is problematic if the information is based on inaccurate perceptions. In light of this, the authors introduce a theoretical model to study the antecedents and profit impact of salesperson perceptions of customer relationship quality. Dyadic analyses using matched survey responses from salesperson–customer dyads and secondary performance data reveal several insightful findings. Results show that self-efficacious salespeople are upwardly biased, whereas customer-oriented salespeople are downwardly biased in their perceptions of customer relationship quality. However, managers can correct these inaccuracies using a behavior-based control system. Response surface analyses illustrate that the effects of salesperson accuracy and inaccuracy are distinct and curvilinear. During later relationship phases, salespeople profit more from salesperson accuracy in high- and low-quality relationships (i.e., a U-shaped effect). Yet the increasingly harmful impact of salesperson inaccuracy on profit is more severe during earlier relationship phases. Together, these findings highlight the benefits of measuring salesperson perceptions and how to manage them.

Keywords: salesperson accuracy, customer relationship management, dyadic modeling, perceptual bias, response surface analysis

Online Supplement: http://dx.doi.org/10.1509/jm.13.0300

Salespeople represent key informants in strategic planning (Sharma and Lambert 1994) and critical implementers of the marketing concept (Hughes and Ahearne 2010). As a result, marketing organizations often rely on salesperson information to guide decisions. This has prompted many firms to invest heavily in applications such as customer relationship management (CRM) systems (more than \$1 billion in 2012; Columbus 2013) to help salespeople collect valuable customer information and, consequently, improve individual and firm decision-making

effectiveness. However, in relying on a salespeople's subjective perceptions of their customers, firms may face financial risk when these perceptions do not accurately reflect their customer relationships.

For example, salesperson perceptions are often used alongside quantitative metrics such as profitability to guide customer prioritization decisions (Homburg, Droll, and Totzek 2008). When inaccurate, salespeople are more likely to prioritize relationships that do not reflect customers' true profit potential and, more importantly, disrupt the firm's large-scale strategic plans (Lambert, Marmorstein, and Sharma 1990). Compounding the problem, a purely quantitative prioritization strategy is also at risk because lowertier customers may already be underperforming as a result of inaccurate salesperson perceptions. Still, the potential for salesperson perceptions to improve customer relationship outcomes has left this issue largely overlooked.

To fully benefit from strategies that incorporate salesperson intelligence (e.g., sales forecasting), firms need more guidance in understanding how to manage salesperson perceptions. Although there has been a renewed interest in examining this phenomenon recently (e.g., Homburg, Bornemann, and Kretzer 2013; Sharma and Lambert 1994; Vosgerau, Anderson, and Ross 2008), three important research gaps remain.

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First, although extant literature has provided empirical evidence that documents causes of inaccuracy at the firm level, research about the causes of inaccuracy at the salesperson level is still scarce (for an exception, see Homburg, Bornemann, and Kretzer 2013). This focus is important because sales leaders need help understanding why and when salesperson perceptions are inaccurate. Second, findings on the effects of perceptual inaccuracy have been mixed. Some research has suggested that salesperson perceptual inaccuracy negatively influences salesperson behavior (e.g., Homburg, Bornemann, and Kretzer 2013; Sharma and Lambert 1994). In contrast, Vosgerau, Anderson, and Ross (2008) show that overestimating relational closeness reduces conflicts and improves relationship functioning. Furthermore, it remains unclear whether outcomes of perceptual inaccuracy at the firm level (e.g., Vosgerau, Anderson, and Ross 2008) extend to salesperson-customer dyads. This is an important research question because salespersoncustomer relationships are more interpersonal than firmlevel relationships, which increases the likelihood that inaccuracy has significant financial implications.

Third, prior marketing research on perceptual accuracy has focused on the difference between each party's responses (e.g., extent of inaccuracy between the salesperson and the customer) while neglecting the level of the responses (e.g., values at which accuracy occurs).<sup>1</sup> Intuitively, this distinction is critical because accuracy at low versus high levels might influence financial returns differently. Moreover, conceptualizations that include the presence, but not the level, of accuracy may limit or even confound findings (e.g., Edwards 1995). Our use of response surface analyses in this study effectively addresses this limitation.

In light of this discussion, we aim to contribute to the literature by studying (1) factors that explain why and when salesperson relationship quality matches or differs from customer relationship quality and (2) the profit impact of salesperson accuracy and inaccuracy during multiple relationship phases. We define "customer relationship quality" as the combined strength of a customer's trust in, satisfaction with, and commitment to a given salesperson, and we define "salesperson relationship quality" as the combined strength of a salesperson's perceptions of a given customer's trust in, satisfaction with, and commitment to him/ her. In line with these definitions, "salesperson accuracy" occurs when salesperson relationship quality matches customer relationship quality (i.e., the two responses are the same), and "salesperson inaccuracy" occurs when salesperson relationship quality is higher or lower than customer relationship quality (i.e., the two responses differ). For our empirical test, we use a unique data set of matched survey and secondary profitability data from salesperson-customer dyads of an industrial goods supplier.

For the antecedent factors, we use a dyadic analysis to simultaneously capture the effects of self-efficacy, customer orientation, and salesperson-customer similarity on both salesperson and customer relationship quality. We focus on these three antecedents because they reflect self-focused, customer-focused, and balanced perspective-taking, which determines whether salesperson relationship quality is above, below, or equal to customer relationship quality, respectively. Although prior research has shown that selfefficacy and customer orientation are positively correlated to customer relationship quality (e.g., Ahearne, Mathieu, and Rapp 2005; Williams and Attaway 1996), we find that these same factors bias salesperson relationship quality. Self-efficacious salespeople perceive customer relationship quality too optimistically, whereas customer-oriented salespeople perceive customer relationship quality too pessimistically. We also demonstrate that managers can counteract such biases with behavior-based control systems.

To understand profit outcomes, we use a response surface methodology to model customer profitability as a function of salesperson accuracy and salesperson inaccuracy. We also examine relationship phase as a moderator of this profit impact. In doing so, we explain mixed findings in prior research by (1) distinguishing the profit impact of different levels of salesperson accuracy, (2) demonstrating curvilinear effects of both salesperson accuracy and inaccuracy, and (3) showing that the profit impact of salesperson inaccuracy is less severe in later relationship phases than in the exploration phase. These findings help managers understand why and when salesperson accuracy and inaccuracy matter.

We organize the remainder of this article as follows: We begin with a review of related literature and set the stage for our study of salesperson accuracy and inaccuracy. Next, we develop hypotheses that we subsequently test empirically. We then conclude with a discussion of theoretical and managerial implications.

### Related Literature and Conceptual Background

### Marketing Research on Perceptual Accuracy

In Table 1, we summarize representative articles from marketing research on perceptual accuracy to highlight key insights and demonstrate how our work contributes to this literature. We categorize perceptual accuracy research into three major domains depending on what is being perceived: (1) customer needs, (2) behavioral discrepancies, and (3) relational dimensions. Our research falls within the relational dimensions domain and is unique in at least three ways.

First, prior research has studied only how antecedents increase perceptual differences (e.g., Sharma and Lambert 1994) without examining the *differential* effect of these antecedents on each party in the interaction (i.e., the salesperson and the customer). Our study is the first to examine this nuanced effect, thereby shedding light on how salesperson relationship quality converges with or diverges from customer relationship quality. Second, in addition to examining the effect of inaccuracy, we also investigate an important issue that has not been examined in prior research: the

<sup>&</sup>lt;sup>1</sup>For example, Vosgerau, Anderson, and Ross (2008) find that the extent of the difference between firm perceptions of relational closeness can have positive or negative effects, though they did not study cases in which parties had equally low or equally high levels of relational closeness.

| Domain  | <b>Relational Dimensions</b>   |  | Same Contraction   | Customer Needs   | Negative Behavior  |
|---|--|--|--|--|--|
| Study   | The current research   | Homburg, Bornemann, and<br>Kretzer (2013)  | Vosgerau, Anderson, and<br>Ross (2008)   | Homburg, Wieseke, and<br>Bornemann (2009); Lambert,<br>Marmorstein, and Sharma<br>(1990); Sharma and Lam-<br>bert (1994); Weitz (1978)       | Wang, Kayande, and Jap<br>(2010)   |
| Focus   |  |  |  |  |  |
| Variable of difference  | Difference between one<br>party's perception of the<br>counterpart's relationship<br>quality and the counter-<br>part's relationship quality | Overestimation of customer<br>commitment to sales repre-<br>sentatives   | Difference between one<br>party's perception of the<br>counterpart's relational<br>closeness and the counter-<br>part's relational closeness | Difference between sales-<br>person and customers<br>regarding customer need<br>importance and expected<br>versus actual performance         | Difference between<br>expected and actual<br>opportunism   |
| Conceptual Aspects  |  |  |  |  |  |
| Antecedents of inaccuracy   | <ul> <li>Salesperson self-efficacy</li> <li>cacy</li> <li>Customer orientation</li> <li>Similarity with oustomers</li> </ul>                 | <ul> <li>Customer attachment style</li> <li>Frequency and age of<br/>relationship</li> <li>Salesperson experience</li> <li>Opener ability</li> <li>Adaptive selling</li> <li>Loyalty-based incentives</li> </ul> | <ul> <li>Communication</li> <li>Age of relationship</li> </ul>   | <ul> <li>Sales task</li> <li>Salesperson satisfaction</li> <li>Experience</li> <li>Age</li> <li>Sales training</li> <li>Education</li> </ul> | Not examined   |
| Antecedent effects on each individual response  | Yes  | Not examined   | Not examined   | Not examined   | Not examined   |
| Direction of inaccuracy   | Both under- and overestimation   | Overestimation only  | Both under- and overestimation   | Not examined   | Both under- and overestimation   |
| Level of accuracy   | Yes  | Not examined   | Not examined   | Not examined   | Not examined   |
| Consequences of<br>perceptual accuracy  | Customer profitability<br>(objective data)   | <ul> <li>Customer repeat purchase</li> <li>Cross-buying</li> <li>Word of mouth</li> </ul>  | Expected profitability<br>(survey)   | <ul> <li>Salesperson performance</li> <li>Customer satisfaction</li> <li>Willingness to pay</li> </ul>                                       | <ul> <li>Evaluation of partner's<br/>performance</li> <li>Continuity intention</li> </ul>                            |
| Boundary conditions for<br>relationship between<br>inaccuracy and<br>outcomes<br>Methodological Aspects | Relationship phase   | Not examined   | Not examined   | Not examined   | <ul> <li>Focal firm's dependence<br/>on partner</li> <li>Relationship phase</li> <li>Bilateral investment</li> </ul> |
| Curvilinear effects   | Yes  | Not examined   | Not examined   | Not examined   | Yes  |
| Analytical strategy for accuracy  | Response surface   | Absolute value for inaccuracy; only overestimations for outcomes   | Separation between<br>extent and the direction of<br>perceptual error  | Difference score   | Separation between over-<br>and underestimation  |

TABLE 1 Overview of Related Research on Perceptual Accuracy level at which salesperson responses and customer responses match (i.e., level of accuracy). Third, unlike empirical studies that rely on linear models, our use of response surface is consistent with the documented curvilinear effects from meeting customers' expectations (e.g., Mittal and Kamakura 2001) and accounts for potential confounding effects from interaction and curvilinear relationships (Ganzach 1997).

### **Theoretical Foundations**

Theoretically, we are particularly interested in whether salespeople are accurate in knowing their customers' subjective experience, which is customer relationship quality in our context. To study this issue, we adopted an empathic accuracy approach (Ickes 1997). Empathic accuracy is defined as "the ability to accurately infer the specific content of another person's thoughts and feelings" (Ickes 1997, p. 4). The empathic approach suggests that individual perceptions are shaped by one's ability to take the perspective of another during social interactions (Ickes 1997). Furthermore, it holds that perspective taking depends on a person's ability to "read" cues displayed by others. Yet this ability may be biased depending on the perceiver's motivations. For example, when people consider their partners' feelings of attraction toward others, they often divert attention away from evidence that acknowledges those feelings to avoid feeling threatened (Simpson, Ickes, and Blackstone 1995).

Along this line, West and Kenny (2011) have recently introduced the truth-bias model as a general model to conceptually explain how empathic perceptions can be drawn toward or away from the truth, defined as criteria that people aim to perceive accurately. We draw from this truthbias model to examine how salesperson relationship quality may be drawn away from customer relationship quality, thereby causing salesperson inaccuracy. In line with prior research (e.g., West and Kenny 2011), we treat customer relationship quality as the truth. Unlike West and Kenny (2011), who use the truth to predict a partner's perception, we argue that a salesperson's perception of customer relationship quality (i.e., salesperson relationship quality) and customer relationship quality are correlated because they are endogenous to shared antecedents; they are not necessarily causal. When an antecedent's effects on each perception are different, the antecedent biases salesperson perspective taking, driving salesperson relationship quality away from customer relationship quality (either above or below) and creating salesperson inaccuracy. When the antecedent's effects on each perception are not significantly different, the antecedent influences salesperson relationship quality and customer relationship quality equally. Here, salesperson perspective taking is balanced, creating accuracy.

The truth-bias model does not provide theory for understanding the outcomes of accuracy and inaccuracy. However, empathic accuracy is assessed in an interpersonal context, making it particularly relevant to understanding relationship outcomes. A key proposition of empathic accuracy is that a person's perception, whether accurate or inaccurate, will influence his or her behavior in subsequent interactions (Ickes 1997). Because accurate perceptions help infer other people's thoughts and feelings (Ickes 1997), behaviors influenced by these perceptions are more likely to align with the other party's expectations. Therefore, people with accurate perceptions are more likely to manage relationships effectively. Similarly, we argue that because salespeople have limited resources, salesperson relationship quality should influence how salespeople allocate relationship activities across customers. Salespeople are more likely to invest relationship activities in high-quality relationships because they anticipate greater returns. Thus, as salesperson relationship quality increases, salespeople should invest more relationship-building activities to meet customers' higher expectations. Here, "relationship-building activities" refer to the resources, efforts, and attention devoted to a customer relationship.

Although salesperson relationship quality determines how salespeople invest in relationship-building activities, customer responses depend on whether those efforts meet or disconfirm the relationship expectations that are in line with the customer's relationship quality. Therefore, we evoke the notions of (1) reciprocity in social exchange theory (Cropanzano and Mitchell 2005; Gouldner 1960) to explain why salesperson relationship-building activities obligate customers to reciprocate through purchase behavior and (2) incremental sensitivity to unmet expectations in assimilationcontrast theory (Anderson 1973; Sherif and Hovland 1961) to explain how salesperson accuracy and inaccuracy affect individual customer profitability in a nonlinear fashion.

### **Conceptual Framework and Definitions**

Our conceptual framework, summarized in Figure 1, is a two-part model aimed at understanding the following relationships: salesperson characteristics → accuracy and inaccuracy of salesperson relationship perceptions  $\rightarrow$  customer profitability. We summarize key constructs and their definitions in Table 2. Previous studies on relationship perceptions have focused primarily on three factors indicative of strong relationships: commitment (Jap and Ganesan 2000), trust (Palmatier et al. 2006), and satisfaction (Crosby, Evans, and Cowles 1990). Yet extant literature has demonstrated that each factor alone may not capture the full essence of buyer-seller relationships (De Wulf, Odekerken-Schröder, and Iacobucci 2001). Indeed, a meta-analysis shows that relationship quality-conceptualized as a secondorder construct reflected by commitment, trust, and satisfaction-has the greatest impact on salesperson objective outcomes (Palmatier et al. 2006). With this in mind, the first part of our model examines salesperson characteristics that explain gaps between customer relationship quality and salesperson relationship quality.

Crosby, Evans, and Cowles (1990) and Palmatier et al. (2006) organize drivers of relationship quality into three variable types (i.e., seller-focused, customer-focused, and dyadic). Building on this framework, we propose that salesperson relationship quality and customer relationship quality are *differentially* influenced by salesperson self-efficacy (seller-focused), customer orientation (customer-focused), and salesperson-customer similarity (dyadic). "Self-efficacy" is a salesperson's confidence in his or her ability to execute actions necessary to perform successfully with customers

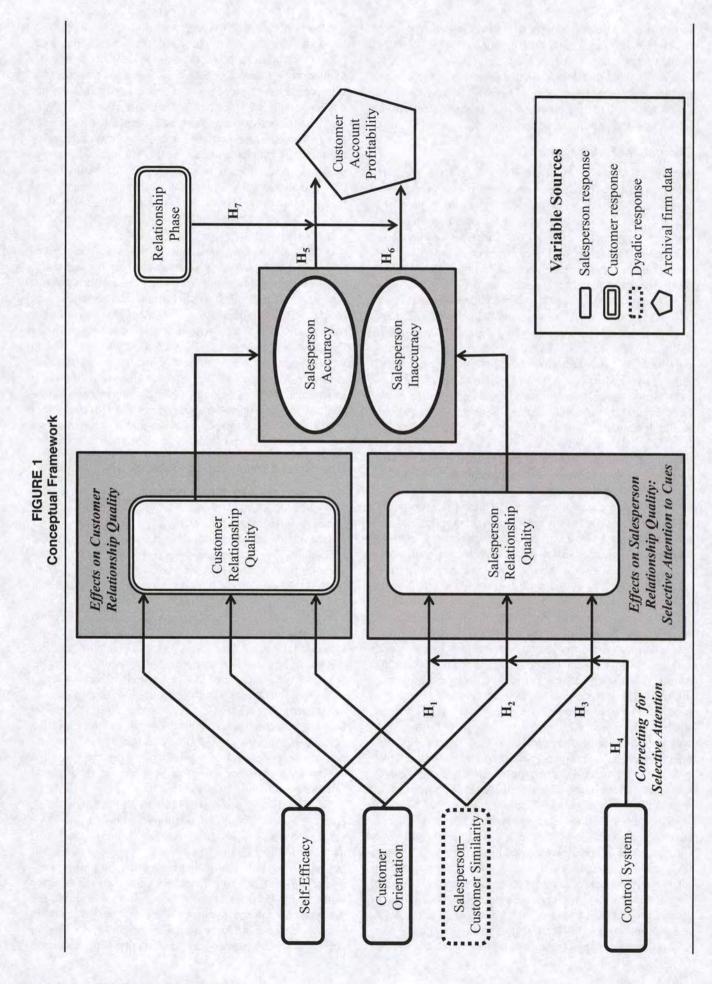


TABLE 2 Key Construct Definitions and Operationalizations

| Constructs                                   | Definition   | Operationalization   |
|--|--|--|
| Customer<br>relationship<br>quality (CRQ)    | Combined strength of a customer's trust in, satisfaction with, and commitment to a given salesperson   | Average of a customer's ratings of the trust,<br>satisfaction, and commitment in a relationship with<br>a given salesperson.                           |
|  |  | (Data source: customer)  |
| Salesperson<br>relationship<br>quality (SRQ) | Combined strength of the salesperson's perceptions<br>of the customer's trust in, satisfaction with, and<br>commitment to him/her  | Average of a salesperson's ratings of his/her<br>perception of the customer's trust, satisfaction,<br>and commitment in the relationship with him/her. |
|  |  | (Data source: salesperson)   |
| Salesperson<br>accuracy (SA)                 | Occurs when salesperson relationship quality matches customer relationship quality   | Response surface method tests the effect of SA by examining the surface along the SA line. Technical   |
|  | Level of Salesperson Accuracy: Level of relationship<br>quality when salesperson accuracy occurs<br>(e.g., the level of SA is high when CRQ = SRQ at the<br>high end of the scale)   | details are available in the Web Appendix.<br>(Data source: salesperson and customer)  |
| Salesperson<br>inaccuracy (SI)               | Occurs when salesperson relationship quality differs<br>from customer relationship quality (i.e., $SI = SRQ - CRQ$ , when $CRQ \neq SRQ$ )   | Response surface method tests the effect of SI by examining the surface along the SI line. Technical details are available in the Web Appendix.        |
|  | <ol> <li>Direction of Inaccuracy: Sign of the difference         <ul> <li>Overestimation: salesperson relationship quality is higher than customer relationship quality             (e.g., if SRQ = 3, CRQ = 2; SRQ - CRQ &gt; 0)</li> <li>Underestimation: salesperson relationship quality             is lower than customer relationship quality             (e.g., if SRQ = 2, CRQ = 3; SRQ - CRQ &lt; 0)</li> </ul> </li> <li>Extent of Inaccuracy: Magnitude of the difference         <ul> <li>(e.g., if SRQ = 2, CRQ = 3; the extent of inaccuracy = ISRQ - CRQI = ISII = I2 - 3I = 1)</li> </ul> </li> </ol> | (Data source: salesperson and customer)  |
|  | Thus, when $SI = -1$ , the direction of salesperson<br>inaccuracy is an underestimation, and the extent of<br>salesperson inaccuracy is 1. When $SI = 1$ , the direction<br>of salesperson inaccuracy is an overestimation, and<br>the extent of salesperson inaccuracy is also 1.   |  |

(Sujan, Weitz, and Kumar 1994). "Customer orientation" refers to the salesperson's ability to understand and meet a customer's needs and interests (Saxe and Weitz 1982). Finally, "salesperson–customer similarity" refers to a commonality in appearance or behavioral compatibility between salesperson and customer (Palmatier et al. 2006). These three antecedents correspond to salespeople's self-focused, customer-focused, and balanced perspective taking and consequently influence whether salespeople are inaccurate.

The second part of our model examines how salesperson accuracy and inaccuracy affect profitability during various relationship stages. To fully capture the effect of salesperson accuracy, we build on and extend previous salesperson perception research. Specifically, we distinguish the consequences of not only the level of salesperson accuracy but also the direction and extent of salesperson inaccuracy. Salesperson accuracy occurs when salesperson relationship quality and customer relationship quality match. Because these perceptions can match at various levels of relationship quality (e.g., low, high), we define the "level of salesperson accuracy occurs. Conversely, salesperson inaccuracy occurs when salesperson relationship quality and customer relationship quality Because salesperson relationship quality can exceed or fall short of customer relationship quality to varying extents, we define the "direction of salesperson inaccuracy" as the sign of the difference between salesperson relationship quality and customer relationship quality (i.e., overestimation or underestimation) and the "extent of salesperson inaccuracy" as the magnitude of that difference.

We test the effect of salesperson accuracy and inaccuracy empirically using a response surface approach based on a polynomial regression that includes the linear, quadratic, and interaction terms of salesperson and customer relationship quality. To examine the effect of salesperson accuracy, we examine the surface along the salesperson accuracy line where we constrain salesperson relationship quality to be equal to customer relationship quality. For salesperson inaccuracy, we examine the surface along the salesperson inaccuracy line where the two are different. We elaborate on this approach in the "Method" section and the Web Appendix.

### Antecedents to Salesperson and Customer Relationship Quality

In this section, we provide specific hypotheses about how self-efficacy, customer orientation, and salesperson-customer similarity differentially influence salesperson relationship quality and customer relationship quality. As we explained previously, these differential effects explain why salesperson relationship quality may or may not match customer relationship quality. Then, we provide a rationale to explain how sales force control systems moderate these effects.

### Self-Efficacy

Salespeople with high self-efficacy offer greater relationship value to customers by exhibiting market expertise and reducing customer uncertainty (Ahearne, Mathieu, and Rapp 2005). Therefore, we expect a positive relationship between self-efficacy and customer relationship quality. However, empathic accuracy research has suggested that people are at times motivated to be inaccurate in their perspective taking (Thomas and Fletcher 1997). For self-efficacious salespeople, the need for self-esteem maintenance may supersede the need to seek the truth about customer relationship quality and therefore may upwardly bias their empathic accuracy.

Specifically, self-efficacy motivates people to view themselves in a positive light to maintain their perceived status (Wood and Bandura 1989). As a result, self-efficacious people are more self-focused in their perspective taking, attributing positive feedback to their own ability while ignoring negative feedback (Gist and Mitchell 1992). Selfefficacious salespeople may be similarly lenient in assessing their relationship status by focusing attention on selfserving customer cues. This suggests that self-efficacy may bias salespeople's perspective-taking ability by causing them to overlook negative cues and focus on positive cues when assessing customer relationships. Consequently, selfefficacy should positively bias salesperson relationship quality, drawing it above customer relationship quality.

H<sub>1</sub>: Salesperson self-efficacy has a stronger positive effect on salesperson relationship quality than it does on customer relationship quality.

### **Customer** Orientation

Customer-oriented salespeople demonstrate an ability to assess and meet customers' needs (Saxe and Weitz 1982). In line with prior research (Crosby, Evans, and Cowles 1990; Williams and Attaway 1996), we expect a positive relationship between customer orientation and customer relationship quality.

Customer-oriented salespeople are willing to expend effort to better understand their customers and are also sensitive to avoid behaviors that might harm the customer relationship (Saxe and Weitz 1982). Consistent with prior research in empathic accuracy (Thomas and Fletcher 1997), we argue that this heightened need to satisfy customers motivates customer-oriented salespeople to pay more attention to negative social cues than to positive ones. Under this customer-focused perspective taking, salespeople may sacrifice accuracy in favor of seeking all the potential negative cues that might lead to customer dissatisfaction. Therefore, although customer orientation positively influences customer relationship quality, customer orientation should negatively bias salesperson relationship quality and draw it below customer relationship quality.

H<sub>2</sub>: Salesperson customer orientation has a stronger positive effect on customer relationship quality than it does on salesperson relationship quality.

### Salesperson–Customer Similarity

Salesperson-customer similarity increases relationship value for customers by reducing the customer's uncertainty about the salesperson (Palmatier et al. 2006). On the one hand, social perception research has suggested that similarity may hinder perspective taking. Often, the perceptions of similar others are idealized to bolster one's own relationship norms (West and Kenny 2011). Research has found that rather than lowering their perceptions, similar people overestimate relationship perceptions because of a strong desire to perceive similar partners in positive ways (Kenny and Acitelli 2001). When salespeople are similar to customers, they may focus more on positive customer cues to validate their relationship expectations. On the other hand, the relationship marketing literature has suggested that similarity promotes unbiased perspective taking. Salesperson-customer similarity helps provide cues about an exchange partner's goals (Palmatier et al. 2006), increasing salespeople's ability to take an unbiased perspective. Moreover, due to shared interpretations about behavior, similarities often enhance perspective taking (Ickes 1997). In line with this latter rationale, we hypothesize the following:

H<sub>3</sub>: Salesperson-customer similarity has the same effect on customer relationship quality and salesperson relationship quality.

### Moderating Effect of Sales Force Control Systems

We propose that sales force control systems can function as an adjusting mechanism for salesperson inaccuracy. As we have discussed, relationship quality antecedents may focus salesperson attention on cues that bias a salesperson's perspective taking. Control systems provide managers with a way to influence salesperson attention. Oliver and Anderson (1994) conceptualize control systems as a continuum anchored by outcome-based controls on one end and behavior-based controls on the other. Outcome-based control is a low-involvement approach that assumes salespeople are best able to direct their efforts toward achieving extrinsic rewards (Oliver and Anderson 1994). Here, managers have little discretion to direct salesperson attention, and salesperson perspective taking is more likely to suffer from biases, leading to inaccuracy.

Conversely, behavioral controls dictate, incentivize, and direct salespeople to engage in a clearly specified number of behaviors, regardless of salesperson discretion. This control system curtails the potential for bias to occur. First, behavior-based controls offer managers a means to broaden salesperson attention to a wide range of customer behavior. Second, behavior-based controls help managers enhance salespeople's intrinsic motivation by increasing role clarity and commitment (Challagalla and Shervani 1996; Cravens et al. 1993; Oliver and Anderson 1994). Thus, under behaviorbased control, salespeople are extrinsically incented and intrinsically motivated to engage with customers more deeply (e.g., call rates, customer interaction reports). As a result, they are less likely to solicit and process customer feedback in a biased way and more likely to adopt a more balanced perspective-taking approach.

In particular, self-efficacious salespeople will be more motivated to improve their customer assessments, rather than maintaining their status. As a result, they will incorporate more negative feedback into their relationship assessments. Similarly, customer-oriented salespeople will focus less on avoiding negative behavior, increasing the likelihood that they pay attention to both positive and negative customer feedback. Behavior-based control should therefore dilute the biases caused by self-efficacy and customer orientation and pull salesperson relationship quality toward customer relationship quality.<sup>2</sup>

H<sub>4</sub>: Under a behavior-based control system, the effect of (a) self-efficacy on salesperson relationship quality is weaker and (b) customer orientation on salesperson relationship quality is stronger.

### Profit Impact of Salesperson Accuracy and Inaccuracy

We conceptualize and test salesperson accuracy and inaccuracy as the interaction effect of salesperson relationship quality and customer relationship quality (see Table 2). Thus, our theoretical rationale for the profit impact of salesperson accuracy and inaccuracy consists of three steps: (1) salesperson relationship quality influences the relationship activities invested in a specific customer, (2) customer relationship quality influences the customer's response to those activities, and (3) customer profitability results from the interaction effect between salesperson relationship quality and customer relationship quality. We also posit how relationship phase moderates the profit impact of salesperson accuracy and inaccuracy (see Figure 1).

### Effects of Salesperson Accuracy on Profitability

Salesperson accuracy helps salespeople invest relationship activities in line with their customers' expectations. Marketing literature has shown that meeting customer expectations is financially valuable because customers feel obligated to increase purchase behavior and pay a premium (Homburg, Koschate, and Hoyer 2005). At low levels of salesperson accuracy, salespeople invest in fewer relationship activities, but they are in line with customer expectations. In contrast, a high level of salesperson accuracy motivates salespeople to invest more in relationship activities in line with the higher expectations of a high-quality relationship. Although customer expectations are met in both cases, we expect that meeting customer expectations will be incrementally more profitable as the level of salesperson accuracy increases. Theoretical support for this curvilinear relationship can be drawn from customer satisfaction research. For example, Homburg, Koschate, and Hover (2005) find that customer willingness to pay incrementally increases by meeting higher customer expectations. Using panel data, Mittal and Kamakura (2001) also find a curvilinear effect that shows increasing repurchases from more highly satisfied customers. Moreover, higher relationship quality helps salespeople decrease their relationship costs (De Wulf, Odekerken-Schröder, and Iacobucci 2001). These findings suggest that meeting higher customer expectations will lead to higher profits either from a greater willingness to pay or from resource savings generated by repeat purchases and lower costs. In other words, higher levels of salesperson accuracy enable salespeople to tailor relationship activities for higher customer expectations and increase their net marginal return.

H<sub>5</sub>: As the level of salesperson accuracy increases, customer accounts become increasingly more profitable.

### Effects of Salesperson Inaccuracy on Profitability

Perceptual inaccuracy undermines a person's ability to forecast another party's reactions and leads to suboptimal outcomes (Wang, Kayande, and Jap 2010). In the same vein, we argue that salesperson inaccuracy lowers profits through either relationship overinvestment or revenue loss. Furthermore, we propose that the negative impact of salesperson inaccuracy is incrementally more severe as the extent of inaccuracy increases in either direction (i.e., overestimation or underestimation).

When salespeople provide more or less relationship effort than expected, customers' expectations are disconfirmed (Oliver 1980). Assimilation-contrast theory further suggests that the severity of negative reactions depends on whether the gap between expectations and actual behavior is large or small (Anderson 1973). If the disparity between customer expectations and salesperson behaviors is sufficiently small, customers will tend to assimilate differences in line with their expectations. However, if the disparity between customer expectations and salesperson behavior is large enough to be rejected, customers contrast and magnify these differences. Such magnification delights customers when salespeople exceed their expectations and disappoints them when salespeople fail to meet their expectations.

When salesperson relationship quality is greater than customer relationship quality (i.e., overestimation), salespeople invest in more relationship-building activities than the customer expects. When the extent of salesperson inaccuracy is small, the level of overinvestment compared with customers' expectations is negligible. In line with assimilation– contrast theory, customers should assimilate these small discrepancies toward their expectations, leaving their subsequent responses unchanged. However, as the extent of inaccuracy increases, salesperson relationship-building activities significantly and surprisingly exceed customers' expectations, causing customers to experience delight (Rust and Oliver 2000) and reciprocate salesperson behavior. However, customer reciprocation will not be proportionate for higher levels of salesperson overinvestment for two reasons.

<sup>&</sup>lt;sup>2</sup>Because salesperson–customer similarity does not create bias, there is no need to correct for its effect. Nevertheless, our empirical model tests the moderating effect of the control system on the effect of this antecedent.

First, customer evaluations display diminishing sensitivity toward relationship activities that are increasingly beyond their expectations (Mittal, Ross, and Baldasare 1998). There is also empirical evidence that customers may even consider salespeople's relationship activities inefficient (Palmatier et al. 2008). As a result, the gains from customer delight will diminish as salesperson overinvestment increases. Second, delighted customers are likely to update their expectations (Boulding et al. 1993; Rust and Oliver 2000) and, consequently, begin to take salesperson overinvestment for granted. Thus, as the extent of inaccuracy in the form of an overestimation increases, salespeople's relationship-building costs increasingly exceed customer purchase responses, causing profits to incrementally decrease.

When salesperson relationship quality is less than customer relationship quality (i.e., underestimation), salespeople invest in fewer relationship-building activities than the customer expects. When the extent of salesperson inaccuracy is small, customers notice few behavioral differences from the expected norm, resulting in a minimal change to purchase behavior (Woodruff, Cadotte, and Jenkins 1983). However, as the extent of salesperson inaccuracy increases, assimilation-contrast theory suggests that customers will exaggerate salesperson underinvestments that fall far below their expectations. This causes customers to decrease purchases or even retaliate. Building on this notion, we argue that as the extent of salesperson underinvestment increases, profits will incrementally decrease. First, although customers may diminish their sensitivity to gains, empirical evidence has shown that diminishing sensitivity does not hold for unmet expectations (e.g., Mittal, Ross, and Baldasare 1998). Furthermore, findings from Einhorn and Hogarth (1981) suggest that unmet expectations loom larger than exceeded expectations such that additional increments of salesperson underinvestment cause disproportionately negative customer responses. As the extent of underinvestment grows, customer responses will range from mild (e.g., purchase cutbacks) to severe (e.g., switching behavior). Revenue losses will be disproportionately higher than any salesperson cost savings, causing profits to incrementally decrease. Thus, we hypothesize the following:

H<sub>6</sub>: As the extent of salesperson inaccuracy increases, customer accounts become increasingly less profitable.

### Moderating Effect of Relationship Phases

Relationship phases refer to the major transitions in how parties regard each other on the basis of relational expectations (Dwyer, Schurr, and Oh 1987). We focus on three phases: exploration, buildup, and maturity. In the exploration phase, each party begins to uncover the goal compatibility and performance of the other. These initial interactions help parties reduce uncertainty and assess potential benefits from continued interaction (Jap and Ganesan 2000). Relationships progress to buildup and maturity stages when parties establish relational norms. Relational norms are behavioral expectations that encourage relational continuity (e.g., information exchange) (Jap and Anderson 2003). These expectations help customers develop confidence about the salesperson's intentions and shift focus from individual to mutual outcomes (Jap and Ganesan 2000).

We argue that the buildup and maturity stages should strengthen the effect of salesperson accuracy on profit. First, relational continuity in the buildup and maturity phases helps customers develop inertia. Inertia is defined as habitual repurchase with little information search or alternative evaluation (Voss, Godfrey, and Seiders 2010). Inertia minimizes customer decision making during interactions and increases the likelihood of repurchase. Second, meeting customer expectations over repeated interactions has a stronger impact on customer willingness to pay than meeting them in a single interaction (Homburg, Koschate, and Hover 2005). This strengthening effect occurs as a result of the certainty customers accumulate and develop as relationships progress. Thus, we expect that customer inertia and certainty that are accumulated in the buildup and maturity phases strengthen the effect of salesperson accuracy on profit.

By invoking the same notions of inertia and attitude certainty, we expect salesperson inaccuracy to have a weaker impact on profitability during later relationship phases than in the exploration phase. Prior research has also suggested that people's certainty in their perceptions tends to be higher in lengthy and highly involved relationships and that such certainty positively influences relationship outcomes, even if perceptions are inaccurate (Swann and Gill 1997). Together, certainty and inertia lead people in established relationships to be less cautious, more forgiving, and more susceptible to counterparts' influence. Along this line, we argue that, for overestimation, customers in buildup and maturity phase relationships may be more easily influenced by salesperson behavior (e.g., Yi and Gong 2008). As a result, they are likely to perceive salespeople's overinvestments in relationship-building activities as reflections of true relationship quality and reciprocate in kind. In contrast, due to a lack of certainty, customers are likely to be more cautious in the exploration phase, leaving them more likely to suspect salespeople's overinvestments as techniques to acquire more business. For underestimation, customers in the exploration phase are less likely to overlook salespeople's underinvestments because they have not developed inertia. These customers are more likely to be transactional and sensitive to loss aversion. In contrast, customers in later phases are more likely to forgive underinvestment because they have established long-term relational commitments (Jap and Anderson 2003). In summary, we expect salespeople to benefit more from salesperson accuracy and suffer less from salesperson inaccuracy during later relationship phases.

H<sub>7</sub>: As salesperson–customer relationships progress from exploration into buildup and maturity, (a) salesperson accuracy has a stronger effect on profits, and (b) salesperson inaccuracy has a weaker effect on profit.

### Method

### **Data Collection**

We tested our model using a unique, dyadic (salespersoncustomer) data set that includes matched survey and objective performance data from a *Fortune* 1000 global consumer and industrial goods supplier. This firm retains a diverse customer base in which accounts vary in size (independent stores to multinational firms) and relationship stage. Before data collection, we conducted 52 in-depth interviews composed of 8 sales executives, 9 sales managers, 21 salespeople, and 14 customers to ensure that our survey materials fit the company's context.

The data set comprises three sources of input: customers, salespeople, and objective performance for each customer's account. For the customer data, an independent consulting firm screened and qualified a sample of the focal company's customers through structured phone interviews. Sample customers were chosen randomly from the company's census list of customer accounts. After we screened the sample to ensure their familiarity with products, salespeople, and industry competitors, an incentivized survey was administered to the remaining sample of 1,227 customers. To blind customers from the focal firm's identity, the screening calls and survey included questions regarding multiple firms in the industry, thus removing potential bias. The survey yielded 301 customer responses, resulting in a 24.5% response rate. We tested for potential nonresponse bias by first dividing the sample into thirds on the basis of response times. We found no significant differences in mean responses between early and late responders. In addition, we compared responders and nonresponders and found no significant differences in company size, percentage of business, or relationship age. We collected salesperson data with a survey administered over a two-week period to the focal firm's entire sales force. We obtained a total of 161 completed responses, resulting in a 100% response rate. Salespeople were asked questions about themselves, their relationship with responding customers, and their relationship with randomly selected customers who did not complete the survey to blind salespeople from the customers of interest and reduce bias.3

Finally, we attained objective performance data using customer profitability for each of the salesperson's customer accounts, collected from the most recent firm archives. After all sources of data were gathered, salesperson responses were matched with their respective customer responses and performance data. For salespeople with multiple customer responses, we randomly selected one customer for analysis.<sup>4</sup> After we removed dyads with missing values, 132 unique salesperson–customer dyads remained for analysis. The average sales experience was

<sup>4</sup>Because the majority of salespeople had only one customer response (>62%), there was not enough variation within salespeople to consider analyzing multiple customers per salesperson.

25.8 years, average industry experience was 24.1 years, and average company tenure was 15.4 years.

### Measures and Measurement Analysis

All scales used in this study are well established in marketing research. The Appendix presents the items, measurement scales, and literature sources for the measures. All multi-item measures show good reliability ( $\alpha > .70$ ), factor loadings above .70, and discriminant validity, with all measures' average variance extracted greater than .50 and larger than all squared correlations. We present all descriptive statistics and the correlation matrix in the Web Appendix.

Using four items adapted from Saxe and Weitz (1982), we operationalized customer orientation as the salesperson's ability to understand and meet a customer's needs and interests. We measured salesperson self-efficacy with four items that capture the salesperson's self-rating of ability, knowledge, and skills used in relationship selling (Sujan, Weitz, and Kumar 1994). Each person self-assessed salesperson-customer similarity using the assertivenessresponsiveness scale from Rich and Smith (2000). Each self-assessment was dichotomized as high or low on each facet and categorized as a dyadic match/mismatch between the salesperson and customer. Customers rated relationship phase categorically using the scale adapted from Jap and Ganesan (2000). Because the number of relationships in the decline phase was small (<5%), we reduced the measure to three relationship phases: exploration, buildup, and maturity. For control systems, we used Oliver and Anderson's (1994) continuum-based approach to measure salespeople's belief that they worked under an outcome- versus behaviorbased control system. We converted each control system subscale to a z-score and additively combined them to form an index in which lower scores represented outcome-based control and higher scores represented behavior-based control. We measured the salesperson's relationship-building activities using a four-item scale adapted from Palmatier et al. (2008). We operationalized customer profitability as the profit margin percentage for each customer account that matches each dyad under study. This percentage represents the average profit margin for the customer account over the two years before the survey for all products for which the salesperson was responsible. Consistent with previous research on sales effort profitability, profit margin is gross profit minus the sales costs viewed as the direct and indirect costs of servicing the account (Bowman and Narayandas 2004). We use two years of archival data to best control for any abnormalities within the given period.

In line with relationship quality research, we conceptualize relationship quality as a second-order factor composed of satisfaction, trust, and commitment (e.g., Palmatier et al. 2006). For customer relationship quality, customers rated these three relationship quality facets with their salesperson. For salesperson relationship quality, each salesperson rated the corresponding customer's facets with him or herself. Confirmatory factor analysis provided strong support for relationship quality as a second-order factor. As recommended by Marsh (1990), we evaluated whether the higher-order factor explained the intercorrelations between

<sup>&</sup>lt;sup>3</sup>In our survey design, we first asked salespeople to name their primary customer contact (i.e., whom they interact with most often) within several customer accounts. Customer surveys were sent to these people to rate the relationship with their primary salesperson. We then populated the salesperson survey with three customer accounts and prompted them to rate the relationship with these accounts by referencing their primary individual customer contact. Using this blinded design helps provide a specific reference for salespeople to rate the relationship quality of the primary customer contact without bias and exclude other members of the account.

the first-order factors. Multi-item scales for trust, satisfaction, and commitment all exhibited high reliability (all interitem correlations > .70). To demonstrate intercorrelations between first-order factors, we compared the fit between a first-order model in which factors are constrained to be uncorrelated and a corresponding model in which factors are free to correlate. The results show that the unconstrained first-order model fits the data significantly better than the constrained model ( $\Delta \chi^2(3) = 184.72, p < 100$ .01). All first-order factors strongly correlate with one another, demonstrate convergent and discriminant validity, and have substantial variance. Next, we modeled the secondorder factor of relationship quality to explain the correlation between first-order factors. The results show that all factors had significant loadings (> .70), strong fit ( $\Delta \chi^2(6) = 9.71$ , p > .05; comparative fit index = .99, root mean square error of approximation = .01, standardized root mean square residual = .02), and relationship quality explains significant variance in each first-order factor. Together, the results support our second-order model of relationship quality.

### Model Specification

We examine salesperson accuracy using a dyadic framework formed by comparing two components (i.e., salesperson and customer relationship quality). There are several ways to analyze this type of data. Most popular is the difference score method, which suffers from several limitations (refer to the Web Appendix). Given these limitations, we followed previous research recommending that dyadic data be analyzed as individual dependent variables rather than difference scores (Edwards and Parry 1993; Mullins and Syam 2014). However, because we did not use difference scores, we were forced to take a two-stage analysis approach to analyze our full model. In the first stage, we modeled each antecedent's relative impact on salesperson perceptions and customer perceptions as well as the moderating effect of control systems using a multivariate hierarchical regression analysis (Edwards 1995). To strengthen the robustness of the results, we controlled for share of wallet, relationship phase, salesperson experience, and tenure. In this multivariate model, we allow the responses from the salesperson and the customer to be correlated. In the second stage, we model the outcomes of salesperson accuracy and inaccuracy using response surface analysis. For more detail on each analysis, see the Web Appendix.

### Results

### Antecedents of Salesperson and Customer Relationship Quality

 $H_1-H_3$  examine the differential effects of each antecedent on customer and salesperson relationship quality. The results for the main effects model in Table 3 illustrate how the antecedents differentially affect each outcome. They show that customer orientation had a positive significant effect only on customer relationship quality ( $b_{11} = .66, p < .01$ ), whereas salesperson self-efficacy had a positive significant effect only on salesperson relationship quality ( $b_{22} = .54$ , p < .01). Salesperson–customer similarity did not have a significant effect on either outcome ( $b_{13} = .20, p > .10; b_{23} =$ -.04, p > .10). To support the presence of differential coefficient effects, we imposed a constraint (e.g.,  $b_{12} = b_{22}$ ) on the model for each coefficient pair. The multivariate constraints show that the self-efficacy coefficients are unlikely to be equivalent for salesperson and customer relationship quality  $(\chi^2(1) = 6.75, p < .01)$ . Thus, self-efficacy affects salesperson relationship quality more than customer relationship quality, in support of H1. Similarly, tests reveal that customer orientation coefficients are unlikely to be equivalent for salesperson and customer relationship quality ( $\chi^2(1) = 10.14, p < .01$ ). Thus, customer orientation affects salesperson relationship quality less than customer relationship quality, in support of H<sub>2</sub>. The constraint test for salesperson-customer similarity was not significant ( $\chi^2(1) = 1.02, p > .05$ ), indicating that similarity has equal effects on each perception, in support of H<sub>3</sub>. The results also show a significant difference between interecepts ( $\beta_0^c = 1.51$ ,  $\beta_0^{sp} = 2.29$ ), indicating systematic differences between salesperson and customer perceptions.

### Moderating Impact of Behavior-Based Control Systems

H4a-b posit that a more behavior-based control system may reduce salesperson inaccuracy. To support these arguments, we added sales force control systems into the model as an interaction variable for both salesperson and customer relationship quality. Adding the interaction parameters significantly improved the model's explanatory power ( $\chi^2(8)$  = 39.80, p < .01), providing justification for the full model. Table 3 shows the simple and interaction effect estimates under a behavior-based control system. We found the simple effect of self-efficacy to be a significant predictor of salesperson relationship quality ( $b_{22} = .38, p < .01$ ) but not customer relationship quality ( $b_{12} = -.07, p > .10$ ). Similarly, the simple effect for customer orientation has a positive effect on customer relationship quality ( $b_{11} = .60, p < .60$ .01) but not salesperson relationship quality ( $b_{21} = .12, p >$ .10). In predicting salesperson relationship quality, the interaction between self-efficacy and a behavior-based control system was significant and negative ( $b_{26} = -.02$ , p < -.02.01), whereas the interaction between customer orientation and behavior-based control system was significant and positive ( $b_{25} = .01, p < .01$ ), in support of  $H_{4a}$  and  $H_{4b}$ , respectively.5 To illustrate the interactions, we use simple slopes analysis. The results show that the difference between the self-efficacy slopes under outcome- and behavior-based controls is significantly positive (b = .16, p < .01), indicating that the positive bias from self-efficacy is weaker under a behavior-based system (Figure 2, Panel A). For customer orientation, the difference between the two slopes is significantly negative (b = -.04, p < .05), suggesting that downward bias from customer orientation is weaker under a behavior-based control system (Figure 2, Panel B).

<sup>&</sup>lt;sup>5</sup>Although not hypothesized, the results show that behaviorbased control systems positively moderate the relationship between salesperson–customer similarity and customer relationship quality. They also show that similarity has no effect on salesperson relationship quality, indicating that similarity may positively bias customers under behavior-based controls.

TABLE 3

Multivariate Hierarchical Regression Results for Antecedents to Salesperson Inaccuracy

| A: Main Effects   | Model                            |               |                                     |       |                 |
|---|----------------------------------|---------------|-------------------------------------|-------|-----------------|
|   | b (SE)                           |               |                                     |       |                 |
|   | Customer<br>Relationship Quality |               | Salesperson<br>Relationship Quality |       | ,               |
| Main Effects  |                                  |               |                                     |       | -               |
| Intercept (b <sub>i0</sub> )  | 1.51*                            | (.69)         | 2.29**                              | (.69) |                 |
| Customer orientation (bi1)  | .66**                            |               | .11                                 | (.07) | H <sub>1</sub>  |
| Self-efficacy (bi2)   | .03                              | (.12)         | .54**                               | (.12) | H               |
| Salesperson-customer similarity (bi3)                               | .20                              | (.13)         | 04                                  | (.13) | H               |
| Controls  |                                  | ()            | .01                                 | ()    | 113             |
| Share of wallet (bi8)   | .00                              | (.00)         | .00                                 | (.00) |                 |
| Sales experience (b <sub>ig</sub> )                                 | .00                              | (.00)         | .00                                 | (.00) |                 |
| Salesperson tenure (b <sub>10</sub> )                               | .00                              | (.01)         | .01                                 | (.01) |                 |
| Relationship phase (b <sub>i11</sub> )                              | .02                              | (.06)         | .04                                 | (.01) |                 |
| 1.1   |                                  |               |                                     | (.00) |                 |
| B: Full Effects Model Under Behav                                   | ior-Based Co                     | ontrol Syster | n                                   |       |                 |
| Simple Effects  | 11.7                             |               |                                     |       |                 |
| Intercept (b <sub>i0</sub> )  | 1.68*                            | (.69)         | 3.09**                              | (.69) |                 |
| Customer orientation (bi1)  | .60**                            | (.07)         | .12                                 | (.07) |                 |
| Self-efficacy (bi2)   | 07                               | (.10)         | .38**                               | (.12) |                 |
| Salesperson-customer similarity (bi3)                               | .49**                            | (.17)         | 05                                  | (.17) |                 |
| Behaviorial control system (bi4)                                    | .02                              | (.04)         | .05                                 | (.04) |                 |
| Interactions  |                                  |               |                                     | /     |                 |
| Behavioral control system × Customer orientation (b <sub>i5</sub> ) | .00                              | (.01)         | .01**                               | (.00) | H <sub>4t</sub> |
| Behavioral control system × Self-efficacy (bi6)                     | .01                              | (.01)         | 02**                                | (.01) | H <sub>4</sub>  |
| Behavioral control system × Salesperson-customer similarity (bi7)   | .13*                             | (.05)         | .03                                 | (.05) | 1 4             |
| Controls  |                                  | ()            | .00                                 | ()    |                 |
| Share of wallet (b <sub>i8</sub> )                                  | .00                              | (.00)         | .00                                 | (.00) |                 |
| Sales experience (b <sub>i9</sub> )                                 | .00                              | (.00)         | .00                                 | (.00) |                 |
| Salesperson tenure (b <sub>i10</sub> )                              | .00                              | (.01)         | .01                                 | (.01) |                 |
| Relationship phase (b <sub>i11</sub> )                              | .01                              | (.06)         | .01                                 | (.01) |                 |
|   |                                  |               | .02                                 | (.06) | -               |
|   | Main Effects Model               |               | Full Effects Model                  |       |                 |
| Deviance statistic  | 494.34                           |               | 454.54                              |       |                 |
| Change in fit index   |                                  |               | $\chi^2(8) = 39.80^{**}$            |       |                 |

\*p < .05. \*\*p < .01.

Notes: i = 1 for customer outcome, 2 for salesperson outcome.

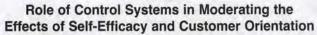
### Consequences of Salesperson Accuracy and Inaccuracy

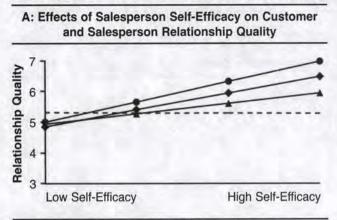
Following Edwards and Parry (1993), we formed response surface coefficients from the main effects in our polynomial regression model (Table 4). Figure 3 shows how these coefficients form a three-dimensional surface displaying the relationship between salesperson relationship quality, customer relationship quality, and customer profitability in one plot (for more detail, see the Web Appendix). Within Figure 3, we highlight the cross-sectional plot lines for salesperson accuracy (solid line) and inaccuracy (dashed line) that are used to support each main effect hypothesis. Panels A and B of Figure 4 display these cross-sections on a two-dimensional plane to facilitate interpretation for the moderating effect of relationship phase.

In  $H_5$ , we posit that increasing salesperson accuracy will provide increasingly larger profit. Referring to Table 4, surface-level tests for customer profitability along the salesperson accuracy line show a nonsignificant slope coefficient ( $b_1 + b_2 = -.035$ , p > .10) and a significant positive curvature ( $b_3 + b_4 + b_5 = .033$ , p < .05). This indicates a Ushaped surface along the salesperson accuracy line (higher profits for both low and high levels of accuracy) and provides partial support for H<sub>5</sub> (Figure 3). Response surface analysis also provides estimates of the principal axes and stationary point of the surface. From coefficient and bootstrap estimates (Edwards and Parry 1993), the results show that the stationary point is close to the scale center (X = .35, Y = .54). The first principal axis exhibits a slope significantly greater than 1 ( $p_{11} = 1.93$ , p < .05), indicating that the line with greatest upward curvature is rotated slightly counterclockwise from the salesperson accuracy line.

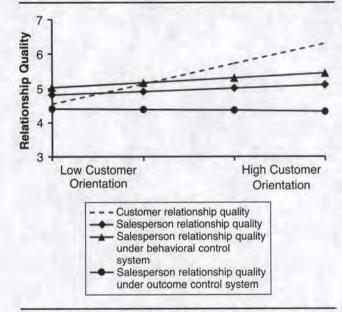
In line with H<sub>6</sub>, profitability has a nonsignificant slope along the salesperson inaccuracy line  $(b_1 - b_2 = .016, p > .05)$  and a significant negative curvature  $(b_3 - b_4 + b_5 = .054, p < .01)$ , indicating an inverted U-shape. These results suggest that customer profitability declines at an increasing rate as the extent of salesperson inaccuracy

### FIGURE 2





B: Effects of Salesperson Customer Orientation on Customer and Salesperson Relationship Quality



Notes: Relationship quality on vertical axis represents both salesperson relationship quality and customer relationship quality.

increases, in support of H<sub>6</sub> (Figure 3). In addition, the results show that the slope of the second principal axis is significantly greater than -1 ( $p_{21} = -.52$ , p < .01), indicating that the line with greatest downward curvature is rotated counterclockwise from the salesperson inaccuracy line.

### Moderating Impact of Relationship Phase

We added the buildup and maturity relationship phases to the polynomial regression as categorical variables to test for changes in the effect of salesperson accuracy and inaccuracy as relationships progress (H<sub>7</sub>). Using the bootstrapping approach recommended by Edwards and Parry (1993), we find that the salesperson accuracy line curvature is not significant during the exploration phase (b<sub>3</sub> + b<sub>4</sub> + b<sub>5</sub> = -.007, p > .10) but becomes significant during the buildup phase (b<sub>3</sub> + b<sub>4</sub> + b<sub>5</sub> + b<sub>10</sub> + b<sub>11</sub> + b<sub>12</sub> = .046, p < .01) and significantly steeper during the maturation phase (b<sub>3</sub> + b<sub>4</sub> + b<sub>5</sub> + b<sub>15</sub> + b<sub>16</sub> + b<sub>17</sub> = .064, p < .05). These results demonstrate a strengthened effect of salesperson accuracy on profitability as the relationship progresses, in support of H7a. Figure 4, Panel A, illustrates these relationships with an insignificant linear increase during the exploration phase that shifts to a significant curvilinear (U-shaped) relationship in the buildup phase and steepens in the maturation phase. Furthermore, the results support a significant dampening effect for the curvature along the salesperson inaccuracy line as the relationship progresses from the exploratory phase (b<sub>3</sub>  $b_4 + b_5 = -.130, p < .01$ ) into the buildup phase  $(b_3 - b_4 + b_5) = -.130, p < .01$  $b_5 + b_{10} - b_{11} + b_{12} = -.025, p > .10$  and maturity phase  $(b_3 - b_4 + b_5 + b_{15} - b_{16} + b_{17} = .022, p > .10)$ . These results demonstrate a weakened effect of salesperson inaccuracy on profitability as the relationship progresses, in support of H7b. Figure 4, Panel B, illustrates these relationships. In the exploration stage, profitability decreases at an increasing rate as the extent of salesperson inaccuracy increases (through either over- or underestimation). Although the relationship between inaccuracy and profit is not significant during the later phases, each phase shows different effects for salesperson under- and overestimations.

### Additional Analyses

Relationship-building activities as a mediating mechanism. We conducted additional tests to support our rationale for relationship-building activities as a mediating mechanism between salesperson relationship quality and profit. We follow Preacher, Rucker, and Hayes's (2007) recommendation to test the conditional indirect effects of salesperson relationship quality on profit given the customer's relationship quality and relationship phase (see the Web Appendix). In support of our rationale, salesperson relationship quality is positively associated with relationship-building activities (b = .86, p < .01). The results also indicate that relationshipbuilding activities are positively associated with profit (b = .03, p < .01). More importantly, bootstrap estimates indicate that salesperson relationship quality has an indirect effect on profit through relationship-building activities (b = .03, p < .01). Next, we tested the conditional indirect effect of salesperson relationship quality on profit at three conditions of customer relationship quality (mean and ±1 SD). The results show that the indirect relationship between salesperson relationship quality and profit is nonsignificant at low customer relationship quality (b = .007, p > .10) but has a positive significant effect at mean customer relationship quality (b = .015, p > 01) and high customer relationship quality (b = .023, p < .01). Finally, we tested relationship phase as a moderator of these relationships. Consistent with our expectations, the indirect effect of salesperson relationship quality on profit strengthens as relationships progress. At high customer relationship quality, the indirect effect of salesperson relationship quality on profit is weakest in the exploration phase (b = .018, p < .05), stronger in the buildup phase (b = .022, p < .05), and strongest in the maturity phase (b = .026, p < .01).

Potential endogeneity. An explanation for our results could be that customer relationship quality changes over the relationship to match salesperson relationship quality, or vice versa. Although we lack the longitudinal data to rule

| A: V   | ariables   |      |                 |                  |                 |
|--|--|------|-----------------|------------------|-----------------|
|  | b (SE)   |      |                 |                  |                 |
|  | Main Effects   |      | Full Model      |                  |                 |
| Predictor Effects  | 1.2  |      |                 |                  |                 |
| Intercept (b <sub>0</sub> )  | .203** (.0   |      | .208**          |                  |                 |
| RQ <sub>SP</sub> (b <sub>1</sub> )                                   |  | 038) | .031            | (.059)           |                 |
| $RQ_{c}(b_{2})$  |  | 034) | .034            | (.049)           |                 |
| $RQ_{SP}^{2}(b_{3})$   |  | 010) | 044*            | (.018)           |                 |
| $RQ_{SP} \times RQ_{C} (b_{4})$                                      |  | 013) | .062**          |                  |                 |
| $RQ_{C}^{2}(b_{5})$  | .010 (.0   | 003) | 025             | (.017)           |                 |
| RPB (b <sub>6</sub> )<br>RPM (b <sub>7</sub> )                       |  |      | 026             | (.045)           |                 |
| Interactions   |  |      | 030             | (.055)           |                 |
|  |  |      |                 |                  |                 |
| $RQ_{SP} \times RPB (b_8)$   |  |      | 028             | (.069)           |                 |
| $RQ_{c} \times RPB (b_{9})$<br>$RQ_{SP}^{} \times RPB (b_{10})$      |  |      | 092             | (.068)           |                 |
| $RQ_{SP} \times RQ_C \times RPB (b_{11})$                            |  |      | .027            | (.024)           |                 |
| $RQ_{C}^{2} \times RPB (b_{12})$                                     |  |      | 026             | (.023)           |                 |
| $RQ_{SP} \times RPM (b_{13})$  |  |      | .053**<br>–.113 | (.022)           |                 |
| $RQ_{C} \times RPM (b_{14})$   |  |      | 067             | (.076)           |                 |
| $RQ_{SP}^2 \times RPM (b_{15})$                                      |  |      | .056*           | (.075)<br>(.028) |                 |
| $RQ_{SP} \times RQ_C \times RPM$ (b <sub>16</sub> )                  |  |      | 041             | (.028)           |                 |
| $RQ_{C}^{2} \times RPM (b_{17})$                                     |  |      | .056*           | (.025)           |                 |
| R-square   | .53  |      | .59             | (.020)           |                 |
| Adjusted R-square  | .51  |      | .54             |                  |                 |
| B: Response  | Surface Analysis   |      |                 |                  |                 |
| Salesperson accuracy line slope (b <sub>1</sub> + b <sub>2</sub> )   | 035 (.0  | 55)  |                 |                  |                 |
| Exploration phase  |  |      | .065            | (.071)           |                 |
| Buildup phase  |  |      | 055             | (.063)           |                 |
| Maturation phase   |  |      | 114             | (.090)           |                 |
| Salesperson accuracy line curvature $(b_1 + b_2 + b_3)$              | .033* (.0  | 15)  |                 |                  | H <sub>5</sub>  |
| Exploration phase  |  |      | 007             | (.022)           | H <sub>7a</sub> |
| Buildup phase  |  |      | .046*           | (.019)           | 14              |
| Maturation phase   |  |      | .064*           | (.033)           |                 |
| Salesperson inaccuracy line slope (b <sub>1</sub> - b <sub>2</sub> ) | .016 (.0   | 48)  |                 |                  |                 |
| Exploration phase  |  |      | 004             | (.082)           |                 |
| Buildup phase  |  |      | .061            | (.087)           |                 |
| Maturation phase   |  |      | 050             | (.088)           |                 |
| Salesperson inccuracy line curvature $(b_1 - b_2 + b_3)$             | 054 (.0  | 22)  |                 |                  | H <sub>6</sub>  |
| Exploration phase  |  |      | 130**           | (.036)           | H <sub>7b</sub> |
| Buildup phase  |  |      | 025             | (.034)           |                 |
| Maturation phase   | and the second s |      | .022            | (.057)           |                 |

### TABLE 4 **Polynomial Regression Results for Customer Profitability**

# \*p<.05. \*\*p<.01.

Notes: RQ<sub>SP</sub> = salesperson relationship quality; RQ<sub>C</sub> = customer relationship quality; RPB = buildup phase; RPM = maturity phase.

out this explanation empirically, we estimated the perceptual differences as a function of relationship phase to offer evidence that this bias does not exist. The results indicate that the difference between customer and salesperson perceptions exhibits a small but insignificant increase as relationships progress (b = .20, p > .05). This suggests that salespeople should continue to evaluate relationship states in all relationship stages.

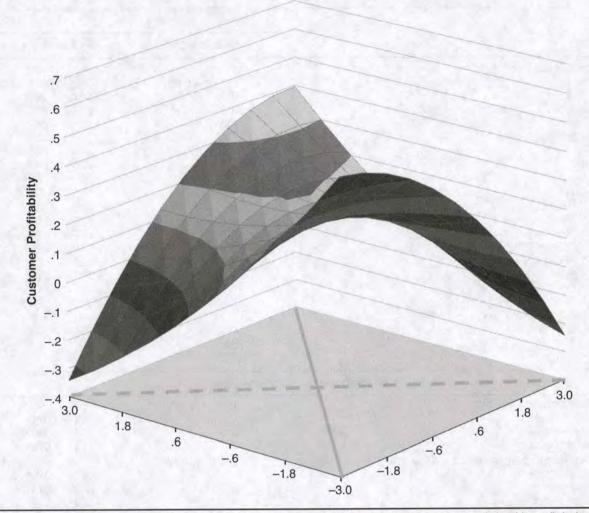
Potential common bias issue. Although the measures for relationship quality are commensurate for salespeople and customers, it is possible that the self-perception of each party is also subject to biases. If so, this bias could explain

the relationship between the antecedents and perceptual inaccuracy. However, for this argument to hold, all selfrated antecedents should have the same relationship with the biases. Because we find biases that work in opposing directions, it is highly unlikely that this bias explains our findings.

### Discussion

Although firms rely heavily on salesperson information in marketing strategy planning and implementation, our understanding of salespeople's perception-based information is still limited. With that in mind, our research provides

FIGURE 3 Main Effects Response Surface for Customer Profitability



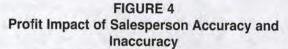
Notes: Solid line = salesperson accuracy line (i.e., level at which salesperson relationship quality = customer relationship quality); dashed line = salesperson inaccuracy line (i.e., extent and direction of difference between salesperson relationship quality and customer relationship quality). The x- and y-axes are based on the scale midpoint centered values as modeled within the polynomial regression.

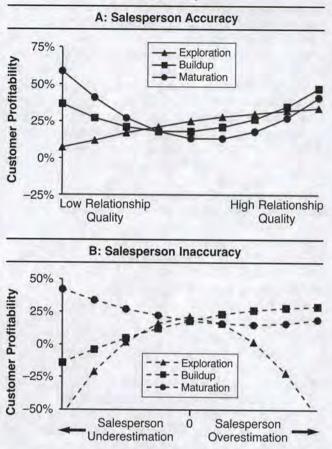
guidance on when and how to benefit most from salesperson perceptions of customer relationship quality. By integrating salesperson perception into the traditional relationship quality framework, we offer new insights into how salesperson inaccuracy forms and how salesperson perception affects customer profitability. We believe that our study design, data, framework, and findings contribute to the literature on relationship management and person perception in several ways.

### **Research Implications**

Importance of a holistic salesperson accuracy model. Prior research on the impact of salesperson perceptions has focused on inaccurate perceptions—in particular, over- and underestimations of customer perceptions (Homburg, Borneman, and Kretzer 2013; Vosgerau, Anderson, and Ross 2008). Operationally, these studies measure the extent of inaccuracy using difference scores. Using this approach, such studies indicate linear relationships between inaccuracy and relationship outcomes. Our approach improves on these studies in one fundamental way: we separate the effects of salesperson and customer responses (i.e., actor and partner effects). By doing so, we (1) avoid issues that plague traditional dyadic research using difference scores and (2) include the effects of salesperson accuracy and inaccuracy in one unified framework. In addition, we expand our knowledge on the effects of salesperson perceptions by studying potential curvilinear effects. Using response surface analysis, we are the first to show that the effects of salesperson accuracy and inaccuracy on financial performance are distinctly different and curvilinear. We believe this approach can be easily applied and can offer novel insights to other contexts, such as service quality in dyad relationships.

Antecedents to salesperson inaccuracy. Because salesperson inaccuracy can lead to suboptimal outcomes, research has called for more understanding on what drives salespeople to misperceive customers (Vosgerau, Anderson, and Ross 2008, p. 219). Answering this call, we find that self-efficacy can upwardly bias salesperson relationship





Notes: The extent of salesperson inaccuracy equals zero at the xaxis center.

quality, whereas customer orientation causes a downward bias. Even though these characteristics are typically associated with increased performance, our findings suggest that their ability to cause inaccuracy can be a double-edged sword that limits their benefit. Panels A and B of Figure 2 illustrate the differential effects on each type of person's perception and depict how inaccuracy occurs through independent processes. Without examining each person's perception, it is impossible to determine how inaccuracy occurred. We also introduce sales force control systems as a solution to correct salesperson biases. We find that although self-efficacy and customer orientation can cause salesperson inaccuracy, this inaccuracy may be reduced under a behavior-based control system.

Profit impact of salesperson accuracy. Our results confirm that salesperson accuracy does not harm customer profitability. What is notable is the nuanced effect that salesperson accuracy provides more profit for both highand low-relationship quality customers, exhibiting a Ushaped relationship. This finding contrasts with research in which improved customer perceptions produce linear performance returns (e.g., Crosby, Evans, and Cowles 1990) and offers some explanation for ineffective relationship strategies. Our results suggest that moderate-quality rela-

tionships are more difficult to allocate relationship resources profitably, stressing the importance of "selectively pursuing" customers (cf. Homburg, Droll, and Totzek 2008). In addition, the results reveal that the effect of salesperson accuracy on profit is strengthened in later relationship phases. Figure 4, Panel A, illustrates that in the exploration phase, salesperson accuracy demonstrates the linear (though insignificant) relationship with profit one might expect from previous relationship quality research (e.g., De Wulf, Odekerken-Schröder, and Iacobucci 2001). However, in the buildup and maturity phases, the profit curve exhibits a U-shaped relationship, indicating higher returns from salesperson accuracy in both high- and low-quality relationships. We believe that during the exploratory phase, a lack of customer inertia and certainty makes it more difficult for customers to reciprocate toward salespeople who provide relationship benefits.

Profit impact of salesperson inaccuracy. As the extent of salesperson inaccuracy increases (whether through overor underestimation), we find that profitability increasingly deteriorates. In line with assimilation-contrast theory (Anderson 1973), small inaccuracies have marginal effects on profit. However, as inaccuracy grows, profitability decreases at an increasing rate. This implies that misallocating relationship effort undermines customer relationship benefits for all relationship quality levels. Misallocating relationship investments may create relationship misunderstandings—destroying trust, commitment, and, ultimately, the relationship.

Despite the negative consequences of inaccuracy discussed in previous research and our study, we are the first to show that subsequent relationship phases can insulate salespeople from the negative impact of inaccuracy. Specifically, Figure 4, Panel B, illustrates that in the exploration phase, customers are increasingly less profitable as the extent of salesperson inaccuracy grows, regardless of the direction of inaccuracy. However, in both the buildup and maturation relationship phases, salesperson inaccuracy does not harm customer profitability as significantly as it does in the exploration phase. It seems that inertia and certainty lead these customers to reciprocate salesperson investments, even when they disconfirm customers' expectations.

Additional implications. Some of our findings also contrast with previous research. First, our results suggest that relationship phase does not predict whether salespeople are more or less accurate. This contrasts with Vosgerau, Anderson, and Ross's (2008) firm-level findings that relationship age reduces the extent of inaccuracy. An explanation for these mixed findings is that relationship age is distinct from relationship phase. Although accuracy may improve over time, accuracy may not be a necessary condition for relationships to progress to a more mature phase. Indeed, there is empirical evidence that confidence in perception grows stronger over a lengthy and involved relationship, but it can be unrelated to accuracy (Swann and Gill 1997). Second, our findings also show that customer orientation creates a downward bias. Homburg, Bornemann, and Kretzer (2013) show that salespeople who practice adaptive selling are less likely to misperceive customer relationship commitment.

Although these findings are seemingly inconsistent, we believe that they may support each other. Shown in metaanalysis, adaptive selling and customer orientation are conceptually and empirically distinct (Franke and Park 2006). Moreover, our second-order construct of relationship quality captures three relational dimensions rather than just one dimension. Prior research has suggested that effect sizes might differ depending on whether researchers treat relationship quality as a second- or first-order construct (Palmatier et al. 2006). Furthermore, we separate the antecedent effects on each dependent variable instead of using difference scores. The contrasting findings could be due to the limitations inherent with difference score variables (Edwards and Parry 1993). For example, difference scores treat all accurate perceptions the same, regardless of level, which could mask nuanced effects.

### Managerial Implications

Our findings inform managers of salesperson characteristics that bias salesperson relationship quality away from customer relationship quality, resulting in salesperson inaccuracy. We further show that this inaccuracy matters because it has an impact on customer profitability. Our study also informs managers of ways to preempt salesperson inaccuracy, to take advantage of salesperson accuracy, and to curtail the effect of salesperson inaccuracy.

Biases from traditional drivers of relationship quality. Prior research has informed managers that, in general, selecting self-efficacious and customer-oriented salespeople improves performance. However, our results show that these characteristics may exert differential effects on customer and salesperson relationship quality, thereby creating inaccuracy. Specifically, our results indicate that self-efficacious salespeople focus attention on positive, self-validating customer cues that inflate salesperson relationship quality. In contrast, customer-oriented salespeople focus attention to customers' negative feedback cues, which biases salesperson relationship quality negatively. Our results also show that managers can curb salesperson inaccuracy by using a more behavior-based control system as a correcting mechanism to ensure that salespeople employ balanced perspective taking.

These findings provide valuable insights for managing the potential shortcomings of self-efficacious or customeroriented salespeople. Specifically, managers should review customer feedback with these salespeople to detect any trends toward a positive or negative bias. Predominantly positive or negative feedback may indicate that a salesperson is ignoring feedback that affects his or her subjective judgment. In these scenarios, managers can monitor salesperson activities in a way that incentivizes seeking accurate feedback. For example, managers can randomly ride along with salespeople to monitor sales calls and cross-check customer activity reports to observe whether salespeople are overly focused on the same issues over time. However, such a heavily behavior-based control system can be costly and unwelcomed by salespeople (Oliver and Anderson 1994). Managers may have to trade off between customer and internal benefits.

Dyadic approach for managing customer relationships. Firms recognize the importance of minimizing perceptual differences within the organization between managers and subordinates (e.g., Edwards 1995). By measuring perceptions from both parties, managers can minimize differences and consequently improve employee relationships, job satisfaction, and performance. Although this has helped internal relationship management, firms often overlook the impact of minimizing perceptual differences in external relationships (e.g., salespeople and customers). This knowledge gap is surprising given sales leaders' strong desire to improve customer relationships. Similar to internal relationships, using a dyadic approach to minimize perceptual differences between customers and salespeople has the potential to improve customer prioritization and relationship management, leading to improved outcomes (e.g., Brown and Swartz 1989). Despite this growth potential, to date, firms have primarily focused their efforts only on the customer side of the relationship. To illustrate, in 2012 firms spent more than \$5.5 billion on initiatives that rely solely on customer data (Columbus 2013). Yet our findings show that salesperson and customer perceptions are often out of sync (pairwise correlation  $\rho = .20$ ), suggesting salesperson inaccuracy may limit the success of relationship-based approaches.

To implement a dyadic approach, managers should track and compare relationship perceptions from both customers and their salespeople within a CRM system. Managers can identify gaps and guide salespeople to allocate relationship-building behavior in line with customer expectations and firm strategy. For example, this approach is particularly helpful for customer segmentation. Our results suggest that accounts may be underperforming due to salesperson inaccuracy. Managers can conduct periodic surveys for different account types (e.g., unprofitable accounts, lost accounts) to understand which accounts are lagging due to salesperson inaccuracy. By pinpointing inaccuracies, managers can help salespeople learn from their errors (Boichuk et al. 2014) and allocate relationship investments more effectively.

Using relationship phases as a profitability leverage. Our findings on the moderating effect of relationship phase also have important implications for salesperson effort allocation. First, we underscore the importance of separating customers by relationship phase. Our findings highlight that new customer relationships are more at risk of reduced profits, with little upside, when relying on salesperson perceptions. In firms in which salespeople have autonomy to allocate relationship effort, managers may restrict salesperson decision authority for new accounts, for which inaccuracy greatly affects customer profitability. Furthermore, managers should assign salespeople who are more skilled at perspective taking to newer accounts because inaccuracy during the exploration phase, through either overestimation or underestimation, is more detrimental at this stage. Again, our findings suggest that assigning highly self-efficacious or overly customer-oriented salespeople to newer accounts may backfire because their perspective taking may be biased. Finally, it is clear that salespeople can achieve

higher levels of profitability when they are accurate in perceiving customer relationship quality. Because later relationship phases exhibit a reduced risk of lower profits, managers should give salespeople more freedom to allocate relationship efforts and focus on customers with higher payoffs (e.g., high- and low-relationship-quality customers).

### Limitations and Further Research

Our article demonstrates that salesperson relationship quality, relative to customer relationship quality, influences relationship effectiveness. As a result, we primarily examine salesperson-specific factors that bias salespeople's perceptions. Further research could benefit from investigating customerspecific factors that influence each party's perception. Research on relationship orientation (Palmatier et al. 2008) could provide a starting point, with multiple factors (e.g., interpersonal, industry) as antecedents. Moreover, few studies have focused on customer trait- and state-based characteristics that influence perceptions.

Further research could also examine how salespeople's perceptions influence customer prioritization toward maximizing firm- versus self-goals. Previous research has suggested that salespeople are less accurate in judging customer feedback when feedback is not aligned with salespeople's goals (e.g., Homburg, Wieseke, and Bornemann 2009). Thus, it is necessary to examine whether managers or salespeople should handle customer prioritization. Self- versus other-focus may influence salespeople's motivation to seek feedback and, thus, their accuracy.

Finally, our context involves a cross-sectional study of one salesperson managing customer accounts. Researchers may consider a process-based or longitudinal approach to study the relationship between pre- and postinteraction salesperson relationship quality and accuracy. Furthermore, many sales contexts involve teams in which customer investments are collective. Future studies could adopt a consensus accuracy model in which team and individual factors influence consensus (level of agreement) and perceptual accuracy (extent that team perceptions match customer perceptions). With the significant investments in key account management, we believe that investigating teamlevel perceptions is a critical area for further research.

## **Appendix: Measurement Scales**

### **Relationship Quality**

(De Wulf, Odekerken-Schröder, and Iacobucci 2001; 1 = "strongly disagree," and 7 = "strongly agree")

### Customer Relationship Quality Commitment

- •I am committed to [company name] as a customer.
- •I am willing to make sacrifices to preserve my relationship with [company name].

### Satisfaction

- •Overall, I'm very satisfied with the sales representative from [company name].
- •Overall, I like working with the sales representative from [company name].

#### Trust

The sales representative from [company name] is ...

- ....very trustworthy.
- ... honest in all of his/her dealings with me.

Salesperson Relationship Quality Commitment

•[Customer name] is committed to our relationship.

•[Customer name] would be willing to make sacrifices to preserve our relationship.

### Satisfaction

•Overall, I think [customer name] is very satisfied with me. •Overall, I think [customer name] likes working with me.

#### Trust

[Customer name] would perceive me as being ...

- •...very trustworthy.
- ... honest in all of our dealings.

### **Customer Orientation**

(Saxe and Weitz 1982; 1 = "strongly disagree," and 7 = "strongly agree")

- 1. I try to help customers achieve their goals.
- 2. I keep the best interests of customers in mind.
- 3. I take a problem solving approach with customers.
- 4. I am able to answer customers' questions correctly.

### Self-Efficacy

(Sujan, Weitz, and Kumar 1994; 1 = "strongly disagree," and 7 = "strongly agree")

Compared with other sales representatives in my division, I...

- 1. ... am an excellent salesperson.
- 2. ... always sense exactly what customers want.
- 3. ... can easily use a wide variety of selling approaches.
- 4. ...know the applications and functions of company products very well.

### Salesperson–Customer Similarity

(Based on Rich and Smith 2000)

Please rate how often your coworkers would describe you as \_\_\_\_\_.

- 1. Approachable
- 2. People oriented
- 3. Open
- 4. Assertive
- 5. One who takes charge
- 6. Competitive

#### **Company Tenure**

How long have you been employed with [company name]? (years)

### Sales Experience

How long have you been working in sales? (years)

### Share of Wallet

(Palmatier et al. 2008; measured in percentage)

Of all the [industry category] products your company purchases, approximately what percentage do you currently buy from [company name]?

### **Control System**

(Oliver and Anderson 1994; 1 = "strongly disagree," and 7 = "strongly agree"; subscale reliabilities in parentheses)

Behavioral Facet (.95) My manager...

1. ...makes sure everyone knows what to do and how to do it.

2. ... stays in close contact with me.

3. ... frequently asks me for information on how I'm doing.

4. ... stays in touch with me.

5. ... stays very well informed of his salespeople's activities.

- 6. ... is very integrated in the activities of his salespeople.
- 7. ... contacts salespeople on a day-to-day basis.
- 8. ... gives explicit direction to salespeople.

#### Outcome Facet (.79)

My manager...

- ...decides who's good by looking strictly at each salesperson's bottom line.
- 2. ... only values tangible results.
- 3. ...doesn't care what I do as long as I produce.
- ...takes very few things into consideration when rating my performance.

How heavily do you think your manager relies on the following measures when he evaluates salesperson performance?

Objective Outcomes (.71)

- 1. Sales volume
- 2. Market penetration
- 3. Achievement of quota

### REFERENCES

- Ahearne, Michael, John Mathieu, and Adam Rapp (2005), "To Empower or Not to Empower Your Sales Force? An Empirical Examination of the Influence of Leadership Empowerment Behavior on Customer Satisfaction and Performance," *Journal* of Applied Psychology, 90 (5), 945–55.
- Anderson, Rolph E. (1973), "Consumer Dissatisfaction: The Effect of Disconfirmed Expectancy on Perceived Product Performance," *Journal of Marketing Research*, 10 (February), 38– 44.
- Boichuk, Jeffrey P., Willy Bolander, Zachary R. Hall, Michael Ahearne, William J. Zahn, and Melissa Nieves (2014), "Learned Helplessness Among Newly Hired Salespeople and the Influence of Leadership," *Journal of Marketing*, 78 (January), 95–111.
- Boulding, William, Ajay Kalra, Richard Staelin, and Valarie A. Zeithaml (1993), "A Dynamic Process Model of Service Quality: From Expectations to Behavioral Intentions," *Journal of Marketing Research*, 30 (February), 7–27.
- Bowman, Douglas and Das Narayandas (2004), "Linking Customer Management Effort to Customer Profitability in Busi-

#### Paper Inputs (.70)

- 1. Number of calls
- 2. Sales expenses
- 3. Quality and completeness of call reports

Subjective Inputs (.92)

- 1. Attitude
- 2. Ability
- 3. Effort

### **Customer Perception of Relationship Phase**

(Jap and Ganesan 2000)

Which of the following relationship phases best describes your current relationship with [company name]?

- 1. Exploration
- 2. Buildup
- 3. Maturity
- 4. Decline

### **Customer Profitability**

Objective firm performance of the revenue above cost of the customer account, standardized by the volume of sales from the customer account.

### **Relationship-Building Activities**

(Palmatier et al. 2008)

- •I work hard to strengthen our business relationship with [customer company name].
- •I focus attention on building and maintaining our relationship with [customer company name].
- •I make significant investments in building a strong relationship with [customer company name].
- •I devote considerable time and effort to our relationship with [customer company name].

ness Markets," Journal of Marketing Research, 41 (November), 433-47.

- Brown, Stephen W. and Teresa A. Swartz (1989), "A Gap Analysis of Professional Service Quality," *Journal of Marketing*, 53 (April), 92–98.
- Challagalla, Goutam N. and Tasadduq A. Shervani (1996), "Dimensions and Types of Supervisory Control: Effects on Salesperson Performance and Satisfaction," *Journal of Marketing*, 60 (January), 89–105.
- Columbus, Louis (2013), "Roundup of CRM Forecasts and Market Estimates, 2012," *Forbes*, (accessed December 16, 2013), [available at http://www.forbes.com/sites/louiscolumbus/2012/ 12/04/roundup-of-crm-forecasts-and-market-estimates-2012/].
- Cravens, David W., Thomas N. Ingram, Raymond W. LaForge, and Clifford E. Young (1993), "Behavior-Based and Outcome-Based Salesforce Control Systems," *Journal of Marketing*, 57 (October), 47–59.
- Cropanzano, Russell and Marie S. Mitchell (2005), "Social Exchange Theory: An Interdisciplinary Review," Journal of Management, 31 (6), 874–900.

- Crosby, Lawrence A., Kenneth R. Evans, and Deborah Cowles (1990), "Relationship Quality in Services Selling: Interpersonal Influence Perspective," *Journal of Marketing*, 54 (July), 68–81.
- De Wulf, Kristof, Gaby Odekerken-Schröder, and Dawn Iacobucci (2001), "Investments in Consumer Relationships: A Cross-Country and Cross-Industry Exploration," *Journal of Marketing*, 65 (October), 33–50.
- Dwyer, F. Robert, Paul H. Schurr, and Sejo Oh (1987), "Developing Buyer-Seller Relationships," *Journal of Marketing*, 51 (April), 11–27.
- Edwards, Jeffrey R. (1995), "Alternatives to Difference Scores as Dependent Variables in the Study of Congruence," Organizational Behavior and Human Decision Processes, 64 (3), 307– 324.
- and Mark E. Parry (1993), "On the Use of Polynomial Regression Equations as an Alternative to Difference Scores in Organizational Research," Academy of Management Journal, 36 (6), 1577–1613.
- Einhorn, Hillel J. and Robin M. Hogarth (1981), "Behavioral Decision Theory: Processes of Judgement and Choice," Annual Review of Psychology, 32 (1), 53–88.
- Franke, George R. and Jeong-Eun Park (2006), "Salesperson Adaptive Selling Behavior and Customer Orientation: Meta-Analysis," *Journal of Marketing Research*, 43 (November), 693–702.
- Ganzach, Yoav (1997), "Misleading Interaction and Curvilinear Terms," Psychological Methods, 2 (3), 235–47.
- Gist, Marilyn E. and Terence R. Mitchell (1992), "Self-Efficacy: A Theoretical Analysis of Its Determinants and Malleability," Academy of Management Review, 17 (2), 183–211.
- Goulder, Alvin W. (1960), "The Norm of Reciprocity: A Preliminary Statement," American Sociological Review, 25 (2), 161–78.
- Homburg, Christian, Torsten Bornemann, and Max Kretzer (2013), "Delusive Perception – Antecedents and Consequences of Salespeople's Misperception of Customer Commitment," *Journal of the Academy of Marketing Science*, 42 (2), 1–17.
  - —, Mathias Droll, and Dirk Totzek (2008), "Customer Prioritization: Does It Pay Off, and How Should It Be Implemented?" *Journal of Marketing*, 72 (September), 110–30.
  - —, Nicole Koschate, and Wayne D. Hoyer (2005), "Do Satisfied Customers Really Pay More? A Study of the Relationship Between Customer Satisfaction and Willingness to Pay," *Journal of Marketing*, 69 (April), 84–96.
  - \_\_\_\_, Jan Wieseke, and Torsten Bornemann (2009), "Implementing the Marketing Concept at the Employee–Customer Interface: The Role of Customer Need Knowledge," *Journal of Marketing*, 73 (May), 64–81.
- Hughes, Douglas E. and Michael Ahearne (2010), "Energizing the Reseller's Sales Force: The Power of Brand Identification," *Journal of Marketing*, 74 (July), 81–96.
- Ickes, William, ed. (1997), Empathic Accuracy. New York: Guilford Press.
- Jap, Sandy D. and Erin Anderson (2003), "Safeguarding Interorganizational Performance and Continuity Under Ex Post Opportunism," *Management Science*, 49 (12), 1684–1701.
- and Shankar Ganesan (2000), "Control Mechanisms and the Relationship Life Cycle: Implications for Safeguarding Specific Investments and Developing Commitment," *Journal* of Marketing Research, 37 (May), 227–45.
- Kenny, David A. and Linda K. Acitelli (2001), "Accuracy and Bias in the Perception of a Partner in a Close Relationship," *Journal of Personality and Social Psychology*, 80 (3), 439–48.
- Lambert, Douglas M., Howard Marmorstein, and Arun Sharma (1990), "The Accuracy of Salespersons' Perceptions of Their Customers: Conceptual Examination and an Empirical Study," *Journal of Personal Selling and Sales Management*, 10 (1), 1– 9.

- Marsh, Herbert W. (1990), "The Structure of Academic Self-Concept: The Marsh/Shavelson Model," Journal of Educational Psychology, 82 (4), 623–36.
- Mittal, Vikas and Wagner A. Kamakura (2001), "Satisfaction, Repurchase Intent, and Repurchase Behavior: Investigating the Moderating Effect of Customer Characteristics," *Journal of Marketing Research*, 38 (February), 131–42.
- —, William T. Ross, and Patrick M. Baldasare (1998), "The Asymmetric Impact of Negative and Positive Attribute-Level Performance on Overall Satisfaction and Repurchase Intentions," *Journal of Marketing*, 62 (January), 33–47.
- Mullins, Ryan and Niladri Syam (2014), "Manager–Salesperson Congruence in Customer Orientation and Job Outcomes: The Bright and Dark Sides of Leadership in Aligning Values," *Journal of Personal Selling & Sales Management*, 34 (3), 188–205.
- Oliver, Richard L. (1980), "A Cognitive Model of the Antecedents and Consequences of Satisfaction Decisions," *Journal of Marketing Research*, 17 (November), 460–69.
- and Erin Anderson (1994), "An Empirical Test of the Consequences of Behavior- and Outcome-Based Sales Control Systems," *Journal of Marketing*, 58 (October), 53–67.
- Palmatier, Robert, Rajiv R. Dant, Dhruv Grewal, and Kenneth R. Evans (2006), "Factors Influencing the Effectiveness of Relationship Marketing: A Meta-Analysis," *Journal of Marketing*, 70 (October), 136–53.
- —, Lisa K. Scheer, Kenneth R. Evans, and Todd J. Arnold (2008), "Achieving Relationship Marketing Effectiveness in Business-to-Business Exchanges," *Journal of the Academy of Marketing Science*, 36 (2), 174–90.
- Preacher, Kristopher J., Derek D. Rucker, and Andrew F. Hayes (2007), "Addressing Moderated Mediation Hypotheses," *Multi*variate Behavioral Research, 42 (1), 185–227.
- Rich, Michael K. and Daniel C. Smith (2000), "Determining Relationship Skills of Prospective Salespeople," *Journal of Busi*ness & Industrial Marketing, 15 (4), 242–59.
- Rust, Roland T. and Richard L. Oliver (2000), "Should We Delight the Customer?" Journal of the Academy of Marketing Science, 28 (1), 86–94.
- Saxe, Robert and Barton A. Weitz (1982), "The SOCO Scale: A Measure of the Customer Orientation of Salespeople," *Journal* of Marketing Research, 19 (July), 343–51.
- Sharma, Arun and Douglas M. Lambert (1994), "How Accurate Are Salespersons' Perceptions of Their Customers?" Industrial Marketing Management, 23 (4), 357–65.
- Sherif, Muzafer and Carl I. Hovland (1961), Social Judgment: Assimilation and Contrast Effects in Communication and Attitude Change. Oxford, UK: Yale University Press.
- Simpson, Jeffry A., William Ickes, and Tami Blackstone (1995), "When the Head Protects the Heart: Empathic Accuracy in Dating Relationships," *Journal of Personality and Social Psychology*, 69 (4), 629–41.
- Sujan, Harish, Barton A. Weitz, and Nirmalya Kumar (1994), "Learning Orientation, Working Smart, and Effective Selling," *Journal of Marketing*, 58 (July), 39–52.
- Swann, Jr., William B. and Michael J. Gill (1997), "Confidence and Accuracy in Person Perception: Do We Know What We Think We Know About Our Relationship Partners?" *Journal of Personality and Social Psychology*, 73 (4), 747–57.
- Thomas, Geoff and Garth J.O. Fletcher (1997), "Empathic Accuracy in Close Relationships," in *Empathic Accuracy*, William Ickes, ed. New York: Guilford Press, 194–218.
- Vosgerau, Joachim, Erin Anderson, and William T. Ross (2008), "Can Inaccurate Perceptions in Business-to-Business Relationships Be Beneficial?" *Marketing Science*, 27 (2), 205–224.
- Voss, Glenn B., Andrea Godfrey, and Kathleen Seiders (2010), "How Complementarity and Substitution Alter the Customer Satisfaction–Repurchase Link," *Journal of Marketing*, 74 (November), 111–27.

- Wang, Qiong, Ujwal Kayande, and Sandy Jap (2010), "The Seeds of Dissolution: Discrepancy and Incoherence in Buyer–Supplier Exchange," *Marketing Science*, 29 (6), 1109–1124.
- Weitz, Barton A. (1978), "Relationship Between Salesperson Performance and Understanding of Customer Decision-Making," *Journal of Marketing Research*, 15 (November), 501–516.
- West, Teresa V. and David A. Kenny (2011), "The Truth and Bias Model of Judgment," *Psychological Review*, 118 (2), 357–78.
- Williams, Michael H. and Jill S. Attaway (1996), "Exploring Salespersons' Customer Orientation as a Mediator of Organizational Culture's Influence on Buyer–Seller Relationships," *Journal of Personal Selling & Sales Management*, 16 (4), 33– 52.
- Wood, Robert and Albert Bandura (1989), "Impact of Conceptions of Ability on Self-Regulatory Mechanisms and Complex Decision Making," *Journal of Personality and Social Psychology*, 56 (3), 407–415.
- Woodruff, Robert B., Ernest R. Cadotte, and Roger L. Jenkins (1983), "Modeling Consumer Satisfaction Processes Using Experience-Based Norms," *Journal of Marketing Research*, 20 (August), 286–304.
- Yi, Youjae and Taeshik Gong (2008), "If Employees 'Go the Extra Mile,' Do Customers Reciprocate with Similar Behavior?" *Psychology and Marketing*, 25 (10), 961–86.

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