Customers' Perceptions of the Service They Receive: the Influence of Employee Extra-Role Job Behaviors.

Robert Carlton Baker IV
Louisiana State University and Agricultural & Mechanical College

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CUSTOMERS' PERCEPTIONS OF THE SERVICE THEY RECEIVE: THE INFLUENCE OF EMPLOYEE EXTRA-ROLE JOB BEHAVIORS

A Dissertation
Submitted to the Graduate Faculty of the
Louisiana State University and
Agricultural and Mechanical College
in partial fulfillment of the
requirements for the degree of
Doctor of Philosophy

in
The Department of Psychology

by
Robert C. Baker, IV
B.A., Centenary College, May, 1990
M.A., Louisiana State University, May, 1995
December, 1999
Acknowledgments

The author would like to acknowledge the valuable assistance and guidance offered by numerous people which significantly contributed to the completion of this project. First, I would like to thank my committee chair, Dr. Eric Braverman, for his contribution to this dissertation. Without his invaluable guidance and amazing patience, quite frankly, this paper would not have been possible. He definitely went above and beyond his formally prescribed role. I would also like to thank two members in particular of my dissertation committee, Dr. Irv Lane and Dr. Tim Buckley for their timely, well-directed, and most importantly, understanding help. I would like to thank several of my colleagues and peers who frequently gave me the encouragement to remain persistent and offered quite useful insight and unconditional assistance: Steve Lamoureux, Brenden Beckstein, Joe Yum, Tina Harris, Leah Groehler, and Gary Greguras. Next, I would like to acknowledge my parents for their support and encouragement. At times when I have had doubts, they have remained steadfastly confident. I would also like to express my gratitude for my boss at work, Bob Zehner, who always insisted that my academic success was of the utmost priority, even if it meant more work for him. In addition, I am indebted to Winona Landry, who listened to my seemingly incessant concerns about this and many other academically-related matters while remaining completely positive and resoundingly reassuring. Finally, and most of all, I would like to thank God for giving me the ability coupled with the opportunity to complete such a project. For it was most assuredly through Him that all of those mentioned above provided to me so much valuable help. Above all else, I am forever indebted to and humbly thankful for Him.
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Abstract

Today's organizations face increased global and domestic competition, more downsizing, growing emphasis on team based work, and increased focus on customer service issues. This changing work environment necessitates a more complete examination of contextual factors impacting service delivery, including extra-role employee job behaviors (Bettencourt & Brown, 1997; Borman & Motowidlo, 1997). The current study examines the effects of employees' extra-role job behaviors on customers' perceptions of service. Specifically, the present study investigates two types of employee extra-role job behaviors: 1) organizational citizenship behaviors (OCBs), and 2) organizationally deviant behaviors (ODBs). These specific employee extra-role job behaviors are studied in order to determine their potential relationship with specific dimensions of customers' perceptions of the service they receive. In general, it was postulated that OCBs are positively related and ODBs negatively related to customers' perceptions of service they receive. More specifically, interpersonal OCBs are more strongly related to customers' perceptions of service than noninterpersonal OCBs. These suppositions were supported. On the other hand, noninterpersonal, more serious ODBs are postulated to be more strongly related to customers' perceptions of service than are interpersonal, less serious ODBs. Only ODBs more serious in nature proved to be more strongly related to customers' perceptions of service in the current investigation. The present study has implications for future research regarding employee extra-role job behaviors. Specifically, present results indicate that employee extra-role job behaviors are significantly related to and account for variance in customers' perceptions of the
service they receive. In addition, examining these types of employee behaviors at the group level proved to be effective. This type of group analysis had not been conducted in previous related research. Future studies should further examine the relationships identified in the current investigation in other settings.
Introduction

Katz and Kahn (1978) describe a theory partitioning job performance into three distinct components: (a) entering and staying with an organization, (b) meeting or exceeding organizationally prescribed standards of performance, and (c) innovatively and spontaneously going beyond such prescribed standards and/or roles. The first component refers to an individual's choice to join a particular organization and his/her subsequent decision to remain in that organization. Schneider's (1987) attraction, selection, and attrition framework provides a basis for understanding this element of job performance. The second component mentioned by Katz and Kahn (1978) pertains to in-role job performance behaviors. Specifically, in-role job behaviors are those actions formally required by the organization of its members. In-role behaviors are typically established by the organization in formal job descriptions, and their presence, or lack thereof, is either formally rewarded or punished. The final component of job performance in Katz and Kahn's (1978) scheme refers to extra-role job behaviors. Extra-role job behaviors are those employee actions not formally assigned by the organization to its employees. These behaviors are not found in prescribed employee job descriptions nor do they serve as the formal basis underlying conventional performance appraisals. Extra-role job behaviors include actions such as cooperating with other employees, protecting one's organization from harm, offering suggestions for improvement, engaging in self-development, and representing one's organization positively to others. Both in-role and extra-role patterns of job performance behavior
are essential for organizational effectiveness, however the latter component is
discretionary and not typically prescribed by the organization (Motowidlo & Van
Scotter, 1994). This is in contrast to in-role job behaviors which are organizationally
prescribed and required.

While the majority of job performance related research has concentrated on
in-role performance behaviors, the present paper concentrates on extra-role job
performance behaviors. While there has been relatively little research conducted that
directly examines these types of job performance behaviors, the study of such extra-role
job performance is a very timely concept for modern organizations now and into the
foreseeable future (Campbell, McCloy, Oppler, & Sager, 1993; Guion, 1987). As
Borman & Motowidlo, (1997) point out, extra-role job performance will become
increasingly important to organizations as: 1) global competition continues to increase
the effort levels required by employees, 2) team-based organizations become more
popular, 3) downsizing continues to necessitate employee adaptability and readiness to
exhibit extra effort, 4) customer service is given greater emphasis, and 5) broadly
interpretable fields of work, in part, replace more specifically defined jobs as the
envelope of work. In other words, modern employees have broader fields of
responsibility, have less clearly defined roles, and must interact more frequently with
others in order to fulfill their job requirements. The current study attempts to expand
the extra-role job behavior research base by demonstrating the importance of such
behaviors in service organizations. Specifically, the primary purpose of the current study
is to examine the relationships between extra-role job performance behaviors and customers' perceptions of service. This is especially timely as organizations today are moving away from a manufacturing orientation and toward a service orientation (Burke, 1995). In other words, there is a growing service imperative facing modern organizations and examining variables that have impact in this area is warranted and important to today's organizations (Heskett, Jones, Loveman, Sasser, & Schlesinger, 1994; Johnson, 1996; Jones & Sasser, 1995; Schneider, 1990; Zeithaml, Berry, & Parasuraman, 1996). Due to increased competition and rapid deregulation in the services sector, many organizations have sought profitable means to differentiate themselves. The delivery of high quality service is one method that has been associated with business success for these organizations (Parasuraman, Zeithaml, & Berry, 1988; Rudie & Wansley, 1985; Thompson, DeSouza, & Gale, 1985). Measuring customers' perceptions of service enables organizations to accurately determine if they are delivering service of high quality. By demonstrating the potential impact of employee extra-role job behaviors upon customers' perceptions of service, the current study may enable organizations to better understand variables influencing these increasingly important perceptions.

While most research has focused on the beneficial aspects of employee extra-role job behaviors, it is meaningful to note that extra-role job behaviors can be either beneficial or detrimental to organizations. Examples of beneficial or positive extra-role job behaviors include actions such as volunteering, assisting new employees, and
outstanding punctuality. Detrimental or negative extra-role job behaviors consist of actions like employee theft, sabotage, and chronic tardiness. Both types of extra-role job behaviors (i.e., positive and negative) are highly prevalent and have potential impact within organizations. More specifically and more applicable to the current investigation, these positive or negative extra-role job behaviors may influence perceptions of customer service. It is the intent of the current study to clearly examine this issue. It is postulated that positive employee extra-role job behaviors will be positively related to customers' perceptions of the service they receive whereas negative employee extra-role job behaviors will be negatively related to such perceptions. That is, as positive employee extra-role job behaviors increase in frequency, customers' perceptions of service will increase in quality. On the other hand, as negative employee extra-role job behaviors increase in frequency, customers' perceptions of service will decrease in quality. Before expanding upon this research objective further, it is necessary to discuss and define extra-role job behaviors more thoroughly. The following section overviews extra-role job behaviors and discusses the potential impact these behaviors have on organizations.
Extra-role Behaviors and Their Importance to Organizations

While Katz and Kahn (1978) broke job performance down into three distinct components, entering and staying, in-role job performance, and extra-role job performance, many researchers have primarily focused upon the latter two. For instance, Borman and Motowidlo (1993) postulated that performance of any job can be separated into components of job specific and non-job specific behaviors. Similar to Katz and Kahn's (1978) second component of job performance, job-specific behaviors refer to those behaviors that are formal or technical requirement of an employee's job (i.e., in-role). Non-job specific behaviors are those behaviors which are not formally required or included in an employee's job description (i.e., extra-role). These types of non-job specific behaviors correspond to the third component of Katz and Kahn's (1978) job performance framework. In accordance with the above mentioned two types of job performance behaviors, employees adhere to roles relative to each. In turn, these roles have profound impact upon subsequent job performance (Morrison, 1994). Generally, such employee role adherence can be classified as either in-role or extra-role. As mentioned earlier, in-role job behaviors are those activities formally prescribed to the employee by the organization. In-role job behaviors are often clearly defined in an employee's job description and frequently comprise the basis for formal performance evaluations. For example, a sales clerk in a department store may be required to keep merchandise in his/her department adequately stocked while at work. The store conveys this requirement to the sales clerk by establishing standards of merchandise stocking.
behavior in the clerk's job description. On the other hand, extra-role job behaviors are not formally assigned by the organization. For example, if the above mentioned sales clerk not only maintains the merchandise stock within his/her area of responsibility but also voluntarily assists other sales clerks in maintaining their stock, the clerk is demonstrating an extra-role job behavior. Although this extra-role behavior is not a job requirement, it is beneficial to the organization. Therefore, in this example, this helping behavior is considered to be a positive extra-role job behavior because the organization benefits from it (the clerk's voluntary assistance). More succinctly, the clerk expedited the stocking of more merchandise which may increase sales for the organization (potentially increasing profits). However, not all extra-role job behaviors are positive. There are many extra-role job behaviors that have negative or detrimental impact to organizations (e.g., taking undeserved breaks, stealing company merchandise, giving less effort toward the end of the work day, etc.). For instance, a retail sales employee who consistently engages in personal phone calls while at work may cost the organization sales because of the resultant inattention to customers (potentially decreasing profits). This negative employee extra-role behavior (i.e., personal telephone conversation) is detrimental to the organization's objective (i.e., selling merchandise). With the difference between positive and negative extra-role job behaviors now established, the importance of these extra-role job behaviors will be discussed.

There are numerous ways that extra-role job behaviors influence organizations. Three particularly important areas in which these types of behaviors have been found to

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have impact concern organizational profits, employee socialization issues, and in-role job performance. In an economic and/or financial sense, extra-role job behaviors can be both beneficial and/or detrimental to organizations. For instance, positive extra-role job behaviors have been found to affect employee productivity (MacKenzie, Podsakoff, & Fetter, 1991) which may in turn impact organizational profits. Additionally, extra-role job behaviors such as employee theft, sabotage and withdrawal of effort cost organizations significant amounts of money (Katzell & Yankelovich, 1975; Murphy, 1993). More explicitly, Murphy (1993) estimated that such negative extra-role job behaviors cost U.S. companies at least 6 to 200 billion dollars annually. It is readily apparent that extra-role job behaviors can have a significant impact upon an organization's bottom-line.

Extra-role job behaviors also affect the employee socialization process. New employees are often indoctrinated concerning their organization's formal and informal policies and procedures by more experienced employees (Organ, 1988). This indoctrination is not typically included in experienced employees' formal job requirements, although such behavior frequently contributes beneficially to organizational functioning. More specifically, newcomers have a need to reduce uncertainty and gain some sense of control in their new working environment (Falcione & Wilson, 1988). Fulfilling this need reduces uncertainty allowing these new workers to make a more effective adjustment to their new work setting. Job incumbents help satisfy this need by voluntarily accepting the extra responsibility of aiding newcomers with the
adjustment to their new surroundings. Logically, by more quickly and effectively adjusting to their new work environment, newcomers will potentially be able to contribute to the organization more effectively and expeditiously.

In addition to employee socialization issues, numerous studies have demonstrated that extra-role job behaviors affect in-role job productivity and subsequent performance evaluations (MacKenzie, Podsakoff, & Fetter, 1991; Podsakoff & MacKenzie, 1994). In fact, supervisors and managers in organizations often report that extra-role job behaviors directly influence in-role job performance. In a field study, Orr, Sackett, and Mercer (1989) found that most supervisors perceived extra-role job behaviors to significantly and directly contribute to the dollar value of each employee's in-role job performance. More typically, extra-role job behaviors influence in-role job performance indirectly through performance appraisals. Performance appraisal takes place in nearly every organization (Cardy & Dobbins, 1994) and plays a crucial role in most personnel decisions (Borman, 1991; Landy & Farr, 1983). By far, most performance measurement in organizations is based on the subjective judgments of raters who rely on formal employee job descriptions and in-role job requirements (Murphy & Cleveland, 1995). However, there is abundant evidence that extra-role job behaviors also contribute to this performance evaluation process (MacKenzie et al., 1991; Motowidlo & Van Scotter, 1994). For example, in a study using sales managers' ratings of sales agents' overall performance, Avila, Fern, and Mann, (1988) found that the managerial evaluation of sales performance was significantly related to extra-role job
behaviors such as cooperating with co-workers, expressing goodwill toward the company, and improving customer relations. As extra-role job behaviors notably impact organizational profits and proficiency, socialization processes, in-role job productivity, and performance evaluation, it is important to develop a more detailed understanding of such behaviors at this point.
Positive and Negative Extra-role Job Behaviors

As mentioned earlier, extra-role job behaviors can be either positive (beneficial) or negative (detrimental) to organizations. Two particularly interesting theoretical approaches frequently employed for understanding positive and negative extra-role job behaviors are Organizational Citizenship Behavior Theory (Organ, 1988) and Organizational Deviant Behavior Theory (Robinson & Bennett, 1995). Both of these approaches attempt to provide a theoretical basis for examining extra-role employee behavior. The present study uses components from each of these theories to develop hypotheses regarding the relationship between employee extra-role job behaviors and customers' perceptions of the quality of the service they received. It is proposed that positive employee extra-role behaviors (i.e., OCBs) will affect customers' perceptions of service differently than will negative employee extra-role behaviors (i.e., ODBs).

Specifically, higher levels of employee OCBs will likely be related to higher levels of customers' perceptions of service. On the other hand, higher levels of employee ODBs will be related to lower levels of such service perceptions. Prior to presenting a more detailed description of the study's hypotheses, it is necessary to provide a brief overview of each of the approaches used in the current paper to explain employee extra-role job behaviors. These two theoretical positions are briefly described in the next portion of this paper.
Organizational Citizenship Behaviors.

Katz (1964) identified several basic types of behavior that are necessary for an organization to function. One type was described in the following manner: "... there must be innovative and spontaneous activity that goes beyond role prescriptions." (pg. 132). Organizational citizenship behaviors (OCBs) represent such activity. OCBs are unrewarded contributions made by individuals that benefit the organization and are not included in an employee's job description. Although not required, employee OCBs in the aggregate lead to more effective and productive organizations (MacKenzie, Podsakoff, & Fetter, 1991; Organ, 1988; Podsakoff & MacKenzie, 1994; Podsakoff & MacKenzie, 1997). OCB theory posits that employee job performance within organizations is profoundly contingent on prosocial behaviors that are not included in formal employee job roles. These prosocial behaviors, or OCBs, are extra-role. There have been many different definitions of OCBs provided in recent literature. However, Organ (1988) furnishes one of the clearest:

"... individual behavior that is discretionary, not directly or explicitly recognized by the formal reward systems,... (and such behavior) is not an enforceable requirement of the role or job description... it is rather a matter of personal choice, such that its omission is not generally understood as punishable." (pg.4).

In other words, OCBs are behaviors that support the social and psychological environment in which in-role task performance occurs (Organ, 1997).
OCBs occur in many different settings within numerous contexts, however they are most frequently studied in the workplace (Dalton & Cosier, 1988). Research has demonstrated that these behaviors are displayed consistently across all sectors of employment. Employee OCBs embody beneficial actions such as helping co-workers, exhibiting above normal attendance and punctuality, volunteering for extra tasks, and actively cooperating in the implementation of administrative decisions (Farh, Podsakoff, & Organ, 1990). The existence of OCBs in organizations is very important as employee OCBs impact both effectiveness and productivity (Organ, 1988). In fact, it has been argued that citizenship behaviors enhance performance by lubricating the social machinery of an organization, reducing friction, and increasing efficiency (Borman & Motowidlo, 1993; Organ, 1988; Podsakoff & MacKenzie, 1997). Companies save significant time and money due to these type of behaviors. For instance, helping new employees adjust to their new roles can prove to be very beneficial to the development of these new workers and to the overall efficiency of the organization. Volunteering has similar outcomes. Individuals who volunteer for extra duties often eliminate the necessity of hiring additional workers which saves organizations money. Thus, organizational financial gain is often the result of employee OCBs (MacKenzie et al., 1991; Organ, 1988). Additionally, employee OCBs increase efficiency by enhancing both managerial and coworker productivity. For example, more experienced employees often help new employees "learn the ropes" by conveying the best practices throughout
their work unit or group (Organ, 1988; Podsakoff & MacKenzie, 1994; Podsakoff & MacKenzie, 1997).

There are also non-monetary benefits of employee OCBs to organizations. For instance, employee OCBs are related to organizational commitment (Organ & Ryan, 1995). Organizational commitment is defined as the strength of one's involvement and identification in an organization (Mowday, Porter, & Steers, 1982). By coming to work punctually, by completing assignments in a timely manner, and by attending work regularly, a worker displays organizational commitment. While it is documented that employee OCBs are related to organizational commitment, the exact direction of this relationship has not been firmly established (Organ & Ryan, 1995). Employee OCBs also significantly impact group norms in the workplace. Employees who view such extra-role prosocial behaviors demonstrated in a consistent fashion by their co-workers are more likely to engage in such behaviors themselves (Bryan & Test, 1967).

Additionally, in companies where high levels of employee OCBs are found, group norms often prescribe that employees carry out duties at levels well beyond minimum standards (Organ, 1988). Prominent companies such as Frito-Lay, Disney, and Federal Express all exhibit high levels of aggregate employee OCBs which help improve overall organizational productivity and efficiency.

Originally, research distinguished between two dimensions of OCBs: altruism and generalized compliance (Smith, Organ & Near, 1983). Altruism refers to acts of aid directed toward a particular person, such as a fellow employee. For instance, a worker
who voluntarily assists others who have been absent or who have heavy work loads
demonstrates altruism. Generalized compliance concerns a more impersonal form of
OCBs related to rules, punctuality, comportment, and attendance. Some research has
labeled generalized compliance as conscientiousness (e.g., Organ, 1988). Being
punctual, promptly returning from scheduled breaks, and minimizing idle conversation
are examples of generalized compliance.

More recently, OCB theory has been further expanded to include three additional
dimensions (Organ, 1988; Podsakoff & MacKenzie, 1988). These are sportsmanship,
courtesy, and civic virtue. Sportsmanship refers to "tolerating with fine grace the minor
impositions and nuisances that are the inevitable fall-out of interdependence." (Organ,
1988, p.47). A worker exhibits sportsmanship by minimizing complaints and/or
grievances to a superior, especially if those complaints are trivial. Courtesy concerns
checking with others before taking action that could potentially impact their work. An
example of courtesy is notifying a co-worker in advance of the need to use a particular
organizational meeting room. Finally, civic virtue refers to feeling an obligation to
function in an organizationally appropriate manner. Civic virtue differs from
conscientiousness in that it pertains to acts impacting the entire organization in a
political sense. Graham (1986) defined civic virtue as responsible participation in the
political life of the organization. Civic virtue can take the form of actions as simple as
reading and promptly responding to one's inter-office mail, attending committee
meetings, or keeping up with issues relative to one's employing organization.
There has been substantial factor analytic support for these five dimensions of OCBs (MacKenzie, Podsakoff, & Fetter, 1991; Morrison, 1994; Organ & Ryan, 1995; Podsakoff, MacKenzie, Moorman, & Fetter, 1990). However, the two factors consistently maintaining the highest factor loadings are altruism and generalized compliance (conscientiousness) (Organ & Ryan, 1995). In agreement with the findings of Williams and Anderson (1991), Organ (1997) has further refined the dimensions of OCBs to incorporate the intended target of such behavior. Specifically, Williams and Anderson (1991) and Organ (1997) have proposed that OCB contributions that are explicitly targeted toward an individual should be labeled OCB-Individual (OCB-I). OCB-I behaviors are synonymous with altruism. On the other hand, OCBs that offer no immediate aid to any specific person or persons should be classified as OCB-Organizational (OCB-O). OCB-O acts are comparable to generalized compliance or conscientiousness.

When examining the link between customer service perceptions and positive employee extra-role job behaviors, the current study will rely upon OCB theory and its components. However, as mentioned previously, not all extra-role job behaviors are beneficial to the organization. Some are detrimental. The following section presents a brief review of the literature concerning negative extra-role job behaviors.

Organizational deviant behaviors.

While the preponderance of research regarding extra-role job behaviors has focused on desirable actions like employee OCBs, some researchers have focused on
extra-role job behaviors that have negative consequences. For example, Dwyer and Ganster (1991) examined absenteeism, Blau (1994) studied lateness behavior, and Greenberg (1987; 1990; 1993) researched theft. Each of the previously mentioned studies individually included potential explanations for the existence of such negative extra-role job behaviors. However, these studies did not focus on a wide array of Organizational Deviant Behaviors (ODBs) simultaneously. They only covered a particular type. Employee ODBs cost organizations tremendous amounts of money each year (Murphy, 1993). For example, several researchers have specified employee theft to be one of the most serious problems confronting the field of human resource management (Clark & Hollinger, 1983; Greenberg, 1990). It has also been estimated that among all employees, 33 to 75 percent have engaged in some form of deviant behavior such as theft, sabotage, vandalism, and/or absenteeism (Harper, 1990). Even though the prevalence and associated cost of such negative extra-role job behaviors necessitates more research effort, relatively little exploration has been aimed at the study of employee ODBs (Vardi & Wiener, 1992; Robinson & Bennett, 1995). While broadly focusing on employee ODBs remains a relatively new approach to understanding extra-role employee job behaviors as a whole, several interesting frameworks do exist providing more detailed theoretical descriptions of employee ODBs (i.e., Hunt, Hansen, & Paajen, 1994; Robinson & Bennett, 1995).

Hunt et al. (1994) proposed a structure of non-job specific performance that included negative extra-role job behaviors such as theft, drug misuse, absence, tardiness,
negative attitude, and sabotage as well as positive extra-role job behaviors (i.e., employee OCBs). Their description of negative extra-role job behaviors is of particular interest. The authors posit that negative extra-role job behaviors are actions of minimum performance. Hunt et al., (1994) separate extra-role job behaviors into two components labeled Minimum Performance Behaviors and Organizational Citizenship Behaviors. Minimum Performance Behaviors include extra-role job acts negative in nature and Organizational Citizenship Behaviors include positive extra-role job behaviors, similar to the descriptions presented earlier (e.g., Organ, 1988; Organ & Ryan, 1995; Podsakoff & MacKenzie, 1989). Most of the above mentioned components of Minimum Performance Behaviors (i.e., theft, drug misuse, bad attitude, absence, and tardiness) are self-explanatory. The bad attitude element refers to a lack of acceptance of authority and the absence of control of negative behavior by an employee. For example, a worker exhibits a bad attitude by failing to follow the directions of his/her supervisor without just explanation. A more useful description of ODBs is presented by Robinson and Bennett (1995). In fact, most aspects of Hunt et al.,'s (1994) theory of employee ODBs are captured by Robinson and Bennett's (1995) expanded typology of deviant workplace behaviors.

A detailed typology of employee ODBs has been provided by Robinson and Bennett (1995). Robinson and Bennett (1995) suggest that employee ODBs can be classified based on two distinct dimensions: level of seriousness and interpersonal/non-interpersonal (intended target). The level of seriousness dimension reflects the harm
that is caused to individuals and the organization by the exhibition of an employee ODB. This level of seriousness is labeled minor-versus-serious, and where on this dimension a specific employee ODB falls is determined primarily by the consequences of that ODB. For example, failing to return a co-worker's routine phone call most likely delineates a minor level of harm whereas destroying costly organizational property most likely characterizes a serious level of harm. The second dimension is labeled interpersonal/non-interpersonal. Employee ODBs that are interpersonal are harmful to individuals, yet not intended to be harmful to the organization as a whole. For example, stealing a fellow employee's personal property (e.g., wallet, purse) is an interpersonal employee ODB. On the other hand, stealing company property (e.g., stapler, copy paper) from the company supply room is a non-interpersonal employee ODB. Stealing property or equipment from the organization does cause direct harm to the organization, and is thus labeled "non-interpersonal".

Robinson and Bennett (1995) suggest four specific types of employee ODBs which occupy the cells outlined by the two previously mentioned dimensions, level of seriousness and interpersonal/non-interpersonal. These four types of employee ODBs are production deviance, property deviance, political deviance, and personal aggression. Production deviance refers to negative employee extra-role job actions such as leaving work early, taking excessive breaks, intentionally working slow, and wasting resources. Property deviance includes such behaviors as sabotage, lying about hours worked, and theft. Political deviance is exemplified by gossiping about fellow employees, competing
nonbeneficially, showing favoritism, and falsely blaming co-workers. Personal aggression is illustrated by actions such as sexual harassment, verbal abuse, and physically endangering co-workers. Employee ODBs accounted for within these four categories can vary with regard to the dimensions of level of seriousness (minor to serious) and to whom or what they are directed toward (interpersonal to organizational) discussed previously. A graphic depiction of Robinson and Bennett's (1995) typology of deviant workplace behaviors can be seen in Figure 1 on the next page. In the present study, the dimensions of level of seriousness and interpersonal/non-interpersonal will be utilized when examining the link between customers' perceptions of service and employee ODBs.

To summarize, it seems evident that employee extra-role job behaviors impact organizations in a variety of ways. For example, productivity and cost efficiency can be affected. Also, the way employees are socialized within an organizational context is impacted. Additionally, many performance appraisal systems include extra-role employee job behaviors either directly or indirectly. Because these extra-role employee job behaviors exert such an influence on organizations, it is not surprising that researchers have attempted to provide a theoretical framework for the study of them (e.g., Organ, 1988; Robinson & Bennett, 1995). These frameworks typically include positive extra-role behaviors (e.g., volunteering, assisting co-workers), negative extra-role behaviors (e.g., theft, sabotage, tardiness) or both. For the purposes of the current study, OCB theory as described by Organ (1988) will be the framework used...
### Organizational

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<thead>
<tr>
<th>Production deviance</th>
<th>Property deviance</th>
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<tr>
<td>* leaving early</td>
<td>* sabotaging equip.</td>
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<tr>
<td>* excessive breaks</td>
<td>* accepting kickbacks</td>
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<tr>
<td>* intentionally working slow</td>
<td>* lying about hours worked</td>
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<tr>
<td>* wasting resources</td>
<td>* stealing from co.</td>
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<th>MINOR</th>
<th>SERIOUS</th>
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<th>Political deviance</th>
<th>Personal aggression</th>
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<td>* showing favoritism</td>
<td>* sexual harassment</td>
</tr>
<tr>
<td>* gossiping about co-workers</td>
<td>* stealing from</td>
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<tr>
<td>* blaming co-workers</td>
<td>* verbal abuse</td>
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<tr>
<td>* competing nonbeneficially</td>
<td>* endangering co-workers</td>
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<th>Interpersonal</th>
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**Figure 1.** Robinson and Bennett's typology of organizationally deviant workplace behaviors. Behaviors are included in Robinson and Bennett's (1995) when...
examining positive extra-role job behaviors. Negative extra-role job behaviors are included in ODB theory. Most of the components related to negative extra-role job examination of workplace deviance. As their approach covers a broad realm of negative extra-role job behaviors, it will serve as the theoretical basis for exploring this area in the present study.

While much research has been conducted regarding employee extra-role job behaviors, many authors have called for additional research focusing on situational and contextual factors impacting organizational functioning (Hunt et al., 1994; Organ & Ryan, 1995; Morrison, 1994; Podsakoff & MacKenzie, 1997). The current study responds to this call by examining extra-role job behaviors (i.e., employee OCBs & ODBs) in a customer service context. Specifically, the current research aims to explore the relationship between employee extra-role job behaviors and customers' perceptions of service. In fact, Morrison (1996) suggested that, in the aggregate, employee OCBs may have significant impact on perceptions of customer service. The present study examines not only employee OCBs but also employee ODBs and their relationship to customers' perceptions of the service they receive. The next section discusses the importance of customers' perceptions of service to organizations, followed by a discussion of the relationship between customers' service perceptions and employee job behaviors.
Customers' Perceptions of Service

Delivering high quality service is essential for success and survival in today's competitive marketplace (Borman & Motowidlo, 1997; Dawkins & Reicheld, 1990; Reicheld & Sasser, 1990; Zeithaml, Parasuraman, & Berry, 1990). This necessity has led to a recent surge in the amount of research being conducted in this domain. Most relevant to the current research endeavor is the body of literature focusing on customer service related issues (George, 1995; Schneider, Hanges, Goldstein & Braverman, 1994; and Schmit & Allscheid, 1995). An increased emphasis on customer service means that employees must extend more interpersonal effort toward customers (Borman & Motowidlo, 1997). A growing number of American companies including Bank One, MCI, Southwest Airlines, and Taco Bell have shifted focus on how they manage and measure organizational success by preeminently incorporating customer service into their overall strategic planning (Heskett, Jones, Loveman, Sasser, and Schlesinger, 1994). Companies such as these are placing an increased emphasis on the value of repeat customers and the service perceptions of those customers. Heskett, et al., (1994) stated that "the lifetime value of a loyal customer can be astronomical, especially when referrals are added to the economics of customer retention and repeat purchases of related products." (pg. 164). Taking into account the fact that the high performing service organizations are now emphasizing a measure of organizational success which includes customer service, it has become increasingly more important to study variables impacting the perceptions that customers have of the service they receive.
These perceptions of service can and do vary among separate business units within the same organization. For instance, Johnson (1996) found that different branches of a large bank differed in levels of service satisfaction as perceived by their customers. In addition, Parasuraman, et al., (1991) found that different branches/departments within the same organization varied in levels of customer service perceptions in a study involving five nationally known companies (i.e., a telephone company, two banks, and two insurance companies). Also, Schneider and Bowen (1993) concluded that within a variety of companies (e.g., Sears, NCR, Ryder, several banks, and many retail outlets), levels of customer service vary among work groups. The present study intends to explain why work groups might vary in customer service by examining the extent to which employees exhibit extra-role job behaviors within their work group. More specifically, it is suggested that the exhibition of employee extra-role job behaviors will be translated into customers' ratings of service. The following two sections discuss in more detail how customer service may be related to employee job behaviors.
Customer Service and Job Behaviors

In-role job behaviors.

Employee task related job behaviors (i.e., in-role job behaviors) have direct impact on customer perceptions and behavior (i.e., customer satisfaction) (Klaus, 1985; Schneider, 1990; Schneider & Bowen, 1985; Schneider, Wheeler, & Cox, 1992; Waldman & Gopalakrishnan, 1996). Although it is not the only factor influencing customers' perceptions of service, the actual delivery of the product/service (i.e., in-role job requirements) must be accomplished in order for these perceptions to be positive (Waldman & Gopalakrishnan, 1996). In fact, it has been stated that both in-role task-related behavior and in-role task-related information is of primary importance with regard to customer service issues (Czepiel, Solomon, Surprenant, & Gutman, 1985). For example, in a study involving maintenance employees at Servicemaster, Heskett et al., (1994) found that in-role job behaviors (e.g., the number of work orders performed per hour and the quality of work done) were significantly and directly related to customers' perceptions of service. In another study, Fiebelkorn (1985) found that teller competence and in-role task performance behavior were critically related to customer satisfaction. More specifically, employees who exhibited prompt and complete service with minimal runaround for the customer received more positive customer service ratings. Thus, it is evident that employee in-role job behaviors directly impact customers' perceptions of service.
Extra-role job behaviors.

Previous literature has shown that employee in-role job performance behaviors affect customers' perceptions of service. However, it is also important for organizations to increase their awareness of the idea that other internal design and employee practices may be visible to customers and impact subsequent perceptions of service (Schneider & Bowen, 1985). For example, employee extra-role job behaviors also comprise a meaningful portion of overall job performance (MacKenzie, et al., 1991; Podsakoff & MacKenzie, 1994). In addition, overall job performance impacts customer perceptions of service (Schneider, 1990; Schneider, Wheeler, & Cox, 1992). So, since extra-role job behaviors comprise a meaningful part of overall job performance and since this overall job performance affects customers' perceptions of service, it logically follows that extra-role job behaviors may also affect customers' perceptions of service (See Figure 2 on the next page). In fact, others have recently suggested this idea (Bettencourt & Brown, 1997; Morrison, 1996; Waldman & Gopalakrishnan, 1996; Walz & Niehoff, 1996). For example, while Bettencourt and Brown's (1997) study concentrated on the influence of employees' perceptions of fairness upon customer satisfaction, they also found that employee extra-role service behavior was positively related to overall customer satisfaction in a study involving a multi-state banking organization (r = .18). However, Bettencourt and Brown (1997) did not examine specific dimensions of employee extra-role behaviors nor specific dimensions of customers' perceptions of service.
Employee Positive Extra-role Behaviors (OCBs)

Employee In-role Job Behaviors

Employee Negative Extra-role Behaviors (ODBs)

Perceived Level of Service Quality

Figure 2. Model of the proposed relationship between employee in-role job behaviors, employee extra-role job behaviors, and customers’ perceptions of service.
In another paper, Morrison (1996) suggested that employee extra-role job behaviors provide a link between an organization's human resource practices and customers' perceptions of service. More specifically, Morrison (1996) indicated that OCBs should have a positive impact on an organization's overall level of service quality. After all, one of the most effective tactics for improving customers' perceptions of service is the ability to handle special customer requests (Guaspari, 1987). Often, handling special customer requests necessitates extra-role job behaviors (e.g., OCBs) on the part of employees (Zemke & Schaaf, 1989). Additionally, Walz and Niehoff (1996) found that employee OCBs were significantly and positively related to customer satisfaction in a study of restaurants. In their study, employee OCBs accounted for 39 percent of the variance in overall customer satisfaction. Following and expanding upon the above mentioned authors' suggestions (i.e., Bettencourt & Brown, 1997; Morrison, 1996; Waldman & Gopalakrishnan, 1996; Zemke & Schaaf, 1989), the current study investigates the relationship between employee extra-role job behaviors (i.e., OCBs, ODBs) and customers' perceptions of service.

In the present study, both measures of customers' perceptions of service and measures of specific employee extra-role job behaviors (i.e., OCBs and ODBs) will be obtained in order to determine how different levels of these extra-role job behaviors impact these perceptions. It has been established that both employee OCBs (positively) and employee ODBs (negatively) relate to "harder" measures of organizational success.
(e.g., productivity). However, companies are now incorporating "softer" measures (e.g., customers' perceptions of service) of organizational success into their repertoire. So, since extra-role job behaviors have been shown to significantly impact previous organizational success measures (MacKenzie et al., 1991; Morrison, 1994; Motowidlo & Van Scotter, 1994; and Murphy, 1993), it logically follows that employee extra-role job behaviors may be related to newer organizational success measures (i.e., customers' perceptions of service) as well. More specifically, it is postulated that service employee OCBs will be positively related to customers' perceptions of the service they receive whereas service employee ODBs will be negatively related to such perceptions. After all, employee OCBs are beneficial to organizations. On the other hand, ODBs are extra-role employee job behaviors that are detrimental to organizations often resulting in negative consequences. Therefore, it is likely that employee ODBs will also have negative impact on customers' perceptions of service. Hence, the current study first hypothesizes that:

H1: The degree to which OCBs are exhibited by employees working in a service organization will be positively related to customers' perceptions of the service they receive.

H2: The degree to which ODBs are exhibited by employees working in a service organization will be negatively related to customers' perceptions of the service they receive.

In addition to the two general hypotheses mentioned above, several more specific hypotheses are proposed. In particular, predictions concerning how specific dimensions
of customer service perceptions are related to extra-role job behaviors (both employee OCBs and employee ODBs) are hypothesized. The following section describes these proposed relationships and the rationale underlying them.
Extra-role Job Behaviors and Dimensions of Customer Service

Seminal research examining the dimensions of perceived service quality has been conducted by Parasuraman, Berry, and Zeithaml (1988). These authors found five dimensions of customer service to be influential relative to customers' perceptions of service quality. These five dimensions of service quality are: 1) reliability, 2) assurance, 3) empathy, 4) responsiveness, and 5) tangibles (see Table 1). Reliability refers to the ability to provide what has been promised (e.g., product or service) dependably and accurately. Assurance pertains to the knowledge and courtesy of employees along with these employees' ability to convey trust and confidence. Empathy is the degree of caring and personal attention shown to customers. Responsiveness involves the willingness to help customers and render prompt service. Tangibles include the physical facilities, equipment, and appearance of personnel. The authors' research focused on service quality across a large number of service organizations including several banks, a long-distance telephone company, a financial services company, and a maintenance company. Their findings indicated that the majority of these five dimensions refer to issues related to in-role job behaviors. Based on these dimensions, Parasuraman et al., (1989) developed an instrument for measuring customers' perceptions of service labeled SERVQUAL. In 1991, Parasuraman et al. reassessed the dimensions of SERVQUAL and still found a consistent five factor structure across five independent samples. While there have been some issues raised in the literature regarding the dimensionality of the SERVQUAL scale (Gronroos, 1984; Scott & Schieff, 1993), several other authors have concluded that SERVQUAL is a good measure of overall perceptions of customer
service quality and demonstrated that it is widely used and accepted (Buttle, 1996; Carman, 1990; Parasuraman, Berry, & Zeithaml, 1991; Zemke & Schaaf, 1989). While it seems clear that in-role job behaviors directly impact customers' service perceptions, a close examination of Parasuraman et al.'s (1988; 1991) dimensions reveals that several

Table 1

Dimensions of Service Quality

<table>
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<tr>
<th>Dimension</th>
<th>Definition</th>
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<tr>
<td>Reliability</td>
<td>The ability to provide what has been promised dependably and accurately.</td>
</tr>
<tr>
<td>Assurance</td>
<td>The knowledge and courtesy of employees along with these employees' ability to convey trust and confidence.</td>
</tr>
<tr>
<td>Empathy</td>
<td>The degree of caring and personal attention shown to customers.</td>
</tr>
<tr>
<td>Responsiveness</td>
<td>The willingness to help customers and render prompt service.</td>
</tr>
<tr>
<td>Tangibles</td>
<td>The physical facilities, equipment, and appearance of personnel.</td>
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(e.g., courtesy, communication, and credibility) may be linked to extra-role job behaviors within many organizations.

It is postulated that particular service dimensions will be differentially related to specific and distinct dimensions of both employee OCBs and ODBs. Regarding employee OCBs, predictions will be made regarding the altruism and generalized
It is postulated that particular service dimensions will be differentially related to specific and distinct dimensions of both employee OCBs and ODBs. Regarding employee OCBs, predictions will be made regarding the altruism and generalized compliance dimensions since these two aspects of OCBs have consistently received the most factor analytical support (Organ & Ryan, 1995). In reference to employee ODBs, Robinson and Bennett's (1995) typology will be used to make specific predictions. In particular, hypotheses will be proposed concerning the production deviance, property deviance, political deviance, and personal aggression types of employee ODBs.

**Employee OCBs and dimensions of customer service.**

As mentioned earlier, there are two basic classes of OCBs, altruism and generalized compliance. Altruism (OCB-I) includes all discretionary behaviors that have the effect of helping a specific person with a task or problem that is organizationally relevant. It is important to note that this type of employee OCB is not always directed toward coworkers, although that is probably its most frequent intention. Altruism is considered to be an employee OCB even if it is aimed at outsiders, including customers, clients, vendors, etc. as long as this interaction between the employee and the outsider is relevant to the employing organization (Organ & Ryan, 1995). For instance, the worker who voluntarily assists a customer in locating their car in the parking lot, even though this act is not included in the worker's job duties, exhibits altruism. Regarding Parasuraman et al.'s (1989) dimensions of customer service, this type of voluntary
diligent adherence to organizational rules and procedures (Organ & Ryan, 1995). For example, employees at Disney maintain outstanding levels of organizational cleanliness exemplifying generalized compliance by caring for organizational property even when it is not formally required. Above normal cleanliness often results in higher perceptions of customer service (Organ, 1988; Zemke & Schaaf, 1989). In fact, Peters (1987) indicated that it is likely to be impossible for an organization to earn credibility about timely delivery and high quality of service if the organization appears slovenly and unkept. With regard to customer service, Parasuraman et al., (1989) found that customers pay special attention to the dimension of "tangibles" when evaluating the quality of service. Tangibles include the appearance of the physical facilities and personnel. Employees consistently engaging in generalized compliance OCBs would likely improve the physical appearance of the organization (e.g., tangibles).

From the preceding two examples, it should be apparent that both altruism (OCB-I) and generalized compliance (OCB-O) can impact customers' perceptions of service. However, the present study proposes that employees' altruistic behaviors will be more strongly related to customers' perceptions of service than employees' generalized compliance behaviors. The reasoning behind this suggestion is as follows. Because altruistic behaviors (OCB-I) are directly aimed toward individuals, including the customer, while generalized compliance behaviors (OCB-O) are directed toward the organization as a whole, altruistic OCBs are more likely to be observed by the customer than are generalized compliance OCBs. Minimal effort and processing resources are required by an individual to make judgments about observed behaviors compared to
unobserved behaviors. In support of this idea, Strack's (1992) experiential judgment strategy theory suggests:

"a task can be so complicated, or the target so obscure and ambiguous that the generation of a judgment requires considerable cognitive effort. Distraction or time pressure can also render the judgment task more difficult. Such complicating circumstances often induce people to simplify the basis of their judgments. This is particularly true if judges are not sufficiently motivated to spend the necessary cognitive effort. Such a simplification might be realized by taking recourse to experiences based on one's bodily sensations." (p. 257), (Strack, 1992).

Such bodily sensations include the results of visual observation. Thus, customers can easily make judgments, such as those required to formulate perceptions of service quality specifically relative to altruistic OCBs, even if they do not have much reason to think deeply about the target (e.g., an employee providing direct service). This is because altruistic OCBs are more readily observed in the service delivery environment.

On the other hand, if more processing effort is required of the customer regarding the correspondent inference of the behavior (e.g., unobservable employee service acts, including the majority of generalized compliance OCBs), the customer will not likely devote the necessary effort to make the appropriate inference. In other words, it is easier for customers to make accurate inferences regarding observable employee service behaviors compared to unobservable employee service behaviors. As previously mentioned, altruistic OCBs are more easily observed by customers than generalized compliance OCBs. This finding provides the basis for the following hypotheses:
H3: Altruistic OCBs of employees working in a service organization, as opposed to generalized compliance OCBs, will be more strongly related to customers' perceptions of service quality.

In other words, employees' altruistic behaviors will have more influence on customers' perceptions of service than will employees' generalized compliance behaviors. In addition, it is proposed that the two dimensions of OCBs (i.e., altruism and generalized compliance) will be differentially related to specific service quality dimensions. Altruistic employee OCBs are interpersonally directed whereas generalized compliance employee OCBs are not interpersonal in nature. Thus, the following hypothesis is proposed:

H4: Altruistic OCBs of employees working in a service organization, as opposed to generalized compliance OCBs, will have a stronger relationship with customers' perceptions of service dimensions of assurance, empathy, and responsiveness.

The reasoning behind this hypothesis is as follows. The dimensions of assurance (i.e., courtesy or conveyance of trust), empathy (i.e., degree of caring), and responsiveness (i.e., willingness to help) are interpersonally oriented, just like employee altruistic behaviors. Taking into account this similarity, it is logical to infer that altruistic employee OCBs will be more closely related to these three service dimensions than will generalized compliance employee OCBs. Employee generalized compliance is non-interpersonal in nature. This parallels the non-interpersonal nature of the service dimension of tangibles. Therefore, it is proposed that employee generalized compliance
altruistic behaviors. Taking into account this similarity, it is logical to infer that altruistic employee OCBs will be more closely related to these three service dimensions than will generalized compliance employee OCBs. Employee generalized compliance is non-interpersonal in nature. This parallels the non-interpersonal nature of the service dimension of tangibles. Therefore, it is proposed that employee generalized compliance OCBs will be more closely related to the service dimension of tangibles than employee altruistic OCBs. Thus, hypothesis five suggests:

H5: Employees' generalized compliance OCBs, as opposed to their altruistic OCBs, will be more strongly related to the customer service dimension of tangibles.

The customer service dimension of reliability by definition can reasonably be impacted by both interpersonal and non-interpersonal behaviors. Reliability refers to the actual delivery of the service/product. This delivery of service may be hindered or aided by both interpersonal (e.g., an employee who forgets a customer request; an employee who delivers the wrong product to the customer) and non-interpersonal (e.g., the distributor of a desired product delays delivery; a defective computer) factors. Hence, a formal hypothesis concerning the relationship between employee OCBs and reliability is not suggested.

Employee ODBs and dimensions of customer service.

Robinson and Bennett (1995) classify employee ODBs with regard to the level of seriousness and degree of interpersonal versus non-interpersonal interaction. Within this classification, the authors further describe employee ODBs in terms of four specific
examples of production deviance. Property deviance ODBs refer to instances where employees acquire or damage property and assets of their organization without permission (Hollinger & Clark, 1982). This type of employee ODB is more serious than production deviance but is still non-interpersonally directed in nature. Sabotaging equipment, accepting kickbacks, falsifying time cards, and theft are some examples of property deviance. Political deviance ODBs are defined as the engagement in social behavior that puts others at a personal or political disadvantage (Robinson & Bennett, 1995). It is of minor seriousness and interpersonally directed. Some examples of political deviance are showing favoritism, gossiping about co-workers, blaming others, and competing nonbeneficially. Personal aggression ODBs refer to behavior that is aggressive or hostile toward other individuals (Robinson & Bennett, 1995). Personal aggression is serious and interpersonally directed. Sexual harassment, verbal abuse, stealing from co-workers, and endangering co-workers are all instances of personal aggression.

By examining the definitions of employee ODB classifications relative to customer service dimensions, more specific predictions can be made concerning their relationship. For example, paralleling employee OCBs, employee ODBs can be interpersonal or non-interpersonal in scope. Therefore, more explicit predictions can be made regarding the relationship employee ODBs have with the dimensions of customer service. However, in the case of employee ODBs, the present study suggests that non-interpersonally directed ODBs (rather than interpersonally directed ODBs) will be more strongly related to customers' perceptions of service. Non-interpersonally directed employee ODBs (i.e., production deviance and property deviance) are directed at the
organization as a whole and more likely to be observed by the customer. This is because non-interpersonally directed employee ODBs occur more frequently than interpersonally directed employee ODBs at the time of service delivery. By definition, interpersonal ODBs are directed toward coworkers, not toward customers (Robinson & Bennett, 1995). Therefore, customers' perceptions of service would less likely be impacted by interpersonal employee ODBs. This is in contrast to employee OCBs. Regarding employee OCBs, interpersonally oriented employee OCBs (i.e., OCB-I) are likely to have more influence on customers' perceptions of service than non-interpersonally directed employee OCBs (i.e., OCB-O) due to the fact that interpersonally directed employee OCBs are more likely to be viewed by the customer.

Both production deviance and property deviance (non-interpersonally directed employee ODBs) can cause significant problems in the delivery of the product and/or service. This may result in decreasing customers' perceptions of service. Similar to the observableness of altruistic OCBs, non-interpersonal ODBs (i.e., production deviance and property deviance) are more visible to customers than interpersonally directed ODBs (i.e., political deviance and personal aggression). Following Strack's (1992) conceptualizations of the judgment of behaviors, customers' inferences regarding both production deviance and property deviance will be more accurate and prominent since these types of ODBs are more visible and have direct impact on the delivery of the product and/or service. As previously stated, although not the only determinant of customers' perceptions of service, the delivery of the service must be accomplished in
order for service perceptions to remain at a high level (Waldman & Gopalakrishnan, 1996). So, hypothesis six states:

H6: Non-interpersonally directed employee ODBs (i.e., production deviance, property deviance) will be more strongly related to overall perceptions of customer service than interpersonally directed employee ODBs (i.e., political deviance, personal aggression).

For example, if employees take excessive breaks, intentionally work slow, or sabotage equipment, the customers are likely to be more aware of these deviant behaviors and potentially more affected than they will be by interpersonally directed employee ODBs. Most likely, employee ODBs interpersonal in nature (such as sexual harassment, gossip, or favoritism) are not directly viewed by customers (at least not typically). Again, by definition, interpersonal ODBs are directed toward coworkers not toward customers (Robinson & Bennett, 1995) resulting in a lesser likelihood that customers' perceptions of service being would be impacted.

In addition, employee ODBs that are more serious in nature have more serious consequences for the organization (Robinson & Bennett, 1995). Therefore, it is postulated that more serious employee ODBs will exert more influence on customers' perceptions of service than employee ODBs of minor seriousness. For example, an employee who sabotages equipment necessary for service/product delivery (i.e., more serious employee ODB) will likely influence a customer's service perception to a greater degree than an employee who intentionally works slow (i.e., less serious employee ODB). By sabotaging equipment, the customer would not receive the desired service/product. However, the employee who works slow still delivers the desired service/product.
service/product. The actual delivery of the product/service must be achieved for customers' perceptions of service to be positive (Czepiel, et al., 1985; Waldman & Gopalakrishnan, 1996). Specifically, hypothesis seven proposes:

H7: Employee ODBs more serious in nature will be more strongly related to customers' perceptions of service than employee ODBs of minor seriousness.

Finally, regarding Robinson and Bennett's (1995) four types of employee ODBs, production deviance seems to be the type most likely to be directly viewed by customers. Therefore, production deviance should be most closely related to customers' perceptions of service compared to the other employee ODB dimensions. For example, employees who leave work early or take excessive breaks (i.e., production deviance ODBs) will more likely have a direct impact on the delivery of the service/product to the customer than would lying about hours worked (i.e., property deviance ODB), gossiping about co-workers (i.e., political deviance ODB), or stealing from co-workers (i.e., personal aggression ODB). The customer will probably be more aware of employee behaviors that directly impact the delivery of the service/product desired by the customer. Hypothesis eight states:

H8: Production deviance will be more strongly related to customers' perceptions of service than property deviance, political deviance, or personal aggression.

For a graphic depiction of the specific relationships proposed by the previous hypotheses, see Figure 3 on the next page.
Figure 3. Specific model of the proposed relationship between employee extra-role job behaviors and customers' perceptions of service.
Method

Overview.

In the present study, employee extra-role job behaviors in a large, multi-department/branch financial services organization are examined to determine their relationship with customers' perceptions of service. Employees and supervisors from different departments within the organization provided measures of both employee OCBs and employee ODBs. External customers receiving the services of the organization provided a quality of service measure. These employee OCB, employee ODB, and quality of service measures are examined at the level of analysis of the department/unit to determine their specific relationship. It is expected that a branch’s customers’ perception of service will vary depending on the branch’s exhibited level of employee OCBs and ODBs. The following sections describe the participants, procedure, and analyses of the present study in greater detail.

Participants.

Job incumbents working within a large, multi-branch organization served as the primary group of participants in the present investigation. The organization was a large financial services company headquartered in the South with individual branches located throughout the United States. In general, the service of this organization is to provide loans to individuals. The majority of the organization’s lending business revolves around either refinancing existing home mortgages and/or consolidating multiple loans into one for its customers. Job incumbents were selected based upon the particular department/branch within the organization for which they work. Two hundred and
ninety eight employees across 35 different departments/branches within the organization were included as participants. The number of employees responding per branch ranged from five to fourteen. The average number of employees responding per branch was 8.5. These 35 branches were located in 18 states spread across the country. For each of the 35 branches, branch managers were included as participants in the present investigation. Branches included in the present investigation represent the top producing branches in terms of loan generation within the company. The branches selected are among the top 20% overall within the organization. Including branches in the present study that represent the top performing branches within the company helps control for in-role job performance's (i.e., loan generation) contribution to the forthcoming investigation. Each branch's loan production performance is comparable.

In addition to job incumbents and their supervisors, 563 external customers of this specific organization provided a measure of customer service quality. The number of customers responding per branch ranged from 8 to 23 with an average of 16.1. These customer participants were chosen because they were recipients of the service(s) provided by the particular organization and its employees. All customer and employee participants were informed that their participation was completely voluntary and that their responses would remain confidential. Regarding the current sample, following Cohen and Cohen's (1983) formula for the statistical calculation of power, it was determined that a sample size of 35 branches was adequate for the statistical analyses intended for the current study. Cohen and Cohen (1983) suggest that researchers should use an effect size that represents a probable population effect size value as indicated by
previous related work. In general, effect sizes can be small (~ .10), moderate (~ .30), or large (~ .50). Using Mackenzie, et al.'s, (1991) study examining the impact of employee extra-role job behaviors (i.e., OCBs) on employee job performance as a reference point, it was determined that a moderate effect size would be appropriate. Mackenzie et al., (1991) had an effect size of .45, therefore the current study's use of a moderate effect size can be considered conservative. Using an effect size of .30 in Cohen and Cohen's (1983) formula for the power analysis of $R^2$, it was determined that a sample size of 33 groups was the number needed to appropriately conduct the statistical analyses used in the present study. As stated previously, 35 groups (i.e., branches) were included in this investigation.

Procedure.

Job incumbents were asked to provide measures of the frequency of their own work unit's extra-role employee job behaviors by completing surveys. Specifically, both measures of employee organizational citizenship behaviors (OCBs) and employee organizationally deviant behaviors (ODBs) were obtained using these job incumbents' responses. In particular, job incumbents from 50 different branches within the organization were asked to complete work unit level employee OCB and employee ODB measures. Intact employee responses were obtained from 35 of the selected branches resulting in a response rate of 70 percent. Job incumbents were assured that their responses would remain confidential and would not be used to identify individual employees in any manner.
Also, customers of the organization were asked to provide their perceptions of the service they received via survey. In total, 3,840 customers of the organization were mailed and asked to complete the survey assessing customer service quality and return it to the researcher through business reply mail. There were 563 surveys returned which is a response rate of nearly 15 percent. Typically, response rates in studies using mailed out customer surveys fall between 20 and 25 percent (e.g., Johnson, 1996; Schneider & Bowen, 1985). Regarding the current sample, business necessity dictated that a limited amount of time be given for customers to respond (roughly six weeks). This may have prevented some surveys from being returned and therefore precluded them from being included in this investigation. As with the employee OCB and ODB measures, measures of customers' perceptions of service were kept separate relative to the branch which provided service to the customer. For example, surveys administered to branch customers were labeled with respect to which branch the individual customer frequents. Customers were assured that their responses would remain completely confidential and anonymous.

**Measures.**

Levels of theory, measurement, and statistical analysis should be congruent. When the level of theory, measurement, and/or statistical analysis are incongruent, problems are created (Klein, Dansereau, & Hall, 1994). The level of theory describes the individual, group, or organizational target that a researcher aims to describe or explain. This is the level to which generalizations are made (Rousseau, 1985). The level of measurement describes the source of the information. This is the unit to which data
can be directly attached (e.g., individual or group level) (Rousseau, 1985). The level of statistical analysis describes the handling of the data during statistical procedures. For instance, if the individual is the level of measurement, but individual scores are aggregated through group means during data analysis, the level of statistical analysis would be the group (Klein, et al., 1994). There is no level-free construct. "Every construct is tied to one or more organizational levels or entities, that is, individuals, dyads, groups, organizations, industries, markets, and so on. To examine organizational phenomena is thus to encounter levels issues." (Klein, et al., 1994 pp. 198). The constructs (i.e., perceptions of customer service and extra-role employee job behaviors) included in the present study are not exempt from levels issues. So, when examining these constructs, two questions should be considered in order to determine the appropriate level of measurement (Klein, et al., 1994). First, are the constructs to be conceptualized as being homogenous, independent, or heterogeneous? Homogeneity refers to the idea that group members respond to a characteristic of the group in a comparable fashion. Group members are sufficiently similar with regard to a construct that they may be characterized as a whole (Klein, et al., 1994). Independence refers to the idea that individual group members are free from group influence. The value of a construct for an individual is independent of the value for that same construct for other members of the group (Klein, et al., 1994). Heterogeneity captures comparative or relative effects. That is, heterogeneity predicts that the effects of an independent variable on a dependent variable are dependent upon the context. For instance, an individual group member's response may change due to the size of the group (Klein et al., 1994).
The second question to be addressed when determining the appropriate level of measurement asks if the relationships among the constructs are presumed to be a function of between group differences, between individual differences, or within group differences. In the present study, the constructs are conceptualized as homogenous and presumed to be a function of between group differences. The suggested relationships among the current constructs are considered to be a function of between group differences because these relationships will vary by group. In other words, groups will be compared to other groups. The following section provides the rationale behind this procedure.

According to several authors, researchers predicting homogeneity may allude to a variety of organizational processes that are expected to engender homogeneity within groups (Klein, et al, 1994; Pfeffer, 1977; Schneider, 1987; Thomas & Griffin, 1989). Four specific organizational processes are mentioned. These are employee attraction and selection processes, socialization, social information processing, and common experience. In the current study, participants will all be working for or receiving service from the same organization. Therefore, the participants have been attracted to and/or selected into the same group. Schneider (1987) provided evidence that similar people are attracted to and retained within groups resulting in greater homogeneity. Regarding socialization, the employees participating in the current study have all received similar training and indoctrination enabling them to respond in similar ways. In addition, the participants have been subject to common social influences or commitment processes (i.e., social information processing). These factors also help to assure group
homogeneity. Finally, in general, participants in the present study have shared common organizational experiences. That is, members of the group will share group events.

In sum, researchers wishing to make propositions that predict within group homogeneity are advised to (a) use research measures that focus on the unit as a whole, and (b) maximize between group variability within the sample (Glick, 1985; Rousseau, 1985). For example, survey measures should be used that presuppose a level of theory as they direct the respondent's attention to group homogeneity (e.g., "In general, how do group members feel about X?"). Therefore, aggregate measures of employee extra-role job behaviors and customers' perceptions of service were collected in the present study. In addition, in order to ensure homogeneity, two primary assumptions suggested by Klein, et al., (1994) will be adhered to during measurement and analysis. These are: (a) group members are assumed to be homogeneous within each group. That is, they are in similar stages of development, and (b) groups are homogeneous within the organization. For example, group performance standards are established by the organization. Adherence to these two assumptions had implications for the collection of data in the present study. Namely, data was collected that: (1) directed participants' attention to the predicted level of theory, (2) maximized variability predicted by the theory, and (3) allowed one to test empirically the theory's predictions of homogeneity, independence, or heterogeneity (Klein, et al., 1994). The specific measures to be utilized in the present research are described in detail in the following sections.
Employee OCBs.

The present study used a 12 item scale adapted from the one described by Williams and Anderson (1991). This instrument measures both altruistic (OCBI) and generalized compliance (OCBO) components of employees' overall OCBs. It is a five point Likert type scale with one indicating "never" and five demonstrating "always". In addition, employee in-role job performance is included in Williams and Anderson's scale. The current measure of employee OCBs assesses work unit level measures of such extra-role behaviors. That is, instead of obtaining individual employee measures of OCBs, employees were asked to provide group level measures of OCBs. As Schneider (1990) discussed, perceptions of behaviors will always come from individuals, but the analysis of individuals' perceptions may occur at any meaningful level.

"...perceptions collected from individuals must be such that the level to which they are aggregated makes conceptual sense. This is accomplished by providing respondents with the frame of reference appropriate for the level of analysis for which the data will be used." (pg. 388).

Others have also suggested that perceptions may be aggregated when it makes conceptual sense (e.g., when linking independent variable measures to customers' perceptions of service) (Johnson, 1996; Schneider & Bowen, 1985; Schneider & Bowen, 1993). In addition, aggregating employee OCBs addresses Organ and Ryan's (1995) call for a closer look at group level employee OCBs and their potential effects on organizations. Also, because the dependent variable in the current study (i.e., customers' perceptions of service) is at the group level, it is logical and appropriate to examine the study's independent variables (i.e., employee OCBs and ODBs) at a corresponding level.
(i.e., it is likely to be impossible to link individual customers to individual employees).

This avoids the problems associated with cross-level issues.

Williams and Anderson (1991) developed their scale using previous authors' measures of employee OCBs (Bateman & Organ, 1983; Graham, 1986; O'Reilly & Chatman, 1986; Organ, 1988; and Smith, Organ, & Near, 1983). The authors conducted a factor analysis to determine the separateness of the scale items. The factor pattern loadings for the authors' data indicated that in all cases the items had their highest loading on the appropriate factor (i.e., OCBI, OCBO, or in-role performance) using a .35 loading criterion. The appropriateness of the factors included in Williams and Anderson's (1991) measure of employee OCBs has been reaffirmed by others conducting research in this area (Organ, 1997; Organ & Ryan, 1995). Regarding the current sample, a maximum likelihood factor analytic procedure using oblique rotation resulted in factor loadings consistent with Williams and Anderson's (1991) findings. The intent of the maximum likelihood procedure is to find a factor solution that best fits the observed correlations between variables. Kim and Mueller (1978) previously stated that the maximum likelihood solution's objective is to find the underlying population parameters (under a given hypothesis) that will result in the greatest likelihood of producing the observed correlation matrix. Regarding the present study, previous literature has found that the items in the current OCB scale can be represented by two primary factors. Oblique rotation was used in order to provide a clear picture of how the individual items load on each factor. This method was chosen because oblique rotation does not impose the restriction that factors be uncorrelated (Kim & Mueller, 1978). In the present

50
analysis, two primary factors emerged, OCBI and OCBO. Factor loadings indicated that the items have their highest loadings on the appropriate factor. In addition, the test of fit of this two factor model was significant ($\chi^2 = 87.88$, $p < .001$) and the Kaiser-Meyer-Olkin index was .83. The results of this factor analysis can be seen in Table 2. In addition, reliability analysis indicated that the overall OCB scale and subscales (i.e., OCBI, OCBO) utilized in the current study were reliable (alpha = .81, .75, & .74 respectively). Additional analyses for the scale resulted in an overall item mean of 3.86 with a standard deviation of .27. A WABA I analysis as described by Dansereau, Alutto, and Yammarino (1984) was conducted in order to ensure that greater heterogeneity between groups than within groups exists. If greater heterogeneity between groups exists when compared within groups, than the group level of analysis is appropriate. The results of this analysis indicate that this is the case regarding the current sample. As the $E$ ratio (i.e., the squared eta correlation adjusted for degrees of freedom) approaches the between cell vector, it becomes greater than one and when the $E$ ratio approaches the within cell vector, it becomes less than one. The current $E$ ratio regarding OCBs is 2.03 which indicates greater variance between groups rather than within groups. Therefore, with particular regard to employee OCBs, the group level of analysis as conducted within the current study is suitable. The employee OCB scale utilized can be seen in Appendix A.

**Employee ODBs.**

The measurement of employee ODBs was conducted using the workplace deviance typology proposed by Robinson and Bennett (1995). Robinson and Bennett
(1995) developed their employee ODB typology using several other authors' previous work (i.e., Hollinger & Clark, 1982; Mangione & Quinn, 1976; and Wheeler, 1976) as well as their own original research. To develop this employee ODB typology the authors used a multidimensional scaling technique. Robinson and Bennett (1995) used participants with extensive work experience to disclose workplace deviant behaviors. Next, the authors had subject matter experts assess how well each behavior fit the definition of workplace deviance. Following the development of this inventory of

Table 2

Factors Loading Matrix for the Employee OCB Scale

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<thead>
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<td>-.82</td>
</tr>
<tr>
<td>Q12</td>
<td>.09</td>
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</table>

Note: Variables Q1 - Q7 represent interpersonal OCBs (OCB-I) and variables Q8- Q12 represent organizational OCBs (OCB-O).
employee ODBs, Robinson and Bennett (1995) developed an instrument to measure these deviant behaviors. They administered their instrument to nearly 200 respondents (full-time workers enrolled in an executive M.B.A. program) to determine its statistical soundness and dimensionality. The dimensions of this scale were provided in an earlier portion of this paper. Basically, the authors found that four types of employee ODBs can vary along two dimensions. More specifically, the two dimensions of employee ODBs can be organizational or interpersonal, minor or serious, and the four types are: production deviance, property deviance, political deviance, or personal aggression. Robinson and Bennett’s (1995) typology integrates employee ODBs into a parsimonious framework.

As with the aforementioned employee OCB measure, the current study’s measurement of employee ODBs was conducted at the group level. Therefore, in accordance with Schneider’s (1990) suggestion, Robinson and Bennett’s (1995) typology was adapted in order to obtain group level perceptions of employee ODBs. This 12 item scale is a five point Likert type scale with one indicating “never” and five demonstrating “always.” For the current sample, a maximum likelihood factor analysis again using oblique rotation of the adapted Robinson and Bennett (1995) ODB scale revealed the prevalence of two factors. In specific, loading patterns identified the following two factors: interpersonal ODBs and organizational ODBs. Factor loadings indicate their highest loadings on the appropriate factor in most cases. Two items (i.e., Q2 and Q11) were dropped from subsequent analysis due to low loadings on the appropriate factor. Just as with the OCB scale, the maximum likelihood factor analytic procedure with
oblique rotation was determined to be the most appropriate for the same reasons as described previously. The test of the fit of this two factor model was significant ($\chi^2 = 79.317, p < .001$) and the Kaiser-Meyer-Olkin index was .89. See Table 3 for these results.

**Table 3**

**Factor Loading Matrix for the Employee ODB Scale**

<table>
<thead>
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</tr>
</thead>
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<tr>
<td>Q3</td>
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<td>-.01</td>
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</tr>
<tr>
<td>Q12</td>
<td>.32</td>
<td>.24</td>
</tr>
</tbody>
</table>

Note: Variables Q1- Q5 represent organizationally directed ODBs and variables Q6 - Q12 represent interpersonally directed ODBs.

The ODB scale along with the corresponding subscales (i.e., interpersonal ODBs, organizational ODBs) were found to be highly reliable in the current study (alpha = .87, .78, & .77 respectively). Again, a WABA I analysis as described by Dansereau, et al., (1984) was conducted in order to ensure that greater heterogeneity between
groups than within groups exists. The results of this analysis indicate that this is again the case regarding the current sample and employee ODBs. As previously mentioned, when the $E$ ratio (i.e., the squared eta correlation adjusted for degrees of freedom) approaches the between cell vector, it becomes greater than one and when the $E$ ratio approaches the within cell vector, it becomes less than one. The current $E$ ratio regarding ODBs is 1.15 which indicates greater variance between groups than within groups. Therefore, examining employee OCBs at the group level of analysis is appropriate. Subsequent scale analyses resulted in an overall item mean of 2.23 with a standard deviation of .30 for the current sample. This measure is shown in Appendix B.

**Customers' perceptions of service.**

A multiple-item scale for measuring service quality, SERVQUAL, was used in the current study to capture customers' perceptions of service. The SERVQUAL instrument contains 22 items constituting five service dimensions: tangibles, reliability, responsiveness, assurance, and empathy. SERVQUAL uses a five point Likert type scale with one indicating strong disagreement and five demonstrating strong agreement. This measure is shown in Appendix C. This instrument was originally developed by Parasuraman et al., (1989) to measure customers' perceptions of service quality. In a later study, Parasuraman et al., (1991) reassessed the dimensions of SERVQUAL and still found a consistent factor structure across five independent samples. Several other authors have declared SERVQUAL to be a good general measure of overall perceptions of customer service and have noted that it is widely used and accepted (Buttle, 1996; Carman, 1990; Parasuraman, Berry, & Zeithaml, 1991; Zemke & Schaaf, 1989).
(1996) noted that SERVQUAL was utilized in 41 published studies between 1992 and 1994. In addition, SERVQUAL has served as the instrument for measuring perceptions of customer service across a wide variety of industries including retail (Carman, 1990; Gagliano & Hathcote, 1994), travel and tourism (Fick & Ritchie, 1991), government (Scott & Schieff, 1993), and business schools (Rigotti & Pitt, 1992).

Although SERVQUAL has generally been found to be a strong and reliable measure of customers' perceptions of service quality, it should be noted that there has been some debate regarding the dimensionality of the SERVQUAL scale. For instance, Gagliano and Hathcote (1994) found only four dimensions: personal attention, reliability, tangibles, and convenience. Gronroos (1984) found that SERVQUAL had three dimensions: technical, functional, and reputation. Parasuraman et al., (1991) state that differences in the dimensionality of SERVQUAL are due to two factors. First, there are differences in data collection and analysis. Researchers may have different techniques for collecting data and some may be more reliable than others. Second, differences among empirically derived factors across replications are primarily due to across-dimension similarities and/or differences in customer evaluations of a specific company involved in each setting. In other words, contextual circumstances and analytical processes can have impact on the dimensionality of SERVQUAL (Buttle, 1996). A customer may evaluate a specific company differently than another customer evaluating the very same company in a different setting. For instance, one customer may base his/her evaluation of customer service quality due to his/her interaction with a retail establishment's hardware department whereas another customer of the same establishment may base his/her
evaluation on his/her dealings with the clothing department. While examination of SERVQUAL's dimensions is needed (Buttle, 1996; Parasuraman, 1991), SERVQUAL still provides a good basic skeleton including service dimensions which can be adapted to fit the characteristics of the specific research needs of any organization (Parasuraman et al., 1991). The current study used a maximum likelihood factor analytic procedure using varimax rotation to examine the dimensionality of the SERVQUAL measure. Varimax rotation was utilized to maximize the loading of each variable on each factor by maximizing the squared loadings for each variable (Kim & Mueller, 1978). This method was selected because the factors of interest are theoretically independent. Similar to the findings of Gronroos (1984), the SERVQUAL measure used in the current sample resulted in three emergent factors. However, two of the specific dimensions identified in the current analyses differ from those found by Gronroos. Specifically, while Gronroos identified the dimensions of SERVQUAL to be technical, functional, and reputational, the factors emerging in the current study can be best described as interpersonal, functional, and physical. It is not unique to find the dimensions of SERVQUAL to be different from the five proposed by Parasuraman et al., (1991) (e.g., Babakus & Boller, 1991; Carman, 1990; Dabholkar, Thorpe, & Rentz, 1996). Still, previous research has demonstrated that SERVQUAL is a reliable overall measure of customers' perceptions of service received. The emergent dimensions of this instrument may vary according to the situation. Regarding the current sample, the overall fit of the three factor model is significant ($\chi^2 = 708.208, p < .001$). See Table 4 for these results. In the current sample, only tangibles (i.e., physical) as defined by Parasuraman, et al., (1991) emerged as...
suggested. The SERVQUAL dimensions of reliability and responsiveness seemed to merge into one dimension which can be described as functional. Pitt, Oosthuizen, and Morris, (1992) reported this same finding. The service dimensions of assurance and Table 4.

**Factor Loading Matrix for the SERVQUAL Scale**

<table>
<thead>
<tr>
<th>Variable</th>
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<th>Factor 2</th>
<th>Factor 3</th>
</tr>
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<tbody>
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<td>Q2</td>
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Note: Variables Q1 - Q4 represent physical service dimension (i.e., tangibles), Q5 - Q13 represent functional service dimension (i.e., reliability & responsiveness), and variables Q14 - Q22 represent interpersonal service dimension (i.e. assurance & empathy).
empathy tended to merge into one dimension which can be described as interpersonal in nature. It is important to note that this resultant three factor SERVQUAL measure, as opposed to an anticipated five factor measure, does not necessitate the alteration of any of the current study's hypotheses. By examining these hypotheses, only hypotheses four and five specifically propose a relationship with a specific dimension of customer service quality as proposed by Parasuraman, et al., (1991). In both cases, these specific service dimensions (i.e., physical and interpersonal service dimensions) are captured by the resultant factors found using factor analysis in the current study. The SERVQUAL overall measure as well as the three subscales (i.e., physical, interpersonal, & functional dimensions) that were identified through factor analysis were found to be highly reliable (alpha = .97, .87, .97, & .96). Analyses revealed an overall item mean of 3.72 with a standard deviation of .36. The actual customer survey which includes the SERVQUAL measure can be found in Appendix D.
Results

Overview.

The following sections report the findings obtained from the current investigation. Specifically, results for each of the eight previously mentioned hypotheses are reported independently. These results include the relevant correlations that were derived in adherence to the suppositions of each hypothesis. Also, results from multiple linear regression analysis, where appropriate, are reported for each hypothesis. In addition, a table including overall OCB, ODB, and service means is included.

The branch means and corresponding standard deviations for the group level employee OCB measure, group level employee ODB measure, and the customers' perceptions of service measure (SERVQUAL) can be seen in Table 5. Next, Table 6 presents overall correlational results of the variables of interest. Specifically, eight proposed hypotheses were statistically tested in the current study.

Table 5

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<td>2.25</td>
</tr>
<tr>
<td>24</td>
<td>3.57</td>
<td>.46</td>
<td>2.19</td>
</tr>
<tr>
<td>25</td>
<td>3.85</td>
<td>.63</td>
<td>2.40</td>
</tr>
<tr>
<td>26</td>
<td>3.82</td>
<td>.40</td>
<td>2.04</td>
</tr>
<tr>
<td>27</td>
<td>3.93</td>
<td>.37</td>
<td>2.28</td>
</tr>
<tr>
<td>28</td>
<td>3.78</td>
<td>.47</td>
<td>2.60</td>
</tr>
<tr>
<td>29</td>
<td>3.95</td>
<td>.35</td>
<td>2.02</td>
</tr>
<tr>
<td>30</td>
<td>3.33</td>
<td>.38</td>
<td>2.48</td>
</tr>
<tr>
<td>31</td>
<td>3.89</td>
<td>.24</td>
<td>2.00</td>
</tr>
<tr>
<td>32</td>
<td>3.43</td>
<td>.33</td>
<td>2.52</td>
</tr>
<tr>
<td>33</td>
<td>3.33</td>
<td>.29</td>
<td>2.33</td>
</tr>
<tr>
<td>34</td>
<td>4.15</td>
<td>.40</td>
<td>1.88</td>
</tr>
<tr>
<td>35</td>
<td>3.66</td>
<td>.53</td>
<td>2.19</td>
</tr>
</tbody>
</table>
Table 6

Correlations Between Overall OCBs, Interpersonal OCBs, Organizational OCBs, Overall ODBs, Interpersonal ODBs, Organizational ODBs, and Customers’ Perceptions of the Service They Receive

<table>
<thead>
<tr>
<th></th>
<th>OCBs</th>
<th>OCB-I</th>
<th>OCB-O</th>
<th>ODBs</th>
<th>ODB-I</th>
<th>ODB-O</th>
<th>Service</th>
</tr>
</thead>
<tbody>
<tr>
<td>OCBs</td>
<td>1.000</td>
<td>.91**</td>
<td>.96**</td>
<td>-.37*</td>
<td>-.33</td>
<td>-.38*</td>
<td>.54**</td>
</tr>
<tr>
<td>OCB-I</td>
<td>1.000</td>
<td>.77**</td>
<td>-.32</td>
<td>-.27</td>
<td>-.35*</td>
<td>.59**</td>
<td></td>
</tr>
<tr>
<td>OCB-O</td>
<td>1.000</td>
<td>-.39*</td>
<td>-.36*</td>
<td>-.38*</td>
<td>.46**</td>
<td></td>
<td></td>
</tr>
<tr>
<td>ODBs</td>
<td>1.000</td>
<td>.93**</td>
<td>.87**</td>
<td>-.43**</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>ODB-I</td>
<td>1.000</td>
<td>.76**</td>
<td></td>
<td>-.33</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>ODB-O</td>
<td>1.000</td>
<td></td>
<td></td>
<td>-.33</td>
<td></td>
<td></td>
<td></td>
</tr>
</tbody>
</table>

Note. N = 35.

* p < .05
** p < .01

Hypotheses 1 and 2.

Regarding employees' extra-role job behaviors' relationship with customers' perceptions of service, correlational analyses were conducted in order to examine this association. In particular, correlations were calculated among employee OCBs, employee ODBs, and customers' perceptions of service. See Table 7 for these results. It is expected that these derived correlations will follow the patterns suggested by hypotheses 1 and 2. Specifically, it is postulated that OCBs will be positively related, and ODBs negatively related to customers' overall perceptions of service. These two
hypotheses were supported. Employee OCBs were significantly and positively related to customers' perceptions of service received ($r = .54, p < .01$). In addition, employee ODBs were found to be significantly and negatively related to customers' perceptions of service received ($r = -.43, p < .01$).

**Hypothesis 3.**

Hypothesis 3 stated that observable and interpersonal OCBs (i.e., OCBI or altruism) will be more highly correlated with customers' perceptions of service than nonobservable, noninterpersonal OCBs (i.e., OCBO or generalized compliance). To test this hypothesis, multiple linear regression analysis was conducted using customers' overall perceptions of service they received (SERVQUAL) as the dependent variable and interpersonal OCBs and organizational OCBs as the independent variables. Table 8 presents the results of this regression analysis. To examine this as well as several
hypotheses that follow, simultaneous multiple linear regression analysis was chosen over the various variable selection methods because the intent the present study is to specify the structure of the relationships between the variables in question based upon previous literature. Variable selection methods (e.g., forward selection, stepwise, and backward elimination regression) do not aid in determining the structure of the relationship among variables and often lend themselves to generating hypotheses based on the data. It is preferable to utilize knowledge-based selection instead of automatic data driven selection in regression (Freund & Wilson, 1993). This regression was significant $F(2, 32) = 8.49, p < .01$, with interpersonal OCBs being significant ($B = .77, p < .05$) in predicting customers' perceptions of the service they received. On the other hand, organizational OCBs were not significant predictors of customers' perceptions of the service they received ($B = .02, p > .10$). Thus, hypothesis 3 was supported. To provide further clarity regarding the relationship between these variables, correlations between interpersonal OCBs, organizational OCBs, and customers perceptions of service they received are also included in Table 9.

**Hypothesis 4.**

Hypothesis 4 proposed that interpersonal OCBs of employees working in a service organization, as opposed to organizational OCBs, would have a stronger relationship with interpersonally related dimensions of customer service (i.e., assurance, empathy, and responsiveness). A multiple linear regression analysis was conducted to test this hypothesis. In specific, interpersonal OCBs and organizational OCBs served as
Table 8

Summary of Multiple Regression Analysis Examining the Effects of Interpersonal OCBs and Organizational OCBs on Customers' Perceptions of Service They Received (N = 35)

<table>
<thead>
<tr>
<th>Variable</th>
<th>B</th>
<th>SE B</th>
<th>STD B</th>
</tr>
</thead>
<tbody>
<tr>
<td>Interpersonal OCBs</td>
<td>0.78</td>
<td>0.30</td>
<td>0.57*</td>
</tr>
<tr>
<td>Organizational OCBs</td>
<td>0.02</td>
<td>0.27</td>
<td>0.02</td>
</tr>
</tbody>
</table>

Note. $R^2 = 0.3467$, Adjusted $R^2 = 0.3059$.
* $p < .05$.

Table 9

Correlations Between Interpersonal OCBs, Organizational OCBs, and Customers' Perceptions of the Service They Receive (SERVQUAL)

<table>
<thead>
<tr>
<th></th>
<th>OCB-I</th>
<th>OCB-O</th>
<th>SERVQUAL</th>
</tr>
</thead>
<tbody>
<tr>
<td>OCB-I</td>
<td>1.000</td>
<td>.77*</td>
<td>.59*</td>
</tr>
<tr>
<td>OCB-O</td>
<td>1.000</td>
<td></td>
<td>.46*</td>
</tr>
<tr>
<td>SERVQUAL</td>
<td>1.000</td>
<td></td>
<td></td>
</tr>
</tbody>
</table>

Note. N = 35.
* $p < .01$
the independent variables and interpersonally related customer service dimensions served as the dependent variable. See Table 10 for these results. This regression was significant $F(2, 32) = 8.54, p < .01$. Therefore, hypothesis 4 was supported. In addition, in order to more fully explain the relationship between these variables, correlations between interpersonal OCBs, organizational OCBs, and interpersonally related dimensions of customer service were calculated. These correlations are presented in Table 11.

Table 10

<table>
<thead>
<tr>
<th>Variable</th>
<th>B</th>
<th>SE B</th>
<th>STD B</th>
</tr>
</thead>
<tbody>
<tr>
<td>Interpersonal OCBs</td>
<td>0.77</td>
<td>0.33</td>
<td>0.51*</td>
</tr>
<tr>
<td>Organizational OCBs</td>
<td>0.13</td>
<td>0.30</td>
<td>0.10</td>
</tr>
</tbody>
</table>

Note. $R^2 = 0.3479$, Adjusted $R^2 = 0.3072$.
* $p < .05$. 

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Hypothesis 5 proposed that employees' organizational OCBs, as opposed to interpersonal OCBs, would be more strongly related to the physical customer service dimension of tangibles as identified through SERVQUAL. Again, a linear multiple regression analysis was utilized to test this hypothesis. See Table 12. While this regression was significant, $F(2,32) = 3.93$, $p < .05$, the results were not as predicted in hypothesis 5. That is, organizational OCBs were not more strongly related to the customer service dimension of tangibles when compared to interpersonal OCBs. In fact, results indicated the opposite to be true. To better describe the resulting relationships between these variables, correlations were calculated and can be seen in Table 13.

Table 11

Correlations Between Interpersonal OCBs, Organizational OCBs, and Customers' Interpersonally Related Perceptions of the Service They Received

<table>
<thead>
<tr>
<th></th>
<th>OCB-I</th>
<th>OCB-O</th>
<th>Interpersonal CS</th>
</tr>
</thead>
<tbody>
<tr>
<td>OCB-I</td>
<td>1.000</td>
<td>.77*</td>
<td>.59*</td>
</tr>
<tr>
<td>OCB-O</td>
<td></td>
<td>1.000</td>
<td>.49*</td>
</tr>
<tr>
<td>Interpersonal CS</td>
<td></td>
<td>1.000</td>
<td></td>
</tr>
</tbody>
</table>

Note. $N = 35$.
* $p < .01$
Table 12

Summary of Multiple Regression Analysis Examining the Effects of Interpersonal Employee OCBs and Organizational Employee OCBs on the Customer Service Dimension of Tangibles (N = 35)

<table>
<thead>
<tr>
<th>Variable</th>
<th>B</th>
<th>SE B</th>
<th>STD B</th>
</tr>
</thead>
<tbody>
<tr>
<td>Interpersonal OCBs</td>
<td>0.74</td>
<td>0.24</td>
<td>0.69*</td>
</tr>
<tr>
<td>Organizational OCBs</td>
<td>-0.48</td>
<td>0.27</td>
<td>-0.49</td>
</tr>
</tbody>
</table>

Note. \( R^2 = 0.1974 \), Adjusted \( R^2 = 0.1472 \). * \( p < .01 \).

Table 13

Correlations Between Interpersonal OCBs, Organizational OCBs, and the Customer Service Dimension of Tangibles

<table>
<thead>
<tr>
<th>OCB-I</th>
<th>OCB-O</th>
<th>Tangibles</th>
</tr>
</thead>
<tbody>
<tr>
<td>OCB-I</td>
<td>1.000</td>
<td>.77*</td>
</tr>
<tr>
<td>OCB-O</td>
<td>1.000</td>
<td>.04</td>
</tr>
<tr>
<td>Tangibles</td>
<td>.</td>
<td>1.000</td>
</tr>
</tbody>
</table>

Note. \( N = 35 \). * \( p < .01 \)
Hypothesis 6.

Hypothesis 6 suggested that organizationally directed ODBs (i.e., production deviance and property deviance) would be more strongly related to overall perceptions of customer service than interpersonally directed employee ODBs (i.e., political deviance and personal aggression). A linear multiple regression analysis was conducted in order to test this hypothesis. Interpersonal employee ODBs and organizational employee ODBs served as the independent variables and customers' perceptions of service received served as the dependent variable. See Table 14 for these results. The results of this regression were not significant, $F(2, 32) = 2.24$, $p > .10$. That is, neither type employee ODB predicted overall perceptions of customer service significantly. In addition, correlations between interpersonally directed ODBs, organizationally directed ODBs, and customers' perceptions of service they received can be found in Table 15. These correlations were calculated in order to better depict the relationships found between these variables in the present study.

In addition to specifically testing hypothesis 6, three exploratory regression analyses were conducted using organizational ODBs and interpersonal ODBs as the independent variables and the three identified dimensions of customers' perceptions of service received (i.e., interpersonal, functional, & physical) as the dependent variables. In each case, neither organizational ODBs nor interpersonal ODBs significantly predicted any dimension of customers' perceptions of service they received.
### Table 14

**Summary of Multiple Regression Analysis Examining the Effects of Interpersonal Employee ODBs and Organizational Employee ODBs on Customers’ Perceptions of Service They Received (N = 35)**

<table>
<thead>
<tr>
<th>Variable</th>
<th>B</th>
<th>SE B</th>
<th>STD B</th>
</tr>
</thead>
<tbody>
<tr>
<td>Interpersonal ODBs</td>
<td>-.19</td>
<td>0.28</td>
<td>-.17</td>
</tr>
<tr>
<td>Organizational ODBs</td>
<td>-.29</td>
<td>0.36</td>
<td>-.20</td>
</tr>
</tbody>
</table>

*Note.  $R^2 = 0.1228$, Adjusted $R^2 = 0.0680$.*

### Table 15

**Correlations Between Interpersonal ODBs, Organizational ODBs, and Customers’ Perceptions of the Service They Received**

<table>
<thead>
<tr>
<th></th>
<th>ODB-I</th>
<th>ODB-O</th>
<th>Service</th>
</tr>
</thead>
<tbody>
<tr>
<td>ODB-I</td>
<td>1.000</td>
<td></td>
<td>-.33</td>
</tr>
<tr>
<td>ODB-O</td>
<td></td>
<td>1.000</td>
<td>-.33</td>
</tr>
<tr>
<td>Service</td>
<td></td>
<td></td>
<td>1.000</td>
</tr>
</tbody>
</table>

*Note.  N = 35.  
* $p < .01$
Hypothesis 7.

Hypothesis 7 proposed that employee ODBs more serious in nature (i.e., property deviance and personal aggression) would be more strongly related to overall customers' perceptions of service than employee ODBs of minor seriousness (i.e., production deviance and political deviance). This hypothesis was tested using multiple regression analysis with customers' perceptions of service serving as the dependent variable and more serious employee ODBs and less serious employee ODBs serving as the independent variables. These results are found in Table 16. The results of this regression were significant, $F(2,32) = 3.52, p < .05$. More serious employee ODBs were significant predictors of overall customers' perceptions of service while less serious employee ODBs were not significant predictors of service perceptions. Thus, hypothesis 7 was supported. Once again, correlations between these variables were calculated and can be seen in Table 17.

In addition to the analysis above, three exploratory regression analyses were conducted in order to examine the relationship between more serious and less serious employee ODBs and the specific dimensions of customers' perceptions of the service they received. Specifically, more serious employee ODBs and less serious employee ODBs served as the independent variables while the interpersonal, functional, and physical dimension of customers' perceptions of service served as the dependent variables in three separate regressions. In only one model were the results significant.
Table 16

Summary of Multiple Regression Analysis Examining the Effects of More Serious Employee ODBs and Less Serious Employee ODBs on Customers' Perceptions of Service They Received (N = 35)

<table>
<thead>
<tr>
<th>Variable</th>
<th>B</th>
<th>SE B</th>
<th>STD B</th>
</tr>
</thead>
<tbody>
<tr>
<td>More Serious OCBs</td>
<td>- .73</td>
<td>0.34</td>
<td>- .48*</td>
</tr>
<tr>
<td>Less Serious ODBs</td>
<td>0.09</td>
<td>0.24</td>
<td>0.09</td>
</tr>
</tbody>
</table>

Note. $R^2 = 0.1804$, Adjusted $R^2 = 0.1292$.
* $p < .05$.

Table 17

Correlations Between More Serious ODBs, Less Serious ODBs, and Customers' Perceptions of the Service They Receive

<table>
<thead>
<tr>
<th></th>
<th>More Serious</th>
<th>Less Serious</th>
<th>Service</th>
</tr>
</thead>
<tbody>
<tr>
<td>More Serious</td>
<td>1.000</td>
<td>.71*</td>
<td>- .42*</td>
</tr>
<tr>
<td>Less Serious</td>
<td>1.000</td>
<td></td>
<td>- .26</td>
</tr>
<tr>
<td>Service</td>
<td></td>
<td></td>
<td>1.000</td>
</tr>
</tbody>
</table>

Note. N = 35.
* $p < .05$

Specifically, more serious employee ODBs proved to be significant predictors of the interpersonally related dimension of customers' perceptions of service received, $F (2, 32) = 3.67, p < .05$. See Table 18 for these results.
Table 18

Summary of Multiple Regression Analysis Examining the Effects of More Serious Employee ODBs and Less Serious Employee ODBs on Interpersonally Related Customers' Perceptions of Service They Receive (N = 35)

<table>
<thead>
<tr>
<th>Variable</th>
<th>B</th>
<th>SE B</th>
<th>STD B</th>
</tr>
</thead>
<tbody>
<tr>
<td>More Serious OCBs</td>
<td>- .81</td>
<td>0.38</td>
<td>- .48*</td>
</tr>
<tr>
<td>Less Serious ODBs</td>
<td>0.08</td>
<td>0.27</td>
<td>0.07</td>
</tr>
</tbody>
</table>

Note. $R^2 = 0.1866$, Adjusted $R^2 = 0.1358$.
* $p < .05$.

Hypothesis 8.

Hypothesis 8 suggested that the employee ODB of production deviance would be more strongly related to customers' perceptions of service than the employee ODBs of property deviance, political deviance, or personal aggression. To test this hypothesis, a multiple regression analysis was conducted using production deviance, property deviance, political deviance, and personal aggression as independent variables and customers' perceptions of service as the dependent variable. See Table 19. The results of this regression analysis were not significant, $F (2, 32) = 1.79$, $p > .10$. Hypothesis 8 was not supported. In addition, an exploratory correlational analysis was conducted including the above mentioned five variables. Neither political deviance ($r = -.23$, $p > .10$) nor production deviance ($r = -.14$, $p > .10$) were found to be
Table 19

Summary of Multiple Regression Analysis Examining the Effects of Production Deviance, Property Deviance, Political Deviance, and Personal Aggression on Customers’ Perceptions of Service They Receive (N = 35)

<table>
<thead>
<tr>
<th>Variable</th>
<th>B</th>
<th>SE B</th>
<th>STD B</th>
</tr>
</thead>
<tbody>
<tr>
<td>Production Deviance</td>
<td>-.12</td>
<td>0.32</td>
<td>-.11</td>
</tr>
<tr>
<td>Property Deviance</td>
<td>-.22</td>
<td>0.34</td>
<td>-.15</td>
</tr>
<tr>
<td>Political Deviance</td>
<td>0.20</td>
<td>0.27</td>
<td>0.22</td>
</tr>
<tr>
<td>Personal Aggression</td>
<td>-.52</td>
<td>0.34</td>
<td>-.41</td>
</tr>
</tbody>
</table>

Note. $R^2 = 0.1923$, Adjusted $R^2 = 0.0846$.

significantly related. However, both property deviance ($r = -.35, p < .05$) and personal aggression ($r = -.40, p < .05$) were significantly related to customers’ perceptions of service received. See Table 20 for these correlations.

In addition to the analysis above, three exploratory regression analyses were conducted using the four dimensions of employee ODBs as independent variables and the three dimensions of customers’ perceptions of the service they receive as dependent variables respectively. No employee ODB dimension significantly predicted any of the
customers' perceptions of service dimensions (i.e., interpersonal, functional, physical).

The results of all three regression models were insignificant. At the end of this section, an outline of each hypothesis along with its support can be seen in Table 21.

Table 20

Correlations Between Production Deviance, Property Deviance, Political Deviance, Personal Aggression and Customers' Perceptions of the Service They Receive (SERVQUAL)

<table>
<thead>
<tr>
<th></th>
<th>Prod</th>
<th>Prop</th>
<th>Political</th>
<th>Personal</th>
<th>Service</th>
</tr>
</thead>
<tbody>
<tr>
<td>Production</td>
<td>1.000</td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Property</td>
<td></td>
<td>1.000</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Political</td>
<td></td>
<td></td>
<td>1.000</td>
<td></td>
<td></td>
</tr>
<tr>
<td>Personal</td>
<td></td>
<td></td>
<td></td>
<td>1.000</td>
<td></td>
</tr>
<tr>
<td>Service</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td>1.000</td>
</tr>
</tbody>
</table>

Note. N = 35.
* p < .05
** p < .01
Table 21

Summary of Hypotheses and Overall Results

<table>
<thead>
<tr>
<th>Hypothesis</th>
<th>Result</th>
</tr>
</thead>
<tbody>
<tr>
<td>H1: The degree to which OCBs are exhibited by employees working in a service organization are positively related to customers' perceptions of the service they receive.</td>
<td>Supported</td>
</tr>
<tr>
<td>H2: The degree to which ODBs are exhibited by employees working in a service organization are negatively related to customers' perceptions of the service they receive.</td>
<td>Supported</td>
</tr>
<tr>
<td>H3: Interpersonal OCBs of employees working in a service organization, as opposed to organizational OCBs, are more strongly related to customers' perceptions of the service they receive.</td>
<td>Supported</td>
</tr>
<tr>
<td>H4: Interpersonal OCBs of employees working in a service organization, as opposed to organizational OCBs, are more strongly related to interpersonally related customer service dimensions.</td>
<td>Supported</td>
</tr>
<tr>
<td>H5: Organizational OCBs, as opposed to interpersonal OCBs, are more strongly related to the customer service dimension tangibles.</td>
<td>Rejected</td>
</tr>
<tr>
<td>H6: Organizationally directed ODBs are more strongly related to overall perceptions of customer service than interpersonally directed employee ODBs.</td>
<td>Rejected</td>
</tr>
<tr>
<td>H7: Employee ODBs more serious in nature are more strongly related to customers' perceptions of service than employee ODBs of minor seriousness.</td>
<td>Supported</td>
</tr>
<tr>
<td>H8: Production deviance is more strongly related to customers' perceptions of service than property deviance, political deviance, or personal aggression.</td>
<td>Rejected</td>
</tr>
</tbody>
</table>
**Additional Analyses.**

In addition to the analyses conducted corresponding to the proposed hypotheses, several other analyses were conducted to further explore the relationships existing between employee extra-role job behaviors (i.e., OCBs, ODBs) and the dimensions of customers' perceptions of the service they receive. This was done in an attempt to better delineate and/or explore the overall relationship of both types of employee extra-role job behaviors (i.e., positive & negative) and customers’ perceptions of the service they receive. Analyses conducted to this point have established that specific relationships exist between employee OCBs, employee ODBs, and the specific dimensions of customers’ perceptions of service. These analyses were conducted separately in accordance with the proposed hypotheses. The following analyses were conducted in order to investigate the overall relationship between employee OCBs, employee ODBs, and customers’ perceptions of service concurrently. That is, employee OCBs, employee ODBs, and customers’ perceptions of service were simultaneously included in various regression models. Specifically, hierarchical regression analyses were conducted using employee OCBs, employee ODBs, and the interaction between these two variables as the independent variables, and the dimensions of customers’ perceptions of the service they receive as the dependent variable(s). Four separate hierarchical regressions were conducted. In regression one, employee OCBs, employee ODBs and their interaction served as the independent variables and customers’ overall perceptions of the service they received served as the dependent variable. In regression two, employee OCBs, employee ODBs and their interaction served as the independent variables and the
interpersonally related dimension of customers' perceptions of the service they received served as the dependent variable. In regression three, employee OCBs, employee ODBs and their interaction served as the independent variables and the functionally related dimension of customers' perceptions of the service they received served as the dependent variable. Finally, in regression four, employee OCBs, employee ODBs and their interaction served as the independent variables and the physical dimension (i.e., tangibles) of customers' perceptions of the service they received served as the dependent variable. The following sections outline the results of these four regressions.

Regression 1.
In this hierarchical regression, employee OCBs, employee ODBs, and their interaction served as the independent variables while customers' perceptions of the service they received served as the dependent variable. In block one, customers' perceptions of the service they received was regressed on employee OCBs and employee ODBs. This regression was significant, $F(2, 32) = 8.66, p < .01$. In block two, the interaction between employee OCBs and employee ODBs was entered. If the inclusion of the interaction in the second regression explains a significant increment in the variance accounted for over the first, than the interaction between the two variables adds significantly to the overall regression model. While this regression was significant, $F = 5.81, p < .01$, the change in $R^2$ and the two-way interaction were nonsignificant. See Table 22 for these results.

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Table 22

Summary of Hierarchical Regression Analysis Examining the Effects of Employee OCBs and Employee ODBs on Customers' Perceptions of the Service They Receive (N = 35)

<table>
<thead>
<tr>
<th>Variable</th>
<th>B</th>
<th>SE B</th>
<th>STD B</th>
</tr>
</thead>
<tbody>
<tr>
<td>Block 1</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>OCBs</td>
<td>0.59</td>
<td>0.21</td>
<td>0.44*</td>
</tr>
<tr>
<td>ODBs</td>
<td>-0.33</td>
<td>0.19</td>
<td>-0.27</td>
</tr>
<tr>
<td>Block 2</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>OCBs</td>
<td>-0.86</td>
<td>2.26</td>
<td>-0.63</td>
</tr>
<tr>
<td>ODBs</td>
<td>-2.79</td>
<td>3.83</td>
<td>-2.31</td>
</tr>
<tr>
<td>Interaction</td>
<td>0.61</td>
<td>0.95</td>
<td>1.93</td>
</tr>
</tbody>
</table>

Note. \( R^2 = 0.3512 \), Adjusted \( R^2 = 0.3106 \) for Block 1; \( R^2 = 0.3597 \), Adjusted \( R^2 = 0.2978 \) for Block 2.
* \( p < .05 \)

Regression 2.

In this hierarchical regression, employee OCBs, employee ODBs, and their interaction served as the independent variables while the customers' perceptions of the interpersonally related service they received served as the dependent variable. In block one, customers' perceptions of the interpersonally related service they received was regressed on employee OCBs and employee ODBs. This regression was significant, \( F \)
$t (2, 32) = 9.75, \ p = < .01$. In block two, the interaction between employee OCBs and employee ODBs was entered. If the inclusion of the interaction in the second regression explains a significant increment in the variance accounted for over the first, than the interaction between the two variables adds significantly to the overall regression model. While this regression was significant, $F = 6.48, \ p < .01$, the change in $R^2$ and the two-way interaction were nonsignificant. See Table 23 for these results.

Table 23

Summary of Regression Analysis Examining the Effects of Employee OCBs and ODBs on Customers' Perceptions of the Interpersonally Related Service They Receive (N = 35)

<table>
<thead>
<tr>
<th>Variable</th>
<th>$b$</th>
<th>SE $b$</th>
<th>STD $b$</th>
</tr>
</thead>
<tbody>
<tr>
<td>Block 1</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>OCBs</td>
<td>0.69</td>
<td>0.22</td>
<td>0.46*</td>
</tr>
<tr>
<td>ODBs</td>
<td>-0.37</td>
<td>0.20</td>
<td>-0.28</td>
</tr>
<tr>
<td>Block 2</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>OCBs</td>
<td>-0.74</td>
<td>2.47</td>
<td>-0.49</td>
</tr>
<tr>
<td>ODBs</td>
<td>-2.81</td>
<td>4.20</td>
<td>-2.08</td>
</tr>
<tr>
<td>Interaction</td>
<td>0.61</td>
<td>1.04</td>
<td>1.70</td>
</tr>
</tbody>
</table>

Note. $R^2 = 0.3786$, Adjusted $R^2 = 0.3398$ for Block 1; $R^2 = 0.3854$, Adjusted $R^2 = 0.3256$ for Block 2.

* $p < .05$

Regression 3.

In this hierarchical regression, employee OCBs, employee ODBs, and their interaction served as the independent variables while the customers' perceptions of the
functionally related service they received served as the dependent variable. In block one, customers' perceptions of the functionally related service they received was regressed on employee OCBs and employee ODBs. This regression was significant, \( F(2, 32) = 5.82, p < .01 \). In block two, the interaction between employee OCBs and employee ODBs was entered. If the inclusion of the interaction in the second regression explains a significant increment in the variance accounted for over the first, than the interaction between the two variables adds significantly to the overall regression model. While this regression was significant, \( F = 4.08, p < .01 \), the change in \( R^2 \) and the two-way interaction were nonsignificant. See Table 24 for these results.

**Regression 4.**

In this hierarchical regression, employee OCBs, employee ODBs, and their interaction served as the independent variables while the customers' perceptions of the physically related (i.e., tangibles) service they received served as the dependent variable. In block one, customers' perceptions of the physically related service they received was regressed on employee OCBs and employee ODBs. This regression was not significant, \( F(2, 32) = 2.24, p > .10 \). In block two, the interaction between employee OCBs and employee ODBs was entered. If the inclusion of the interaction in the second regression explains a significant increment in the variance accounted for over the first, than the interaction between the two variables adds significantly to the overall regression model. Again, this regression was not significant, \( F = 1.68, p > .10 \). Neither the change in \( R^2 \) nor the two-way interaction were significant. See Table 25 for these results.
Table 24

Summary of Hierarchical Regression Analysis Examining the Effects of Employee OCBs and Employee ODBs on Customers’ Perceptions of the Functionally Related Service They Receive (N = 35)

<table>
<thead>
<tr>
<th>Variable</th>
<th>B</th>
<th>SE B</th>
<th>STD B</th>
</tr>
</thead>
<tbody>
<tr>
<td>Block 1</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>OCBs</td>
<td>0.42</td>
<td>0.19</td>
<td>0.36*</td>
</tr>
<tr>
<td>ODBs</td>
<td>-0.28</td>
<td>0.17</td>
<td>-0.27</td>
</tr>
<tr>
<td>Block 2</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>OCBs</td>
<td>-1.32</td>
<td>2.06</td>
<td>-1.13</td>
</tr>
<tr>
<td>ODBs</td>
<td>-3.25</td>
<td>3.50</td>
<td>-3.12</td>
</tr>
<tr>
<td>Interaction</td>
<td>0.74</td>
<td>0.87</td>
<td>2.69</td>
</tr>
</tbody>
</table>

Note. $R^2 = 0.2668$, Adjusted $R^2 = 0.2210$ for Block 1; $R^2 = 0.2835$, Adjusted $R^2 = 0.2142$ for Block 2.

* p < .05
Table 25

Summary of Hierarchical Regression Analysis Examining the Effects of Employee OCBs and Employee ODBs on Customers' Perceptions of the Physically Related (i.e., Tangibles) Service They Receive (N = 35)

<table>
<thead>
<tr>
<th>Variable</th>
<th>B</th>
<th>SE B</th>
<th>STD B</th>
</tr>
</thead>
<tbody>
<tr>
<td>Block 1</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>OCBs</td>
<td>0.01</td>
<td>0.19</td>
<td>0.01</td>
</tr>
<tr>
<td>ODBs</td>
<td>-0.34</td>
<td>0.17</td>
<td>-0.35</td>
</tr>
<tr>
<td>Block 2</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>OCBs</td>
<td>-1.62</td>
<td>2.11</td>
<td>-1.49</td>
</tr>
<tr>
<td>ODBs</td>
<td>-3.13</td>
<td>3.57</td>
<td>-3.22</td>
</tr>
<tr>
<td>Interaction</td>
<td>0.70</td>
<td>0.89</td>
<td>2.71</td>
</tr>
</tbody>
</table>

Note. $R^2 = 0.1227$, Adjusted $R^2 = 0.0678$ for Block 1; $R^2 = 0.1396$, Adjusted $R^2 = 0.0564$ for Block 2.
Discussion

The current investigation examined the effects of employees' extra-role job behaviors (i.e., OCBs & ODBs) on customers' perceptions of the service they received. In general, it was proposed that positive employee extra-role job behaviors (i.e., OCBs) would be positively related to customers' perceptions of the service they receive. In addition, it was proposed that negative employee extra-role job behaviors would be negatively related to customers' perceptions of the service they receive. More specifically, it was proposed that interpersonal OCBs, when compared to organizational OCBs, would be more strongly related to customers' perceptions of the service they receive whereas organizational ODBs, when compared to interpersonal ODBs, would be more strongly related to customers' perceptions of the service they receive. Established measures for the variables of interest were utilized to conduct this investigation. Specifically, an OCB measure developed by Williams and Anderson (1991), an ODB measure developed through the work of Robinson and Bennett (1995), and a customer service measure developed by Parasuraman et al., (1989; 1991) were utilized in the present study. As described previously, the OCB and ODB measures were adapted in order to provide group level measurement of the constructs of interest (i.e., branch level employee OCBs, branch level employee ODBs). The need for group level of analysis regarding employee extra-role job behaviors has been suggested by other researchers (George, 1995; Morrison, 1996). Some very interesting results emerged from the present investigation. First of all, employee extra-role job behaviors were found to be significantly related to customers' perceptions of service received. More specifically,
employee OCBs were found to be positively related and employee ODBs were found to be negatively related to these service perceptions, congruent with the proposed hypotheses. Research to this point has not established concretely the influence that such extra-role behaviors may have. The current study provides data suggesting that such extra-role employee job behaviors do have significant influence on customers' perceptions of the service they receive.

Also, with particular regard to positive employee extra-role job behaviors (i.e., OCBs), it was found that interpersonally directed positive extra-role job behaviors (e.g., listening to coworkers' problems and worries; volunteering; helping out newcomers or those who have been absent) have a stronger relationship with customers' perceptions of service quality than did organizationally directed positive extra-role job behaviors (e.g., giving advance notice when unable to come to work; taking undeserved breaks; attending work at levels above the norm). Further, not only were interpersonally directed OCBs, when compared to organizationally directed OCBs, more strongly related to customers' overall perceptions of the service they received but they were also more strongly related to interpersonally related dimensions of this service (e.g., understanding the customer's specific needs; giving personal attention; instilling confidence in the customer; courtesy). In addition and somewhat surprisingly, contrary to what was hypothesized, interpersonally directed OCBs actually had a stronger relationship to the non-interpersonal, physical dimension of service labeled tangibles (i.e., physical facilities, equipment, & employee appearance) than did organizationally directed OCBs. Overall, the findings of the present study indicate that employee OCBs do have
significant impact on customers’ perceptions of the service they receive and that this is particularly true for interpersonally directed OCBs.

On the other hand, with regard to negative employee extra-role job behaviors (i.e., ODBs), different patterns of results were found. Specifically, more serious employee ODBs (e.g., sabotaging equipment, stealing from the company, and verbally abusing coworkers) were significantly related to and predictive of customers’ perceptions of service quality. The other dimensions of employee ODBs (i.e., interpersonal/organizational and less serious ODBs) were found to be unrelated to customers’ perceptions of the service they receive. Some examples of interpersonal ODBs are showing unjust favoritism toward coworkers, inappropriately blaming coworkers, and borrowing items from coworkers without permission. Examples of organizational ODBs include leaving work early, carelessly using work equipment, and wasting resources. Less serious employee ODBs include intentionally working slow, gossiping about coworkers, and taking excessive breaks. In sum, based on the findings of the current research endeavor, only employee ODBs of a more serious nature can be considered a predictor of customers’ perceptions of the service they receive.

Contrary to what was hypothesized, organizational ODBs were not found to be more strongly related to customers’ perceptions of service quality than interpersonal ODBs. In fact, neither type of employee ODB predicted customers’ perceptions of service quality. Similarly, neither organizational nor interpersonal employee ODBs significantly predicted the physical dimension of customers’ perceptions of service quality. There are several potential explanations for the lack of support for the ODB
related hypotheses. First, negative behaviors such as employee ODBs may lead to a restriction of range in the responses given by participants. That is, respondents may underestimate the presence of ODBs in the workplace for fear of retribution by superiors etc. Respondents are often hesitant to report the existence of negative behaviors (Ones, Viswesvaran, & Schmidt, 1993; Sackett & Wanek, 1996). In addition, in the current study, productivity levels for the selected branches were high. The branches utilized represented the top 20% in terms of productivity. Therefore, it is possible that these branches exhibit lower levels of employee ODBs than less productive branches. This is another potential explanation for the lack of findings with regard to the dimensions of employee ODBs. Finally, it may actually be the case that there is no link between the dimensions of employee ODBs and customers’ perceptions of service quality. Future research should be conducted that can address this issue further. Specifically, research should be done in an organization examining the relationship between dimensions of employee ODBs and customers’ perceptions of service quality while controlling for the productivity levels of the branches/work groups.

Overall, based on the results of the present investigation, it seems that both employee OCBs and employee ODBs are significantly related to customers’ perceptions of the service they receive. In general, analyses seem to indicate that employee OCBs and, in some cases, employee ODBs can be considered significant predictors of customers’ perceptions of the service they receive. In addition, the interaction between employee OCBs and employee ODBs does not seem to have a significant relationship with customers’ perceptions of service. That is, the present study did not identify some
combination of these two types of employee extra-role job behaviors that significantly affected customers’ service perceptions.

The scale used to measure OCBs as adapted from one developed by Organ (1988; 1991) proved to be a useful tool for measuring both interpersonally (i.e., OCB-I) and organizationally (i.e., OCB-O) directed positive employee extra-role job behaviors. Also, the employee ODB scale, as adapted from the work of Robinson & Bennett (1995), provided a functional instrument for measuring organizationally directed as well as interpersonally directed negative employee extra-role behaviors. However, the four specific dimensions as described and defined by Bennett and Robinson (1995) were not completely captured using this scale in the present study. This suggests that the need for some refinement regarding the identification of specific ODB dimensions by researchers in the future. Regarding the customer service measure, SERVQUAL, this scale was useful in the present investigation. While the service dimensions captured (i.e., interpersonal, functional, & physical) did not coincide exactly with some of the previous work in this area (i.e., Parasuraman et al., 1988; 1991), the SERVQUAL instrument did allow for a fruitful investigation of the overall relationships between employee extra-role job behaviors and customers’ perceptions of the service they received in this study.

Limitations

As with most organizational research, limitations in the present study exist. First and foremost, the current examination took place within a fully functioning organization. Therefore, it is possible that variables not of interest to the present investigation could have had some influence on subsequent results. It was not possible to control for all
external variables. However, just as this is a drawback regarding internal validity, it can be considered an advantage with regard to the external validity or generalizability of the present study’s findings. Actual employees working in an operational organization were used. The setting used is similar to many other organizational settings throughout the country. Therefore, the findings may be more generalizable.

Another potential limitation involves a restriction of range regarding the measures utilized. For instance, the scores on the customer service measure ranged from 3.23 for the lowest rated branch to 4.27 for the highest rated one, which is a difference of slightly more than one. It may be difficult to immediately pinpoint what is practically important about this statistically significant difference. What does this difference mean to the practitioner? Simply stated, the importance may be that the lower score indicates lower overall customer service perceptions as identified by actual customers. Perhaps the overall message is more important than the method of delivering it. Taking this idea further, this difference of slightly more than one represents a more than 20% difference in terms of the scale used. A 20% difference in terms of customer service perceptions can hardly be deemed insignificant in any setting, particularly if customers’ perceptions could be directly related to financial performance or bottom-line profitability. Another potential limitation of the present study is that self-report employee measures were used. Although this is a very common practice with regard to organizational research, it is only fair to take this into account when contemplating the findings of the present investigation. Fortunately, the current study’s emphasis upon the group level of measurement and assurance of anonymity should help alleviate some of the problems.
typically associated with self-report measures (e.g., dishonesty, leniency). In addition, it should be noted that the measures used were found to be reliable regarding the current sample and have been well established in the literature.

**Potential Alternative Explanation.**

It was suggested that an alternative explanation for the achieved results in the present study may be due to the level of observability of the employee extra-role job behaviors by customers. That is, more observable employee extra-role job behaviors may have more influence on subsequent ratings of customers' perceptions of service than do nonobservable employee extra-role job behaviors. This could potentially impact the conclusions drawn in the present investigation. In order to test this supposition, several industrial/organizational psychologists examined the scale items and made judgments concerning which items were most likely to be observable and which items were most likely to be nonobservable. The OCB items that were deemed most likely observable to the customer were items eleven and twelve (i.e., “Spending a great deal of time with personal phone conversations” and “Complaining about insignificant things at work”). The OCB items that were judged to be the least likely to be observed by the customer were numbers seven and nine (i.e., “Passing along information to other employees” and “Giving advance notice when unable to come to work”). ODB items that were deemed most observable by customers were numbers three and ten (i.e., “Intentionally working slow” and “Being verbally abusive to others within the department”) while the ODB items deemed to be least observable by customers were numbers six and seven (i.e., “Lying about hours worked” and “Showing unjust favoritism to co-workers”). After
unanimous agreement was reached regarding the relative observability of the items, correlational analyses were conducted which specifically tested the relationship between observable versus nonobservable employee extra-role job behaviors and customers’ perceptions of service. In specific, a correlational analysis examining both observable and nonobservable employee OCBs and customers’ perceptions of service was conducted. Next, a correlational analysis investigating the relationship between observable and nonobservable employee ODBs and customers’ perceptions of service was done. The results of these analyses indicate that the previously suggested relationships between both types of employee extra-role job behaviors (i.e., OCBs and ODBs) are not confounded by the observability of the extra-role behavior. That is, observable employee extra-role job behaviors were not more highly correlated with customers’ perceptions of service than nonobservable employee extra-role job behaviors. In fact, in each case, there was not a significant relationship. This is interesting, since both employee OCBs and ODBs were previously found to be significantly related to customers’ perceptions of service. However, only small components of the employee OCB and ODB scales (i.e., observable and nonobservable items) were tested in the present correlational analysis. It is not necessary for each individual item of a scale to be correlated with a construct in order for the overall scale to be correlated. See Table 26 and Table 27 for the results of these analyses.
Table 26

**Correlations Between Observable OCBs, Nonobservable OCBs and Customers' Perceptions of the Service They Receive**

<table>
<thead>
<tr>
<th></th>
<th>Observable</th>
<th>Nonobservable</th>
<th>Service</th>
</tr>
</thead>
<tbody>
<tr>
<td>Observable</td>
<td>1.000</td>
<td>.50*</td>
<td>-0.09</td>
</tr>
<tr>
<td>Nonobservable</td>
<td>1.000</td>
<td>.07</td>
<td></td>
</tr>
<tr>
<td>Service</td>
<td></td>
<td></td>
<td>1.000</td>
</tr>
</tbody>
</table>

*Note.* N = 35.

*p < .05

Table 27

**Correlations Between Observable ODBs, Nonobservable ODBs and Customers' Perceptions of the Service They Receive**

<table>
<thead>
<tr>
<th></th>
<th>Observable</th>
<th>Nonobservable</th>
<th>Service</th>
</tr>
</thead>
<tbody>
<tr>
<td>Observable</td>
<td>1.000</td>
<td>.65*</td>
<td>-0.04</td>
</tr>
<tr>
<td>Nonobservable</td>
<td>1.000</td>
<td>-0.01</td>
<td></td>
</tr>
<tr>
<td>Service</td>
<td></td>
<td></td>
<td>1.000</td>
</tr>
</tbody>
</table>

*Note.* N = 35.

*p < .05
Implications

The present study has implications for both research and practice. Regarding research, there are four main reasons that the present study is useful. First, with the exception of one study (i.e., Bettencourt & Brown, 1997), employee extra-role job behaviors have not been examined in a customer service context before. While it has been suggested that employee extra-role job behaviors, specifically OCBs, may lead to improved customer service (Bettencourt & Brown, 1997; George, 1991), research has not specifically established this potential influence of either employee OCBs and/or employee ODBs upon customers' perceptions of the service they receive. Bettencourt and Brown's (1997) study concentrated on examining the impact that service employees' workplace fairness perceptions and levels of job satisfaction had on employee extra-role customer service behaviors, not specific customer service dimensions. While these authors' work does provide an enhanced understanding of employee extra-role job behaviors, specifically those that are customer service related, it does not include a specific examination of the relationship among overall employee extra-role job behaviors and customers' perceptions of the service they receive. In fact, Bettencourt and Brown (1997) acknowledged that much more research should be conducted regarding extra-role employee job behaviors. The current study attempts to address this call for more related research. Current results suggest that these type of extra-role employee job behaviors do have a significant correlation with customers' perceptions of service. Future research should be conducted in other organizational settings in order to replicate this finding.

Second, since it was found that employee extra-role job behaviors are related to...
customer service perceptions, the present study assists in establishing that employee extra-role job behaviors account for variance in customers' perceptions of the service they receive similar to other variables (e.g., in-role employee job behaviors; job satisfaction). The idea that employee extra-role job behaviors account for a significant amount of variance in customers' perceptions of service just as employee in-role job behaviors have traditionally been found to do is a new approach when thinking about customer service issues. Again, more research is needed in this area in order to support this idea. Third, as both George (1990) and Organ and Ryan (1995) suggested was necessary, group level OCBs rather than individual level OCBs were examined more specifically. George (1990) and George and Brief (1992) have argued that studying OCBs at the group level is not only more interesting but it is also analytically the preferable way to theorize about OCBs. The current study addressed this suggestion by measuring OCBs at the workgroup/department level. This is a unique way of looking at OCBs. Although many interesting findings have been presented regarding individual measures of OCBs, it has still been suggested that measuring OCBs at the group level may prove to yield different results. The present examination of employee OCBs at the group level of analysis provides future researchers with some evidence that group-level employee OCB measurement is useful. Finally, the present study establishes a link between employee extra-role job performance (i.e., OCBs & ODBs) and an organizational (i.e., customers' perceptions of the service they received) rather than individual outcome (e.g., job satisfaction; affect). This viewpoint is atypical when compared to most of the research examining employee extra-role job performance in our
field. Research has tended to focus on the individual outcomes of such behavior which may have limited the understanding this behavior and its effects on organizations. Future research is warranted examining employee OCBs at the group level relative to their potential impact on other important organizational variables such as sales performance, productivity, and/or safety performance. Perhaps, researchers in this area should take note of studies being conducted in the business and marketing fields. Many researchers in these areas carefully study and incorporate organizational outcomes (e.g., sales performance) along with their examination of employee job behaviors. As mentioned earlier, in today’s highly competitive and global market, organizational outcomes should be carefully considered in order to attain overall organizational success. By examining variables of interest at an organizational level of analysis, it is possible that research can further assist organizations in their development and effectiveness.

With regard to practice, the present study may provide managers and other practitioners much useful information. First, the current investigation provides a potential reason explaining why two work groups exhibiting equal in-role job performance may still differ with regard to customers’ perceptions of service received. Further, employee extra-role job behaviors may be another area to take into serious account when investigating important customer service issues. The results of the current investigation provide support for the idea that high quality in-role employee job performance alone is not an assurance of high levels of customers’ perceptions of service quality. Future research that specifically examines similarly performing work groups that differ in terms of perceptions of customer service quality may serve to reinforce this idea.
In today's highly competitive market filled with well-informed customers, delivering high levels of customer service quality is essential to the success of many companies (Zeithaml, et al., 1996). In fact, it has been suggested that lowering customer defection through the delivery of high quality customer service has a stronger impact on a company's profits than market share, unit costs, and many other factors associated with competitive advantage (Reicheld & Sasser, 1990). Firms utilizing this knowledge that employee extra-role job behaviors do significantly impact customers' perceptions of service may gain further competitive advantage over firms who fail to do so by using this information to improve customer service performance. Second, the current examination of employee extra-role job behaviors may enable managers to better realize the importance of these behaviors and encourage them to develop such behaviors among their subordinates. Modern organizations are increasingly moving toward project-focused work teams where social obstacles and/or facilitators (e.g., employee extra-role job behaviors) can greatly impact success or failure (Brown & Mitchell, 1993). With particular regard to customer service, today's employees are being called upon to step beyond their traditional roles to meet new work demands (Netemeyer, Boles, McKee, & McMurrian, 1997). Therefore, managers may wish to foster positive extra-role job behaviors among their employees. Similarly, in light of the current study's findings, more serious negative extra-role job behaviors should also be proactively discouraged. Of course, most organizations probably already discourage negative extra-role job behaviors, however, the degree of seriousness of such behaviors is not always considered. In fact, it has been suggested that using a peer as a mentor who encourages
positive employee extra-role job behaviors in fellow employees can result in better overall job performance (Pullins, Fine, & Warren, 1996). Perhaps, it may be time for a reexamination of formal reward and performance appraisal systems. That is, these systems may need to be updated in order to encompass a broader job domain which includes employee extra-role job behaviors for employees in service organizations. It has been recommended that such positive employee extra-role job behaviors be recognized and rewarded in order to improve service delivery (Brown & Bettencourt, 1997). In addition, it may be time to implement training programs that make work groups and their employees more aware of the importance of employee extra-role job behaviors. This may instill in an organization's employees the idea that such extra-role employee job performance is valued by the organization. Subsequently, employees may be able to better recognize their unique importance in relationship to customers' perceptions of service quality. After all, each employee within a service organization contributes toward and is in part responsible for success with regard to the delivery of dependable and high quality customer service (Peters, 1987).

Conclusion

Based on the findings of the present investigation, it can be concluded that employee extra-role job behaviors are significantly related to customers' perceptions of service. More specifically, group level employee OCBs were demonstrated to be predictive of these increasingly important customer service perceptions. This may be yet another area where employee OCBs exert influence in the work place. In addition, group level employee ODBs more serious in nature also had a significant relationship with
customers’ perceptions of the service they receive. Of course, before steadfastly heeding the conclusions drawn from this study, additional research in similar and dissimilar settings is needed. Since this area of research has not yet been well established, studies that replicate the current investigation’s findings are necessary. Another important conclusion that may be drawn from the present investigation is that group level measures of employee extra-role job behaviors can be utilized effectively in organizational research. However, as previously mentioned, these measures may need further refinement in order to specifically identify the underlying dimensions that exist. In particular, the employee ODB scale and SERVQUAL may need to be examined further in order to concretely establish their underlying dimensional properties.


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Appendix A: Measure of Employee OCBs

Using a five-point Likert type scale (1=never, 2=rarely, 3=sometimes, 4=very frequently, 5=always), participants will be asked to respond to the following scale items in reference to the employees working in their department as a whole.

Scale Items:

To what extent do people in your work group....

1. Help others who have been absent.
2. Help others who have heavy work loads.
3. Volunteer to supervisor with his/her work.
4. Take time to listen to co-workers' problems and worries.
5. Go out of their way to help new employees.
6. Take a personal interest in other employees.
7. Pass along information to other employees.
8. Attend work at a level that is above the norm.
9. Give advance notice when unable to come to work.
10. Take undeserved work breaks.
11. Spend a great deal of time with personal phone conversations.
12. Complain about insignificant things at work.

Note: Variables Q1 - Q7 represent interpersonal OCBs (OCB-I) and variables Q8- Q12 represent organizational OCBs (OCB-O).
Appendix B: Measure of Employee ODBs

Using a five-point Likert type scale (1=never, 2=rarely, 3=sometimes, 4=very frequently, 5=always), participants will be asked to respond to the following scale items in reference to the employees working in their department as a whole.

Scale Items:

To what extent do employees in the department for which you work....

1. Leave early.
2. Take excessive breaks.
3. Intentionally work slow.
4. Waste resources such as paper, pens, envelopes etc.
5. Carelessly use equipment (e.g, failing to remove staples from material to be copied).
6. Lie about hours worked.
7. Show unjust favoritism to their co-workers.
8. Gossip about co-workers.
9. Blame co-workers for their own mistakes.
10. Are verbally abusive to others within their own department.
11. Borrow items from co-workers without permission.
12. Endanger the physical safety of their co-workers.

Note. Items 1-5 are organizationally directed ODBs. Items 6-12 capture interpersonally directed ODBs.
Appendix C: Measure of Customers' Perceptions of Service (SERVQUAL)

Using a five-point Likert type scale, participants will be asked to respond to the following.

Scale items.

1. XYZ has modern looking equipment.
2. The physical facilities at XYZ are visually appealing.
3. XYZ's employees are neat appearing.
4. Materials associated with service (such as pamphlets or statements) are visually appealing at XYZ.
5. When XYZ promises to do something by a certain time, XYZ does so.
6. When you have a problem, XYZ shows a sincere interest in solving it.
7. XYZ performs the service right the first time.
8. XYZ provides their services at the time XYZ promises to do so.
9. XYZ insists on error-free records.
10. Employees at XYZ tell you exactly when services will be performed.
11. Employees at XYZ give you prompt service.
12. Employees at XYZ are always willing to help you.
13. Employees at XYZ are never too busy to respond to your requests.
14. The behavior of employees of XYZ instills confidence in you.
15. You feel safe in your transactions with XYZ.
16. Employees at XYZ are consistently courteous with you.
17. Employees at XYZ have the knowledge to answer your questions.
18. XYZ gives you individual attention.
19. XYZ has operating hours convenient to all customers.
20. XYZ has employees who give you personal attention.
21. XYZ has your best interests at heart.
22. The employees at XYZ understand your specific needs.

Appendix D: Employee Survey

Please answer the following questions as honestly and accurately as you can. Respond to them as they pertain to your work group. Your answers will be kept completely anonymous and will not be used at any time to identify individual employees. Do not write your name on this form. The survey should only take about 15-20 minutes to complete. Your input is very valuable, useful, and appreciated. Again, thank you for your help.

Please use the scale provided below to answer the following items. Choose only one number to answer each question. Write the number that most closely represents employees within your work group for each question in the blank provided to the left.

1  2  3  4  5
Never Rarely Sometimes Frequently Always

____ 1. To what extent do the employees in the department for which you work adequately complete assigned duties?

____ 2. To what extent do the employees in the department for which you work fulfill responsibilities specified in their formal job descriptions?

____ 3. To what extent do the employees in the department for which you work perform tasks that are expected of them?

____ 4. To what extent do the employees in the department for which you work meet formal performance requirements of their jobs?

____ 5. To what extent do the employees in the department for which you work engage in activities that will directly affect their formal performance evaluations?

____ 6. To what extent do the employees in the department for which you work neglect aspects of the job they are obligated to perform?
Please use the scale provided below to answer the following items. Choose only one number to answer each question. Write the number that most closely represents employees within your work group for each question in the blank provided to the left.

Never     Rarely     Sometimes     Frequently     Always

7. To what extent do the employees in the department for which you work fail to perform essential duties?

8. To what extent do the employees in the department for which you work help others who have been absent?

9. To what extent do the employees in the department for which you work adhere to informal rules devised to maintain order?

10. To what extent do the employees in the department for which you work complain about insignificant things at work?

11. To what extent do the employees in the department for which you work take time to listen to coworkers' problems and worries?

12. To what extent do the employees in the department for which you work go out of their way to help new employees?

13. To what extent do the employees in the department for which you work give advance notice when unable to come to work?

14. To what extent do the employees in the department for which you work help others (i.e., fellow employees) who have heavy work loads?

15. To what extent do the employees in the department for which you work volunteer to assist the supervisor(s) with his/her work?

16. To what extent do the employees in the department for which you work take undeserved work breaks?

17. To what extent do the employees in the department for which you work pass along information to other employees?
Please use the scale provided below to answer the following items. Choose only one number to answer each question. Write the number that most closely represents employees within your work group for each question in the blank provided to the left.

1  2  3  4  5
Never Rarely Sometimes Frequently Always

18. To what extent do the employees in the department for which you work attend work at levels above the norm?

19. To what extent do the employees in the department for which you work take a personal interest in other employees?

20. To what extent do the employees in the department for which you work spend time making personal phone conversations?

21. To what extent do the employees in the department for which you work leave early?

22. To what extent do the employees in the department for which you work steal from coworkers or customers?

23. To what extent do the employees in the department for which you work endanger the physical safety of their coworkers?

24. To what extent do the employees in the department for which you work accept kickbacks (e.g., taking money from another in order to perform a task)?

25. To what extent do the employees in the department for which you work blame coworkers for their own mistakes?

26. To what extent do the employees in the department for which you work take excessive breaks?

27. To what extent do the employees in the department for which you work verbally abuse others within their own department?
Please use the scale provided below to answer the following items. Choose only one number to answer each question. Write the number that most closely represents employees within your work group for each question in the blank provided to the left.

<table>
<thead>
<tr>
<th>1</th>
<th>2</th>
<th>3</th>
<th>4</th>
<th>5</th>
</tr>
</thead>
<tbody>
<tr>
<td>Never</td>
<td>Rarely</td>
<td>Sometimes</td>
<td>Frequently</td>
<td>Always</td>
</tr>
</tbody>
</table>

28. To what extent do the employees in the department for which you work carelessly use equipment (e.g., failing to remove staples from material to be copied)?

29. To what extent do the employees in the department for which you work waste resources such as paper, pens, envelopes, etc.?

30. To what extent do the employees in the department for which you work gossip about coworkers?

31. To what extent do the employees in the department for which you work intentionally work slow?

32. To what extent do the employees in the department for which you work sexually harass others within their own department?

33. To what extent do the employees in the department for which you work lie about hours worked?

34. To what extent do the employees in the department for which you work steal from the company (e.g., paper, pens, envelopes, etc.)?

35. To what extent do the employees in the department for which you work compete nonbeneficially?

36. To what extent do the employees in the department for which you work show unjust favoritism to their coworkers?

Thank you for your time and effort.
Note. Items 1-7 measure employee in-role performance behaviors. Items 8, 11, 12, 14, 15, 17, & 19 measure altruistic job behaviors (OCBI). Items 9, 10, 13, 16, 18, & 20 measure generalized compliance job behaviors (OCBO). Items 21, 26, 29, & 31 capture production deviance ODBs, are organizationally directed, and of minor seriousness. Items 24, 28, 33, & 34 capture property deviance ODBs, are organizationally directed, and of serious consequence. Items 25, 30, 35, & 36 capture political deviance ODBs, are interpersonally directed, and of minor consequence. Items 22, 23, 27, & 32 capture personal aggression ODBs, are interpersonally directed, and of serious consequence.
Appendix E: Customer Survey

Please answer the following questions as honestly and accurately as you can. Respond to them as they pertain to your personal experience with the branch of XYZ that you most frequently interact. Your answers will be kept completely anonymous. Do not write your name on this form. The survey should only take about 10-15 minutes to complete. Your input is very valuable to us and greatly appreciated. We hope that the information that you provide today will enable us to better serve you tomorrow. Again, thank you for your help.

Please use the scale provided below to answer the following items. Choose only one number to answer each question. Write the number that most closely represents your personal experience with XYZ for each question in the blank provided to the left.

1 = Strongly disagree
2 = Disagree
3 = Neither agree nor disagree
4 = Agree
5 = Strongly agree

1. XYZ has modern looking equipment.
2. The physical facilities at XYZ are visually appealing.
3. XYZ's employees are neat in appearance.
4. Materials associated with service (e.g., pamphlets or statements) are visually appealing at XYZ.
5. When XYZ promises to do something by a certain time, XYZ does so.
6. When you have a problem, XYZ shows sincere interest in solving it.
7. XYZ performs service right the first time.
8. XYZ provides their services at the time XYZ promises to do so.
9. XYZ insists on error-free records.
Please use the scale provided below to answer the following items. Choose only one number to answer each question. Write the number that most closely represents your personal experience with XYZ for each question in the blank provided to the left.

1 = Strongly disagree
2 = Disagree
3 = Neither agree nor disagree
4 = Agree
5 = Strongly agree

10. Employees at XYZ tell you exactly when services will be performed.
11. Employees at XYZ give you prompt service.
12. Employees at XYZ are always willing to help you.
13. Employees at XYZ are never too busy to respond to your requests.
14. The behavior of employees at XYZ instills confidence in you.
15. You feel safe in your transactions with XYZ.
16. Employees at XYZ are consistently courteous with you.
17. Employees at XYZ have the knowledge to answer your questions.
18. XYZ gives you individual attention.
19. XYZ has operating hours convenient to all customers.
20. XYZ has employees who give you personal attention.
21. XYZ has your best interests at heart.
22. The employees at XYZ understand your specific needs.

Thank you for your time and effort.

Note. Items 1-4 measure tangibles. Items 5-9 measure reliability. Items 10-13 measure responsiveness. Items 14-17 measure assurance. Items 18-22 measure empathy. Items will be mixed up on actual customer surveys.
Vita

Robert C. Baker, IV was raised in Midwest City, Oklahoma, where he attended Midwest City High School. A popular student, he was known for his quick wit, athletic prowess, and "movie star" smile. After graduating from high school, he enrolled at Centenary College of Louisiana located in Shreveport, Louisiana. He majored in Psychology and was involved in many extra-curricular activities including intramural sports, the Theta Chi fraternity, and Army ROTC. In fact, Robert set the campus intramural records for both touchdown passes and homeruns while simultaneously keeping his dorm room spotless. He graduated Cum Laude in May of 1990 with a Bachelor of Arts degree in Psychology. Next, he spent a couple of years working as a jet-ski instructor in Hilton Head Island, South Carolina. He found himself to be quite popular with the tourists and enjoyed himself immensely. The author then enrolled in graduate school at Louisiana State University in Baton Rouge. He chose industrial/organizational psychology as his major. He received his Master's of Arts degree in May of 1995. Robert's research interests include customer service related issues, employee extra-role job behaviors, and training. He is an ardent supporter of both capitalism and the New York Yankees. In his free time, Robert enjoys raising fresh water fish. The author will earn his Ph.D. in August of 1999. His favorite color is green and he has also been to Jamaica. The author is very strong for his size.
DOCTORAL EXAMINATION AND DISSERTATION REPORT

Candidate: Robert C. Baker, IV

Major Field: Psychology

Title of Dissertation: Customer's Perceptions of the Service They Receive: The Influence of Employee Extra-role Job Behaviors

Approved:

Major Professor and Chairman

Dean of the Graduate School

EXAMINING COMMITTEE:

Date of Examination:

June 29, 1999