Effects of competitive psychological climate, work-family conflict and role conflict on customer orientation
The case of call center employees in India

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Abstract

Purpose – The purpose of this paper is to consider the impact of a competitive psychological climate on the levels of role conflict and work-family conflict in call center employees and their further impact on customer orientation.

Design/methodology/approach – The conceptual model is developed through a review of literature and is then validated in the context of call center employees in India. A total of 281 responses were considered. The model is validated using a multi-group analysis in order to consider a possible influence of gender.

Findings – The model is found to have a very good fit and four of the five hypothesized relationships are found to be significant. The study thus establishes the impact of a competitive psychological climate on the role conflict and work-life conflict in the case of service employees.

Research limitations/implications – The study uses a self-reported measure of customer orientation as well as the sampling methodology is not random. These two aspects could limit the generalizability of the results.

Practical implications – The paper gives empirical support against adoption of competition-based practices in service organizations. This is an important implication for practitioners.

Originality/value – The study looks at the impact of competitive psychological climate in call centers, a construct hitherto not much analyzed. The analysis of the relationship between competitive psychological climate, role conflict and work-family conflict have also not been looked into in the previous literature.

Keywords Customer orientation, Call centers

Paper type Research paper

Introduction

Over the past decade, marketing scholars have emphasized the critical role of employee customer orientation in the success of service organizations (Narver *et al.*, 2000; Slater and Narver, 2000; Day, 1999; Han *et al.*, 1998). Schneider *et al.* (1998) in fact found that customer orientation is a critical dimension of service climate. Customer orientation is also found to impact other important outcome variables like customer satisfaction, loyalty and

perceived value. For instance, Brady and Cronin (2001) found that being perceived as customer oriented leads to greater levels of customer satisfaction and value perceptions and further Chao *et al.* (2007) found that in service organizations, customer orientation moderates the relationship between perceptions of service quality and customer loyalty.

Recognizing the critical importance of customer orientation, numerous studies have looked at customer orientation among service workers in the past (Kelly, 1992; Brown *et al.*, 2002; Dean, 2007; Lee *et al.*, 2006, etc.). Most of these studies have identified important antecedents of customer orientation. These antecedents include employee related dimensions like personality traits (Brown *et al.*, 2002), organizational commitment of employees, job satisfaction (Lee *et al.*, 2006) and pure organizational facets like organizational climate (Kelly, 1992). The number of antecedent variables proposed in the context of customer orientation of service employees is quite large. Further, most of these studies recognize the complexity of interdependent relationships between the antecedent variables. Past studies however have not explicitly considered such factors like a competitive psychological climate in the organization and an employee's work-family conflict on customer orientation. High level of competition encouraged between employees could impact customer orientation as employees may be more interested in quantitative, comparable outcomes which are not necessarily associated with customer orientation. The level of competitive intensity could also impact other factors like perceived role conflict and work-family conflict. Work-family balance is an important construct in this context as it could lead to higher levels of emotional exhaustion (Yavas *et al.*, 2008) and job stress (Netemeyer *et al.*, 2005) and thus may impact an employee's level of customer orientation. In the present study we attempt to develop a model that explains the impact of competitive organizational climate, work-family conflict and role conflict on an employee's level of customer orientation. The model is validated through an empirical study conducted among call center operators in India. Since gender could be an important moderating influence in this context, the model is validated separately for males and females. In the succeeding sessions we explain the rationale for the proposed relationships and the model validation procedure. We conclude by discussing the important implications of the study.

Concept development
In the conceptual model, we propose relationships between:
- the competitive climate in the organization;
- the role conflict felt by the employee;
- work-life conflict; and
- the level of customer orientation.

All these constructs have been covered quite adequately in the past and have been associated with other variables that are important in the context of customer orientation. We first explain these constructs and their associated factors by a review the literature and then develop the hypothesis.

Competitive psychological climate in organizations
Psychological climate refers to employees' perceptions of their organization's environment (Brown *et al.*, 1998). Koys and DeCotiis (1991) opines that the primary

function of the psychological climate is to cue and shape individual behavior toward the modes of behavior dictated by organizational demands. The psychological climate is an outcome of the behavior and policies of the top management (Woodard *et al.*, 1998). According to Kohn (1992), a competitive psychological climate represents the extent to which employees perceive organizational rewards to be based on comparisons of their performance against that of their co-workers. A competitive climate is believed to be an outcome of the structural competition that exists in organizations. A structural competition is a situation in which two or more people vie for tangible or intangible rewards that are too scarce to be enjoyed equally by all (Kohn, 1992). Based on extensive review of empirical studies drawn from varied domains, Kohn argues that a competitive environment ultimately leads to negative outcomes rather than positive outcomes. Thus, prevalence of a competitive climate in the organization would lead to high levels of competition between employees wherein performance is often not based on what was achieved, but rather what was achieved in comparison to the other employees. According to Brown *et al.* (1998, p. 89):

> [. . .] competition is an important aspect of psychological climate because it focuses employees' attention on the performance criteria that serves as the standards of peer group comparison and creates demands on employees to focus their efforts on goal-related activities.

Role conflict
Role conflict, a part of role stress has been a central theme of research into boundary spanners (Singh *et al.*, 1996). According to Boles and Babin (1996), role conflict involves an employee's feeling of incompatibility in job requirements. This could arise when employees feel constrained to take actions which they feel are not the most productive and also because if the course of action suggested by one party (e.g. the supervisor) is inconsistent with the demands of the other (e.g. customer). In their meta-analytic study Brown and Peterson (1993) had shown that role conflict directly influences job satisfaction and job performance in boundary spanning employees. Role conflict is also found to influence an employee's self-efficacy or their beliefs in their abilities to successfully perform job-related tasks (Jex and Gudanowski, 1992).

Work-family conflict
Work-family conflicts occur when work expands to interfere with time that is supposed to be spend with the family. As Netemeyer *et al.* (2005) say, the conflicts may have their most pronounced effects in the stressful environment of customer service jobs as customer service employees may take their jobs home with them, creating work-family conflicts which may in-turn lead to more job stress. With an increasing number of dual-income couples in the workforce, with both partners having to contribute equally to familial responsibilities, the likelihood of such conflicts increases (Boles and Babin, 1996). Greenhaus and Beutell (1985) attributes identify three main factors that are bound to cause work-family conflict:

(1) having a limited amount of time to meet both home and work responsibilities while also pursuing personal desires;

(2) using behaviors from one domain inappropriately in another; and

(3) psychological strain resulting from an individual trying to meet mutually incompatible demands.

The effect of work-family conflict on service employees has received adequate research attention in the recent past (Netemeyer *et al.*, 2004, 2005; Yavas *et al.*, 2008). Most of these studies attempt to link work-family conflict faced by service employees and job related aspects like job performance, job satisfaction and turnover intention.

Customer orientation
Dean (2007) defined perceived customer orientation of the service employee from a customer's perspective as "the extent to which the call center service provider was committed to understanding and meeting their needs and made an effort to seek their opinion and monitor their feelings". This definition is broadly consistent with the employee perceived customer orientation mentioned in service climate studies. According to Brown *et al.* (2002), customer orientation is an employee's tendency or predisposition to meet customer needs in an on-the-job context. Further Dunlap *et al.* (1988) argued that customer orientation is important in the context of service employees as employees who are customer oriented engage in behaviors that increases customer satisfaction. Several studies have focused on the antecedents of customer orientation of service employees. Most of these studies however focused purely on personal specific antecedents like personality traits (Brown *et al.*, 2002) or on organizational specific antecedents (Kelly, 1992). Thurau and Thurau (2002) talk about three dimensions of customer orientation in service employees:

(1) being motivated to be customer oriented;

(2) being authorized to be customer oriented; and

(3) being skilled to be customer oriented.

They feel that different sets of antecedents impact each component of customer orientation. For instance, personal factors like learning orientation and personality are the major determinants of the third component of customer orientation. However, their study did not consider aspects like organizational level variables like work-family conflict and the competitive climate of the organization. In this study, we focus on the first dimension of customer orientation, i.e. being motivated to be customer oriented and consider how it is impacted by an important organizational level variable – competitive organizational climate – that impacts an employee's ability balance the different roles in the organization and family and which in turn could impact an employee's level of customer orientation.

Role theory
The organizational role theory perspective (Kahn *et al.*, 1964) is adopted to support the proposed relationships. The organizational role theory focuses on social systems that are preplanned, task-oriented, and hierarchical. According to this theory, normative expectations and social positions generate roles in organizations. Roles therefore could vary across individuals as normative expectations are subject to both the official demands of the organizations and the pressures of informal groups. Given multiple sources for norms, individuals encounter role conflicts in which they must contend with antithetical norms for their behavior. Such role conflicts produce strain affecting the general performance of the organization (Biddle, 1986). Role theory postulates that individuals, by virtue of their social positions interact with a variety of "role-partners" who together comprise of an individual's role set (Troyer *et al.*, 2000). For employees

who constantly interact with customers in a service set up, the role set would comprise of the managers in the organization, the multitude of customers as well as the members of the family.

According to role theory, a central problem in social interactions involves the adequate enactment of a social role (Goode, 1960; Katz and Kahn, 1966). Often this is because the expectations pressed on an individual from different members of the role set are inconsistent. This results in a paradox causing role conflict. Work-family conflict is a special kind of role conflict in which the work-role demands interfere with work-family demands (Greenhaus and Beutell, 1985). Role theory suggests that as employees have more and more to do for their firm, they have less and less time and energy to do for their family (Hochschild, 1997). The ensuing sections present the hypotheses developed that link the main constructs used in the study.

Hypothesis development

Yoon *et al.* (2001) had found that the work climate in an organization could affect the behavior of service employees. Service climate in an organization is considered to be an important influence on the customer orientation of employees (Kelly, 1992). However, the effects of a competitive psychological climate on customer service employees have not yet received much attention. This is strange in the context of the highly competitive climate in which many service organizations operate.

According to Chung and Schneider (2002), the level of role conflict experienced by service employees is higher when there is a disconnect between what the customers want from them and what the employees feel they are rewarded for in the organization. This study was carried out in a call center for insurance employees. This result points to the existence of a linkage between a competitive psychological climate (in which rewards are based on comparison of performance between co-workers) and an employee's experience of role conflict. The strength of this linkage depends of course, on the degree of gap between what the customers typically expect from the employee and the performance criteria for comparison. While performance metrics include measures based on customer satisfaction and customer service levels, as Feinberg *et al.* (2000) and Robinson and Morley (2006) show, call centers also use a plethora of performance metrics, that may not contribute directly to customer satisfaction like average speed of answer (ASA), average work time after call, total calls, etc. which reduces the ability of a call center employee to provide the requisite level of customer care for all customers. This view is also supported by the study conducted by de Ruyter *et al.* (2001). In fact, as Robinson and Morley (2006) reports, often in call centers, managers end up measuring what is easy to measure than what is necessary to measure. This situation could, according to Taylor and Bain (1999) deteriorate into a quality vs quantity dilemma. Hence, even when there is metric that capture the satisfaction of call center customers, the plethora of measures, many of which runs contrary to achieving customer satisfaction could create stress in the employees (de Ruyter *et al.*, 2001). In many call centers, especially in India, there is high level of stress due to the pressure to work according to standardized performance metrics (Dataquest, 2004). The performance oriented metrics used for comparison and control represent components of a competitive psychological climate in the organization. A well set metric records the employee performance which is compared with the performance of the peers for promotion or other rewards. Performance oriented metrics also usually suggest a particular mode of

behavior for the employee. It is possible that in certain instances this suggested behavior contravenes with the fulfillment of the actual requirements of the customer. These instances would pose intense role conflict in the employees. Thus:

> *H1.* A competitive psychological climate leads to high levels of role conflict in service employees.

A competitive psychological climate could also adversely impact the work-family conflict level of service employees. Brown *et al.* (1998) have shown that sales persons who perceive high levels of competitive psychological climate in their work environment usually set higher goals than those who perceive low levels of competitive psychological climate. When an employee sets higher goals (than his/her peers), it is natural to lead to higher workload or higher work pressure. High goal setting could also increase work demands – defined in terms of greater hours worked, work intensity and other work pressures. Greater work demands lead to "job spillovers" on time spent on home (White *et al.*, 2003) thereby leading to work-family conflict. Further, aspects of a competitive psychological environment could also increase work pressure which inevitably leads to work-family conflict. According to Gallie *et al.* (1998), a work environment characterized by constant appraisals, target setting and merit pay increases the levels of work pressure on employees. Thus, we propose:

> *H2.* A competitive psychological climate leads to higher levels of work-family conflict.

Several studies have looked at the linkage between role conflict and job satisfaction of employees (see Fisher and Gitelson (1983) for a review). Most of these studies have found that role conflict adversely impact job satisfaction. However, the relationship between role conflict and work-life conflict has not been widely studied. Bedeian *et al.* (1988) and Burke (1989) had found that work related stress is an important contributor to work-life conflict. Bacharach *et al.* (1991) found that among nurses and engineers, those facing high levels of role conflict at work also feel high work-family conflict at home. Boles and Babin (1996) who conducted a comprehensive study of customer contact personnel in restaurants report a significant relationship between role conflict and work-family conflict. Hence, we propose:

> *H3.* High levels of role conflict leads to high levels of work-family conflict.

There has been contrasting results with regard to the relationship between role conflict and customer orientation. However, several studies have reported a direct and indirect negative impact of role conflict and customer orientation. For instance, Hoffman and Ingram (1991) found a negative indirect impact for role conflict on customer orientation and Siguaw and Honeycutt (1995) found a negative correlation between role conflict and customer orientation while Daniel (1998) found a significant negative impact between role conflict and customer orientation among airline flight attendants in Australia. Further, Bettencourt and Brown (2003) found an indirect negative effect of role conflict on customer oriented boundary spanning behaviors among a sample of retail banking personnel as well as personnel in the business credit division of an international bank. Chebat and Kollias (2000) had found from a sample of bank employees that role conflict adversely impacts the self-efficacy, job satisfaction and adaptability of employees and this in turn adversely impacts customer service oriented variables like extra-role

performance and role prescribed performance. Extra-role performance was defined as a contact employee's behavior which could lead to customer delight by providing certain extras and spontaneous exceptional services during the service encounter. These behaviors parallel the customer oriented dimension of contact employee behavior. Knight *et al.* (2007) have also found empirical evidence of a negative relationship between role stress and customer orientation of service employees. Hence, we propose:

H4. There is a negative relationship between role conflict and customer orientation among call center personnel with high levels of role conflict leading to less levels of customer orientation.

Past studies have not specifically explored the relationships between work-family conflict and customer orientation in service employees. However, several studies have looked at the effects of work-family conflict in the context of service employees. For instance, Yavas *et al.* (2008) found a strong relationship between work-family conflict and emotional exhaustion among a sample of frontline hotel employees in turkey. Emotional exhaustion could deplete your resources to perform your job properly and in such occupations where you have to control your emotions when you are constantly in touch with customers, it could lead the employee to show less levels of customer orientation. Further, Netemeyer *et al.* (2004, 2005) in a cross-country study of retail salespersons who interact with customers found that work-life conflict leads to high levels of job-stress which was found to adversely impact job satisfaction (Netemeyer *et al.*, 2004) and customer purchase intention (Netemeyer *et al.*, 2005). In another study Bettencourt and Brown (1997) have found a positive relationship between job satisfaction and "pro-social service behavior" – a construct that parallels customer orientation. Hence, since work-life conflict is found to increases job-stress and thereby reducing job-satisfaction in service employees, and also since job satisfaction is negatively related to customer service behaviors of service employees, it is logical to propose that:

H5. Work-family conflict reduces customer orientation of service employees.

The hypotheses are represented in Figure 1.

Empirical study
The hypothesized relationships between constructs were empirically validated through a study among customer contact employees in the call center sector in India.
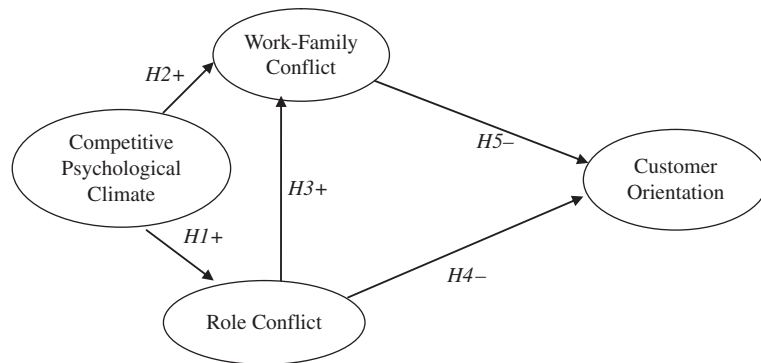

Figure 1.
The conceptual model

Several studies in the past have discussed the challenges posed by employees in call centers in India (Budhwar *et al.*, 2006; Goel and Thakur, 2007). The employees were drawn from 32 different call centers. All the employees were customer-contact employees who interacted with customers personally. Data was collected through a structured questionnaire. The questionnaires were administered personally by researchers and our associates to ensure a high response rate. The questionnaires were filled out either in their place of work or during their training sessions. Almost all (80 percent) the respondents were from the city of Bangalore and the rest were located in Mumbai. A total of 281 responses were collected. Of this 148 were female and 133 were male call center operators.

Measurement model
All the constructs were measured using scale items that had received prior psychometric validation. Work-life conflict was measured using three items adopted from the scale developed by Burke *et al.* (1979). This method asked respondents to express the degree to which their present job impacted various facets of their life on a scale ranging from "strong positive impact" to "strong negative impact". Role conflict was measured using three items extracted from the Rizzo *et al.* (1970) scale. Competitive psychological climate was measured using three items from the scale developed by Brown *et al.* (1998). Customer orientation was measured using three items from the Saxe and Weitz (1982) scale. The scale items are given in Table I.

The convergent and discriminant validity of the measurement model were measured using confirmatory factor analysis. Since prior research point towards a possible difference between female and male workers in their job-related attitudes and opinions (Karatepe *et al.*, 2006; Babin and Boles, 1998), we decided to implement a multi-group method that initially checks whether there are any differences between males and females in terms of the measurement model. Using this method we ran

	Males	Females
Role conflict	0.81 [a]	0.76
I some times have to bend an organizational norm or policy to carry out some task	0.819	0.790
I do things that are apt to be accepted by one person and not accepted by others	0.817	0.763
I may have to complete tasks with inadequate resources and materials	0.762	0.643
Competitive psychological climate	0.77	0.78
My manager frequently compares my results with those of my colleagues	0.637	0.764
Everybody is concerned with finishing at the top of the rankings	0.791	0.741
My co-workers frequently compare their results with me	0.814	0.779
Work-family conflict	0.83	0.85
Mental and physical state away from work	0.684	0.779
Participation in home activities	0.885	0.928
Concern for health and safety	0.894	0.827
Customer orientation	0.87	0.83
I try to give customers an accurate expectation of what can be offered	0.852	0.792
I try to figure out what a customer's needs are	0.916	0.876
I try to answer a customer's questions as correctly as I can	0.824	0.780

Notes: [a]composite reliability; $\chi^2 = 191.15$; $\chi^2/df = 1.991$; dof = 96; NFI = 0.893; CFI = 0.942; TLI = 0.905; RMSEA = 0.06

Table I.
Scale items, standardized regression weights

a series of confirmatory factor analyses starting with a model where all the parameters were allowed to be estimated freely for both the groups. Then with each further analysis we constrained the models by:

- setting the factor loadings to be equal across groups; and
- setting the factor loadings and covariances to be equal across groups.

The unrestricted model produced an acceptable fit for the measurement model with χ^2-value of 191.15, df $= 96$, $p < 0.000$, CFI $= 0.942$, TLI $= 0.905$, NFI $= 0.893$ and RMSEA $= 0.06$. Though the p-value was less than 0.00, χ^2/df as well as other fit indices like CFI, NFI, TLI and RMSEA values adequately supports the model. With restricting the factor loadings to be equal between groups, χ^2-value of 199.643 was obtained which at 104 df did not lead to a significant change in χ^2 even at $p < 0.1$ level. In the next step the model was constrained by imposing the additional condition of the co-variance being equal across groups. This model had a χ^2-value of 215.05 with 120 df. The change in χ^2 was again not found to be significant at $p < 0.1$ level. Thus, it was concluded that the measurement model was similar across both females and males. The coefficient α values for the four constructs were found to be above 0.7 across both the groups, thus giving indication of internal consistency reliability.

In the next step we considered the standardized regression weights, average variance extracted (AVE) and the shared correlations between constructs to assess the convergent and discriminant validity (Fornell and Larcker, 1981). All the standardized regression weights were found to be above 0.5 and statistically significant at $p < 0.01$ across both the groups. Further the AVE value for all the four constructs were well above the shared correlations for all the four constructs for both the groups. Together, these results establish the convergent and discriminant validity of the measurement model. The details of the standardized regression weights, AVE and shared correlations are given in Tables I and II. Table III gives details of the mean, standard deviation, minimum, maximum and coefficient α values of the latent variables.

	AVE	2	3	4
1. Role conflict	0.639 (0.539)	0.356[a] (0.268)	0.429[a] (0.361)	−0.195[a] (−0.143)
2. Competitive psychological climate	0.564 (0.56)		0.268 (0.346)	−0.096[a] (−0.019)
3. Work-family conflict	0.683 (0.717)			−0.096[a] (−0.111)
4. Customer orientation	0.74 (0.667)			

Notes: [a]Shared variances; the values in brackets pertain to females

Table II.
AVE and shared variances

	Minimum	Maximum	Mean	SD	Coefficient α
Work life balance	1.00	5.00	3.470	1.05	0.874
Competitive psychological climate	1.00	5.00	3.301	0.79	0.797
Customer orientation	2.29	4.71	3.405	0.53	0.875
Role conflict	1.00	4.00	2.932	0.46	0.801

Table III.
Mean, maximum, minimum, standard deviation and coefficient α values for the constructs

Common method bias
As the antecedent variables – competitive work climate, work-family conflict and role conflict – and the outcome variable – customer orientation were measured from the same source, potential distortion of the results due to common method bias cannot be rule out (Podsakoff *et al.*, 2003). Therefore, two statistical methods recommended by Podsakoff *et al.* (2003) were applied to measure the level of common method bias. Harman's single factor test in which all the fit indices for a single factor measurement model was compared to the actual measurement model was applied first. The single factor model for the male sample and the female sample was found to be far too poor compared to the actual measurement model in terms of the fit indices thereby showing lack of common method bias. In the second test, repeated for both the male and female sample, all the observed variables in the measurement model were loaded to their assigned latent factors as well as to a single unmeasured latent method factor. The fit indices resulting from this model was then compared to the fit indices for the actual measurement model. The model with the unmeasured latent method factor was noted to have better fit indices rather than the actual measurement model. However, the total variance explained by the single unmeasured factor was found to be insignificant (less than 5 percent) and well below 25 percent – the standard set by Williams *et al.* (1989). The results from the two tests therefore show a minimal impact due to the common method bias on the final results

Hypotheses validation
The hypotheses were validated by running path-analysis using the AMOS software. Again, multi-group method was implemented by splitting the sample to males and females. In the initial model all the factor loadings were set to vary in an unrestricted way and in the second model, all the facto loadings were constrained to be invariant across groups. The first – unrestricted – model showed good fit ($\chi^2 = 191.922$, df = 98, $p < 0.00$, NFI = 0.893, TLI = 0.908, CFI = 0.943 and RMSEA = 0.059). The second – invariant – model did not show too much of a variation from the initial model ($\chi^2 = 209.55$, df = 111, $p < 0.00$, NFI = 0.883, TLI = 0.908, CFI = 0.94, RMSEA = 0.056). The difference between the χ^2 was not statistically significant. Hence, it was concluded that there is no significant difference between males and females in terms of the relationships analyzed. Hence, the male and female sample were aggregated and a combined path analysis was carried out for the whole sample comprising of 281 respondents. Results of the combined path analysis is shown in Table III. The χ^2/df was 2.302, which is below the value 2, while the CFI, NFI and TLI values were all above 0.9 thereby establishing the fit for the model. The RMSEA was 0.068. The standardized path analyses coefficients are shown in Table IV for both males and females from the unrestricted model. As seen from the results, there is no significant difference between males and females in terms of the hypothesized paths. It can therefore be concluded that the effect of gender is not very significant in the case of the relationships.

From the path analysis coefficients, it is seen that except in the case of the relationship between work-life conflict and customer orientation, all the other paths have coefficients that are significant and the direction of the path coefficients are consistent with the proposed hypotheses. Thus, the empirical evidence supports *H1-H4*. In the case of *H5*, though the direction of the path coefficient is consistent with the hypotheses, the path coefficient is not shown to be statistically significant. Therefore, *H5* is not supported in the case of either males or females.

	Path	Standardized coefficient
H1	Competitive psych climate to role conflict	0.534*
H2	Competitive psych climate to work-family conflict	0.253*
H3	Role conflict to work-family conflict	0.424*
H4	Role conflict to customer orientation	− 0.235*
H5	Work-family conflict to customer orientation	0.006

Notes: Significant at: $^{*}p < 0.01$; $\chi^2/df = 2.302$; CFI $= 0.96$; TLI $= 0.936$; NFI $= 0.933$; RMSEA $= 0.068$; these are the standardized path coefficients for both males and females in the unrestricted model

Table IV.
Path analyses coefficients

Discussion and conclusion

The present study looks at the impact of competitive psychological climate on employee attitudes and behavior in the context of call centers. Specifically, the study proposes an indirect effect of competitive psychological climate on customer orientation through its impact on role conflict and work-life conflict. The hypotheses were tested separately on males and females. The empirical analyses show that in the context of the effects of competitive psychological climate, there is not much of a difference between males and females. The empirical analyses also show that a high level of perceived competitive psychological climate increases both the role conflict and work-life conflict of employees. The study thus provides empirical evidence to support a reduction of competitive psychological climate in service organizations. This is a significant result for practitioners. A competitive psychological climate is basically an outcome of management practices based on performance matrices and peer comparison. Few studies have considered the impact of competitive psychological climate in service organizations before.

Another significant result is the positive relationship between role conflict and work-family conflict. The results thus support the conclusion reached by Babin and Boles (1996). However, apart the Babin and Boles study, few studies have looked at this relationship. The analyses also show a negative and significant relationship between role conflict and customer orientation of employees in call centers. Like the relationship between role conflict and work-family conflict, the relationship between role conflict and customer orientation has also not been considered by many studies in the past. This result therefore contributes toward the literature in this field. The relationship between work-family conflict and customer orientation is not found to have a statistically significant relationship, though the coefficient is found to be negative. One possible reason for this result is the presence of a mediating variable that was not considered. Future studies could probe this relationship in other contexts and consider possible mediating variables that impact this relationship. Variables like emotional exhaustion, job satisfaction, stress, etc. could be considered.

The study thus contributes to the existing knowledge at several levels. Future studies could extend the results to consider other mediating variables and also could attempt to validate this model in other contexts. Also future studies could look at a customer reported measure of customer orientation of employees, rather than a self-reported measure of customer orientation. Also the different dimensions of customer orientation could be tested rather than the overall customer orientation measure used here.

It is also necessary to point out some limitations of this study. First of all, the sampling method used was convenience sampling, with sample elements contacted

purely through personal contacts. This could impact the generalizability of the study. Further, while work-life conflict is an important factor in this context, family-work conflict also needs to be considered since, and family commitments could also erode the customer orientation of employees.

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