Deakin Research Online

This is the authors’ final peer reviewed (post print) version of the item published as:


Available from Deakin Research Online:

http://hdl.handle.net/10536/DRO/DU:30022851

Reproduced with the kind permission of the copyright owner.

Copyright: 2009, Emerald Group Publishing Limited
Police stress: the role of the psychological contract and perceptions of fairness

The Authors

A.J. Noblet, Deakin Business School, Deakin University, Burwood, Australia

J.J. Rodwell, Deakin Business School, Deakin University, Burwood, Australia

A.F. Allisey, Deakin Business School, Deakin University, Burwood, Australia

Abstract

Purpose – The overall purpose of this paper is to examine the extent to which breaches in psychological contracts and perceptions of organizational fairness account for variations in job stress experienced by operational police officers (as measured by psychological distress and employee performance), after controlling for the variance associated with more established job stressors (i.e. job demands, job control and social support).

Design/methodology/approach – This study is based on data collected through a self-report survey involving operational members of a large Australian police force (n=582).

Findings – Results of hierarchical multiple regression analyses indicate that vast majority of explained variance in psychological distress and extra-role performance is attributed to the additive effects of demand, control, and support. Furthermore, only one of the social exchange dimensions (interpersonal fairness) is predictive of either target variable.

Research limitations/implications – The limitations that need to be taken into account are the cross-sectional nature of the study design and the focus on a single police service.

Practical implications – Despite the generally weak support for the social exchange variables, there are signs that dimensions of justice (particularly interpersonal justice) should be included in future police-stress investigations. The results also suggest that job characteristics such as job demand, job control and social support should be taken into account when developing strategies to prevent and/or reduce chronic job stress in policing services.

Originality/value – This is one of the first studies to examine the relationships between psychological contract breach, perceptions of fairness and police stress.

1. Introduction
Although job stress is a concern for many industries and occupational groups, some professions appear to be more vulnerable to experiencing high levels of stress at work than others (Kop et al., 1999). Policing has been identified as one of these particularly stressful occupations, with law enforcement work being ranked among the top five most stressful occupations worldwide (Dantzer, 1987; Liberman et al., 2002). Organizational stressors such as heavy workloads, inadequate supervisory support, staff shortages and poor communication are considerably more prevalent and problematic than acute operational stressors, such as attending accident scenes and apprehending violent individuals (Biggam et al., 1997; Brough, 2004). Ongoing exposure to organizational stressors can have a negative impact on both the organization (e.g. lower levels of organizational commitment, increased absenteeism) and their members (e.g. reduced physical and mental health, declining job satisfaction) (Sparks et al., 2001). There is also a risk that community relations and public safety may be undermined by chronic job stress, with studies showing positive associations between levels of police burnout and cynical attitudes towards civilians (Stearns and Moore, 1993) and the use of self-reported violence (Kop et al., 1999). In view of the serious and far-reaching effects of prolonged occupational stress, there is a compelling need for policing services to have a sound understanding of the organizational origins of the stress experienced by their members and to use this information to develop well-informed and targeted stress prevention strategies.

A long line of research has uncovered a range of organizational and social working conditions that contribute to the stress experienced by policing personnel. Generally, these stressors relate to characteristics of the job (heavy workloads, inadequate decision-making input, supervisory support) and the context in which the job takes place (organizational change, interpersonal conflict, shift work) (e.g. Berg et al., 2005; Biggam et al., 1997; Collins and Gibbs, 2003; Deschamps et al., 2003; Violanti and Aron, 1995). However one area that has received considerably less attention in the police stress literature is the relationship between social exchange constructs, such as psychological contract (PC) and organizational fairness, and levels of police stress. Whilst the results of research indicates that PC breaches (e.g. Gakovic and Tetrick, 2003; Noblet and Rodwell, 2009) and perceptions of unfair treatment (e.g. Elovaainio et al., 2002; Kivimäki et al., 2003b) may be particularly distressing for employees, this research is only just emerging, and little is known about the extent to which social exchange variables contribute to employee stress over and above the effects of more established stressors such as job demands, job control and social support. A further limitation of research involving social exchange variables is that the relevant studies have generally involved non-policing occupations and there is a clear need to examine the effects of unfulfilled PCs and perceptions of injustice in a law enforcement context. The overall aim of the current study is therefore to assess the relationship between PC breaches and perceptions of organizational fairness and the stress experienced by operational police officers. We will control for the effects of well recognized stressors (i.e. job demand, job control and social support), in order to better understand the unique contribution made by the social exchange variables, and will examine job stress using measures that are important to the health of frontline police officers (i.e. psychological distress) and the organizations in which they work (i.e. employee performance). The results of the present study can then be used to help gauge the extent to which policing services should consider PC breaches and perceptions of fairness when developing initiatives to prevent and/or reduce the stress experienced by their members.
1.1 Psychological contract, organizational fairness and police stress

The psychological contract refers to a set of unwritten agreements about what one party expects to give and receive from the other (Robinson, 1996; Robinson and Morrison, 2000) and can cover a range of issues including promotional opportunities, training and development and the level of decision-making responsibility that the employee will receive (Turnley and Feldman, 2000). Breaches in psychological contract are relatively common and are associated with a range of negative outcomes, including reduced employees' trust, higher levels of job dissatisfaction, reduced commitment to the organization, declining levels of in-role and extra-role performance and increased employee turnover (Robinson and Morrison, 2000).

Although management scholars have identified strong relationships between PC breaches and a variety of attitudes and behaviors, the effects on job stress and other indicators of employee wellbeing have been largely overlooked. Furthermore, where researchers have addressed the PC breach-stress relationship, the results are inconclusive (Gakovic and Tetrick, 2003; Noblet and Rodwell, 2009). Both of these studies compared the influence of PC fulfillment with well recognized sources of stress, namely job demands, job control and supervisory support. The Gakovic and Tetrick (2003) study involved 161 clerical and sales personnel and found that while met obligations were closely associated with burnout (as measured by emotional exhaustion), none of the more traditional stressors were predictive of the outcome measures. In comparison, the research by Noblet and Rodwell (2009) was based on two samples of public sector employees, one of which consisted of 1,010 sworn police officers. Although the results of multiple regressions involving both samples also indicated that the level of explained variance attributed to the PC was significant, the proportion of variance captured by the PC measure was considerably smaller than that accounted for by the traditional stressors. So, while the results of the Gakovic and Tetrick (2003) study suggest that assessing PC breach should take precedence over examining demand, control and support, the Noblet and Rodwell (2009) study indicates that potentially harmful aspects of the working environment could be overlooked if these job characteristics were ignored. Given the contradictory findings from these studies, a key objective of the current investigation is to clarify the relationship between PC breach and job stress among police officers and consider whether this association supersedes, or is in addition to, the role of demand, control and support. The Noblet and Rodwell (2009) study was notable for the involvement of sworn policing personnel and, on the basis of the parallels between this and the current investigation, we have given the findings greater weighting when forming the relevant hypothesis:

H1. Both PC breach and the job characteristics (demand, control and support) will account for significant proportions of explained variance in the job stress reported by police officers.

Organizational fairness is another social exchange theory that may offer new and valuable insights into the sources of stress experienced by law enforcement personnel. The term “organizational fairness”, or “organizational justice” as it is sometimes known, is used to describe people's perception of fairness in organizations (Greenberg, 1988). These perceptions are multi-dimensional and relate to people's subjective evaluations of the extent to which outcomes such as pay, promotions, work roles, and workloads are
distributed fairly (referred to as distributive fairness), the perceived fairness of the procedures that authority figures use when deciding who should receive these outcomes (procedural fairness), the level of respect and dignity people feel they receive during and after fairness-related decisions are made (interpersonal fairness) and the extent to which employees receive timely and accurate information about the decision-making processes, or the outcomes of those processes (informational fairness) (Colquitt, 2001). The relationship between the fairness dimensions and employee attitudes and behaviors have been documented in meta-analyses (Cohen-Charash and Spector, 2001; Colquitt, 2001) and relevant literature reviews (Conlon et al., 2005).

Despite many of the early organizational fairness studies overlooking the impact of injustice on job stress, there is a rapidly growing body of research focusing on the “injustice as stressor” concept. Not only has this research identified close relationships between perceptions of injustice and indicators of psychological strain, but the findings strongly suggests that the effects associated with fairness perceptions are independent of other job stressors. For example, Kivimäki et al. (2003c) found that procedural and relational justice were independent predictors of a range of stress-related outcomes including self-rated health (Kivimäki et al., 2004), coronary heart disease risk scores (Kivimäki et al., 2005), minor psychiatric disorders (Elovainio et al., 2002), sickness absence (Kivimäki et al., 2003a) and depression (Ylipaavalniemi et al., 2005). Importantly, these relationships remained after adjusting for well-recognized psychosocial work stressors such as job demand, job control and, to a lesser extent, social support.

Although previous studies indicate that organizational fairness should be taken into account when researchers and practitioners are addressing police stress, there are two major limitations that make it difficult to make this conclusion. The first is that the vast majority of the research in this area has involved non-policing organizations. Of the justice-related research involving police officers most have either focused on the public’s perceptions of how fairly they have been treated in their dealings with police (e.g. Engel, 2005), or the fairness associated with recruitment and/or selection practices (e.g. Farmer et al., 2003). In contrast, very few justice-in-policing studies have considered the fairness associated with the day-to-day interactions between authority figures (sergeants, senior sergeants and other personnel with significant people-management responsibilities) and members. Two exceptions to this trend are studies by Kop et al. (1999) and Adebayo et al. (2008). Although both studies indicate that organizational justice is associated with stress-related outcomes such as burnout and emotional exhaustion, organizational fairness was operationalized as a global construct in these studies and hence it is difficult to identify the effects associated with specific dimensions of fairness (i.e. distributive, procedural, informational or interpersonal). This lack of detail has important practical implications, as the differential effects associated with the fairness dimensions provide important insights into how fairness needs to be managed in order to enhance health and performance outcomes (e.g. do supervisors focus on the outcomes of resource allocation decisions or the processes used to make those decisions?).

The second key limitation of the injustice as stressor research involves the inconsistent application of social support and the difficulty this creates when assessing the extent to which fairness dimensions make unique contributions to job stress. A relatively large
proportion of justice-health studies have either not assessed work-based support, or have focused solely on emotional support when considering the independent effects associated with organizational fairness (e.g. Elovainio et al., 2002; Kivimäki et al., 2003c). In contrast, the support matching hypothesis suggests that the effectiveness of support is heavily dependent on the degree to which the form and source of support matches the specific needs activated by the stressor (e.g. Cutrona, 1990; Sarason et al., 1990). Disaggregated measures of social support that tap into the commonly recognized forms (emotional, instrumental, informational and appraisal) and sources (supervisors, colleagues, subordinates) of support at work are therefore more likely to predict employee wellbeing.

The current study will address the limitations of previous justice-health research by testing whether all four organizational justice dimensions make independent contributions to employee wellbeing over and above demand, control and support. In addition, social support will be operationalized according to the disaggregated definition (i.e. assessing multiple forms and sources). On the basis of emerging research addressing the relationship between organizational fairness and indicators of job stress, and taking into account the benefits associated with multi-source and multi-form social support, we have hypothesized the following:

\[ H2. \] Both the perceptions of organizational fairness and job characteristics (demand, control and support) will account for significant proportions of explained variance in the job stress reported by police officers.

1.2 Links between job characteristics and police stress

The job characteristics – job demands, job control and social support – have been included in the current study as a means of identifying the extent to which the social exchange constructs (PC breach and organizational fairness dimensions) can make contributions to police stress that are independent of more commonly identified job stressors. In view of the critical role played by these three characteristics in the current study, it is necessary to establish their credentials in the job stress literature.

Job demands, job control and social support represent core components of some of the most widely used models underpinning research on employee stress, including the Demand-Control-Support model (Johnson and Hall, 1988; Karasek and Theorell, 1990) and the Job Demands-Resources model (Demerouti et al., 2001). In both these cases, resources such as decision-making latitude and support from supervisors and colleagues are predicted to prevent or buffer the negative effects of high job demands. Although the synergistic effects of demand, control and support have been reinforced in a number of large-scale, community-based studies, the majority of research has failed to support the two and three-way interactions (for a review, see Van der Doef and Maes, 1999). Instead, there has been strong support for the independent and additive effects of demand, control and support. Importantly these direct effects have been identified in studies involving law enforcement personnel. In relation to job demands, for example, time pressures and work overload were found to be key sources of stress in studies involving Dutch (Kop et al., 1999) and Scottish (Biggam et al., 1997) police officers. Other studies, predominantly involving law enforcement officers from Western countries such as France, Norway, the UK and the USA,
have also identified inadequate support (particularly from senior officers) and/or a lack of decision-making input as being important factors in the stress experienced by police officers (Berg et al., 2005; Collins and Gibbs, 2003; Deschamps et al., 2003; Morash et al., 2006; Violanti et al., 1985). The strong empirical support for the direct effects of demand, control and support indicate that these variables are indeed commonly identified sources of stress among policing personnel and that these particular job characteristics will provide a worthwhile reference point against which to assess the unique contribution made by the social exchange variables.

1.3 Employee outcomes

The employee outcomes measured in the current study (psychological distress, employee performance) together represent variables that are important to individual officers and to policing services generally. Psychological distress refers to the levels of generalized anxiety and depression experienced by individuals and can have serious consequences for the person’s overall quality of life and his/her effectiveness in the workplace (Bültmann et al., 2005). Deteriorating employee behaviors such as declining performance are regarded as manifestations of job strain in much the same way as psychological distress and have been closely linked with both the job characteristics (demand, control and support) as well as the social exchange constructs (PC breach and organizational fairness dimensions) (e.g. Bond and Bunce, 2003; Conlon et al., 2005). We will examine both in-role and extra-role performance in the current study, the latter of which will be measured by organizational citizenship behavior (OCB). OCB refers to discretionary behavior directed at individuals or the organization as a whole, which go beyond existing role expectations (i.e. formal, in-role duties) and benefit or are intended to benefit the organization (Organ, 1988). OCBs can have a direct impact on the social and organizational environments in which work takes place and have been described as the “social lubricant” that enables employees to perform their core responsibilities (Podsakoff and MacKenzie, 1997). Including OCBs in the current investigation, in addition to in-role behavior, therefore provides a more detailed assessment of the relationship between the study variables and employees’ overall contributions to the organization.

2. Method

2.1 Sample

The current investigation was based on the responses from operational police officers based within one region of a large Australian police service. All sworn police officers from this region (hereafter referred to as Region A) were invited to participate in the study, via a mail-out survey that was sent directly to employees' work addresses. The questionnaire was accompanied by a cover letter – signed by the Chief Commissioner and the Secretary of the local police union – encouraging members to take part in the study and offering them the opportunity to complete the survey form during work hours. Participants were also asked to return their completed questionnaire to the authors in a reply-paid envelope. Overall 31 percent \( (n=582) \) of employees from the region returned their completed questionnaire. To summarize the demographic characteristics of the sample, most (72 percent) of the respondents were male. The majority of respondents were aged 30 years and over, the
largest number of respondents being 30-39 years of age (41 percent). In terms of tenure, there was a relatively even spread across three age ranges (nine years or less, ten to 19 years, 20 years or more), with approximately a third of respondents in each group. The vast majority of respondents (90 percent) were sworn members and the most common rank was Senior Constable or Leading Senior Constable (52 percent). Comparisons with personnel data were undertaken to determine the extent to which the sample was representative of all sworn members within the participating region. Breakdowns on the basis of age were not available, however according to the gender, tenure and rank profiles of the region, study participants were not significantly different from the larger workforce. After excluding surveys with missing values and outliers the regression analyses below are conducted on 504 cases.

2.2 Measures

2.2.1 Job control

Job control was measured using a nine-item scale assessing skill discretion and decision-making control (Karasek, 1985). Examples of the items included in this scale were, “My job requires me to make a lot of decisions on my own” and “I have very little freedom to decide how I work”. Responses were recorded on a five-point Likert scale ranging from “strongly disagree” (1) to “strongly agree” (5), and negatively worded items were reverse-coded so that high scores indicate high levels of job control.

2.2.2 Job demands

Job demands were measured using the quantitative workload scale developed by Caplan et al. (1980). The scale assesses both physical and psychological demands and consists of eleven items measuring the amount of work performed by the employee and the pace at which it was performed (e.g. “How many tasks or responsibilities do you have?” and “How much time do you have to think and contemplate?”). Responses were recorded on a five-point Likert scale ranging from “rarely/hardly any” (5) to “very often/a great deal” (1). High scores on the scale indicate high job demands.

2.2.3 Support (work and non-work)

Participants were asked to complete a 17-item scale (Etzion, 1984) assessing the extent that various forms of support are present in their working (nine items) and non-working (eight items) lives (e.g. “To what extent do you get appreciation and recognition for what you do?” and “To what extent is support and advice available when you are experiencing difficulties?”). Participants recorded their responses on a seven-point scale ranging from “very little” to “very much”, with higher scores indicating that the sources supported them to a greater extent.

2.2.4 Organizational fairness

Fairness was measured using the justice measure developed by Colquitt (2001). The measure contains 20 items in total, with seven items measuring procedural justice (e.g. “Have those procedures been applied consistently?”), four measuring distributive justice
(e.g. “Do your pay, promotions and other benefits reflect the effort you put into your work?”), four measuring interpersonal justice (e.g. “Have they treated you with respect?”) and five measuring informational justice (e.g. “Have they been candid in their communications with you?”). Items were rated on a five-point scale according to the extent that various elements of fairness applied to the respondent, from “very often” (1) to “rarely” (5). For each of the four sub-scales, their respective items were recoded and then summed to make a total score, with higher scores indicating higher levels of fairness.

2.2.5 Psychological contract

The psychological contract variable was measured using five items from Robinson and Morrison’s (2000) Perceived Contract Breach instrument. These items were rated on a five-point scale, from “disagree strongly” (1) to “agree strongly” (5), according to the extent to which respondents agreed that their expectations had been met (e.g. “I feel my employer has come through in fulfilling the promises made to me when I was hired” and “I have not received anything promised to me in exchange for my contributions”). After reverse-coding the negatively orientated items, the item scores were summed to constitute an overall PC fulfillment score, with higher scores corresponding to expectations being met to a higher degree.

2.2.6 Psychological distress

Psychological distress was measured using the Kessler Psychological Distress Scale (K10) developed by Kessler and Mroczek (1994), which contained ten items. Respondents rated each item (e.g. “In the last 30 days how often: did you feel tired for no good reason?” or “did you feel that everything was an effort?”) on a five-point Likert scale, ranging from “all of the time” (1) to “none of the time” (5). After reverse coding all items, the ten items were summed to form an overall psychological distress score with higher scores indicating higher levels of distress.

2.2.7 Employee performance

The performance measurement instrument assessed behaviors that:

- benefit the organization in general (OCB-O; e.g. “I give advance notice when I’m unable to come to work”);
- immediately benefit individuals and indirectly benefit the organization (OCB-I; e.g. “I go out of my way to help new employees”); and
- are based on performance of specified in-role-behaviors (IRBs; e.g. “I adequately complete assigned duties”).

These behaviors were measured using the 21-item scale developed by Williams and Anderson (1991). Each subscale contained seven items that were measured on a five-point Likert scale, ranging from “disagree strongly” (1) to “agree strongly” (5). Higher scores for each of the behavior subscales indicated higher levels of that behavior.

3. Results
Prior to the commencement of the data analyses, the data were screened for the accuracy of scores, missing data, outliers and for violations of the assumptions of the regressions, using the approach discussed in Tabachnick and Fiddell (2001). The evaluation of these assumptions indicated that the data and variables met the requirements for normality, linearity and homoskedasticity, particularly when investigating collinearity and multicollinearity (Tabachnick and Fidell, 2001). The missing data was treated using list-wise deletion and all statistical analyses were undertaken using SPSS 15.0 for Windows (SPSS, 2004).

3.1 Bivariate correlations

Table I lists the descriptive statistics and correlations for each of the study variables. The correlations were conducted to highlight the pattern of relationships between the independent variables – i.e. PC breach, the dimensions of organizational fairness and the three job characteristics (demand, control and support) – and the target variables, i.e. psychological distress and measures of employee performance. A key feature of Table I is the large number of significant correlations between the target measures and the predictor variables. PC breach, the dimensions of fairness and the job characteristics were all correlated with psychological distress. These relationships were also in the expected direction. Similarly, many of the independent variables were significantly correlated with job performance. Scale reliabilities are presented in Table I, with values ranging between 0.68 and 0.91.

3.2 Multiple regression analyses

Although the bivariate correlations lend support for the relevance of the social exchange and job characteristic variables in a law-enforcement context, they do not clarify the extent to which the hypotheses are supported (i.e. both PC breach and organizational fairness variables will account for job stress over and above job characteristics). Multiple regression was therefore undertaken to respond to the study hypotheses.

The results of the multiple regressions are reported in Tables II and III. The order in which the independent variables were entered into the regression analyses was based primarily on the need to identify the capacity of the social exchange variables to account for explained variance in employee distress and performance after controlling for the job characteristics. Consequently, the first step contained job control, workload, support at work and support outside work. The second step consisted of PC fulfillment (i.e. the extent to which expectations were fulfilled), whilst the third step included the four fairness subscales (procedural, distributive, interpersonal and informational fairness). The entry of these sets of variables was reversed ordered in subsequent analyses, however as the changes in adjusted $R^2$ attributed to each block remained essentially the same, we have presented the results in the original order (i.e. job characteristics, PC fulfillment and organizational fairness).

Table II indicates that the vast majority of the explained variance in psychological distress was accounted for by the job characteristics, demand, control and support. Although there was a change in adjusted $R^2$ attributed to PC fulfillment and the fairness variables, the
proportion of change was not significant. In terms of the effect sizes associated with individual predictor variables, all the job characteristics were predictive of psychological distress, while only one of the social exchange variables – interpersonal fairness – recorded a beta coefficient that was significant.

The three subscales for performance – i.e. OCB-O, OCB-I and IRBs – were included in the survey. However, due to the inability of the predictor variables to explain adequate or significant amounts of variance in the OCB-O and IRB scales, only the results of the regression with OCB-I as the outcome variable is presented in Table III.

The pattern of results for the OCB-I regressions are very similar to those for psychological distress. The job characteristics again captured almost all of the adjusted \( R^2 \), while all the individual variables (with the exception of non-work support) were predictive of OCB-I. In contrast, the proportion of explained variance associated with the two sets of psychological contract variables was negligible and none of the organizational fairness or PC variables were predictive of this outcome measure.

4. Discussion

Recent job stress research involving non-policing personnel has indicated that psychological contract and organizational justice variables could make important contributions to employee stress. The organizational justice literature in particular has suggested that perceptions of fairness may account for proportions of job stress, even after controlling for the influence of more established job stressors such as demand, control and support. As very few researchers had examined the relationship between PC breaches, perceptions of fairness and employee outcomes in a policing context, research was required to examine the extent to which the stress experienced by operational police officers could be attributed to the social exchange variables.

Overall, the results of the current analyses were not supportive of the study hypotheses. Almost all of the explained variance in psychological distress and OCB-I was attributed to the demand, control and support variables, and the PC breach and the fairness dimensions failed to provide significant explanatory value over and above the additive effects of the more established job stressors. Furthermore, interpersonal fairness was the only individual social exchange variable that was predictive of either outcome. In contrast, all the job characteristics were predictive of psychological distress and OCB-I (except non-work support on OCB-I).

4.1 The role of PC breach and organizational justice

The lack of support for the social exchange variables was unexpected, in view of the background literature, and a discussion of the possible reasons for this non-support is necessary. In summary, both operational as well as contextual differences between the current study and previous job stress research involving organizational justice and PC breach may have contributed to the failure of the social exchange variables to capture significant proportions of variance in the outcome variables. In terms of operational differences, the current study included a disaggregated measure of social support that tapped into the
commonly recognized forms and sources of support in work and home-life. This approach is consistent with the support matching hypothesis whereby the employee is able to match the form and source of support with the specific needs activated by the stressor (Cutrona, 1990; Sarason et al., 1990). In comparison, other social exchange-job stress studies incorporating social support have tended to use measures that focused on a single source or form of support. In relation to the psychological contract, for example, Gakovic and Tetrick (2003) measured supervisory support and did not take into account the support employees might receive from colleagues and non-work sources (e.g. family and friends). Likewise, the organizational fairness research has tended to concentrate on emotional support and have generally overlooked other forms (Elovainio et al., 2002; Kivimäki et al., 2003b, c). The use of the disaggregated approach to social support in the current study may have been one of the key reasons why work and non-work support was so prominent in the regression results relative to the PC and justice variables.

The context in which study was undertaken may have also contributed to the lack of support for the social exchange constructs. The current study focused on police officers working in a large, highly bureaucratic, state-funded organization. In this organization, the regulations and procedures relating to resource allocation decisions (e.g. promotions, performance reviews) are tightly controlled and administered. The higher levels of control may have created greater consistency around justice-related decisions, which in turn meant that fairness and PC breach issues may have been less problematic for employees working in this context. The inverse relationship between interpersonal justice and psychological fairness lends support to this explanation, as treating people with respect and dignity during justice-related decisions is less likely to be influenced by formal systems and policies. That is, individual supervisors and managers have much more discretion over if and when they provide interpersonal justice and thus there is greater likelihood that individual supervisors will dispense this form of fairness in a similar way to other authority figures.

Although the social exchange constructs were not generally associated with the outcome variables in the current study, the one exception was interpersonal justice. The close links between interpersonal justice and distress support the view that the “means” for making justice-related decisions are as important, if not more important, than the “ends” or outcomes of those decisions. Treating employees with respect and dignity both during and after the justice-related decision has the potential to off-set negative reactions to unfavorable decisions (e.g. unsuccessful promotion application), as well as helping to build strong, positive relationships between workers and supervisors (Tepper, 2001).

4.2 The relationship between job characteristics and job stress

The hypotheses guiding the current investigation were directed primarily towards assessing the unique contribution that social exchange variables could make to the stress experienced by front-line police officers. Although the PC and justice variables were not well supported in the regression results, the large proportions of explained variance accounted for by the additive effects of demand, control and support strengthen the importance of addressing these variables in future police stress studies. Social support, both from work and non-work sources, was particularly prominent in the results and adds weight to research showing strong associations between the advice, assistance and feedback received from colleagues.
and supervisors and employee wellbeing (De Lange et al., 2004; Swanson and Power, 2001). The finding is also consistent with previous research involving police samples where support was found to be one of the highest rating factors to influence officer attitudes and behaviors (Baruch-Feldman et al., 2002; Brough and Frame, 2004). In general, the results of the current investigation as well as previous research in the area indicates that operational command needs to be aware of the benefits of appropriate support initiatives that address potentially stressful conditions and have mechanisms in place to monitor and address these support needs.

Job control has received less attention in the police-specific literature, however the predictive capacity of this variable in the present study (across both outcomes) suggests that it should play a more prominent role in future police stress research. The introduction of more decentralized decision-making structures in law enforcement agencies (such as community policing models) clearly offers valuable opportunities for control and influence to be devolved down to the operational level (Fleming and Lafferty, 2000; Morash et al., 2006). Although there is evidence that this is occurring in many policing agencies throughout the Western world, there are still doubts over the adequacy of the control held by operational staff, particularly in countries where governments and communities are exercising greater control over budgets and core agency functions (Brunetto and Farr-Wharton, 2005). Tensions between internal and external sources of control therefore warrant further attention from practitioners and researchers. Specifically, there is a need to investigate how agencies can provide their front-line staff with greater parity between responsibility and authority, while also enabling external stakeholders a genuine say in how their communities are policed.

The finding that heavier workloads were associated with higher levels of OCB-I was contrary to earlier expectations and there are two possible explanations for this association. The first is that the positive association between workloads and OCB-I is merely reflecting the tendency for employees with higher OCB-I scores (who, by definition, are more likely to take on additional tasks) to also have increased workloads. The second explanation is consistent with the dynamics of action regulation (Frese and Zaph, 1994) and implies that time pressures and demanding work schedules actually promote citizenship behaviors as a way of enabling employees to achieve performance objectives (Fritz and Sonnentag, 2009). Helping a new work colleague, listening to co-workers’ worries, and other pro-social behaviors are a way of enhancing the unit’s overall capacity for overcoming obstacles and achieving either personal or unit-level goals. In many ways, the latter explanation is counter to the dominant job stress and social exchange theories – where workers withdraw pro-social behaviors either out of fatigue or perceived workload inequities. The action regulation perspective also creates a dilemma for unit command. While the results involving OCB-I indicate that higher workloads would ultimately benefit the organization, the psychological distress findings strongly suggest that heavier workloads and time pressures would be counter-productive in the longer-term. Further research addressing the relationship between job demands and citizenship behaviors is therefore necessary to clarify how supervisors should manage employee workloads.

4.3 Limitations
The limitations that need to be kept in mind when assessing the results of the present study include the study sample (one region within a large Australian-based policing organization), the cross-sectional study design and the reliance on the subjective views of the participants. Longitudinal research involving several policing organizations and incorporating more objective outcome measures (e.g. performance records) would help address these limitations. The need for future research to incorporate more objective measures should not diminish the validity of results involving self-report scales, as research has identified strong correlations between subjective and objective measures of working conditions (e.g. Spector, 1992). Instead, the objective assessments of employee outcomes would be particularly valuable in identifying the breadth of attitudes and behaviors that are influenced by the job characteristics and social exchange variables within policing context.

4.4 Conclusion

Despite the overall lack of support for the social exchange variables in the current study, there were signs that organizational justice may contribute to the stress experienced by sworn policing personnel. This was one of the first studies to examine the injustice-assessor concept among police officers and the close association between interpersonal justice and psychological distress suggests that this variable, at least, should be taken into account in future police stress investigations. The success of the job characteristic variables in predicting the stress-related outcomes supports previous research in this area and indicates that demand, control and support may offer valuable avenues for both reducing the levels of distress among officers while also enhancing their citizenship behaviors.

<table>
<thead>
<tr>
<th>Variable</th>
<th>Mean</th>
<th>SD</th>
<th>1</th>
<th>2</th>
<th>3</th>
<th>4</th>
<th>5</th>
<th>6</th>
<th>7</th>
<th>8</th>
<th>9</th>
<th>10</th>
<th>11</th>
<th>12</th>
<th>13</th>
</tr>
</thead>
<tbody>
<tr>
<td>1. Psychological distress</td>
<td>16.46</td>
<td>6.94</td>
<td>0.94</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>2. SBP</td>
<td>4.35</td>
<td>0.07</td>
<td>0.68</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>3. OCB</td>
<td>39.40</td>
<td>5.09</td>
<td>0.43</td>
<td>0.27</td>
<td>0.00</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>4. OCB-O</td>
<td>41.45</td>
<td>4.81</td>
<td>0.16</td>
<td>0.42</td>
<td>0.03</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>5. Job control</td>
<td>44.19</td>
<td>4.44</td>
<td>0.32</td>
<td>0.43</td>
<td>0.04</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>6. Workload</td>
<td>41.43</td>
<td>6.37</td>
<td>0.12</td>
<td>0.28</td>
<td>0.01</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>7. Support (work)</td>
<td>39.03</td>
<td>10.66</td>
<td>0.32</td>
<td>0.29</td>
<td>0.07</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>8. Support (non-work)</td>
<td>50.88</td>
<td>10.05</td>
<td>0.27</td>
<td>0.14</td>
<td>0.13</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>9. PC</td>
<td>14.28</td>
<td>4.30</td>
<td>0.23</td>
<td>0.02</td>
<td>0.11</td>
<td>0.06</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>10. Procedural fairness</td>
<td>16.55</td>
<td>5.89</td>
<td>0.39</td>
<td>0.06</td>
<td>0.16</td>
<td>0.29</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>11. Distributive fairness</td>
<td>8.08</td>
<td>3.89</td>
<td>0.14</td>
<td>0.08</td>
<td>0.01</td>
<td>0.13</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>12. Interpersonal fairness</td>
<td>13.92</td>
<td>3.51</td>
<td>0.25</td>
<td>0.06</td>
<td>0.22</td>
<td>0.32</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>13. Informational fairness</td>
<td>14.82</td>
<td>4.83</td>
<td>0.22</td>
<td>0.00</td>
<td>0.02</td>
<td>0.16</td>
<td>0.17</td>
<td>0.41</td>
<td>0.35</td>
<td>0.45</td>
<td>0.57</td>
<td>0.37</td>
<td>0.68</td>
<td></td>
<td></td>
</tr>
</tbody>
</table>

Notes: Scale reliabilities are shown in parentheses; *p < 0.05; **p < 0.01

Table I: Means, standard deviations, reliabilities and correlations among study variables
Table II
Summary of hierarchical regression analysis for variables predicting psychological distress

<table>
<thead>
<tr>
<th>Step</th>
<th>Variable</th>
<th>B</th>
<th>SE B</th>
<th>β</th>
<th>Progressive R² adjusted (%)</th>
</tr>
</thead>
<tbody>
<tr>
<td>1</td>
<td>Job control</td>
<td>-0.19</td>
<td>0.07</td>
<td>-0.12**</td>
<td></td>
</tr>
<tr>
<td></td>
<td>Workload</td>
<td>0.19</td>
<td>0.05</td>
<td>0.18***</td>
<td></td>
</tr>
<tr>
<td></td>
<td>Support at work</td>
<td>-0.08</td>
<td>0.03</td>
<td>-0.12</td>
<td></td>
</tr>
<tr>
<td></td>
<td>Support outside work</td>
<td>-0.15</td>
<td>0.03</td>
<td>-0.23***</td>
<td>18.2</td>
</tr>
<tr>
<td>2</td>
<td>PC fulfillment</td>
<td>-0.08</td>
<td>0.08</td>
<td>-0.05</td>
<td>18.4</td>
</tr>
<tr>
<td>3</td>
<td>Procedural fairness</td>
<td>0.00</td>
<td>0.07</td>
<td>0.00</td>
<td></td>
</tr>
<tr>
<td></td>
<td>Distributive fairness</td>
<td>0.08</td>
<td>0.09</td>
<td>0.04</td>
<td></td>
</tr>
<tr>
<td></td>
<td>Interpersonal fairness</td>
<td>-0.53</td>
<td>0.12</td>
<td>-0.17**</td>
<td></td>
</tr>
<tr>
<td></td>
<td>Informational fairness</td>
<td>0.01</td>
<td>0.09</td>
<td>0.01</td>
<td>19.7</td>
</tr>
</tbody>
</table>

Notes: *p < 0.05; **p < 0.01; ***p < 0.001

Table II Summary of hierarchical regression analysis for variables predicting psychological distress

Table III
Summary of hierarchical regression analysis for variables predicting psychological distress

<table>
<thead>
<tr>
<th>Step</th>
<th>Variable</th>
<th>B</th>
<th>SE B</th>
<th>β</th>
<th>Progressive R² adjusted (%)</th>
</tr>
</thead>
<tbody>
<tr>
<td>1</td>
<td>Job control</td>
<td>0.16</td>
<td>0.05</td>
<td>0.14*</td>
<td></td>
</tr>
<tr>
<td></td>
<td>Workload</td>
<td>0.19</td>
<td>0.04</td>
<td>0.24**</td>
<td></td>
</tr>
<tr>
<td></td>
<td>Support at work</td>
<td>0.09</td>
<td>0.03</td>
<td>0.18*</td>
<td></td>
</tr>
<tr>
<td></td>
<td>Support outside work</td>
<td>0.04</td>
<td>0.02</td>
<td>0.08</td>
<td>13.3</td>
</tr>
<tr>
<td>2</td>
<td>PC fulfillment</td>
<td>0.03</td>
<td>0.06</td>
<td>0.02</td>
<td>13.1</td>
</tr>
<tr>
<td>3</td>
<td>Procedural fairness</td>
<td>-0.06</td>
<td>0.05</td>
<td>-0.06</td>
<td></td>
</tr>
<tr>
<td></td>
<td>Distributive fairness</td>
<td>-0.10</td>
<td>0.07</td>
<td>-0.08</td>
<td></td>
</tr>
<tr>
<td></td>
<td>Interpersonal fairness</td>
<td>0.12</td>
<td>0.09</td>
<td>0.08</td>
<td></td>
</tr>
<tr>
<td></td>
<td>Informational fairness</td>
<td>-0.04</td>
<td>0.07</td>
<td>-0.04</td>
<td>13.8</td>
</tr>
</tbody>
</table>

Table III Summary of hierarchical regression analysis for variables predicting psychological distress

References


SPSS (2004), SPSS Advanced Statistics 12.0.1, SPSS, Chicago, IL.


About the authors

A.J. Noblet is currently undertaking research in the areas of organizational behavior, organizational health and occupational stress. He has provided research and consultancy services to a range of private and public-sector organizations and specializes in undertaking
employee attitude surveys, stress audits and strategy development work. A.J. Noblet is the corresponding author and can be contacted at: andrew.noblet@deakin.edu.au

J.J. Rodwell has a strong research background including having been the Associate Dean of Research at the Macquarie Graduate School of Management and currently holding a professorial position in management at Deakin. His current research focus is on employee-level issues such as work stress in large organizations, with an aim toward making healthier, more productive workplaces and preventing employee turnover.

A.F. Allisey is currently completing a PhD in Organizational Behavior. Her thesis is focused on the influence of effort-reward imbalance at work and personality on employee wellbeing and general health.