

The nature, causes and consequences of harm in emotionally-demanding occupations

Prepared by **Birkbeck College University of London**
for the Health and Safety Executive 2008

The nature, causes and consequences of harm in emotionally-demanding occupations

Professor Rob B Briner BSc, MPhil, PhD
Dr Sarah Poppleton MA, MSc, PhD
Dr Sarah Owens BA, PhD
Dr Tina Kiefer lic phil, Dr phil

Department of Organisational Psychology
Birkbeck College
University of London
London WC1E 7HX

Traditional approaches to understanding psychosocial job characteristics and well-being have been quite general in that they explore links between general job characteristics such as workload and control on workers in many different sorts of occupations. One example of a more specific approach can be found in research into emotional labour - the requirement to regulate both feelings and the expression of feelings for organizational goals. Early research into emotional labour focused on customer service workers (CSW) but has more recently also considered human service workers (HSW) such as nurses and social workers. A more specific approach to thinking about the outcomes of demanding psychosocial job characteristics can be found in research on burnout which is thought to have three elements: emotional exhaustion, depersonalization (also labelled cynicism), and (low) accomplishment (also called professional efficacy). Much recent research has started to explore the links between emotional demands and burnout. The main aim of this project is therefore to explore the nature of such links through undertaking three distinct tasks. The first is a literature review of evidence and theory while the second two tasks comprise two empirical studies examining several key issues in burnout research.

This report and the work it describes were funded by the Health and Safety Executive (HSE). Its contents, including any opinions and/or conclusions expressed, are those of the authors alone and do not necessarily reflect HSE policy.

© Crown copyright 2008

First published 2008

All rights reserved. No part of this publication may be reproduced, stored in a retrieval system, or transmitted in any form or by any means (electronic, mechanical, photocopying, recording or otherwise) without the prior written permission of the copyright owner.

Applications for reproduction should be made in writing to:
Licensing Division, Her Majesty's Stationery Office,
St Clements House, 2-16 Colegate, Norwich NR3 1BQ
or by e-mail to hmsolicensing@cabinet-office.x.gsi.gov.uk

ACKNOWLEDGEMENTS

The authors would like to thank all the organizations and participants who gave their time to share their experiences of emotional labour with us. We are indebted to Gabriele Woelfle who prepared the final version of this report. We would also like to thank Peter Kelly and Kevin Mantle from HSE for their guidance and support throughout this project.

Contents

Executive summary	ix
Background	ix
Literature review	ix
Study 1: Questionnaire survey	ix
Study 2: Daily diaries and interviews	x
Conclusions and recommendations	xi
1 Introduction	1
1.1 Rationale and background	1
1.1.1 Emotional labour	1
1.1.2 Emotions at work	2
1.1.3 Burnout	2
1.2 Objectives and research questions	3
1.2.1 Literature review	3
1.2.2 Empirical work	3
2 Literature review	4
2.1 Introduction and overview	4
2.2 Correlates and causes of burnout	4
2.2.1 Demographics	4
2.2.2 Occupation	6
2.2.3 Personality	7
2.2.4 Traditional job stressors	9
2.2.5 Summary	13
2.3 Burnout process	14
2.3.1 Introduction	14
2.3.2 Sequential order of the three burnout dimensions	14
2.3.3 Other research into the processes underlying burnout	16
2.3.4 Summary and conclusion	18
2.4 Emotional labour and burnout in customer service and human service work	19
2.4.1 Introduction	19
2.4.2 Emotional labour	19
2.4.3 Emotional demands of customer service and human service work	21
2.4.4 Summary	23
2.5 Relationship between emotional demands and burnout in customer service workers and human service workers	23
2.5.1 Introduction	23
2.5.2 Customer contact and burnout	23
2.5.3 Customer aggression	24
2.5.4 Relationship between emotional labour and burnout	25
2.5.5 Summary and conclusions	29
2.6 Burnout interventions	29
2.6.1 Introduction	29
2.6.2 Individual level burnout interventions	30
2.6.3 Interventions at the individual-organizational interface	30
2.6.4 Organizational-level interventions	31
2.6.5 Burnout workshops	32
2.6.6 Concluding summary	32
2.7 Summary and conclusions	33
3 Study 1: Questionnaire survey	35
3.1 Purpose of study 1 and main research questions	35
3.2 Variables	35
3.2.1 Person characteristics	35
3.2.2 Job characteristics	36
3.2.3 Emotional demands	36
3.2.4 Outcome variables	36

3.3	Describing the three human service work groups	38
3.3.1	Recruitment of the sample and the three main human service work groups	38
3.3.2	Person Factors: How can the main groups be characterized?	38
3.3.3	How can their jobs be characterized?	40
3.3.4	Summary	42
3.4	Research question 1: What is the level of burnout and well-being in the key human service occupations in the UK?	43
3.4.1	RQ1a: How do these levels of burnout and well-being compare to other samples?	43
3.4.2	RQ1b: How do the levels of burnout and well-being compare across different human service occupations?	44
3.4.3	Summary and conclusion	44
3.5	Research question 2: Which key variables are associated with burnout and well-being?	45
3.5.1	RQ2a: Which key variables are associated with burnout and well-being?	45
3.5.2	Brief summary	46
3.5.3	RQ2b: Are different key variables associated with burnout and well-being in different human service occupations?	47
3.5.4	Summary	49
3.6	Summary and conclusion	49
4	Study 2: Daily diaries and interviews	51
4.1	Introduction and overview	51
4.1.1	Method and design	51
4.1.2	Data analysis	52
4.1.3	Brief overview of results	52
4.2	Events engendering positive emotions	55
4.2.1	Enjoyable client contact	55
4.2.2	Meeting or interactions with clients which had a positive outcome	55
4.2.3	Client contact in which the client gave positive feedback	56
4.2.4	Other types of positive client interaction	56
4.2.5	Other types of positive, work-related event	56
4.2.6	Positive non-work events	57
4.2.7	Concluding summary	57
4.3	Events engendering negative emotions	57
4.3.1	An interaction with a difficult client	57
4.3.2	A client who is going through a negative experience	59
4.3.3	Verbal abuse	61
4.3.4	Paperwork or “Admin”	62
4.3.5	Problems with the working environment	63
4.3.6	A colleague or subordinate’s handling of a situation with a client	64
4.3.7	Difficult interactions with colleagues or third parties	66
4.3.8	Role of negative non-work events	67
4.3.9	Concluding Summary	67
4.4	Emotional demands	68
4.4.1	Emotionally demanding situations	68
4.4.2	Emotion work in particular events	71
4.4.3	Concluding Summary	77
4.5	Stress and burnout	78
4.5.1	Diarists’ thoughts on burnout	78
4.5.2	Stress and burnout-type emotions in human service work	79
4.5.3	Concluding summary	84
4.6	Additional findings	84
4.6.1	Detrimental consequences of human service work	84
4.6.2	Buffers and coping	85
4.6.3	Concluding summary	88
4.7	Summary of the qualitative results	89
5	Conclusions and recommendations	91
5.1	Literature review	91

5.2	Study 1: Questionnaire survey	93
5.3	Study 2: daily diaries and interviews	94
5.4	Recommendations	95
5.4.1	For research.....	95
5.4.2	For practice	96
6	Appendices.....	97
6.1	Appendix 1: Measures used in the questionnaire survey	97
6.2	Appendix 2 : Daily diary	102
6.3	Appendix 3: Interview schedule topic guide	108
6.4	Appendix 4: The diary coding template	112
6.5	Appendix 5: Additional interview codes	120
7	References.....	124

EXECUTIVE SUMMARY

BACKGROUND

Traditional approaches to understanding psychosocial job characteristics and well-being have been quite general in that they explore links between general job characteristics such as workload and control on workers in many different sorts of occupations. One example of a more specific approach can be found in research into emotional labour – the requirement to regulate both feelings and the expression of feelings for organizational goals. Early research into emotional labour focused on customer service workers (CSW) but has more recently also considered human service workers (HSW) such as nurses and social workers. A more specific approach to thinking about the outcomes of demanding psychosocial job characteristics can be found in research on burnout which is thought to have three elements: emotional exhaustion, depersonalization (also labelled cynicism), and (low) accomplishment (also called professional efficacy). Much recent research has started to explore the links between emotional demands and burnout. The main aim of this project is therefore to explore the nature of such links through undertaking three distinct tasks. The first is a literature review of evidence and theory while the second two tasks comprise two empirical studies examining several key issues in burnout research.

LITERATURE REVIEW

The literature review examined the following six areas:

1. The main correlates and causes of burnout in human service work
2. Traditional work stressors that have been found to relate to burnout (and related outcomes)
3. The pathways through which these stressors lead to these end points
4. The extent to which and how the emotional demands of human service occupations are different from emotional demands of other related and un-related occupations
5. The relationship between emotional demands and burnout (and related outcomes) in customer service work and human service work
6. Interventions which may ameliorate the impacts of such emotional demands on outcomes

As the vast proportion of studies in this field is cross-sectional it was in nearly all cases only possible to examine associations. Most demographic and occupational factors (area 1) correlate quite inconsistently with burnout though the few studies which examine personality do find consistent relationships between negative affectivity and burnout. Some traditional work stressors (area 2), such as role ambiguity, job demands, and social support have shown reasonably consistent associations with burnout. While there is a general belief that burnout occurs in a sequence of stages (area 3), such that its different elements appear in a particular order, the available evidence does not support any specific sequence. Other approaches to burnout processes emphasize intra-personal processes such as emotion regulation. The nature of emotional demands (area 4) does seem to be different in HSW and CSW probably due to the different motivations behind and involvement in the emotional labour required. While emotional demands such as the quantity of customer interaction (area 5) do not seem to relate to burnout other demands, such as surface acting (or emotional dissonance), do seem to be associated. While in some senses HSW have the most emotionally demanding jobs they also have the lowest levels of emotional dissonance. There is very little research on burnout interventions (area 6) but that which has been done suggests some of these interventions can be effective.

STUDY 1: QUESTIONNAIRE SURVEY

A survey of 398 participants (around 40% response rate) was undertaken. The sample had three sub groups: CSW, mainly call centre staff (N=110); HSW-Other, mainly human service workers, such as social and care workers, but excluding teachers (N=184); and, Teachers, mainly primary school heads (M=104). The following research questions and sub-questions were addressed:

1. What is the level of burnout and well-being in key human service occupations in the UK?
 - RQ1a: How do these levels of burnout and well-being compare to other samples?
 - RQ1b: How do the levels of burnout and well-being compare across different human service occupations?
2. Which key variables are associated with burnout and well-being?
 - RQ2a: Which key variables are associated with burnout and well-being?
 - RQ2b: Are different key variables associated with burnout and well-being in different human service occupations?

In order to do this measures of person characteristics (e.g. demographics and personality), traditional job characteristics (e.g. role conflict and autonomy), emotional demands (e.g. surface acting and requirement to display positive emotions), and well-being (burnout and GHQ12).

The levels of burnout and GHQ12 scores for the sample as a whole were broadly similar to other national and international norms. CSW show the highest levels of cynicism (referred to as depersonalization in the literature review), the lowest levels of professional efficacy (referred to as accomplishment in the literature review) but not the highest levels of exhaustion (which was found in Teachers). There were no differences across the groups in GHQ12 scores.

After controlling for person characteristics and traditional job demands (which accounted for large proportions of the variance), emotional demands did account for significant though small proportions of variance in the three burnout dimensions but not GHQ12. The pattern of relationships between specific emotional demands and burnout was different across the three groups. As the study was cross-sectional no causal inferences can be made.

STUDY 2: DAILY DIARIES AND INTERVIEWS

This study addressed the following two research questions:

1. What kinds of events and situations at work are found to be particularly emotionally demanding at work and in what ways?
2. What are the pathways and mechanisms through which specific emotional demands lead to particular kinds of psychological health outcomes?

24 participants (including 10 head teachers, 4 social workers and assistants, and 3 care workers) completed daily diaries about events at work and at home for two consecutive weeks and the majority of participants took part in a follow-up face-to-face or telephone interview. The diaries contained a checklist of emotions and a series of questions asking for descriptions of positive and negative events and during the interviews participants were asked for further details about the events they had described.

More events engendering positive than negative emotions were recorded in the diaries. The types of positive event recorded included positive meetings with clients and those that had successful outcomes. Types of negative events included dealing with difficult clients and being subject to verbal abuse. However, there seemed to be particular features of negative events which help explain why they were experienced as such, including not feeling listened to in one's professional role and feeling unable to resolve a negative situation.

Emotion work was often seen as something which could be both difficult and very rewarding where the participant had felt able to turn a very negative situation into a more positive one and help resolve clients' problems. On the other hand certain types of emotional labour were viewed only as difficult such as interactions where participants felt they had to suppress anger or were unable to voice their opinion. Participants who appeared to be particularly distressed also reported emotionally demanding situations at home as well as at work.

CONCLUSIONS AND RECOMMENDATIONS

Literature review: Most research about emotional labour and burnout is cross-sectional meaning that is not possible to make causal inferences. A number of features of burnout, including its inconsistent relationships with person and occupational factors and the mixed evidence about how it develops call into question aspects of its validity and reliability as a construct. Researchers have different views about how emotional labour is best construed and the nature of the relationship between emotional labour and burnout appears to differ across HSW and CSW. There are so few studies of burnout interventions it is difficult to draw any meaningful conclusions.

Study 1: Though scores on burnout and GHQ12 were not different from available norms for similar groups the three groups differed in a number of important respects including the level of different aspects of emotional labour reported and levels of different dimensions of burnout. Emotional demands were found to be related to burnout (after controlling for person factors and traditional job stressors) but the patterning of the relationships varied across the three groups again demonstrating the importance of contextual factors in understanding emotional labour.

Study 2: The double-edged nature of emotional labour for participants provided important suggestions for why it may be the case that HSW report higher levels of emotional labour but not necessarily higher burnout. Some light was also shed on why and how negative interactions with clients may be experienced as harmful. While all job characteristics depend to some extent on their context the results suggest that emotional labour plays out very differently depending not only on context but the specific nature of the events and episodes encountered by employees.

Recommendations for research and practice: Undertaking more longitudinal and less cross-sectional research is essential for understanding links between emotional labour and burnout. Future research should focus on theoretically unpacking both burnout and emotional labour in order to develop clearer and more elaborate constructs and find ways of incorporating context more fully. Given the current state of knowledge it is difficult to make sound practical suggestions. However, the available evidence suggests that emotional labour cannot be managed in the same way as traditional 'stressors' and that practitioners should start to engage more with the idea of emotional labour when looking at how work affects well-being.

1 INTRODUCTION

1.1 RATIONALE AND BACKGROUND

Significant advances in our understanding of the relationships between psychosocial work conditions and well-being have been made through examining the effects of general job characteristics, such as workload and control, on workers in a wide range of workplaces and occupations. However, it also seems likely that there are important differences in workplaces and occupations which mean that the nature, meaning, and effects of these general job conditions will depend on specific organizational and job contexts. While it is useful therefore, up to a point, to look at these general job characteristics and their general effects on workers it is also important to look at more specific job characteristics and the specific effects they may have on worker well-being. For example, particular kinds of workload may have particular effects on specific aspects of well-being.

One example of a more specific type of workload is emotional work demands. While work has always demanded the use of physical and cognitive (or mental) resources it can also require the use of emotional resources. This sort of work demand has been traditionally associated with those whose jobs require them to deal with the pain and suffering and needs of others such as nurses, doctors, other medical staff and social workers. Collectively, such work is sometimes referred to as human service work. More recently, however, it has also been identified in customer service work – jobs in which effective performance requires the display of particular emotions or the handling of the emotions in those with whom they are paid to interact. Though, as will be mentioned later, this distinction is not always a clear one.

HSE's 2002 *Strategic Research Outlook* identified human service occupations, such as nursing, teaching and social work, as an important area for further investigation in part because of the specific nature and high level of emotional demands placed on those in such occupations. It is worth noting that with the expansion of the service sector over the past few decades the number of people now employed in jobs that have some element of emotional demands, such as those in call centres, has increased dramatically. In the same document, it is also noted that: "HSE is particularly interested in innovative thinking to take forward the identified issues rather than full technical solutions" (paragraph 26, p.5).

The general purpose of this research is therefore to explore the nature and effects of emotional demands at work. Before setting out the research objectives and research questions three key ideas that form the background to this research will be discussed briefly.

1.1.1 Emotional labour

As indicated earlier, the physical and cognitive demands of work are not the only resources required in some jobs and occupations. Hochschild (1983) was the first to note that some jobs require workers to also use their emotional resources in displaying or withholding particular emotions. Her initial research focused on air attendants but since that time emotional labour has been investigated in a wide range of other occupations such as nurses, counsellors, supermarket cashiers, hairdressers, debt collectors, social workers, and criminal interrogators. What all these jobs have in common is that workers must display specific emotions at particular times in order to complete job tasks effectively.

A central mechanism through which emotional labour is considered to be harmful to well-being is because of the possible discrepancy between displayed and felt emotions. A nurse, for example, may be expected to display concern towards patients. If the nurse actually feels little concern but nonetheless are still required to display such feelings this creates a discrepancy which, it is argued, is very effortful to maintain and ultimately damaging to well-being. Clearly, this is more likely to occur when a person has been in an occupation for some time. The disturbing nature of such emotional

discrepancies may be particularly marked in occupations where there is a strong vocational element, such as teaching and nursing, as workers in these professions are more likely to believe it is important to actually feel the emotions they should display and to not 'fake it'. It is important to note that many jobs which involve intense emotional labour also have this strong vocational draw.

As will be discussed later, the concept of emotional labour is central to developing an understanding of how emotional demands may affect worker well-being.

1.1.2 Emotions at work

In parallel to the shift in thinking about demands of work from the physical and cognitive to the emotional there has been a move towards considering the emotional aspects of workplaces, organizations and jobs. The past decade has seen a very significant increase in research exploring the causes and consequences of specific emotions at work (e.g. Briner, 1999; Briner & Totterdell, 2002). In part this is because the emotional nature and demands of work have been largely ignored but also because existing ideas such as job satisfaction and job stress are viewed by some as too general and unfocused to now be helpful.

One lesson from the body of work on emotions in organizations for the current research is the importance of specificity and considering the ways in which specific kinds of work events and work demands are likely to lead to particular kinds of emotional reactions both in the shorter and longer-term. In other words, rather than thinking of stressful job conditions, in general, as having many different kinds of possible outcomes it may be more productive to view these different outcomes as being caused by more specific and different kinds of emotional states such as anger, fatigue, anxiety, or sadness.

1.1.3 Burnout

One example of a specific type of outcome can be found in the ideas of burnout. As the term implies, the notion is that workers in jobs with high levels of emotional demands eventually lose the ability or energy to meet the demands of the job. For several decades, burnout research has examined its causes and also more recently how it may be prevented (Maslach, Schaufeli & Leiter, 2001). Most definitions of burnout suggest it has three components: Emotional exhaustion, lack of personal accomplishment and depersonalization. Most of the literature reviewed in this report refers to these three components. Note, however, that in Study 1 we had to use a scale by Maslach and colleagues that uses a slightly different terminology, namely emotional exhaustion, cynicism (instead of depersonalization) and professional efficacy (instead of accomplishment).

While there are debates concerning the precise nature of burnout and how it can be assessed there is broad agreement that it is the emotional demands of human service work which may, over a number of years or decades cause burnout or burnout-like outcomes. It is also considered that other outcomes such as early retirement, absence, physical ill-health, and changing careers may be involved.

Although clearly related to human service occupations and to burnout there has thus far been relatively little attempt to link these two areas of research together although initial work doing so has proved fruitful (e.g. Brotheridge & Grandey, 2002).

The current research is therefore taking place in the context of a growing body of work into emotional labour, emotions at work more generally, and the burnout as a specific consequence of emotional demanding work.

1.2 OBJECTIVES AND RESEARCH QUESTIONS

As already stated, the main general purpose of the research is to examine the nature and effects of emotional demands at work. In order to do this, the research has three different but complementary elements, a literature review and two empirical studies, which are described below.

1.2.1 Literature review

Compared to research on traditional psychosocial job characteristics that are thought to be harmful such as workload or control, work on emotional demands is relatively new though expanding rapidly. For this reason the first element of the research aims to conduct a literature review in order to identify existing thinking and evidence concerning the following five issues, some of which were adapted directly from HSE's 2002 *Strategic Research Outlook*:

1. The main correlates and causes of burnout in human service work
2. Traditional work stressors that have been found to relate to burnout (and related outcomes)
3. The pathways through which these stressors lead to these end points
4. The extent to which and how the emotional demands of human service occupations are different from emotional demands of other related and un-related occupations
5. The relationship between emotional demands and burnout (and related outcomes) in customer service work and human service work
6. Interventions which may ameliorate the impacts of such emotional demands on outcomes

1.2.2 Empirical work

Given the general purpose of the research it is important to collect data which allows some inference to be made both about the presence and effects of emotional demands in human service workers and also about the processes through which such demands may affect well-being. It is important to note that because of the time-scales and budgets involved it has not been possible to conduct a longitudinal study of the duration required to fully explore the effects of emotional demands on well-being which are generally assumed to occur over years or even decades. However, the two studies conducted here will in combination help to at least suggest some possible causal mechanisms. It should also be noted that research in this area (which will be reviewed later), in common with other research examining the impact of psychosocial job conditions on well-being, is characterized by a dearth of studies adopting designs which permit reasonable inference of causality.

In order to explore the presence and effects of job demands a cross-sectional questionnaire study will be conducted which aims to address two main research questions:

1. What is the level of burnout and well-being in key human service occupations in the UK?
2. Which key variables are associated with burnout and well-being?

In order to understand more about processes through which emotional demands may affect well-being a qualitative daily diary study and interviews will be conducted which address the following research questions:

3. What kinds of events and situations at work are found to be particularly emotionally demanding at work and in what ways?
4. What are the pathways and mechanisms through which specific emotional demands lead to particular kinds of psychological health outcomes?

2 LITERATURE REVIEW

2.1 INTRODUCTION AND OVERVIEW

The main aims of this literature review are to identify existing evidence and thinking around the following six issues:

1. The main correlates and causes of burnout in human service work
2. Traditional work stressors that have been found to relate to burnout (and related outcomes)
3. The pathways through which these stressors lead to these end points
4. The extent to which and how the emotional demands of human service occupations are different from emotional demands of other related and un-related occupations
5. The relationship between emotional demands and burnout (and related outcomes) in customer service work and human service work
6. Interventions which may ameliorate the impacts of such emotional demands on outcomes

The aim of the review is not, therefore, to generate research questions for the two empirical studies reported later but, rather, to critically review the available theory and evidence around a number of key issues within burnout research. However, the focus of the two empirical studies through to some extent exploratory was also guided by the findings of the literature review.

While this will be discussed in more detail later, it is important to note again at this point that the term human service work refers here to any worker whose job involves the day-to-day care of individuals in need (e.g. teachers, nurses, social workers). Where relevant, this review will also consider customer service work where employee emotional display and handling the emotions of customers and clients are important parts of the job. However, as this review focuses largely on burnout as an outcome and the processes through which burnout may occur, the vast majority of material in the review is drawn from research conducted with human service workers. This is simply because burnout, as a consequence of emotional labour, has been much more commonly studied in human service rather than customer service workers as it assumed that human service occupations will experience the greatest levels of emotional demands and hence the greatest levels of burnout.

2.2 CORRELATES AND CAUSES OF BURNOUT

The purpose of this section is to address the first and second literature review issues. Sections 2.2.1 to 2.2.3 examine the risk factors that are associated with burnout and Section 2.2.4 examines the relationships between traditional job stressors and burnout. It should be noted that, in common with other areas of research about the influence of personal and work factors on work-related well being, almost all the research is cross-sectional and hence it is not possible in most cases to draw any causal inferences. Where the study under discussion is longitudinal this will be mentioned.

Here we organize the correlates and causes of burnout under four main headings: Demographics, occupation, personality, and traditional job stressors.

2.2.1 Demographics

Gender

The relationship between gender and burnout is not clear-cut. Overall, there do not seem to be reliable differences in burnout levels between men and women, and several studies have found no gender difference across any of the three burnout dimensions (e.g. Ben-Zur & Yagil, 2005; Dormann & Zapf, 2004; Kop, Euwema & Schaufeli, 1999; Rafferty, Friend & Landsbergis, 2001).

Where differences have been found, they tend to suggest that the genders are differentially susceptible to different dimensions of burnout, specifically that women may be more prone to emotional exhaustion and men more prone to depersonalization. This pattern was found in an early study by Maslach and Jackson (1981), and has been supported by several other studies. For example, Johnson (1991) found that female police officers scored relatively high on emotional exhaustion, whereas males scored relatively high on depersonalization, and Lewig and Dollard (2003) found being female was significantly associated with emotional exhaustion in a sample of call centre workers. Deery, Iverson and Walsh (2002) also found that being female was associated with higher emotional exhaustion in their bivariate analysis, although this relationship was not significant in their multivariate structural equation model in which numerous other variables were taken into account. In partial support of these gender differences, Dollard, Winefield, Winefield and de Jonge (2000) found depersonalization was associated with being male, but that gender was unrelated to emotional exhaustion and personal accomplishment.

However, the empirical data are mixed. A good number of studies have reported no gender difference in emotional exhaustion (e.g. de Jonge & Schaufeli, 1998; de Rijk, LeBlanc, Schaufeli & de Jonge, 1998; Dickter & Sin, 2004; Grandey, Giebels & Janssen, 2005; Holman, Chissick & Totterdell, 2002; Tummers, Landeweerd & van Merode, 2002; Van Vegchel, de Jonge, Bakker & Schaufeli, 2002) and, as detailed above, some studies have found no gender differences in any of the burnout dimensions. Occasionally reverse findings are reported, for example, Price and Spence (1994) found higher levels of emotional exhaustion amongst men in their sample of drug and alcohol workers.

Where gender differences are found to exist, it is possible that this may reflect a confounding of gender and occupation. It has been suggested that predominantly female jobs, such as nursing, suffer more from burnout, and that predominantly male occupations, such as policing, are more prone to depersonalization (Maslach & Jackson, 1981; Maslach, Schaufeli & Leiter, 2001).

Age

In many of the early studies, younger employees consistently reported higher levels of burnout (e.g. Maslach & Jackson, 1981; 1985) and the demographic norms reported in the Maslach Burnout Inventory Manual (Maslach, Jackson & Leiter, 1996) show a clear gradient of burnout decreasing with age across all three dimensions. However, more recently there have been mixed findings, and several studies have found no relationship between age and burnout.

Consistent with the early pattern of findings, Zohar (1997) and Dollard et al (2000) found that age was significantly negatively related to all three burnout dimensions and Carson, Maal, Roche, Fagin, De Villiers, O'Malley, Brown, Leary & Holloway (1999) found their low burnout group was significantly older than their high burnout group in a sample of mental health nurses. Zellars and Perrewé (2001) found age was negatively associated with depersonalization, but not significantly related to emotional exhaustion or diminished personal accomplishment in nurses, whereas Cranswick (1997) reported that emotional exhaustion, but neither of the other burnout dimensions, was significantly negatively associated with age in a sample of rehabilitation workers. Complicating matters still further, Dormann and Zapf (2004) found age was unrelated to emotional exhaustion, but negatively related to depersonalization and positively related to personal accomplishment in a sample of customer service workers, whereas Rafferty et al (2001) found that age was negatively associated with both emotional exhaustion and depersonalization, but unrelated to personal accomplishment. Tang, Au, Schwarzer and Schmitz (2001) reported two studies: in the first study age was significantly negatively associated with emotional exhaustion in teachers, but in the second no relationship between age and burnout was found.

A couple of other studies have also found no relationship between age and any of the three burnout dimensions (e.g. Ben-Zur & Yagil, 2005; Payne, 2001) and several studies have focused only on the emotional exhaustion dimension of burnout and have found this to be unrelated to age (e.g. De Jonge & Schaufeli, 1998; Deery, Iverson & Walsh, 2002; Giebels & Janssen, 2005; Holman et al, 2002; Van Vegchel et al, 2002; Tummers et al, 2002). De Rijk et al (1998) measured emotional exhaustion and depersonalization and found no relationship with age for either variable.

As can be seen from this brief review, although age is sometimes cited as one of the variables most consistently related to burnout (e.g. Maslach et al, 2001), there is actually very little consistency in the empirical findings. Having said this, where significant relationships between age and burnout are reported, they almost exclusively describe an inverse relationship. By implication, burnout is a process that unfolds over time and hence it is curious that where relationships are found between age and burnout they tend to show that burnout decreases rather than increases with age. However, it should also be noted that as most of these studies are cross-sectional it is not possible to infer any causal relationship. It may be, for example, that those who report most burnout actually leave their jobs and hence those who remain will tend to have lower levels of burnout (see below for a discussion of 'survival bias')

Tenure

A number of studies have investigated the relationship between job tenure and burnout and the findings have been mixed, with positive associations, negative associations and a lack of association all reported.

In studies carried out over the past ten years, the most common finding appears to be that burnout increases with tenure. Zohar (1997) found tenure was significantly positively associated with all three burnout dimensions, and emotional exhaustion has been found to be positively associated with tenure by Deery et al (2002), Kop et al (1999) and Lewig and Dollard (2003). Alexander and Klein (2001) found that sense of accomplishment diminished with increased length of service in ambulance workers, but found no association between tenure and emotional exhaustion or depersonalization.

Few recent studies have found an inverse association between tenure and burnout. However, Holman et al (2002) found that tenure was significantly negatively related to emotional exhaustion, and Tang et al (2001) reported two studies, one of which found that emotional exhaustion was lower amongst more experienced teachers, and the other found no association.

Fujiwara, Tsukishima, Tsutsumi, Kawakami and Kishi (2003) and Omdahl & O'Donnell (1999) both found that number of years of experience were unrelated to all three burnout dimensions in home care workers and nurses respectively, and Giebels and Janssen (2005) found no association between tenure and emotional exhaustion in a sample of social workers. De Rijk et al (1998) also found tenure was unrelated to emotional exhaustion or depersonalization in nurses.

Taken together, these results paint a somewhat confusing picture, and it would be difficult to say anything definitive about the relationship between tenure and burnout. Some commentators have described burnout as an early career problem (Maslach et al, 2001; Schaufeli & Enzmann, 1998), and suggested that this may be due to an issue of 'survival bias', where those who burn out early are likely to quit their jobs, leaving behind survivors with generally lower levels of burnout. However, this characterisation of burnout is based largely on early findings of Maslach (1982) and Pines and Aronson (1988), and does not sit so well with the more recent findings of a positive association between tenure and burnout, detailed above. It seems likely that the relationship is a complicated one: for instance, it is possible that, on the one hand, those most prone to experience burnout leave the profession early and, on the other hand, those who remain in the profession become more emotionally exhausted over time. What is really needed to understand the relationship between tenure and burnout is probably a greater understanding of the processes involved in the development of burnout.

2.2.2 Occupation

The original concept of burnout was specific to human service workers and burnout was thought to be a result of the unique demands, in terms of interpersonal interactions, specific to these kinds of jobs. However, burnout research has been conducted in a wide range of occupational settings and the results do not consistently support the idea that burnout is necessarily higher in human service workers.

Brotheridge and Grandey (2002) directly compared burnout levels in different types of occupation, looking at human service workers, service/sales employees, managers, clerical employees and physical labourers. This study did not find significant occupational differences in emotional exhaustion levels: the absolute highest value was for service/sales jobs, but this did not differ significantly from the other values. Mean levels of depersonalization were significantly higher for service/sales employees and managers than for clerical employees and physical labourers. Human service workers reported significantly *lower* levels of depersonalization than did service/sales employees, managers, and physical labourers, which was contrary to the hypothesised relationship that human service workers should experience higher levels of depersonalization. Similarly, personal accomplishment was *highest* for human service workers, significantly higher than that for service/sales employees and physical labourers. Taken together, the findings from this study did not support the hypothesis that those in human service professions or prototypical emotional labour jobs experience higher levels of burnout than managers, clerical employees, and physical labourers.

Police work is an example of an occupation which is widely assumed to be highly stressful and likely to lead to burnout, but which has been empirically found not to lead to high levels of burnout in members of the profession. Studies of police officers have generally found relatively low levels of psychological strain and burnout, although some have found relatively high levels of depersonalization (Schaufeli & Enzmann, 1998). Kop et al (1999) found the typical burnout profile of police officers seemed to comprise relatively low levels of emotional exhaustion, average levels of depersonalization, and levels of personal accomplishment slightly above average. Similarly, Hart, Wearing & Headey (1995) found police officers had less psychological distress and greater well-being than the average person, although this study did not measure burnout *per se*. A possible explanation for this pattern of results may be the existence of a selection effect, such that police officers are especially selected for their resistance to stress. In support of this hypothesis, Kop et al (1999) claim that personality inventories are often used in the selection process, and high scores on neuroticism are generally a reason to reject a candidate.

There have also been findings of surprisingly low levels of burnout in nursing and related healthcare occupations, which are generally thought to be burnout prone professions. Payne (2001) found burnout scores were generally low in hospice nurses, consistent with past studies of hospice nurses. Similarly, Carson et al (1999) found that, contrary to popular belief, burnout was not a particularly big problem in mental health nurses, with only a relatively low 5.7% falling into the high burnout group (as defined by Maslach et al (1996) burnout inventory manual). Hayter (1999) reported remarkably low levels of depersonalization in specialist HIV/AIDS community nurses with 97% of the sample scoring low on depersonalization.

On the other hand, some findings have been in line with expectations regarding the kinds of work that might lead to burnout. Reviewing a number of studies across various professions, Schaufeli and Enzmann (1998) concluded that levels of emotional exhaustion were particularly high amongst teachers. Johnson and Hunter (1997) also found high levels of emotional exhaustion in counsellors, particularly those dealing with victims of sexual assault.

Overall, the question remains as to whether human service work and/or prototypical emotional labour jobs do in fact cause high burnout, relative to other professions. Of course, levels of emotional demands differ widely within professions, and emotional demands are present in many jobs, not just those typically seen as causing burnout. Therefore, it may be more useful to look specifically at the relationship between emotional demands and burnout, rather than carrying out analysis at the occupational level.

2.2.3 Personality

The vast majority of burnout studies choose not to focus on personality variables (around 90% of studies according to both Pines (2004) and our own literature search), but those studies which do measure personality consistently find that it is a significant predictor of burnout, especially emotional exhaustion. The reasons for the neglect of personality variables in burnout research are not obvious,

but appear to be more ideological than scientific, in that researchers wish to avoid appearing to 'blame the victim'. Burisch (2002, p.2) points out that Maslach and Leiter's (1997) book *The Truth About Burnout* puts the accountability for burnout 'squarely on the shoulders of the organization', and that this is applauded by fellow burnout researcher Cary Cherniss, who agrees 'that the causes - and solutions - are to be found primarily in the organization, not the individual'. But, as Burisch (2002) points out, "this question has been astonishingly little studied" (p.2).

Unsurprisingly, the bulk of research into the relationship between personality and burnout has looked at trait affectivity, i.e. negative affectivity/neuroticism and (less commonly) positive affectivity. Studies have unanimously found that negative affectivity is significantly associated with higher levels of emotional exhaustion (Dollard et al, 2000; Grandey et al, 2004; Iverson, Olekalns & Erwin, 1998; Van Vegchel et al, 2002; Wright & Cropanzano, 1998; Zellars & Perrewé, 2001; Zohar, 1997). This association is generally fairly strong, with correlation coefficients as high as $r=0.72$ (Wright & Cropanzano, 1998), but more commonly in the range 0.40-0.50. The association between negative affectivity and the other two burnout dimensions is generally less strong but generally still significant. Zellars and Perrewé (2001), Dollard et al (2000) and Iverson et al (1998) found negative affectivity was significantly associated with all three burnout dimensions, but Zohar (1997) did not find a significant association with depersonalization, where burnout measures were completed by the employees' partners.

In terms of positive affectivity, Deery et al (2002) focused on emotional exhaustion as their burnout measure and found this to be significantly inversely associated with emotional exhaustion. Iverson et al (1998) found positive affectivity to be inversely associated with all three burnout dimensions, and Zellars and Perrewé (2001) obtained a similar result with extraversion, which is strongly related to positive affectivity.

Although the majority of studies have focused on trait affectivity as the most pertinent personality traits, a number of other personality traits have also been studied in relation to burnout. Self-efficacy has been found to be negatively related to burnout in teachers (Tang et al, 2001) and in nurses (Greenglass & Burke, 2002), and the related individual difference variable of internal locus of control has also been shown to be inversely associated with burnout (Bond & Bunce, 2003; Westman, Etzion & Danon, 2001). Type A personality has been reported as a positive predictor of burnout in teachers (Burke & Greenglass, 1995; Jamal & Baba, 2001), whereas hardiness (Alexander & Klein, 2001) and sense of coherence (Soderfeldt et al, 2000) have both been found to be negative predictors of burnout in ambulance workers and social workers respectively.

As is generally the case in this field, there is little longitudinal research to draw on. Burish (2002) investigated the relative contribution of personality (a battery of personality tests administered before starting training) and environmental factors to the development of burnout in a sample of German nurses. His results are difficult to interpret, as neither individual nor experiential variables could be linked to intra-individual change in burnout scores, measured at 7 points in time; however, inter-individual burnout scores could be explained about equally well by personality and environmental factors. Deary, Watson and Hogston (2003) also carried out a longitudinal study of burnout in nursing students, focusing on the 'Big 5' personality traits. They found that personality factors at course entry contributed significantly to the prediction of burnout. In particular, neuroticism and openness predicted emotional exhaustion, agreeableness negatively predicted depersonalization, and conscientiousness negatively predicted depersonalization and positively predicted personal accomplishment.

Overall then, there is good evidence that personality factors, especially trait affectivity, play an important role in the burnout process. As in the wider stress field, however, the exact nature of this role is potentially complex. Taking negative affectivity as an example, this may have a direct effect, such that individuals high in negative affectivity are more prone to burnout irrespective of their job experiences; it may act as a moderator, such that these individuals show stronger burnout reactions to stressful job conditions; or it may act as a biasing factor in research, by inflating self-reports of both stressful work conditions and burnout, thus producing artificially high correlations between the two.

In reality, it may be a combination of these options. Klein and Verbeke (1999) found that employees with higher emotional reactivity (in terms of autonomic feedback) were more likely to score highly on all three burnout measures, and that this relationship was even more pronounced under conditions of high job stress, supporting the moderator hypothesis. In support of the biasing hypothesis, a number of studies have found that trait affectivity is significantly associated with self-reports of stressors as well as burnout scores (e.g. Iverson et al, 1998; Grandey et al, 2004) and Dollard et al (2000) found associations between burnout and demand-control-support stressors were attenuated when trait anxiety was controlled for.

It therefore seems important that future research includes measures of personality traits in order to gain a deeper understanding of the role played by personality in the burnout process.

2.2.4 Traditional job stressors

Please note that this section deals only with traditional job stressors as causes and correlates of burnout. The effects of emotional demands arising specifically from emotional labour will be considered in a later section after a discussion of the nature of emotional labour.

Role conflict and role ambiguity

Role conflict occurs when conflicting demands are placed on employees, and role ambiguity describes a situation where employees are unclear as to what they are expected to do in order to perform their job well. Troyer, Mueller and Osinsky (2000) found that customer service jobs are particularly prone to role conflict, where employees act as the 'broker' between the organization on one side and customers on the other.

Empirical studies of the effects of role conflict and role ambiguity on burnout have generally found a significant relationship. Both Zellars and Perrewé (2001) and Koniarek and Dudek (1996) found that role conflict and role ambiguity were significantly positively correlated with all three dimensions of burnout in nurses, and Klein and Verbeke (1999) reported the same pattern of results with travelling salespeople. Greenglass, Burke and Koniarski (1997) used a combined measure of role conflict and role ambiguity, which was also significantly positively associated with all three burnout scales in a sample of teachers. Zohar (1997) used both traditional and 'hassles based' measures of role conflict and ambiguity, and found that all four of these measures correlated significantly with all three dimensions of burnout.

A few studies have focused specifically on the emotional exhaustion element of burnout. Thompson, Kirk and Brown (2005) found role ambiguity was significantly associated with emotional exhaustion in a sample of policewomen and Tummers et al (2002) found role conflict and role ambiguity were significantly positively associated with emotional exhaustion and psychosomatic health complaints amongst nurses. Barber and Iwai (1996) reported that role conflict but not role ambiguity was a significant predictor of emotional exhaustion in a sample of nurses and social workers working with elderly Alzheimer's patients, whereas Stordeur, D'hoore and Vandenberghe (2001) found role ambiguity but not role conflict predicted emotional exhaustion in nurses.

Overall then, a review of the empirical research reveals a fairly consistent association between role stressors and burnout, despite the fact that specific associations failed to reach significance in a couple of individual studies. The relationship tends to be weaker with personal accomplishment than with emotional exhaustion or depersonalization: in a meta-analysis of early studies, Lee and Ashforth (1996) reported the corrected mean correlations for role conflict as $r = .53$ (emotional exhaustion), $r = .37$ (depersonalization) and $r = -.21$ (personal accomplishment), and for role ambiguity as $r = .21$ (emotional exhaustion), $r = .34$ (depersonalization) and $r = .11$ (personal accomplishment).

However, these studies reviewed above were all cross-sectional, so care must be taken in inferring a causal relationship from stressors to burnout. A particular issue that needs to be considered is the possibility that neuroticism is acting as a third variable, producing or inflating the association between measures of stressors and strain. Few studies have measured trait affectivity, but those which have

Table 1: Correlations and scale reliability coefficients in the diagonal

	<i>Role overload</i>	<i>Control & autonomy</i>	<i>Role conflict</i>	<i>Social support</i>	<i>Surface acting</i>	<i>Deep acting</i>	<i>Display positive emotion</i>	<i>Hide Negative emotion</i>	<i>Exhaustion</i>	<i>Professional efficacy</i>	<i>Cynicism</i>	<i>Negative trait affectivity</i>	<i>Positive trait affectivity</i>	<i>General Health</i>	<i>Job Satisfaction</i>
<i>Role overload</i>	.85														
<i>Control and autonomy</i>	-.00	.75													
<i>Role conflict</i>	.49**	-.25**	.61												
<i>Social support</i>	.37**	-.15**	.37**	.80											
<i>Surface acting</i>	.37**	-.25**	.42**	-.29**	.67										
<i>Deep acting</i>	.03	.05	.07	.01	.09	.69									
<i>Display positive emotions</i>	.09	.11*	.19**	-.01	.06	.23**	.71								
<i>Hide negative emotions</i>	.18**	.03	.25**	-.03	.24**	.21**	.50**	.81							
<i>Exhaustion burnout</i>	.49**	-.30**	.40**	-.32**	.43**	.02	.01	.21**	.88						
<i>Professional efficacy burnout</i>	-.15**	.33**	-.20**	.13*	-.17**	.18**	.22**	.15**	-.18**	.84					
<i>Cynicism burnout</i>	.26**	-.41**	.34**	-.27**	.32**	-.05	-.11*	.06	.64**	-.31**	.76				
<i>Negative trait affectivity</i>	.26**	-.22**	.24**	-.20**	.37**	-.02	.05	.17**	.46**	-.20**	.36**	.85			
<i>Positive trait affectivity</i>	-.13*	.41**	-.27**	.17**	-.24**	.15**	.14**	-.02	-.42**	.53**	-.56**	-.28**	.92		
<i>Psychological well-being</i>	-.41**	.30**	-.36**	.32**	-.39**	.01	-.04	-.14**	-.54**	.26**	-.50**	-.54**	.50**	.91	
<i>Job satisfaction</i>	-.23**	.53**	-.36**	.27**	-.31**	.11*	.15**	-.03	-.57**	.47**	-.75**	-.32**	.69**	.49**	.94
<i>Intention to quit</i>	-.01	-.41**	.19**	-.18**	.13*	-.06	-.16**	-.01	.34**	-.27**	.49**	.14**	-.47**	-.28**	-.61**

** Correlation is significant at the 0.01 level (2-tailed); * Correlation is significant at the 0.05 level (2-tailed).

3.3 DESCRIBING THE THREE HUMAN SERVICE WORK GROUPS

In order to better understand each occupational group we will first describe the sample and each occupational group in relation to emotional demands and outcome variables.

3.3.1 Recruitment of the sample and the three main human service work groups

The sample was recruited from a list of organizational contacts derived from commercial lists and publicly available directories (e.g. Local Authority Directory, 2006), as well as the personal contacts of the researchers. Each organizational contact was emailed a letter giving details of the research (e.g. aims, methods, confidentiality and how to participate).

Eight organizations agreed to participate (e.g. insurance companies, social service departments of local authorities). Additionally, a number of smaller organizations (e.g. doctor's and dental surgeries, schools) were recruited via personal contacts. Participating organizations were sent or given a batch of questionnaires, with reply paid envelopes, to distribute to staff. The only criteria for participation were that staff should have direct contact with the public, and be engaged in either customer service or human service work. Staff were informed that participation was entirely voluntary, that the questionnaires were anonymous, and were asked to return the questionnaire to the researchers in the reply paid envelope provided. Additionally, respondents were asked to return a reply paid postcard, giving their contact details, if they were interested in participating in the qualitative study.

1,000 questionnaires were distributed and 398 usable questionnaires were returned (i.e. a response rate of almost 40%). The participants can be divided into three main groups:-

1. *Human service workers (without teachers)* – mainly social workers, care workers and housing workers, plus a small number of medical staff (e.g. GPs) (N = 184), labelled HSW-Other.
2. *Customer service workers* – mainly call centre employees (N = 110), labelled CSW
3. *Teachers* – mainly primary school head teachers (N = 104)

The following analyses will explore the data for these three main groups of human service workers.

3.3.2 Person Factors: How can the main groups be characterized?

Table 2 shows that the majority of the sample is female, married or living with a partner, without children in school age or younger. The vast majority of the sample is aged 50 or younger.

Table 2: Demographics

		<i>HSW- Other (%)</i>	<i>CSW (%)</i>	<i>Teachers (%)</i>	<i>Total (%)</i>
<i>Gender</i>	<i>Male</i>	44.5	36.4	19.1	28.1
	<i>Female</i>	47.0	24.2	28.8	71.9
<i>Age</i>	<i>Under 20</i>	0	100	0	1.8
	<i>21-30</i>	27.2	57.9	14.9	28.9
	<i>31-40</i>	51.1	23.9	25.0	22.3
	<i>41-50</i>	64.4	9.9	25.7	25.6
	<i>51-60</i>	47.2	2.8	50.0	18.3
	<i>61+</i>	66.7	8.3	25.0	3.0
<i>Marital status</i>	<i>Single</i>	25.8	50.8	23.3	30.5
	<i>Married/with partner</i>	55.3	16.5	28.3	60.2
	<i>Divorced /separated</i>	54.3	22.9	22.9	8.9
	<i>Widowed</i>	100	0	0	.5
<i>School age children at home?</i>	<i>Yes</i>	58.6	17.1	24.3	28.1
	<i>No</i>	41.5	31.3	27.1	71.9

3.3.3 How can their jobs be characterized?

In this section we describe the characteristics of three groups with respect to job characteristics, emotional demands and outcome variables. These analyses are conducted using one-way Anovas with post-hoc Bonferroni tests to determine significant differences between the three groups. In doing so, we will be better able to understand the nature of the three occupations with respect to their emotional demands and job characteristics.

Emotional demands

On the whole, emotional labour (deep or surface acting) is on average only required rarely to sometimes. Participants report the need to sometimes hide negative emotions and often display positive emotions (no matter what they feel). Participants were further asked how often they experienced verbal aggression against them in their job. Most participants answered “rarely” or “sometimes” (see Table 3).

The three groups vary significantly with respect to reporting of emotional demands, except for deep acting. Compared to CSW and Teachers, HSW-Other report significantly more verbal aggression against them at work and a higher need to manage their emotions (both in relation to showing positive emotions and hiding negative emotions). Teachers report significantly more surface acting than the other two groups. CSW overall have the lowest emotional demands at work.

Table 3: Emotional demands at work across the three occupational groups

	<i>Occupational groups</i>							
	<i>HSW-Other</i>		<i>CSW</i>		<i>Teachers</i>		<i>Total</i>	
	<i>Mean</i>	<i>SD</i>	<i>Mean</i>	<i>SD</i>	<i>Mean</i>	<i>SD</i>	<i>Mean</i>	<i>SD</i>
<i>Surface acting</i>	2.58	.74	2.52	.78	2.87	.70	2.64*** ^{bc}	.75
<i>Deep acting</i>	2.88	.82	2.84	.75	2.89	.70	2.87	.77
<i>Display positive emotions (emotion management)</i>	4.23	.56	3.67	.77	3.97	.55	4.01*** ^{abc}	.67
<i>Hide negative emotions (emotion management)</i>	3.51		3.03		3.15		3.28*** ^{ab}	.83
<i>Verbal aggression</i>	3.01	1.19	2.55	1.08	2.24	.92	2.68*** ^{ab}	1.14

Note. Anchors range from 1 to 5. ^a= significant difference between HSW-Other and CSW, ^b= significant difference between HSW-Other and Teachers, ^c= significant difference between Teachers and CSW. *** Mean difference is significant at the 0.01 level. ** Mean difference is significant at the 0.05 level. * Mean difference is significant at the 0.10 level.

Job characteristics

Participants experience medium levels of role overload, conflict, clarity, control and ambiguity. Also, participants report frequent social support by employees and supervisors. Apart from role clarity and lack of ambiguity, the three groups differ with respect to their job characteristics (see Table 4).

Teachers report higher role overload than the other two groups, more control and autonomy than CSW, and less social support than both other groups. CSW report the least role overload, less control and autonomy than both other groups, more social support than Teachers and less than HSW-Other. HSW-Other report significant less role overload than Teachers, but more than

CSW, and less control and autonomy than Teachers, but more than CSW. HSW-Other also report the highest levels of social support. In summary this means that Teachers report the highest levels of role overload, and at the same time report the highest levels of control and the lowest levels of social support.

Table 4: Job characteristics across the three occupational groups

	<i>Occupational groups</i>							
	<i>HSW-Other</i>		<i>CSW</i>		<i>Teachers</i>		<i>Total</i>	
	<i>Mean</i>	<i>SD</i>	<i>Mean</i>	<i>SD</i>	<i>Mean</i>	<i>SD</i>	<i>Mean</i>	<i>SD</i>
<i>Role overload</i>	2.91	.90	2.45	.77	3.83	.87	3.03*** ^{abc}	1.00
<i>Role conflict</i>	2.94	.80	2.80	.66	2.99	.83	2.91	.77
<i>Control and autonomy</i>	3.37	.76	2.73	.68	3.55	.70	3.24*** ^{ac}	.79
<i>Social support</i>	3.58	.49	3.41	.58	3.19	.67	3.43*** ^{abc}	.59

Note. Anchors range from 1 (strongly disagree) to 5 (strongly agree). For social support from 1 (never) to 4 (often). ^a= significant difference between HSW-Other and CSW, ^b= significant difference between HSW-Other and Teachers, ^c= significant difference between Teachers and CSW. *** Mean difference is significant at the 0.01 level. ** Mean difference is significant at the 0.05 level. * Mean difference is significant at the 0.10 level.

Outcome variables

Do the three main job groups differ with respect to burnout, well-being, job satisfaction, intention to quit? Again, providing this information gives us a better sense of the nature of each of the three occupational groups, which provides a basis for discussing and understanding findings that relate to the research questions.

Table 5 shows that Teachers report significantly higher levels of exhaustion than HSW-Other and less professional efficacy than CSW. Further, Teachers report lower intention to quit and higher job satisfaction than CSW. HSW-Other report significantly less exhaustion than Teachers, more professional efficacy than CSW and less cynicism than CSW. Further, HSW-Other report lower intention to quit than CSW. CSW report less professional efficacy than HSW-Other, and more cynicism, higher intention to quit and less job satisfaction than both other groups. In summary, Teachers report the highest levels of exhaustion but also the lowest intention to quit and the highest job satisfaction.

Table 5: Outcome variables across the three occupational groups

	<i>Occupational groups</i>							
	<i>HSW-Other</i>		<i>CSW</i>		<i>Teachers</i>		<i>Total</i>	
	<i>Mean</i>	<i>SD</i>	<i>Mean</i>	<i>SD</i>	<i>Mean</i>	<i>SD</i>	<i>Mean</i>	<i>SD</i>
<i>Exhaustion (burnout)</i>	2.43	1.52	2.77	1.51	3.08	1.33	2.69*** ^b	1.49
<i>Cynicism (burnout)</i>	1.65	1.39	2.48	1.61	1.70	1.30	1.89*** ^{ac}	1.47
<i>Professional efficacy (burnout)</i>	4.63	1.02	4.34	1.09	4.64	.88	4.56*** ^{ac}	1.01
<i>Psychological well-being</i>	2.97	.47	3.02	.52	2.89	.50	2.96	.49
<i>Intention to quit</i>	1.92	1.08	2.81	1.34	1.78	1.20	2.13*** ^{ac}	1.26
<i>Job satisfaction</i>	3.19	1.01	2.60	1.07	3.45	.95	3.09*** ^{ac}	1.06

Note: For intention to quit 1 (almost certainly stay) to 5 (almost certainly quit); Burnout 0 (never) to 6 (every day); health 1 (worse than usual) to 4 (better than usual); job satisfaction 1 (little) to 5 (high).

^a= significant difference between HSW-Other and CSW, ^b= significant difference between HSW-Other and Teachers, ^c= significant difference between Teachers and CSW*** Mean difference is significant at the 0.01 level. ** Mean difference is significant at the 0.05 level. * Mean difference is significant at the 0.10 level.

3.3.4 Summary

So, overall, how can the three groups be characterized? The three groups differ with respect to job demands and outcomes as follows:

- HSW-Other reported the highest requirements for emotion management (hiding negative emotions and displaying positive emotions), experience the highest verbal aggression and feel the highest role overload, but also report the most social support. With respect to burnout, well-being, intention to quit and job satisfaction HSW-Other report average levels.
- CSW reported relatively low emotional demands (in particular the lowest level of the need to display positive emotions), the lowest role overload and conflict while also the lowest control & autonomy; they showed the highest levels of cynicism and the lowest levels of professional efficacy. They also reported the highest level of intention to quit.
- Teachers have the highest levels of role overload and report the highest level of surface acting, but only medium levels of emotion management. They report the lowest level of social support and the highest level of exhaustion, but relatively low levels of cynicism and relatively high professional efficacy. At the same time they also show relatively high levels of job satisfaction and low levels of intention to quit.

In summary, the professional groups differ significantly with respect to reported job demands and health-related outcomes. We would therefore also expect that the nature of the relationships between emotional demands and burnout will vary across these groups. In the next section we will try to explain the relationships between these variables.

3.4 RESEARCH QUESTION 1: WHAT IS THE LEVEL OF BURNOUT AND WELL-BEING IN THE KEY HUMAN SERVICE OCCUPATIONS IN THE UK?

The results discussed in the previous section and Table 5 also give a partial answer to the first research question: What is the level of burnout in key human service occupations in the UK first compared to other national norms and, second, compared across the three occupational groups?

3.4.1 RQ1a: How do these levels of burnout and well-being compare to other samples?

The authors of the Maslach Burnout Inventory (Maslach et al, 1996) advise that each of the three dimensions of burnout should be treated separately. For this reason we will discuss the three dimensions separately. Unfortunately Maslach et al (1996) do not provide clear norm tables or a large range of samples for comparison purposes. We will therefore have to compare the results found here to the Dutch, Finnish and Canadian samples (total N=5259) provided in by Maslach et al (1996).

Exhaustion

The average level of exhaustion for our participants was $M=2.69$ ($SD = 1.49$). This means that those items in the questionnaire measuring, in this case exhaustion, were reported on average as being experienced by participants between “once a month or less” (scored 2) and “a few times a month” (scored 3). According to the authors of the scale, Maslach et al (1996) this is an average level for the Canadian sample ($N=3727$). It is considerably lower than the levels of exhaustion found, for example, in Dutch civil servants or Dutch rural workers, however, it is comparable to other human service workers from a Canadian sample (nurses, psychiatric workers, clerical).

Cynicism

The level of cynicism in the overall sample is $M=1.89$ ($SD= 1.47$), which means between “a few times a month” (2) and “once a year” (1). According to the manual this again is an average level rate in the Canadian sample and comparable to other human service work samples, however significantly higher than Finnish participants in a computer job ($N=289$) or the Dutch civil servants ($N=956$) and rural workers ($N=761$).

Professional efficacy

The mean for efficacy is 4.56 ($SD=1.01$), which is between “once a week” and “a few times a week”. This is similar to the average level found in the Canadian sample. It is higher, however, than the average human service worker in Canada, and more comparable to military, clerical and technical workers in Canada. It is higher than the Dutch civil servants and lower than the Dutch rural workers.

GHQ12 – levels of minor psychiatric disorder

The GHQ12 is a self-administered screening instrument that was developed to: A) detect an inability to carry out one’s normal “healthy” functions; and, b), to detect the recent appearance of new experiences of a distressing nature (Goldberg, 1972). There are several ways to score this measure. The GHQ12 can be used to assess psychological well-being (see above and Appendix 1) and to detect minor psychiatric disorders. So far in this report we have used the measure as an indicator for well-being. As described above we scored the GHQ12 as a Likert-scale measure and re-coded it, so that higher values indicate higher well-being (see Hardy, Shapiro & Borril, 1997).

In order to compare our participants to other UK samples, we used the GHQ12 to detect the level of psychiatric disorder. To do this so, we followed the case-scoring method (see e.g. Hardy et al 1997). Participants who responded indicating that their health or symptoms were worse than usual in relation to four or more of the GHQ12 items were labelled, using the same terminology, as ‘cases’ (potential cases or likelihood of psychiatric disorder) and 26.9% of the sample fitted into this category. All other participants were defined as ‘non-cases’. For this comparison we draw on the case-rates for samples from NHS trust and samples from the BHPS (British Household Panel Survey N=501), provided by Wall, Bolden, Borrill, Carter, Golya and Hardy (1997, p. 520). Wall et al’s (1997) study revealed that overall 26.8% of respondents were classified as probable “cases” with minor psychiatric disorder, which is virtually identical to the participants in our study. However, this case rate is significantly higher than that of the BHPS sample of 17.8% ($\chi^2 = 153.4$, df1, $p < .01$). In Wall et al’s (1997) sample women managers (41%) and women doctors (35%) had the highest rates, followed by male medicine staff and male and female nurses (30%/39%).

Overall, we can draw the conclusion that while our sample has a higher case rate than the general population (as assessed by the BHPS), the case rate is broadly comparable to other human service workers (NHS employees) in the UK.

3.4.2 RQ1b: How do the levels of burnout and well-being compare across different human service occupations?

In this section we will compare the levels of burnout in the three occupational groups to each other and to Maslach Burnout Inventory (Maslach et al, 1996) and GHQ norms. Table 5 shows the relevant data. Turning first to exhaustion, Teachers report significantly higher levels of exhaustion than HSW-Other, but not significantly higher than CSW. Also, the difference between HSW-Other and CSW is not statistically significant. According to the norms, the exhaustion levels of our three groups fall within the normal range.

With respect to cynicism, CSW report the highest rates of cynicism, which would also be considered high in the norm table provided by Maslach et al (1996). However, HSW-Other and Teachers do not significantly differ from each other (or from the norm). CSW not only report the highest levels of cynicism, but also the lowest levels of professional efficacy. However, this level is still within the norms provided. The efficacy levels of HSW-Other and teaches do not significantly differ from one another.

We also compared the three occupational groups with respect to cases of minor psychiatric disorders (according to the procedure described in the above section). As shown in Table 5, there are no significant differences between the three occupational groups. A χ^2 - analysis with the case-rates does not show any significant differences either ($\chi^2 = 1.40$, df2, $p > .10$)

3.4.3 Summary and conclusion

- While there are clearly differences between the levels of burnout amongst the three occupational groups, the overall level of burnout of this UK sample is well within international averages
- Only one score can, in comparison to a large North American sample be considered outside the norm, and that is the cynicism level of CSW
- CSW show the highest level of cynicism and the lowest level of professional efficacy.
- Teachers experience higher exhaustion rates than HSW-Other, but not than CSW
- Overall our participants appear to have a higher case rate of minor psychiatric disorder in comparison to a representative sample of the UK population, however, they show similar

rates to NHS employees. The three occupational groups do not significantly differ from one another with respect to their case rate of minor psychiatric disorder

3.5 RESEARCH QUESTION 2: WHICH KEY VARIABLES ARE ASSOCIATED WITH BURNOUT AND WELL-BEING?

In this section the results relevant to research question 2 are discussed. Guided by the literature review, we examined three groups of variables related to burnout: Person factors, job characteristics and emotional demands. In the first step we analyze how emotional demands explain burnout and well-being over and above person factors and job characteristics as these are already known to affect burnout and well-being. In the second step we explore the statistical predictors of burnout for each occupational group separately. As this is a cross-sectional study, it should be noted that it is not possible to make any claims about causality though we can analyze what statistically contributes to burnout and well-being.

3.5.1 RQ2a: Which key variables are associated with burnout and well-being?

One important question this study seeks to address is which factors are associated with burnout and well-being. So, what is associated burnout and well-being? While it is known, in general, that trait affectivity and job characteristics are related these outcomes, the main purpose of these analyses is to explore if the emotional demands of the job also affect burnout and well-being once the effects of trait affectivity and job characteristics have been taken into account. In other words, do emotional demands affect these outcomes over and above the effects of trait affectivity and traditional job characteristics?

In order to address this question, we conducted hierarchical regressions, entering the variables in three steps: First, person characteristics (PA, NA, gender, age, occupational tenure, job tenure), secondly, job characteristics (role overload, control & autonomy, role conflict and social support) and thirdly, emotional demands (verbal aggression, surface and deep acting, having to display positive and negative emotions). Table 6 summarizes the results of the third step. Note that the first and second steps were omitted from the tables for the sake of readability. We present the results for the three burnout dimensions, exhaustion, cynicism and professional efficacy and well-being (GHQ12).

Explaining Exhaustion

Table 6 shows that experiencing verbal aggression in the job and surface acting are significantly related to exhaustion after controlling for the effects person factors and traditional job characteristics.

Explaining Cynicism

Verbal aggression and demands to display positive emotions are significantly related to cynicism beyond job characteristics and trait affectivity. In other words, the more aggression and the lower the requirement to display positive emotion, the more cynical participants report to be.

Explaining professional efficacy

For professional efficacy, positive trait affectivity and job characteristics explain the majority of variance. However, two of the emotional demands do play a role beyond these variables. The more individuals feel they have to display positive emotions at work and the more they perform deep acting, the higher their professional efficacy levels.

Explaining well-being

Well-being is explained by trait affectivity, control and social support, but none of the measures of emotional demands were found to relate to well-being once these other variables had been taken into account.

Table 6: Results of hierarchical regression analysis (full sample)

Model	Exhaustion		Cynicism		Professional Efficacy		Well-being	
	Beta	Sig.	Beta	Sig.	Beta	Sig.	Beta	Sig.
3	<i>(Constant)</i>							
	Negative trait affectivity	.184 ***	.131 ***	-.025	-.335 ***			
	Positive trait affectivity	-.191 ***	-.356 ***	.415 ***	.315 ***			
	Gender	.010	.133 ***	.073	.026			
	Age	-.037	-.105 **	.108 **	.000			
	Children at home	-.004	-.021	.016	.010			
	Tenure occupation	-.034	-.036	.005	.061			
	Tenure job	.065	.155 ***	-.073	-.071			
	Role overload	.353 ***	.139 ***	-.089 *	-.236 ***			
	Control and autonomy	-.156 ***	-.187 ***	.098 *	.083			
	Role conflict	.018	.088 *	-.067	-.001			
	Social support	-.041	-.041	-.008	.096 **			
	Verbal aggression	.126 ***	.098 **	.074	-.029			
	Surface acting	.106 **	.033	-.032	-.045			
	Deep acting	.032	.021	.094 **	-.026			
	Display positive emotions	-.069	-.109 **	.112 **	-.040			
	Hide negative emotions	.076	-.009	.054	.009			
	<i>F</i>	22.77 ***	22.87 ***	12.67 ***	24.03 ***			
	<i>R</i> ²	.48	.47	.33	.50			
	Model 2/3 ΔR^2	.03 ***	.02 **	.03 ***	.00 ns			

Note. *** Significant at the 0.01 level. ** Significant at the 0.05 level. * Significant at the 0.10 level. Model 2/3 ΔR^2 refers to the additional variance accounted for by including the five emotional demands variables once person and traditional job characteristics have been taken into account.

3.5.2 Brief summary

The results are presented visually in Figure 2. Generally speaking, after controlling for trait affectivity and traditional job characteristics, emotional demands related quite weakly (though statistically significantly) to burnout and were unrelated to well-being (as assessed by the GHQ12). Exhaustion is related to only two emotional demands – verbal aggression and surface acting – such that more aggression and more surface acting is associated with higher levels of exhaustion. Cynicism is significantly positively related to role overload, role conflict, verbal aggression and NA. However, control and autonomy and PA are negatively related to cynicism such that higher levels of control and autonomy and PA are related to lower levels of cynicism. Professional efficacy is positively related to two emotional demands - deep acting and having to display positive emotions at work.

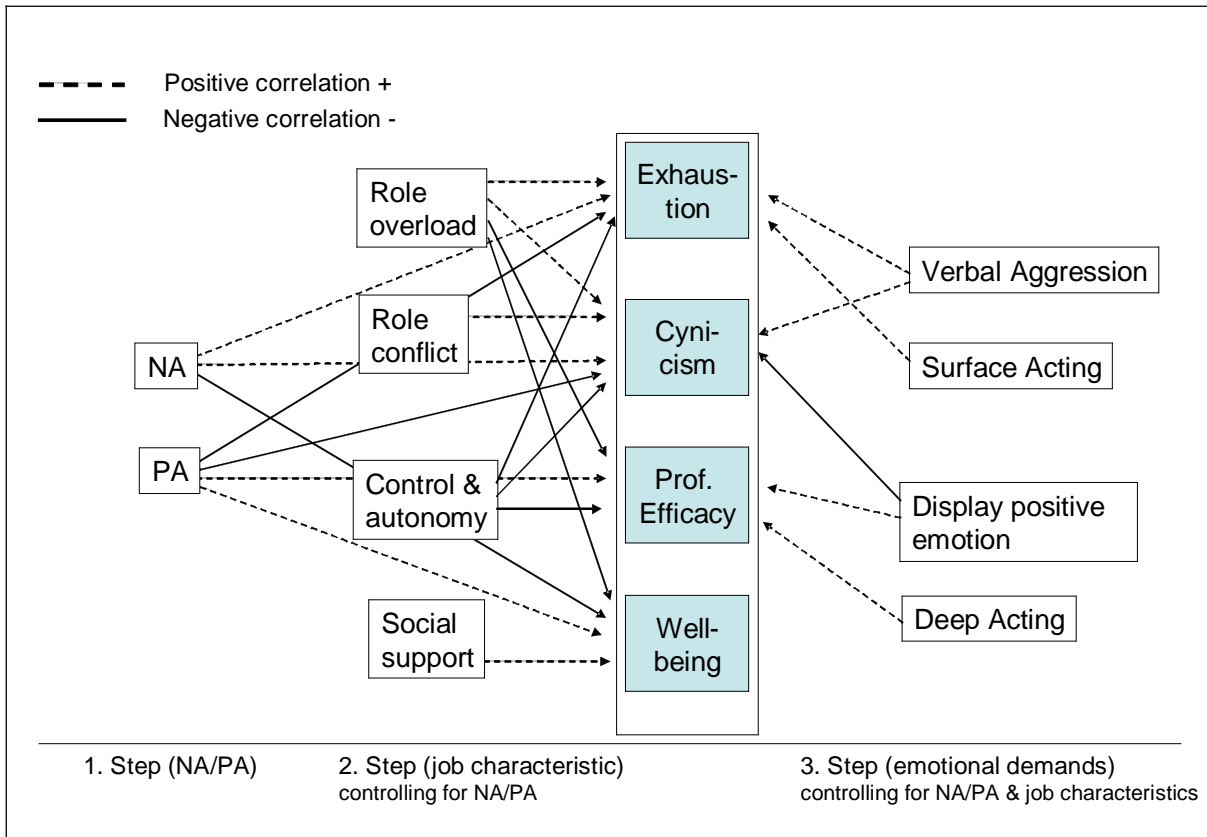


Figure 2: Summary of results from research question 1a

3.5.3 RQ2b: Are different key variables associated with burnout and well-being in different human service occupations?

Given the differences in the nature of the three job groups described above, it seems likely that there are differences between the three occupational groups in the ways in which person factors, job characteristics, and emotional demands relate to burnout and well-being. The following analyses are again hierarchical regressions for each of the three occupational groups separately. Table 7 summarizes the significant results.

Human service workers

For this group, three emotional demands measured significantly related to the outcome variables beyond person factors and job characteristics:

- Surface acting and hiding negative emotions statistically predict exhaustion
- Displaying positive emotions statistically predicts professional efficacy

Table 7: Hierarchical regressions for burnout and GHQ12 split by occupational group, controlling for person factors and job characteristics

Model	Exhaustion			Cynicism			Professional efficacy			Psychological well-being		
	HSW-Other Beta	CSW Beta	Teacher Beta	HSW-Other Beta	CSW Beta	Teacher Beta	HSW-Other Beta	CSW Beta	Teacher Beta	HSW-Other Beta	CSW Beta	Teacher Beta
3 (Constant)												
Negative trait affectivity	.181***	.211**	.273***	.201***	.120	.136*	.066	-.066	-.180**	-.437***	-.256***	-.303***
Positive trait affectivity	-.059	-.323***	-.243***	-.187***	-.468***	-.392***	.433***	.424***	.419***	.284***	.492***	.158*
Gender (1 male, 0 female)	.053	-.054	-.065	.194***	.073	.107	.124*	.083	.097	.011	-.039	.044
Age	.041	.149*	-.167*	-.077	.087	-.032	.178**	.068	-.070	.008	-.016	.180*
Children at home	.035	-.008	-.066	-.018	.006	-.023	-.009	.133	.031	.055	-.119	.023
Tenure occupation	-.052	.068	.006	.019	.099	-.115	.012	.082	-.032	-.011	.004	.247**
Tenure job	.034	-.057	.156	.202***	.011	.106	-.062	-.104	-.035	.036	.049	-.372***
Role overload	.371***	.104	.322***	.269***	.019	.028	-.167**	.040	-.113	-.135**	-.089	-.376***
Control and autonomy	-.057	-.242***	-.136	-.075	-.210***	-.180	.036	.054	.249***	.135**	.000	.187**
Role conflict	.077	.012	.050	.090	.035	.185*	-.125	.139	.071	-.029	-.076	.027
Social support	-.012	-.106	.017	-.001	-.170**	.142	.054	-.057	.048	.018	.165**	.022
Verbal aggression	.083	.267***	.149*	.059	.141*	.133	.029	.076	.243***	.023	-.151**	-.035
Surface acting	.143**	.019	.109	.081	-.032	.187*	-.007	-.077	.011	-.044	.018	-.068
Deep acting	.029	.065	-.034	.045	-.083	-.020	.062	.155	-.017	-.042	.000	-.083
Display positive emotions	-.093	.003	.057	-.082	-.038	-.043	.146*	.103	.119	.004	-.136	.120
Hide negative emotions	.156**	.008	.055	-.015	.001	.050	.136	.038	-.159	.008	-.028	-.015
F	11.33***	6.80***	7.67***	10.19***	6.6***	7.00***	7.00***	2.94	4.93***	14.11***	9.12***	5.50***
R ²	.49	.48	.53	.46	.46	.50	.36	.23	.40	.55	.56	.43
Model 2/3 ΔR ²	.05***	.05**	.02	.00	.01	.02	.05***	.02	.03	.00	.03*	.00

Note that these are the results of a three-step hierarchical regression (see Table), where the data for model 1 and 2 has been omitted for the sake of readability.

*** Significant at the 0.01 level. ** Significant at the 0.05 level. * Significant at the 0.10 level

Table 9: Overview of positive and negative events, by diarist

<i>Diarist</i>	<i>Occupation</i>	<i>Number of positive client interactions across diaries</i>	<i>Number of other positive work events across diaries</i>	<i>Number of positive non-work events across diaries</i>	<i>Number of negative client interactions across diaries</i>	<i>Number of other negative work events across diaries</i>	<i>Number of negative non-work events across diaries</i>
1	Head teacher	11	7	11	7	10	4
2	Head teacher	11	15	12	7	9	4
3	Head teacher	6	2	6	2	4	1
4	Manager - Education	8	6	8	7	6	0
5	Head teacher	9	11	7	5	6	1
8	Head teacher	1	11	9	8	6	3
11	Head teacher	7	6	5	8	11	0
13	Head teacher	15	9	12	10	10	8
16	Head teacher	8	8	6	3	4	5
19	Housing worker	6	4	5	8	7	11
20	Housing worker	4	8	9	4	4	3
21	Head teacher	14	8	14	8	17	2
22	Social worker	9	2	3	2	3	9
23	Social worker	4	2	0	4	4	3
24	Social worker	11	6	13	7	5	1
25	Housing worker	4	1	4	3	0	0
28	Residential care worker	5	3	6	2	7	2
29	Home tutor	8	7	10	5	6	5
31	Manager in residential care home	7	6	3	7	13	7
32	Head teacher	6	13	9	6	8	2
33	Manager in residential care home	8	7	11	3	12	8
36	Social worker	7	7	5	3	6	10
37	Community Substance Misuse worker	7	10	5	7	11	3
38	Consultant and Police Doctor	6	11	10	8	8	2
Total		Total = 182	Total = 170	Total = 183	Total = 134	Total = 177	Total = 94

- Williams, C. (2003) Sky service: The demands of emotional labour in the airline industry. *Gender, Work and Organization*, 10(5), 513-550.
- Winstanley, S. & Whittington, R. (2002). Anxiety, burnout and coping styles in general hospital staff exposed to workplace aggression: a cyclical model of burnout and vulnerability to aggression. *Work and Stress*, 16(4), 302-315.
- Workman, M. & Bommer, W. (2004). Redesigning computer call center work: A longitudinal field experiment. *Journal of Organizational Behavior*, 25(3), 317-337.
- Wouters, C. (1989). The sociology of emotions and flight attendants: Hochschild's *Managed Heart*. *Theory, Culture & Society*, 6,95-123.
- Wright, T. A. & Cropanzano, R. (1998). Emotional exhaustion as a predictor of job performance and voluntary turnover. *Journal of Applied Psychology*, 83(3), 486-493.
- Zapf, D. (2002). Emotion work and psychological strain: A review of the literature and some conceptual considerations. *Human Resource Management Review*, 12, 237-268.
- Zapf, D., Isic, A., Bechtoldt, M. & Blau, P. (2003). What is typical for call centre jobs? Job characteristics, and service interactions in different call centres. *European Journal of Work and Organizational Psychology*, 12(4), 311-340.
- Zapf, D., Seifert, C., Schmutte, B., Mertini, H. & Holz, M. (2001). Emotion work and job stressors and their effects on burnout. *Psychology and Health*, 16(5), 527-545.
- Zapf, D., Vogt, C., Seifert, C., Mertini, H. & Isic, A. (1999). Emotion work as a source of stress: The concept and development of an instrument. *European Journal of Work and Organizational Psychology*, 8, 371-400.
- Zellars, K.L. & Perrewé, P.L. (2001). Affective personality and the content of emotional social support: Coping in organizations. *Journal of Applied Psychology*, 86(3), 459-467.
- Zohar, D. (1997). Predicting burnout with a hassle-based measure of role demands. *Journal of Organizational Behavior*, 18(2), 101-115.

The nature, causes and consequences of harm in emotionally-demanding occupations

Traditional approaches to understanding psychosocial job characteristics and well-being have been quite general in that they explore links between general job characteristics such as workload and control on workers in many different sorts of occupations. One example of a more specific approach can be found in research into emotional labour - the requirement to regulate both feelings and the expression of feelings for organizational goals. Early research into emotional labour focused on customer service workers (CSW) but has more recently also considered human service workers (HSW) such as nurses and social workers. A more specific approach to thinking about the outcomes of demanding psychosocial job characteristics can be found in research on burnout which is thought to have three elements: emotional exhaustion, depersonalization (also labelled cynicism), and (low) accomplishment (also called professional efficacy). Much recent research has started to explore the links between emotional demands and burnout. The main aim of this project is therefore to explore the nature of such links through undertaking three distinct tasks. The first is a literature review of evidence and theory while the second two tasks comprise two empirical studies examining several key issues in burnout research.

This report and the work it describes were funded by the Health and Safety Executive (HSE). Its contents, including any opinions and/or conclusions expressed, are those of the authors alone and do not necessarily reflect HSE policy.