Aiken, L. H., S. P. Clarke, et al. (2001). "Nurses' reports on hospital care in five countries." Health Affairs **20**(3): 43-54.

The current nursing shortage, high hospital nurse job dissatisfaction, and reports of uneven quality of hospital care are not uniquely American Phenomena. A paper presents reports from 43,000 nurses from more than 700 hospitals in the US, Canada, England, Scotland, and Germany in 1998-1999. Nurses in countries with distinctly different health care systems report similar shortcomings in their work environments and the quality of hospital care. While the competence of and relation between nurses and physicians appear satisfactory, core problems in work design and workforce management threaten the provision of care. Resolving these issues, which are amenable to managerial intervention, is essential to preserving patient safety and care of consistently high quality. [Publication Abstract] *no sex breakdown or gender-based analysis

Aiken, L. H. and D. M. Sloane (1997). "Effects of organizational innovations in AIDS care on burnout among urban nurses." Work & Occupations **24**(4): 453-477.

Data from a survey of more than 800 nurses who care for AIDS patients revealed that the organizational form of the unit and hospital in which care was provided significantly affected the likelihood of nurses reporting that they were emotionally exhausted. Nurses who worked in dedicated or specialized AIDS units, or in "magnet" hospitals known to possess organizational characteristics attractive to nurses, exhibited lower levels of emotional exhaustion than did nurses who cared for AIDS patients in general, scattered-bed medical units. These differences persisted after nurse characteristics were statistically controlled, but they were accounted for in part by controlling for the amount of organizational support that nurses perceived was present in their workplaces. [Publication Abstract] *no gender-based analysis or sex-breakdown

Anderson, W. J. R., C. L. Cooper, et al. (1996). "Sources of stress in the national health services: a comparison of seven occupational groups." Work & Stress **10**(1): 88-95.

This paper reports a comparative study of sources of occupational stress affecting the seven major occupational groups within the National Health Service. The groups are compared on seven dependent variables. These are the six sub-categories of stressors identified by Cooper and Marshall (1978) and measured by the Occupational Stress Indicator (OSI) (Cooper et al. 1988), and a total stress score that is derived by summing scores for each of the six sub-categories. Occupational groups differed significantly (p.05) in only two of the six sub-categories. In these cases occupational groups not normally associated with front-line care reported higher levels of stress than either doctors or nurses. The results show that high levels of occupational stress are experienced by all occupational groups within the NHS and the subsequent discussion argues for a more progressive research policy that gives adequate attention to 'lower status' groups, such as ancillary, works and maintenance, and administrative and clerical [Publication Abstract] *no gender-based analysis

Armstrong, P. and H. Armstrong (2003). Wasting away: the undermining of Canadian

health care. Toronto, Oxford University of Press.

This book offers a critical discussion of the neo-liberal agenda for health that is currently undermining Canada's health care system. Recent reforms to health care have had profound consequences - transforming who provides, who delivers, who decides, who pays, and who receives care - and by implication who does not. Health care restructuring has also meant the context of care, how and what care is provided, as well as how this care work is organized, has changed. Rationalizing services, downsizing in the acute care sector has also affected the long-term care sector. The implications of health care restructuring for those who provide and receive care in long-term care facilities are considered. In the context of reform, long-term care facilities are expected to respond to increasing demands, higher acuity levels of residents with changing and complex care needs, and with fewer resources. For predominately female workers, insufficient staffing and failure to replace absent workers has meant increased workloads, stress, burnout and compromises to health and safety. According to Armstrong & Armstrong the changing composition of patients, including increasing numbers of patients with dementia, Alzheimer's, multiple physical challenges, and complex acute care needs as patients are transferred faster and less well from hospitals (suggesting inappropriate placement) "creates a volatile mix and increases enormously the demands on providers." Moreover, the authors point out the new agenda for health care fails to recognize the complexity of care that is now required in long-term care facilities as well as ignores research relating to the determinants of health as critical to health - both with significant implications and consequences for workers.

Armstrong, P. and T. Daly (2004). There are not enough hands: conditions at Ontario's long-term care facilities, Canadian Union of Public Employees.

This study examines the conditions of long-term care from the perspective of long-term care workforce involved in direct care labour (e.g., nurses, personal support workers, maintenance staff, homemaking staff, dietary workers, therapists and recreational workers). This report is based on findings from a sample survey questionnaire. The purpose of this study was to evaluate long-term care workplace issues. This included staff training, workload, perceptions of resident care, worker health and safety and the connection between work and family life. In terms of workplace mental health concerns, 53.8% of survey respondents reported stress as a consequence of their conditions of this work. For instance, how this work is organized, who controls this work. *gender-based analysis

Armstrong, P. and I. Jansen (2000). Assessing the impact of restructuring and work: reorganization in long-term care, National Network on Environments and Women's Health.

Using a gender-based analysis framework, this report assesses the impacts and implications arising from the restructuring of long-term care and reorganization of work in this sector. Historically, health care work has been women's work. Gendered assumptions about care may situate women in positions where their

work conditions and their health and safety may be obscured. The uthors note that while research has demonstrated the relationship between work organization, job control, social support and health outcomes such as depression and anxiety claims for compensable workplace illness are restricted to those that are acute or traumatic, thus excluding much of the ill health, including stress and depression, that may be chronic or cumulative and develop gradually over time.

Armstrong-Stassen, M., R. al-Ma'Aitah, et al. (1994). "Determinants and consequences of burnout: a cross-cultural comparison of Canadian and Jordanian Nurses." Health Care Women International **15**(5): 413-421.

We compared the determinants and consequences of burnout for Canadian (N = 586) and Jordanian (N = 263) registered nurses working in a hospital setting. LISREL 7 software was used to perform a path analysis testing hypothesized relationships between job satisfaction dimensions (supervision, hospital identification, kind of work, amount of work, physical work conditions, rewards, and career future) and burnout and intention to quit. For both Canadian and Jordanian nurses, kind of work, amount of work, and career future were important determinants of burnout. Career future and burnout (emotional exhaustion) were associated with intention to quit on the basis of the highly similar results across the two samples, we propose that a universal theoretical model of the determinants and consequences of burnout among nurses may be plausible. [Publication Abstract]

Aronsson, G., K. Gustafsson, et al. (2000). "Sick but yet at work: an empirical study of sickness presenteeism." Journal of Epidemiology and Community Health **54**(7): 502-509.

STUDY OBJECTIVE: The study is an empirical investigation of sickness presenteeism in relation to occupation, irreplaceability, ill health, sickness absenteeism, personal income, and slimmed down organisation. DESIGN: Cross sectional design. SETTING: Swedish workforce. PARTICIPANTS: The study group comprised a stratified subsample of 3801 employed persons working at the time of the survey, interviewed by telephone in conjunction with Statistics Sweden's labour market surveys of August and September 1997. The response rate was 87 per cent. MAIN RESULTS: A third of the persons in the total material reported that they had gone to work two or more times during the preceding year despite the feeling that, in the light of their perceived state of health, they should have taken sick leave. The highest presenteeism is largely to be found in the care and welfare and education sectors (nursing and midwifery professionals, registered nurses, nursing home aides, compulsory school teachers and preschool/primary educationalists. All these groups work in sectors that have faced personnel cutbacks during the 1990s). The risk ratio (odds ratio (OR)) for sickness presenteeism in the group that has to re-do work remaining after a period of absence through sickness is 2.29 (95% CI 1.79, 2.93). High proportions of persons with upper back/neck pain and fatigue/slightly depressed are among those with high presenteeism ($p< 0.001$). Occupational groups with high sickness presenteeism show high sickness absenteeism (rho = 0. 38; $p<.01$) and the

hypothesis on level of pay and sickness presenteeism is also supported (rho = -0.22; p<0.01). CONCLUSIONS: Members of occupational groups whose everyday tasks are to provide care or welfare services, or teach or instruct, have a substantially increased risk of being at work when sick. The link between difficulties in replacement or finding a stand in and sickness presenteeism is confirmed by study results. The categories with high sickness presenteeism experience symptoms more often than those without presenteeism. The most common combination is low monthly income, high sickness absenteeism and high sickness presenteeism. [Publication Abstract] *no gender-based analysis

Banerjee, A., T. Daly, et al. (2008). Out of control: violence against personal support workers in long-term care Toronto, York University.

This university study reports on violence, unwanted sexual attention, and racial comments directed at personal support workers from residents in long-term care homes. The report draws on an international study comparing long-term care in three provinces (Manitoba, Nova Scotia and Ontario) in Canada and four Nordic European countries (Denmark, Finland, Norway and Sweden). In the Canadian setting, data from this study was derived from surveys administered to 948 personal support workers in 71 unionized facilities as well as 9 focus group sessions. Care workers in these facilities are primarily women, many whom are of immigrant status or from marginalized and racialized groups. In the context of Canadian facilities, physical, verbal and sexual violence are reported to be a persistent and widespread problem. Compared to their Nordic counterparts in Denmark, Finland, Norway and Sweden, Canadian personal support workers are seven times more likely to experience violence in the context of their work. The researchers' report 43 percent of personal support workers in Canada experience physical violence from residents on a daily basis, and 25 percent endure resident-to-staff violence weekly. Focus group sessions revealed that violence was constant and on going. Physical violence included being hit, punched, spat at, pinched, bitten, as well as the throwing of objects. Workers report their workplaces and conditions of work as intensely stressful and consistently mentally exhausting. Verbal violence by residents was a common occurrence and often included racial insults, being cursed at, screamed at, threats as well as degrading or demeaning comments. These incidents are reported by care workers to most often occur during direct care assistance/activities, such feeding, bathing, dressing, repositioning. The report indicates most incidents of violence go unreported by workers. Direct care workers report fear of blame or reprimand, time constraints, or the expectation that workers should tolerate or accept violence as "part of the job" as reasons for not reporting incidents of resident to staff violence. The study provides evidence for the relationship between violence and staffing levels including heavy workload demands in the long-term care work setting. The researchers note staffing levels in long-term care facilities are a key difference between Canada and Nordic countries.

Barnes-Farrell, J. L., D.-S. Kimberly, et al. (2008). "What aspects of shiftwork influence

off-shift well-being of healthcare workers?" Applied Ergonomics **39**(5): 589-593.

Characteristics of shiftwork schedules have implications for off-shift well-being. We examined the extent to which several shift characteristics (e.g., shift length, working sundays) are associated with three aspects of off-shift well-being: work-to-family conflict, physical well-being, and mental well-being. We also investigated whether these relationships differed in four nations. The Survey of Work and Time was completed by 906 healthcare professionals located in Australia, Brazil, Croatia, and the USA. Hierarchical multiple regression analyses supported the hypothesis that shiftwork characteristics account for significant unique variance in all three measures of well-being beyond that accounted for by work and family demands and personal characteristics. The patterns of regression weights indicated that particular shiftwork characteristics have differential relevance to indices of work-to-family conflict, physical well-being, and mental well-being. Our findings suggest that healthcare organizations should carefully consider the implications of shiftwork characteristics for off-shift well-being. Furthermore, although our findings did not indicate national differences in the nature of relationships between shift characteristics and well-being, shiftwork characteristics and demographics for healthcare professionals differ in systematic ways among nations; as such, effective solutions may be context-specific. [Publication Abstract] *sex breakdown; no gender-based analysis

Baumann, A., L. O'Brien-Pallas, et al. (2001). Commitment and care: the benefits of a healthy workplace for nurses, their patients and the system., Canadian Health Services Research Foundation.

This synthesis report considers: 1) the impact of work environment on nursing workforce health and well-being 2) possible solutions and strategies to improve the nursing work environment. Research indicates stress related to heavy workloads, extensive hours, low status, challenging workplace relations, workplace hazards, lack of control (e.g., over professional practice) and workplace hazards can affect physical and psychological health of the healthcare workforce. Recommendations are geared to professional, employer, research, educator, government and funding bodies.

Blaikie, H. (2008). Workplace violence in Canada: evolving OH&S obligations and management issues. OHS & WSIB Management Update.

[Publication Excerpt, p.4]: Increasingly the WSIB has been accepting traumatic mental stress complaints from workers who were harassed on an ongoing basis in the workplace or subjected to verbal threats, humiliation, or aggressive behaviour. Decision No. 2391/06,7 concerned a lab technician in a metal casting company. He suffered from cerebral palsy and was continuously harassed by two co-workers. The co-workers frequently yelled profanities and insults at him. The worker applied for WSIB benefits after he began suffering depression and paranoia. The application was initially denied on the grounds that there was no traumatic event. However, the Tribunal accepted the appeal, ruling that it was reasonable that a worker of average mental stability would perceive the situation to be mentally stressful and would as a result be at risk of a disabling mental

reaction. The fact that the worker in this case had a pre-existing psychological condition was not considered by the Tribunal to be a bar to receiving benefits. The Tribunal ordered the worker receive benefits for the 10 months he was absent from work. Despite these steps toward a broader definition of traumatic mental stress, it has recently been confirmed by the Tribunal that there is no entitlement for stress due to an employer's actions that are part of the management function, such as discipline. In Decision No. 620/08,8 the worker had signed a letter of complaint about his supervisor with 16 other workers. The worker alleged that following the submission of the letter his supervisor targeted him. The Tribunal found that although the supervisor grew extremely frustrated with the worker, conducted investigations and criticized the worker's performance the worker was not exposed to any objectively traumatic incident. Overzealous supervision does not constitute a traumatic event. Board policy dictates no entitlement for stress due to an employer's conduct that is part of the management function such as discipline.

Blazer, L. K. and P. K. Mansfield (1995). "A comparison of substance use rates among female nurses, clerical workers and blue-collar workers." Journal of Advanced Nursing **21**: 305-313.

The issue of impairment of practicing professional nurses by alcohol and other drugs bas become a critical concern since the 1980s. The literature abounds with conjectures about the large numbers of nurses who are impaired, often without valid data to support the claims that the problem in nursing is greater than it is in the general population. This study reflects an effort to compare the reported substance use of employed female nurses with that of two other groups of working females. Survey data from 920 nurses, 405 clerical workers and 200 females employed in non-traditional trades jobs in two large eastern states in the US revealed that there was little evidence of 'abuse' of any of 15 substances, nurses did not report higher rates of substance use than the other two groups, and most reported substance use occurred in the younger age groups, reflecting the national trend. The need for continuing research efforts and confirmation of valid data, and primary prevention efforts with young female workers, including at-risk student nurses, is made evident. [Publication Abstract] *female workers

Blythe, J., A. Baumann, et al. (2001). "Nurses' experiences of restructuring in three Ontario hospitals." Journal of Nursing Scholarship **33**(1): 61-68.

PURPOSE: To describe the effects of restructuring, particularly redeployment, on nurses' personal and work lives, and to compare the utility of "survivor syndrome" and empowerment as alternative concepts for understanding these effects and planning change. METHODS: Twenty-six focus groups or interviews were held with 59 nurses working in three hospitals in Ontario, Canada. FINDINGS: Participants described how restructuring strategies had affected them as individuals, as members of nursing teams, and as employees. In each of these aspects of their work lives, relationships became less integrated, their work activities became less controllable, and the changes compromised their ability to deliver effective care. CONCLUSIONS: Restructuring intensifies structural

weaknesses in professions, such as nursing, whose members are primarily employed by bureaucracies. Nurses may not find survivor syndrome a useful model to explain their low morale following restructuring because it identifies nurses as “patients” in need of therapy. An empowerment model that takes into account nurses' concerns about uncertainty and integration may be more fruitful for devising strategies to enhance their ability to practice effectively in hospital settings. [Publication Abstract]. *no sex breakdown; no gender-based analysis

Bourbonnais, R., C. Brisson, et al. (2005). "Psychosocial work environment and certified sick leave among nurses during organizational changes and downsizing." Relations industrielles **60**(3): 483-509.

The study aimed to determine whether the incidence and duration of certified sick leave (CSL) among nurses had increased during major restructuring of the health care system in the province of Québec, and to determine whether nurses exposed to adverse psychosocial factors at work showed an increased incidence of CSL. It involved nurses working in 13 health facilities. Sickness absence data were retrieved from administrative files (n = 1454). Incidence of CSL for all diagnoses and for mental health problems was examined. Telephone interviews were conducted to measure psychosocial factors at work with validated instruments. There was an increase in CSL among nurses during the restructuring, particularly for mental health problems. Modifiable adverse psychosocial work factors were identified and provide basis for interventions. Since human resources are the mainstay and primary resource of the health network, it is essential that people be able to perform their work under optimal conditions. [Publication Abstract] *women workers

Bourbonnais, R., C. Brisson, et al. (2005). "Health care restructuring, work environment and the health of nurses." American Journal of Industrial Medicine **47**(1): 54-64.

BACKGROUND: In the last 15 years, the health care system has undergone significant restructuring. The study's objective was to examine the psychosocial work environment and the health of nurses after major restructuring in comparison with two reference populations. METHODS: This cross-sectional study involved 2,006 nurses from 16 health centers. A questionnaire measured current work characteristics: psychological demands, decision latitude, and social support at work from Karasek's Job Content Questionnaire, organizational changes, and health effects. Prevalence ratios and binomial regression were used to examine the associations between current work characteristics, changes and psychological distress (PSI). RESULTS: There was a considerable increase in the prevalence of PSI and of adverse psychosocial work factors in comparison to the prevalence reported by a comparable group of nurses in 1994. These adverse factors were also more prevalent among nurses than among Québec working women and they were independently associated with psychological distress. CONCLUSION: Workplace interventions should be based on elements identified by many nurses as being problematic [Publication Abstract].*women workers; no gender-based analysis

Bourbonnais, R., M. Comeau, et al. (1999). "Job strain and the evolution of mental health among nurses." Journal of Occupational Health Psychology **4**(2): 95-107.

The objective of this 2nd phase of a 2-year study among female nurses was to provide further empirical validation of the demands-control and social support model. The association of job strain with psychological problems and the potential modifying role of social support at work were examined. A questionnaire was sent at the workplace to 1,741 nurses. The same associations were found between psychological demands, decision latitude, and a combination of the 2 with psychological distress and emotional exhaustion for current exposure and for cumulative exposure. Social support had a direct effect on these psychological symptoms but did not modify their association with job strain. Longitudinal and prospective data are needed to study the occurrence and persistence of health problems when exposure is maintained or retrieved. [Publication Abstract] *women workers; no gender-based analysis

Bourbonnais, R., M. Comeau, et al. (1998). "Job strain, psychological distress, and burnout in nurses." American Journal of Industrial Medicine **34**(1): 20-28.

The first phase of this longitudinal study consisted of a questionnaire completed by a cohort of 1,891 nurses (aged 23-65 years) from six acute care hospitals from the province of Québec. This study was set up to investigate the association between the psychosocial environment of work and mental health. After adjusting for confounding factors, a combination of high psychological demands and low decision latitude was associated with psychological distress and emotional exhaustion, one of the three dimensions of burnout. Social support at work, although associated with each of the mental health indicators, did not modify their association with job strain. The present study identified conditions of the work environment that are modifiable and provide the basis for interventions that focus beyond the modification of individual coping strategies. [Publication Abstract] *women workers; no gender-based analysis

Bourbonnais, R. and M. Mondor (2001). "Job strain and sickness absence among nurses in the province of Quebec." American Journal of Industrial Medicine **39**: 194-202.

Using Karasek's job strain model, the objective of the study was to determine whether nurses exposed to job strain had a higher incidence of sick leave than nurses not exposed. The design was longitudinal. Data on sick leave were collected for 1,793 nurses for a 20-month period: short-term leaves and certified sick leaves. The Job Content Questionnaire was used to measure psychological demands, job decision latitude, and social support at work. Short-term sick leaves were associated with job strain (incidence density ratio (IDR) = 1.20) and with low social support at work (IDR = 1.26). Certified sick leaves were also significantly associated with low social support at work (IDR = 1.27 for all diagnoses and IDR = 1.78 for mental health diagnoses). Our results support the association between job strain and short-term sick leaves. The association with certified sick leaves is also significant for subgroups of nurses with specific job characteristics. Social support at work, although associated with all types of sick leaves measured, does not modify the association between job strain and

absence. [Publication Abstract] *women workers; no gender-based analysis

Bru, E., R. J. Mykletun, et al. (1996). "Work-related stress and musculoskeletal pain among female hospital staff." Work & Stress **10**(4): 309-321.

Musculoskeletal back pain and perceived psychosocial and organizational factors at work (POW factors) were studied in a sample of 586 female hospital staff. Musculoskeletal pain was assessed by self-report. Three POW factors were identified by factor analyses of the Cooper stress check: institutional policy, work overload, and social relations, whereas factor analyses of a scale check: institutional policy, work overload, and social relations, whereas factor analyses of a scale designed for this particular study (the RJM scale) identified four additional POW factors: professional and social support, work content, responsibility, and work-home overflow. The main conclusions from this study are as follows: (1) POW factors are associated with musculoskeletal back pain. (2) These associations increase when psychosocial and organizational load occur in combination with ergonomic load and full-time employment. (3) POW factors tend to be more closely associated with neck pain than with low-back pain or shoulder pain. (4) All three POW factors identified by the Cooper stress check were significantly associated with back pain among female hospital staff. Of these, work overload, assessing qualitative and qualitative work load, yielded the strongest associations. (5) Of the POW factors identified by the RJM scale, work content, assessing variation and challenge of work tasks, was the factor that most frequently accounted for variance in back pain beyond POW factors identified by the Cooper stress check [Publication Abstract] *women workers; no gender-based analysis

Brulin, C., A. Winkvist, et al. (2000). "Stress from working conditions among home care personnel with musculoskeletal symptoms." Journal of Advanced Nursing **31**(1): 181-189.

A large proportion of the working population experiences musculoskeletal symptoms, which affect the individual's quality of life. Neck/shoulder and/or low back complaints are common among home care personnel. This occupational sector is characterized by high physical and psychosocial demands and the staff is typically female. The aim of this qualitative study was to gain a deeper understanding of those factors in the work environment of home care personnel that the individuals perceive as demanding and problematic. Eight employees in the home care service were interviewed in depth. Each interview was transcribed and Grounded Theory was applied. Stress, related to demanding physical and psychosocial working conditions, emerged as the core variable that probably contributed to the development and maintenance of musculoskeletal symptoms. Financial cut-backs at the municipality was seen as a cause of the demanding working conditions. In future studies it is important to evaluate prevention programmes focused upon coping strategies against stress. [Publication Abstract] *women workers; no gender-based analysis

Burke, R. J. (2003). "Survivors and victims of hospital restructuring and downsizing:

who are the real victims?" International Journal of Nursing Studies **40**(8): 903-9.

This study reports the results of a longitudinal study of the effects of hospital restructuring and downsizing on nursing staff satisfaction and psychological well-being. Participants completed questionnaires in November 1996 and November 1999. All were employed as hospital-based nurses in 1996 but some had left hospital nursing for other jobs by 1999. Nurses still employed in hospital settings (N=744) were compared with nurses now employed elsewhere (N=74). Hospital-based nursing staff reported less job satisfaction, more absenteeism, greater psychological burnout and poorer psychological well-being than nurses now employed elsewhere. [Publication Abstract] *sex breakdown; no gender-based analysis

Burke, R. J. and E. Greenglass (1999). "Work-family conflict, spouse support, and nursing staff well-being during organizational restructuring." Journal of Occupational Health Psychology **4**(4): 327-36.

This study examined work and family conflict, spouse support, and nursing staff well-being during a time of hospital restructuring and downsizing. Data were collected from 686 hospital-based nurses, the vast majority (97%) women. Nurses reported significantly greater work-family conflict than family-work conflict. Personal demographic but not downsizing and restructuring variables predicted family-work conflict; downsizing and restructuring variables but not personal demographics predicted work-family conflict. Spouse support had no effect on work-family conflict but reduced family-work conflict. Both work-family conflict and family-work conflict were associated with less work satisfaction and greater psychological distress. [Publication Abstract] *sex breakdown; no gender-based analysis

Burke, R. J. and E. Greenglass (2000). "Effects of hospital restructuring on full and part-time nursing staff in Ontario." International Journal of Nursing Studies **37**(2): 163-71.

This study examined the effects of hospital restructuring and downsizing on full-time and part-time nursing staff. Data were collected from 1362 nursing staff, a 35% response rate, using anonymous questionnaires. Measures included personal and situational characteristics, hospital restructuring and downsizing variables, work outcomes and psychological well-being indicators, and work-family experiences. Although full and part-time nurses were significantly different on most personal and demographic characteristics, both groups experienced and described hospital restructuring and downsizing similarly. Full-time nurses reported greater emotional exhaustion and poorer health and indicated greater absenteeism and lower intention to quit. [Publication Abstract] *participant sex breakdown; sex aggregated data; no gender-based analysis

Burke, R. J. and E. Greenglass (2000). "Hospital downsizing and restructuring in Canada: are less experienced nurses at risk?" Psychological Reports **87**: 1013-1021.

The health care sector has undergone significant change during the past decade as hospitals struggle to provide the same service with fewer resources. This study examined perceptions of hospital restructuring and downsizing and their

effects on nursing staff as a function of years in nursing. Data were obtained from 1,362 staff nurses by questionnaire. Nursing staff having less tenure generally described and responded to hospital restructuring and downsizing in more negative terms. Nursing staff having less tenure were in better health, reflecting their younger age. Some implications for hospital administration and the nursing profession are raised. Entrants to hospital-based nursing staff positions are the life blood of the profession. Their reactions to hospital restructuring and downsizing may influence their commitment to nursing as well as hospital functioning. The profession may have difficulty attracting young women and men into nursing programs. As longer tenured nursing staff retire, a potential shortage of nurses may result. [Publication Abstract] *participant sex breakdown; sex aggregated data; no gender-based analysis

Burke, R. J. and E. Greenglass (2000). "Work status congruence, work outcomes and psychological well-being." Stress Medicine **16**: 91-99.

This study investigated work status congruence, work outcomes and psychological well-being among nursing staff. Data were collected from 1362 hospital-based nurses using anonymous questionnaires. Nurses indicated whether they were currently working full-time or part-time and whether they preferred to work full-time or part-time. Four work status groups were then compared. There were considerable demographic differences between the four work status groups. Nursing staff having congruent work status were generally more satisfied and reported higher levels of psychological wellbeing. The two work status incongruent groups of nurses were found to have different correlates and consequences [Publication Abstract] *participant sex breakdown; sex aggregated data; no gender-based analysis

Burke, R. J. and E. Greenglass (2001). "Stress and the effects of hospital restructuring in nurses." The Canadian Journal of Nursing Research **33**(2): 93-108.

This study examines the extent of stress and burnout experienced by nurses during hospital restructuring. It includes both job-related outcomes such as job satisfaction and burnout, and psychosomatic outcomes such as depression. The study compares effects attributable to number of hospital restructuring initiatives with those attributable to specific work stressors such as workload, bumping (where one nurse replaces another due to greater seniority), and use of unlicensed personnel to do the work of nurses. It also examines the role of personal resources including self-efficacy and coping. Results show that, in hospitals undergoing restructuring, workload is the most significant and consistent predictor of distress in nurses, as manifested in lower job satisfaction, professional efficacy, and job security. Greater workload also contributed to depression, cynicism, and anxiety. The practice of bumping contributed to job insecurity, depression, and anxiety. The results point to specific deleterious effects of hospital restructuring. Implications of the findings are discussed. The extent to which workload issues are managed through appropriate practices can be expected to match the extent of nurses' experience of either job satisfaction or depression and anxiety. Such practices need to be part of an ongoing process of

interaction between the hospital administration and nurses. [Publication Abstract] *participant sex breakdown; sex aggregated data; no gender-based analysis

Burke, R. J. and E. R. Greenglass (2001). "Hospital restructuring and nurse staff well-being: the role of perceived hospital and union support." Anxiety, Stress, & Coping **14**: 93-115.

This research examined the effects of perceived hospital and union support on work satisfaction and psychological well-being of nursing staff during a period of hospital restructuring and downsizing. Data were collected from 1363 hospital-based nurses using anonymous questionnaires. Respondents reported receiving moderate levels of both hospital and union support during this period. However nursing staff reporting higher levels of perceived hospital support indicated greater job satisfaction, more job security, lower levels of psychological burnout and fewer psychosomatic symptoms, controlling for personal and work situation factors and extent of restructuring and downsizing initiatives. Implications for organizational management during downsizing and reorganization are drawn. [Publication Abstract] *participant sex breakdown; sex aggregated data; no gender-based analysis

Campolieti, M., J. Goldenberg, et al. (2008). "Workplace violence and the duration of workers' compensation claims." Relations industrielles **63**(1): 57-84.

Based upon unique Canadian administrative data from the years 1996 to 1999, this study examines the duration of absences from work due to injuries arising from workplace violence with a hazard model. We find that policing and nursing occupations, larger health care expenditures and more severe acts of violence are associated with longer absences from work. On the other hand,workers from larger firms have shorter absences from work. Our estimates are also quite sensitive to the inclusion of unobserved heterogeneity distribution, i.e., an individual specific random effect. This suggests that unobservable factors, such as stress and psychological or psychosomatic problems resulting from the workplace violence could have a large impact on the duration of work absences. [Publication Abstract] *no gender-based analysis

Chappell, N. L. and M. Novak (1992). "The role of support in alleviating stress among nursing assistants." The Gerontologist **32**(3): 351-359.

This paper provides a direct test of the buffering hypothesis that the negative effects of stressors (measured as burden, burnout, and perceived job pressure) on nursing assistants working in long-term care institutions are moderated by social support (at work and external to work). The buffering hypothesis was not confirmed, though some support for a main effects view was found. Social support at work, specifically training to work with residents with cognitive impairment, and support from family and friends can assist nursing assistants in dealing with burnout and perceived job pressure. However, major steps in alleviating burden, burnout, and perceived job pressure must be to decrease or change the workload and provide rewards on the job. [Publication Abstract] *participant sex breakdown; sex aggregated data; no gender-based analysis

Clarke, M., W. Lewchik, et al. (2007). "'This just isn't sustainable: precarious employment, stress and workers' health." International Journal of Law and Psychiatry **30**: 311-326.

This paper explores the impact of precarious employment relationships on health outcomes. It uses a novel framework, “Employment Strain” to describe the characteristics of different employment relationships and how they impact health outcomes. It uses interview data and comments provided on a survey to explore these issues. The paper begins by exploring if the health effects reported by mid-career individuals in precarious employment are different from those of younger and older workers. Finding limited evidence to support this hypothesis, the paper goes on to explore in detail the conditions under which precarious employment does increase stress and tension and impact health outcomes. It concludes that a combination of an individual's desire for more permanent employment, the expectation that permanent employment will be found, and the support individuals receive from various sources are critical to understanding the health effects of precarious employment. [Publication Abstract] *gender-based analysis

Cohen, M., A. Yassi, et al. (2003). Reducing injuries in intermediate care: risk factors for musculoskeletal and violence-related injuries among care aides and licensed practical nurses in intermediate care facilities, Workers' Compensation Board of BC, Hospital Employees' Union, Occupational Health and Safety Agency for Healthcare in BC, Institute of Health Promotion Research, Canadian Institutes of Health Research, University of British Columbia,.

The objective of this study are to identify risk factors (organizational, psycho-social, biochemical) associated with injuries amongst Intermediate care staff. Section 3 of this report reviews Canadian data and research linking stress in the healthcare workplace to increasing job demands, stressful tasks, organizational culture, work intensification, low job control, and reduced resources arising from restructuring and downsizing. The report concludes with a discussion of intervention strategies to reduce staff injury and improve staff well-being in these healthcare settings.

Cummings, G. and C. Estabrooks (2003). "The effects of hospital restructuring that included layoffs on individual nurses who remained employed: a systematic review of impact." International Journal of Sociology and Social Policy **23**(8/9): 8-53.

This study purpose was to assess the evidence on the effects of hospital restructuring that included layoffs, on nurses who remained employed, using a systematic review of the research literature to contribute to policy formation. Papers addressing research, hospital restructuring resulting in layoffs, effects on nurses, and a stated relationship between the independent and dependent variables were included. Data were extracted and the quality of each study was assessed. The final group of included studies had 22 empirical papers. The main effects were significant decreases in job satisfaction, professional efficacy, ability to provide quality care, physical and emotional health, and increases in turnover, and disruption to health care team relationships. Nurses with fewer years of

experience or who experienced multiple episodes of restructuring experienced greater effects. Other findings remain inconclusive. Further research is required to determine if these effects are temporal or can be mitigated by individual or organizational strategies. [Publication Abstract] *no gender based analysis

Decker, F. H. (1997). "Occupational and nonoccupational factors in job satisfaction and psychological distress among nurses." Research in Nursing Health **20**.

To facilitate nurses' job satisfaction and reduce their psychological distress, it is useful for a nursing manager to know whether factors within the workplace provide greater prediction of these affective states than variables outside the domain of work, and whether there are common predictors of satisfaction and distress. The relative importance of occupational and nonoccupational variables in the prediction of job satisfaction and psychological distress was investigated in a survey of hospital nurses (N 5 376). Perceived relations with the head nurse, coworkers, physicians, and other units/departments, along with unit tenure and job/nonjob conflict, were predictors of job satisfaction. Personal disposition (anxiety-trait), social integration, unit tenure, professional experience, position level, and job/nonjob conflict, along with the relations with the head nurse and physicians, were predictors of psychological distress. The relations with the head nurse and physicians, as well as unit tenure and job/nonjob conflict, were predictors of both satisfaction and distress. The prediction by unit tenure is noteworthy. Unit tenure had a negative relationship to satisfaction and a positive one to distress, whereas total experience had a negative relationship to psychological distress and none with job satisfaction. The role of unit tenure in nurses' affective experiences warrants more attention in future research, along with the role of job/nonjob conflict and other variables predictive of nurses' satisfaction and distress. [Publication Abstract]. *women workers; no gender-based analysis

Denton, M., I. U. Zeytinoglu, et al. (2002). "Working in clients' homes: the impact on the mental health and well-being of visiting home care workers." Home Health Care Services Quarterly **21**(1): 1-27.

The purpose of this paper is to examine the effects of working in clients' homes on the mental health and well-being of visiting home care workers. This paper reports the results of a survey of 674 visiting staff from three non-profit home care agencies in a medium-sized city in Ontario, Canada. Survey results are also complimented by data from 9 focus groups with 50 employees. For purposes of this study, home care workers include visiting therapists, nurses, and home support workers. Mental health and well-being is measured by three dependent variables: stress; job stress; and intrinsic job satisfaction. Multiple least squared regression analyses show several structural, emotional, physical, and organizational working conditions associated with the health and well-being of visiting home care workers. Overall, results show that workload, difficult clients, clients who take advantage of workers, sexual harassment, safety hazards, a repetitious job, and work-related injuries are associated with poorer health. Being fairly paid, having good benefits, emotional labour, organizational support, control

over work, and peer support are associated with better health. Results suggest that policy change is needed to encourage healthier work environments for employees who work in clients' homes. [Publication Abstract] *no sex breakdown; no gender-based analysis

Denton, M., I. U. Zeytinoglu, et al. (2003). Organizational change and the health and well-being of home care workers
Social and Economic Dimensions of an Aging Population Research Papers 110, McMaster University**:** 139.

OBJECTIVE: The objective of this research is to study the impact of health care restructuring and other organizational changes on the mental and physical health of home care workers. METHODS: This study covers 11 agencies and 7 union locals. We interviewed 59 key decision-makers, 171 workers in 29 focus groups, and surveyed 1,311 workers (70% response rate). Qualitative data are analyzed for themes and quantitative data analysis consists of descriptive statistics and associations between variables. RESULTS: The restructuring of the health care sector and organizational change have increased stress levels and musculoskeletal disorders of home care workers. Physical health problems among this workforce are much higher than the comparable group in the Canadian population. Restructuring and organizational change are significant factors in decreasing job satisfaction, while increasing absenteeism rates, fear of job loss, and propensity to leave. CONCLUSIONS: Occupational health problems experienced by these workers are preventable. It is important to acknowledge that occupational stress can result from incremental changes in the work and external work environment, affecting physical health, job dissatisfaction, absenteeism, and propensity to leave. Sufficient government funding to provide services, avoiding continuous changes in the work environment, and creating supportive work environments can positively contribute to workers' health [Publication Abstract].

Denton, M., I. U. Zeytinoglu, et al. (2002). "Job stress and job dissatisfaction of home care workers in the context of health care restructuring." International Journal of Health Services **32**(2): 2327-2357.

Changes in the social organization of home care work due to health care restructuring have affected the job stress and job dissatisfaction of home care workers. This article reports the results of a survey of 892 employees from three nonprofit home care agencies in a medium-sized city in Ontario, Canada. Survey results are complemented by data from 16 focus groups with 99 employees. For the purposes of this study, home care workers include both office workers (managers, supervisors, coordinators, office support staff, and case managers) and visiting workers (nurses, therapists, and visiting homemakers). Focus group participants indicated that health care restructuring has resulted in organizational change, budget cuts, heavier workloads, job insecurity, loss of organizational support, loss of peer support, and loss of time to provide emotional labouring, or the "caring" aspects of home care work. Analyses of survey data show that organizational change, fear of job loss, heavy workloads, and lack of

organizational and peer support lead to increased job stress and decreased levels of job satisfaction. [Publication Abstract] *gender-based analysis

Drentea, P. and M. A. Goldner (2006). "Caregiving outside of the home: the effects of race on depression." Ethnicity & Health **11**(1): 41-57.

Objective. This research examines the conditions that determine whether Blacks experience lower or higher levels of depression while caregiving outside of the home, as compared to Whites. Some prior literature has found that African Americans report a lesser caregiver burden despite an increased likelihood that they will acquire this role, and decreased resources to do so. Others have found that African Americans experience the same caregiver burden and distress as Whites. Given these mixed findings, we use the stress process model to examine whether African American caregivers experience lower or higher levels of depression when they provide care outside of the home. Design. A sample of care workers who provide care to others outside of the home was drawn from the 1992-4 National Survey of Families and Households. The final sample included 275 (11%) Blacks, and 2,218 (89%) Whites (not of Hispanic origin). The primary statistical method for predicting differences in caregivers' depressive symptomatology was OLS regression analysis with progressive adjustment. Results. We examined sociodemographics, family structure, resources, and stressors and found that African Americans, those with lower socioeconomic status, the unmarried, spending more weeks caregiving, having a physical impairment, and surprisingly receiving more help from parents are associated with higher depressive symptomatology. Stronger religious beliefs decreased depressive symptomatology for Blacks. The race effect was, in part, explained by family structure, amount of caregiving, and impairment of care worker. Conclusion. Contrary to prior literature, we found that Blacks are more depressed than White caregivers in large part because of lower socioeconomic status and greater stressors, and higher levels of physical impairment. Yet, strength in religious belief has a stress-buffering effect for African Americans. We suggest that policies that attempt to eliminate racial disparities in socioeconomic status and health could benefit these caregivers. [Publication Abstract] *no sex breakdown; no gender-based analysis

Dunn, L. A., U. Rout, et al. (1994). "Occupational stress amongst care staff working working in nursing homes: an empirical investigation." Journal of Clinical Nursing **3**(3): 177-183.

A questionnaire survey of care staff in nursing homes examined staff stress. Staff completed questionnaires covering Type A behaviour, job satisfaction, psychological well-being, relaxation behaviour, coping skills and demographic details. A specific measure of nursing home stress was developed following a pilot study. From a total sample of 375, 112 (30%) responses were obtained. On the stress questionnaire the major stressors were found to be 'unsatisfactory wages', 'shortage of essential resources', 'not enough staff per shift', 'feeling undervalued by management', 'lifting heavy patients' and 'working with colleagues who are happy to let others do the work'. Factor analysis of stress

questionnaire responses identified five major stress groupings. These were, 'differing expectations about patient care', 'management factors', 'lack of support from other staff', 'feeling inadequately trained to deal with job demands' and 'home-work conflicts'. Examination of stress outcomes showed that many staff were under pressure, with high levels of smoking and alcohol intake. Given the increasing importance of nursing home care for the elderly the present study is timely. The implications of the findings for further research, and for the training of staff in nursing homes are considered.[Publication Abstract]

Edwards, D., P. Burnard, et al. (2000). "Stress and burnout in community mental health nursing: a review of the literature." Journal of Psychiatric and Mental Health Nursing **7**(1): 7-14.

There is a growing body of evidence that suggests that many community mental health nurses (CMHNs) experience considerable stress and burnout. This review aimed to bring together the research evidence in this area for CMHNs working within the UK. Seventeen papers were identified in the literature, seven of which looked at stress and burnout for all members of community mental health teams (CMHTs) and the remaining 10 papers focused on CMHNs. The evidence indicates that those health professionals working as part of community teams are experiencing increasing levels of stress and burnout as a result of increasing workloads, increasing administration and lack of resources. For CMHNs specific stressors were identified. These included increases in workload and administration, time management, inappropriate referrals, safety issues, role conflict, role ambiguity, lack of supervision, not having enough time for personal study and NHS reforms, general working conditions and lack of funding and resources. Areas for future research are described and the current study of Welsh CMHNs is announced. This review has been completed against a background of further significant changes in the health service. In the mental health field, specific new initiatives will have a significant impact on the practice of community mental health nursing. A new National Framework for Mental Health, along with a review of the Mental Health Act (1983), will undoubtedly help to shape the future practice of mental health nursing. [Publication Abstract]

Eriksen, W., K. Tambs, et al. (2006). "Work factors and psychological distress in nurses' aides: a prospective cohort study." BMC Public Health **6**(290): 11

BACKGROUND: Nurses' aides (assistant nurses), the main providers of practical patient care in many countries, are doing both emotional and heavy physical work, and are exposed to frequent social encounters in their job. There is scarce knowledge, though, of how working conditions are related to psychological distress in this occupational group. The aim of this study was to identify work factors that predict the level of psychological distress in nurses' aides. METHODS: The sample of this prospective study comprised 5076 Norwegian nurses' aides, not on leave when they completed a mailed questionnaire in 1999. Of these, 4076 (80.3 %) completed a second questionnaire 15 months later. A wide spectrum of physical, psychological, social, and organisational work factors

were measured at baseline. Psychological distress (anxiety and depression) was assessed at baseline and follow-up by the SCL-5, a short version of Hopkins Symptom Checklist-25. RESULTS: In a linear regression model of the level of psychological distress at follow-up, with baseline level of psychological distress, work factors, and background factors as independent variables, work factors explained 2 % and baseline psychological distress explained 34 % of the variance. Exposures to role conflicts, exposures to threats and violence, working in apartment units for the aged, and changes in the work situation between baseline and follow-up that were reported to result in less support and encouragement were positively associated with the level of psychological distress. Working in psychiatric departments, and changes in the work situation between baseline and follow-up that gave lower work pace were negatively associated with psychological distress. CONCLUSION: The study suggests that work factors explain only a modest part of the psychological distress in nurses' aides. Exposures to role conflicts and threats and violence at work may contribute to psychological distress in nurses' aides. It is important that protective measures against violent patients are implemented, and that occupational health officers offer victims of violence appropriate support or therapy. It is also important that health service organisations focus on reducing role conflicts, and that leaders listen to and consider the views of the staff.[Publication Abstract] *sex aggregated data; no gender-based analysis

Estryn-Behar, M., M. Kaminski, et al. (1990). "Stress at work and mental health status among female hospital workers." British Journal of Industrial Medicine **47**(1): 20-8.

Relations between working conditions and mental health status of female hospital workers were studied in a sample of 1505 women: 43% were nurses, 32% auxiliaries, and 7% ancillary staff; 13% were other qualified health care staff, mainly head nurses; 5% had occupations other than direct health care; 63% worked on the morning, 20% on the afternoon, and 17% on the night shift. Data were collected at the annual routine medical visit by the occupational health practitioner, using self administered questionnaires and clinical assessments. Five health indicators were considered: a high score to the general health questionnaire (GHQ); fatigue; sleep impairment; use of antidepressants, sleeping pills, or sedatives; and diagnosis of psychiatric morbidity at clinical assessment. Four indices of stress at work were defined: job stress, mental load, insufficiency in internal training and discussion, and strain caused by schedule. The analysis was conducted by multiple logistic regression, controlling for type of occupation, shift, number of years of work in hospital, daily travel time to work, age, marital status, number of children, and wish to move house. Sleep impairment was mostly linked to shift and strain due to schedule. For all other indicators of mental health impairment and especially high GHQ scores, the adjusted odds ratios increased significantly with the levels of job stress, mental load, and strain due to schedule. This evidence of association between work involving an excessive cumulation of stress factors and mental wellbeing should be considered in interventions aimed at improving the working conditions of hospital workers. [Publication Abstract] *women workers; no gender-based analysis

European Agency for Safety and Health at Work (2003). Gender issues in safety and health at work - a review.

Achieving gender equality in all aspects of employment is now a key European priority. It is a matter of rights, but it is also a matter of sound economic policy - especially considering the human and economic costs of injuries and ill health caused or made worse by work. The report highlights the dual importance of considering gender in risk prevention and including occupational safety and health in gender equality employment activities. Cooperation between these two policy areas is crucial, from the European level, down to the workplace, to promote improved workplace risk prevention for both women and men. [Publication Summary]

Felton, J. S. (1998). "Burnout as a clinical entity - its importance to health care workers." Occupational Medicine **48**(4): 237-50.

Burnout, viewed as the exhaustion of physical or emotional strength as a result of prolonged stress or frustration, was added to the mental health lexicon in the 1970's, and has been detected in a wide variety of health care providers. A study of 600 American workers indicated that burnout resulted in lowered production, and increases in absenteeism, health care costs, and personnel turnover. Many employees are vulnerable, particularly as the American job scene changes through industrial downsizing, corporate buyouts and mergers, and lengthened work time. Burnout produces both physical and behavioural changes, in some instances leading to chemical abuse. The health professionals at risk include physicians, nurses, social workers, dentists, care providers in oncology and AIDS-patient care personnel, emergency service staff members, mental health workers, and speech and language pathologists, among others. Early identification of this emotional slippage is needed to prevent the depersonalization of the provider-patient relationship. Prevention and treatment are essentially parallel efforts, including greater job control by the individual worker, group meetings, better up-and-down communication, more recognition of individual worth, job redesign, flexible work hours, full orientation to job requirements, available employee assistance programmes, and adjuvant activity. Burnout is a health care professional's occupational disease which must be recognized early and treated [Publication Abstract]. *sex breakdown; no gender-based analysis

Fillion, L., I. Tremblay, et al. (2007). "Job satisfaction and emotional distress among nurses providing palliative care: empirical evidence for an integrative occupational stress-model." International Journal of Stress Management **14**(1): 1-25.

This study tested an integrative occupational stress-model with a sample of 209 palliative-care nurses who responded to a survey. Using two hierarchical regression models, including the Job Demand-Control-Support model, the Effort-Reward Imbalance model, and specific palliative care stressors and resources, results showed that best predictors of job satisfaction were job demand, effort, reward, and people-oriented culture, whereas best predictors of emotional

distress were reward, professional and emotional demands, and self-efficacy. Finally, using structural equation modeling, a two-factor occupational stress-model was developed, distinguishing job demands and job resources. Results emphasize the importance of using comprehensive and situation-specific models to study stress in specific worker populations, studying positive outcomes in stress research, and increasing job resources at work to prevent stress. [Publication Abstract] *no gender-based analysis

Flannery, R. B., M. A. Hanson, et al. (1995). "Patients' threats: expanded definition of assault." General Hospital Psychiatry **17**: 451-453.

Most studies of patient assaults against staff operationally define violence as episodes of unwanted physical or sexual contact. This study empirically assessed a broader range of patient violence by including verbal and nonverbal threats in addition to sexual and physical assaults. Preliminary data from a statewide survey suggested that patient threats were frequent events. Data from a team of staff assaulted by patients in one hospital suggested that some verbal threats produced as much psychological distress for staff victims as did some physical assaults. These findings suggest the need to consider including threats in future studies of patient assaults. [Publication Abstract] *sex breakdown; no gender-based analysis

Forastieri, V. (2000). Information note on women workers and gender issues on occupational safety and health. Geneva, International Labour Office.

This paper discusses the importance of gender in relation to occupational safety and health research. Research relating to the occupational safety and health of women is under-developed. This, in part, is related to assumptions about women's work and limitations on what constitutes or is recognized as legitimate occupational injury and illness (predicated on a male norm). Factors that create and or intensify work stress are discussed (e.g., organization of work, workload demands, autonomy and control over work, job security). The report concludes with recommendations for integrating a gender perspective into the area of occupational health and safety.

Fox, M., D. Dwyer, et al. (1993). "Effects of stressful job demands and control on physiological and attitudinal outcomes in a hospital settings." Academy of Management Journal **36**(2): 289-318.

We tested the job demands--job control model of stress with a group of 136 registered nurses. Significant interactions between subjective and objective measures of work load and a measure of perceived control predicting physiological and attitudinal outcomes indicated support for the model. In addition, objectively assessed job demands were significantly associated with blood pressure and cortisol levels. The model also predicted elevations in physiological responses after individuals left work, suggesting that potentially health-impairing reactions to jobs that have high demands and low controllability might carry over to home settings and thus pose a high risk of long-term health impairment. The results have implications for the role of personal control in

occupational stress generally and for nurse-management practices specifically. [Publication Abstract] *sex aggregated; predominately female study participants; no gender-based analysis

Geiger-brown, J., C. Mutaner, et al. (2004). "Demanding work schedules and mental health in nursing assistants working in nursing homes." Work & Stress **18**(4): 292-304.

Nursing home assistants have physically and emotionally challenging jobs, and they often work demanding schedules in order to provide 24h care. While the physical effects of demanding work schedules have been studied, little is known about the impact on mental health. This study explored the relationship between demanding scheduling variables and mental health indicators of depression, anxiety and somatization. A cross-section of 473 US female nursing assistants working in nursing homes was surveyed. Work schedule characteristics included shiftwork, hours per day and week, days per week, number of weekends per month, number of double shifts per month, breaks, and number of jobs worked. Working two or more double-shifts per month was associated with increased risk for all mental health indicators, and working 6-7 days per week was associated with depression and somatization. There was a trend for increasing odds of adverse mental health with increased numbers of demanding work schedule factors. The odds of depression was increased four-fold when working 50+ h/week, more than two weekends/month and more than two double shifts/month. Providing work schedules that are less unhealthy may have implications for both worker retention and the quality of care delivered to nursing home residents [Publication Abstract] *women workers; no gender-based analysis

Gillespie, M. and V. Melby (2003). "Burnout among nursing staff in accident and emergency and acute medicine: a comparative study." Journal of Clinical Nursing **12**: 842-851.

This study was designed to identify the prevalence of burnout among nurses working in Accident and Emergency (A & E) and acute medicine, to establish factors that contribute to stress and burnout, to determine the experiences of nurses affected by it and highlight its effects on patient care and to determine if stress and burnout have any effects on individuals outside the clinical setting. A triangulated research design was used incorporating quantitative and qualitative methods. Maslach Burnout Inventory was used. Nurses working in acute medicine experienced higher levels of emotional exhaustion than their A & E counterparts. The overall level of depersonalization was low. High levels of personal accomplishment were experienced less by junior members of staff. Stress and burnout have far reaching effects both for nurses in their clinical practice and personal lives. If nurses continue to work in their current environment without issues being tackled, then burnout will result. The science of nursing does not have to be painful, but by recognition of the existence of stress and burnout we can take the first steps towards their prevention. [Publication Abstract] *no gender-based analysis; sex aggregated data

Glasberg, A. L., A. Norberg, et al. (2007). "Sources of burnout among healthcare

employees as perceived by managers." Journal of Advanced Nursing **60**(1): 10-19.
AIM. This paper is a report of a study to investigate healthcare managers' perspectives on factors contributing to the increase of healthcare employees on sick leave for burnout symptoms. BACKGROUND. Current turbulent healthcare reorganization has resulted in structural instability, role conflicts and vague responsibility commitments, all of which contribute to increasing numbers of sick days caused by burnout symptoms. Managers' perceptions of burnout sources are important as these perceptions guide the actions taken to prevent burnout. METHOD. Interviews were carried out with 30 healthcare managers, with different occupational backgrounds and from different units. The data were collected in Sweden in 2003 and analysed using thematic qualitative content analysis. FINDINGS. According to the healthcare managers, continuous reorganization and downsizing of healthcare services has reduced resources and increased demands and responsibilities. These problems are compounded by high ideals and expectations, making staff question their own abilities and worth as well as making them feel less confirmed and less valued as people. The main finding indicates that healthcare employees are thrown into a spiraling sense of inadequacy and an emerging sense of pessimism and powerlessness. CONCLUSION. To understand and influence people's actions, one has to understand their perceptions and thoughts - their explanatory models. This study shows the complexity and interconnection between sources of burnout as perceived by healthcare managers, and highlights the encouragement of realism without the destruction of enthusiasm as an important factor in management and healthcare practice. [Publication Abstract]

Gottlieb, B. H., E. K. Kelloway, et al. (1996). "Predictors of work family conflict, stress, and job satisfaction among nurses." The Canadian Journal of Nursing Research **28**(2): 99-117.
Using multiple regression analysis, this study examined the contribution of demographic, job-related, social-support, and caregiving variables to the prediction of work-family conflict, stress, and job satisfaction among a sample of 101 hospital-based nurses who had responsibility for the care of a child and/or an elderly relative. The results revealed that family support, perceived organizational support for family life, perceived workload size, and involvement in child care were mainly responsible for the outcomes studied. In addition, the study underscores the importance of separately measuring both the source and the direction of work-family conflict. [Publication Abstract] *no gender-based analysis; sex aggregated

Greenglass, E. and R. J. Burke (2000). "Hospital downsizing, individual resources, and occupational stressors in nurses." Anxiety, Stress, & Coping **13**(4): 371-390.
Restructuring and downsizing are occurring increasingly throughout the workplace. As a result, many individuals are losing their jobs. Many others experience job insecurity as a result of the threat of downsizing. As with most other work spheres, several hospitals are closing, resulting in thousands of layoffs. Since nurses constitute one of the main groups employed in hospitals,

they are faced with increasing job shortages. This study examines psychological reactions of nurses in response to stressors resulting from hospital downsizing. Individual resources, particularly coping strategies and self-efficacy, can affect the extent to which individuals experience distress as a result of downsizing. A self-report, anonymous questionnaire was filled out and returned by 1363 nurses employed in hospitals in Canada. Results of this study show that amount of work was a consistent and significant stressor in nurses. The greater the nurse's workload, the greater her emotional exhaustion, cynicism, depression and anxiety. Further results reported here indicated that control coping and self-efficacy lessened distress on the job and increased job satisfaction, while escape coping was associated with greater psychological distress and less job security. [Publication Abstract] *participant sex breakdown; sex aggregated; no gender-based analysis

Grinspun, D. (2003). "Part-time and casual nursing work: the perils of healthcare restructuring." The International Journal of Sociology and Social Policy **23**(8/9): 54-80.

Health care restructuring forced thousands of nurses in Canada into part-time and casual work. Despite the widespread use of such flexible employment arrangements, the topic has been scantly addressed in the nursing or general literature. This paper focuses on nursing within the context of a broader analysis of flexible labour markets. Given its prevalence, the focus is on part-time and casual work. Multiple employment and agency work are briefly touched upon - the first, as a necessity for nurses' financial survival; the second, as an example of the collision between employers' intended goals and outcomes. The paper first brings various perspectives that have not been advanced to theorize flexible labour. It then presents definitions and trends, focusing specifically on part-time and casual work in the general workforce, and comparing them to nursing trends. The latter brings to light the sharp increases in part-time and casual nursing during the 1990s in Canada. Taking into account the empirical evidence in other sectors, and the absence of it in nursing, the paper finally explores the implications for nurses, health care organizations, patients and policy. [Publication Abstract] *no gender-based analysis

Gruss, V., J. McCann, et al. (2004). "Job stress among nursing home certified nursing assistants: comparison of empowered and nonempowered work environments." Alzheimer's Care Quarterly **5**(3): 207-216.

As the primary caregivers in long-term care (LTC), certified nursing assistants (CNAs) experience high levels of job stress and extraordinary high turnover rates, resulting in a shortage of personnel at a time when we face an increasing demand for LTC workers. The purpose of this study was to examine job stress among dementia care CNAs working in empowered and nonempowered LTC environments and to determine which stressors were associated with the 2 types of environments. Results indicate that CNAs working in empowered environments reported more resident-focused stressors and CNAs working in a nonempowered environment reported more job-focused stressors. These results enhance our understanding of the nature of CNA job stress and may lead to the

development of interventions that reduce stress and create culture change with empowering work environments in an attempt to attract and retain employees. [Publication Abstract] *women workers; no gender-based analysis

Hall, D. S. (2004). "Work-related stress of registered nurses in a hospital setting." Journal for Nurses in Staff Development **20**(1): 6-14.

This qualitative, explorative study identified work-related stressors and coping mechanisms of registered nurses (RNs) within a hospital setting. A sample of 10 RNs was interviewed about work-related stressors and observed under normal working conditions. RNs identified stress related to failure to meet patients' needs, self-expectations, workload, and inexperienced colleagues. Staff development implications include education of clinical nurses and administrators in identifying systems barriers to providing patient care, interventional staffing, stress debriefing, patient assessment, and active coping. [Publication Abstract]

Hansson, A. S., E. Vingard, et al. (2008). "Organizational change, health, and sick leave among health care employees: a longitudinal study measuring stress markers, individual, and work site factors." Work & Stress **22**(1): 69-80.

This controlled longitudinal study was conducted to investigate the effects of organizational change on employees' self-reported health, work satisfaction, work-related exhaustion, stress, and sick leave. The population consisted of 226 employees at T1 and 198 at T2, divided into a study group affected by organizational changes, and a reference group not affected by them. Group differences for the outcome measures self-rated health (SRH), work satisfaction, work-related exhaustion, and hormones associated with stress were analysed using a two-factor ANOVA design for repeated measurements. Our findings showed no significant differences, either across time or between groups for SRH, work satisfaction, and work-related exhaustion. However, we did find significant change across time and between groups for the recovery hormone DHEA-S. Days of sick leave increased by 7% for employees in the study group and by 2% in the reference group. Serum cortisol showed significantly decreased levels across time but not between groups. The decreased recovery potential in the study group might have long-term health implications. The study points to the importance of looking at the impact of organizational change on employee well-being from a number of perspectives, such as self-reported health parameters, registered sick-leave data, and biological stress markers [Publication Abstract] *sex breakdown; sex aggregated data; no gender-based analysis

Iskera-golec, I., S. Folkard, et al. (1996). "Health, well-being and burnout of ICU nurses on 12 and 8 h shifts." Work & Stress **10**(3): 251-256.

It is generally agreed that some features of shift systems can influence the extent of well-being and health problems experienced by the workers involved. Extended working days (9-12 h) have been found to aggravate some problems associated with shiftwork, especially when the work is mentally and emotionally demanding. The aim of the study was to compare measures of health, sleep, psychological and social well-being, job satisfaction and burnout of ICU nurses

on 12- and 8-h shifts. The groups of subjects were matched for age, length of shiftwork experience, marital status and number of hours worked. the 12-h shift nurses, when compared to their 8-h shift colleagues, experienced more chronic fatigue, cognitive anxiety, sleep disturbance and emotional exhaustion. Job satisfaction seems to be independent of the shift duration. The nurses on 12-h shifts reported less social and domestic disruption than those on 8-h shifts. The 12-h shift nurses showed worse indices of health, well-being and burnout tan the 8-h shift nurses. It is suggested that this may be associated with their longer daily exposure to the stress of work. The increased number of rest days of 12-h shift nurses seems to be insufficient to dissipate the adverse health and well-being effects that built up over their longer shifts [Publication Abstract] *no gender-based analysis

Jamal, M. and V. V. Baba (2000). "Job stress and burnout among Canadian managers and nurses: an empirical investigation." Canadian Journal of Public Health **91**(6): 454-8.

This study examined the relationship of job stress with burnout and its three dimensions (emotional exhaustion, lack of accomplishment and depersonalization), job satisfaction, organizational commitment and psychosomatic health problems. Data were collected by means of a structured questionnaire from Canadian managers (N = 67) and nurses (N = 173). Pearson correlation and moderated multiple regression were used to analyze the data. Job stress was significantly correlated with overall burnout and its three dimensions and job satisfaction in both samples. In the nursing sample, job stress was also significantly correlated with psychosomatic health problems and organizational commitment. Moderated multiple regression only marginally supported the role of gender as a moderator of stress-burnout relationship. [Publication Abstract] *no gender-based analysis

Jennings, B. M. (2008). Work stress and burnout among nurses: role of the work environment and working conditions Patient safety and quality: an evidence-based handbook for nurses R. G. Hughes. Rockville, MD Agency for Healthcare Research and Quality

This chapter provides an overview of research relating to stress and burnout in healthcare professions. Research examining the relationship between gender and family obligations, personal characteristics, management styles are reviewed. Research designed to mitigate or reduce stress in healthcare professionals have focused on the role of social support and empowerment. Challenges related to conceptual ambiguity of stress and implications and limitations of evidence-based practice are considered. The author argues for more comprehensive research as well as research that explores the relationship between stress and burnout to patient outcomes.

Kandolin, I. (1993). "Burnout of female and male nurses in shiftwork." Ergonomics **36**(1-3): 141-147.

Burnout and psychological stress of nurses in two- and three-shift work was analysed. The study concerned 124 mental health nurses and 162 nurses of

mentally handicapped persons; half of the nurses were women. Fifty-two per cent were in three-shift work and the other half worked in two shifts. The Maslach Burnout Inventory was used as a measure of burnout. The inventory has three categories: psychological fatigue; loss of enjoyment of work; and (attitudinal) hardening. Female nurses in three-shift work reported more stress symptoms and had ceased to enjoy their work more often than women in two-shift work. Psychological fatigue and hardening were not dependent on the shift system. Male nurses experienced the same amount of burnout and stress in two- and three-shift work. Besides shiftwork, occupational demands and passive stress coping strategies contributed to the experience of burnout and stress. Family demands did not correlate with burnout of the nurses. [Publication Abstract] *sex breakdown; no gender-based analysis

Kaseberg, M., N. Chahal, et al. (2008). Changing the Workplace: Improving Mental Health of Hospital Workers, Summary of Work Conditions Results from Baseline Survey (Phase II), Occupational Health & Safety Agency for Healthcare in British Columbia.

BACKGROUND: Workplace related mental illness is becoming an increasingly serious problem for Canada and the Provinces. Although workplace mental illness is understood to be preventable, within British Columbia there is a lack of information about the specific work conditions that influence the mental health of healthcare workers. Additionally, no program exists for improving the work environment of healthcare workers at both the unit and organizational levels. To address this gap, the Changing the Workplace Collaborative was designed to implement and evaluate unit and organizational level interventions directed at improving mental health of acute care workers in Fraser, Interior, and Vancouver Coastal Health. This brief report summarizes frontline workers' responses to baseline survey questions on unit and organizational work conditions. METHODS: Thirty-six hospital units were randomly selected from three BC health authorities (Fraser, Interior, and Vancouver Coastal Health) and randomly assigned to either Intervention or Control groups. Informed consent for the baseline survey was obtained from 63% (1084) of eligible participants (all RNs, RPNs, LPNs, Care Aides and Unit Clerks who had worked at least one shift in the previous three months on the respective unit). To date, 848 participants have completed the survey including 604 Registered Nurses, 42 Registered Psychiatric Nurses, 101 Licensed Practical Nurses, 26 Student Nurses, 13 Nurses (unspecified), 67 Unit and Program Clerks, 12 Care Aids and 9 with non-specified occupations- representing a 78% response rate among registrants. The average age of respondents evaluated in this study was 42 years (standard deviation: 12 years), with 73% of the respondents being female. The 40 minute telephone survey was administered by an independent market research firm and included questions on both unit and organizational work conditions. FINDINGS: The mean scores and standard deviations of acute care workers' perceived positive and negative work conditions for closed-ended questions (i.e. questions with selection from provided multiple choice response options only) were quantified using scale measures. Quantitative data were reported for all participants (Figure 1). Based on quantitative findings, positive aspects of the

work environment include (i.e. mean score falls left of neutral on figure): reward and recognition; managerial leadership; positive spillover from family life to work. Based on quantitative findings, work conditions of concern include (i.e. mean score falls right of neutral on figure): high workloads as measured by high work demands and effort; poor physical environment; poor organizational communication; lack of involvement with organizational decision making; negative spillover from work to family life. Qualitative findings (obtained from written responses to questions rendered by participants) highlight that the presence and/or absence of certain work conditions can influence their perceived quality of care. This survey was conducted in a variety of units and hospitals in the participating health authorities, therefore representing a wide range of work environments. The five most frequently identified concerns perceived as contributing to difficulties in obtaining high levels of care amongst frontline workers were: insufficient staff; high patient acuity; lack of space or poor layout of physical environment; excessive patient or task volume; poor patient flow. Frontline workers also report work conditions that they felt promote high levels of care quality. The four most frequent responses were: sufficient staff, good teamwork, reasonable patient flow, reasonable patient or task volume. CONCLUSION: Based on the baseline study findings, high workload (comprised of high work demands, employee effort, patient acuity, excessive patient and task volume) and insufficient staffing were the most frequently cited concerns by participants. The results also indicate that participants perceive themselves as providing a higher quality of patient care on units when these are not concerns. Both the quantitative and qualitative results suggest that the physical environment, including issues pertaining to a lack of space, limited patient beds and poor cleanliness are of concern to the participants. Some participants also indicated being concerned about organizational communication, input into decision making, and to a lesser extent, work-life imbalance. Participants reported having positive relationships with leadership although the qualitative results suggest that some frontline workers would prefer leadership that is more available, responsive and supportive. Results also indicate that employee rewards, such as promotion opportunities and recognition, are perceived to be sufficient. Finally, open-ended qualitative questions yielded a wide range of potential facilitators and challenges to the provision of quality patient care and warrant review. For example, personal characteristics of frontline workers, such as devotion, thoroughness, carefulness and experience were frequently reported as positively influencing provision of patient care. Thus, supporting and further developing these skills could potentially serve as tools to improve the overall work environment. The results are similar across the health authorities with a few minor exceptions. [Publication Brief Report]

Kemp, A. A. and P. Jenkins (1992). "Gender and technological hazards: women at risk in hospital settings." Organization and Environment **6**(2): 137-152.

In this paper, we describe and analyze hospitals as dangerous places to work. We summarize into four major areas the technological and social hazards to which health care workers are exposed: physical hazards and accidents,

chemical or toxicological hazards, infectious diseases, and social hazards - including stress and sexual harassment. Further, we discuss the structural barriers which mitigate workers' perceptions of these risks and limit their ability to define their workplace as dangerous. Primary among these are the occupational hierarchy, including sex and race segregation, and the differential vulnerability related to that hierarchy. We conclude that in place of a narrow research focus on the biological and technological nature of workplace hazards, we must also bring the worker in as a central and necessary actor to achieving a safe environment. [Publication Abstract] *gender-based analysis

Kennedy, B. R. (2005). "Stress and burnout of nursing staff working with geriatric clients in long-term care." Journal of Nursing Scholarship **37**(4): 381-382.

The purpose of this study was to examine the stress and burnout experience of nursing staff working with geriatric clients in long-term care. The study was conducted at a 252-bed nursing home in southeastern United States. [Publication Abstract] *no gender-based analysis

Koehoorn, M., G. S. Lowe, et al. (2002). Creating high-quality health care workplaces: a background paper for Canadian Policy Research Networks' National Roundtable. Ottawa, CPRN Discussion Paper No. W/14.

Health human resources have emerged as a top priority for research and action. This paper echoes calls for a fundamentally new approach to the people side of the health care system – treating employees as assets that need to be nurtured rather than costs that need to be controlled. The scope of the human resources crisis in health care is multi-dimensional in its symptoms, underlying causes, and consequences. Finding solutions to these problems starts with the recognition that the performance of any health care organization depends on motivated, knowledgeable, and well-resourced employees. Especially important are relationships among co-workers and between employees and employers. Furthermore, the same work environment factors that help to meet organizational goals (i.e., a ‘healthy’ or well-functioning organization), also contribute to positive worker outcomes ranging from physical well-being to skill development and job satisfaction. The question guiding the paper is: “What are the key ingredients of a high-quality work environment in Canada’s health care sector and how can this goal be achieved?” Synthesizing insights from a variety of research streams, the paper identifies many ingredients needed to create a high-quality workplace. We take a multidisciplinary and holistic approach, which complements other research initiatives on health human resources. The paper suggests that health care organizations can, and must, achieve a virtuous circle connecting work environments, individual quality of work life, and organizational performance. Doing so will require a bold new vision of health human resources, supported by a workplace culture and leadership approach that fully values the contributions of all staff. The paper makes 11 recommendations for policy and practice, many of which reflect discussions at a National Roundtable, organized by Canadian Policy Research Networks, in Ottawa on October 29, 2001. [Publication Abstract] *gender-based analysis not amongst recommendations

Lambert, V. A. and E. L. Clinton (2001). "Literature review of role stress/strain on nurses: an international perspective." Nursing and Health Sciences **3**: 161-172.

The presence of role stress/strain among nurses has been of concern throughout the world. However, to date, no one has conducted, from an international perspective, a literature review of research on the topic. This article assesses research from 17 countries, identifies the major areas of focus in the studies, compares and contrasts the findings, summarizes the state of the science on role stress/strain on nurses and makes recommendations for future research. [Publication Abstract]

Landsbergis, P. A. (2003). "The changing organization of work and the safety and health of working people." Journal of Occupational and Environmental Medicine **45**: 61-72.

Recent trends in the organization of work may affect worker health through a variety of pathways-by increasing the risk of stress-related illnesses, such as cardiovascular disease, musculoskeletal disorders, and psychological disorders, by increasing exposure to hazardous substances and violence on the job, or by affecting occupational health services and training programs. Much remains to be learned about the nature of changes in work organization, and how they affect worker health and safety. While available evidence is limited, such evidence suggests that recent trends in work organization may be increasing the risk of occupational illnesses. In a groundbreaking publication, the National Institute for Occupational Safety and Health has provided a concise summary of available knowledge and a detailed agenda for research and development. [Publication Abstract]

Lapane, K. L. and C. M. Hughes (2007). "Considering the employee point of view: perceptions of job satisfaction and stress among nursing staff in nursing homes." Journal of the American Medical Directors Association **8**(1): 8-13.

OBJECTIVE: To document job satisfaction and sources of stress among nursing staff working in nursing homes and to evaluate the extent to which the reasons of stress differ by type of nursing staff. DESIGN: Cross-sectional study. SETTING: Twenty-five nursing homes in North Carolina participating in a demonstration project of a new model of long-term care pharmacy. PARTICIPANTS: Nurses and nursing assistants employed at the time of the survey in the spring and summer of 2002 (n = 1283). MEASUREMENTS: Health Professional Stress Inventory modified for use in the nursing home setting and ratings of job satisfaction. RESULTS: The situations most stressful for nurses were not having enough staff, having too much work to do, interruptions, having non-health professionals determine how to do their job, poor pay, and ultimately being responsible for patient outcomes. The top most stressful situations for nursing assistants included poor pay, not enough staff, and too much work to do. Nursing assistants were more likely than nurses to report stress because they do not have adequate information regarding a patient's condition. Nurses were more likely than nursing assistants to report stress because non-health professionals

(eg, surveyors) determine how they must do their job. CONCLUSIONS: The findings of this study support the need to improve recognition for nursing, improve staffing, and provide competitive compensation in nursing homes. [Publication Abstract] *sex aggregated data; no gender-based analysis

Lavoie-Tremblay, M., D. Wright, et al. (2008). "Creating a healthy workplace for new-generation nurses." Journal of Nursing Scholarship **40**(3): 390-397.

PURPOSE: To examine dimensions of the psychosocial work environment that influence the psychological health of new-generation nurses. BACKGROUND: While much work has been done concerning the health of nurses in general, research on the relationship between the nursing work environment and the psychological well-being of new-generation nurses at the start of their careers is limited. DESIGN: A correlational descriptive design was used for this quantitative study. Survey data were collected from new nurses (N=309) whose names were obtained from a provincial licensing registry in Quebec, Canada. FINDINGS: Among new nurses, 43.4% stated that they have a high level of psychological distress. These nurses were significantly more likely to perceive an imbalance between effort expended on the job and rewards received, low decisional latitude, high psychological demands, high job strain, as well as low social support from colleagues and superiors ($p \leq 0.05$). CONCLUSIONS: Understanding the relationship between the work environment and health as experienced by new-generation nurses is imperative for creating interventions to successfully recruit and retain these young nurses. CLINICAL RELEVANCE: Generation Y nurses in Quebec, faced with high levels of psychological distress because of their exposure to difficult nursing work environments, might leave the profession thereby exacerbating an already salient nursing shortage. [Publication Abstract] *sex aggregated data; no gender-based analysis

Lawoko, S., J. J. F. Soares, et al. (2004). "Violence towards psychiatric staff: a comparison of gender, job and environmental characteristics in England and Sweden." Work & Stress **18**(1): 39-55.

Workplace violence is receiving increasing attention world-wide, and studies suggest that, for example, nurses and women may be more abused at work than psychiatrists and men. However, there is a lack of cross-cultural data on the topic. Further, relatively few studies have addressed the influence of environmental factors in the occurrence of violence and within a cross-cultural context. The present study compares among other things the nature of violence encountered by female/male staff (nurses and psychiatrists) in Sweden and England. Psychiatric personnel from England (301 nurses; 74 psychiatrists) and Sweden (745 nurses; 306 psychiatrists) were assessed cross-sectionally by means of a questionnaire covering various areas (e.g. nature of violence). The univariate analyses showed an association between being abused and male gender, young age, being British and a nurse, physical and psychological strain. The multivariate logistic regression confirmed that British nurses and male nurses were the main risk group for exposure to violence. Further, the multivariate analysis indicated that the odds of being abused increased with

increasing age, physical strain and dissatisfaction with quality of care. Interventions thus need to be sensitive to gender differences, societal context, professional roles and interactions between them. Further, clinical supervision and team functioning, organizational and environmentally friendly settings may help to reduce violence in mental health care [Publication Abstract] *sex breakdown

Lewis, M. L. and D. S. Dehn (1999). "Violence against nurses in outpatient mental health settings." Journal of Psychosocial Nursing and Mental Health Services **37**(6): 28-33.

The objective of this study was to determine the prevalence, severity, frequency, and impact of patient physical assault and verbal threats on nurses working in outpatient mental health setting. For this descriptive study, a convenience sample of 72 mental health nurses working in psychiatric/mental health outpatient settings were surveyed using a 25-item questionnaire. Key findings from this study include: Nurses in outpatient mental health settings who have been assaulted may have an increased sense of vulnerability. Assault and verbal threats influence how nurses view client behaviour. Mechanisms need to be developed to protect staff in outpatient settings and to support colleagues when assaults or threats occur [Publication Abstract] *no gender-based analysis

Lippel, K. (1995). Watching the Watchers: how expert witnesses and decision-makers perceive men's and women's workplace stressors. Invisible: issues in women's occupational health. K. Messing, B. Neis and L. Dumais. Charlottetown, P.E.I, gynergy books.

Workers compensation schemes in many North American jurisdictions compensate psychological disability caused by workplace stress. In a previous study we described how legal rules applicable to this issue have evolved in 60 North American jurisdictions. Legal criteria used to determine eligibility for coverage often include work-related tests that take into account such factors as "unusualness" of the workplace stressors, the existence of stressors in the claimant's personal life, and links between the stressors and the work environment. We are currently a study in which we examine expert witnesses' and decision-makers' perceptions of men's and women's work and life circumstances as reported in Quebec compensation review and appeals decisions. We seek to determine whether perception of these variables differs depending on claimants gender, and if so, whether there is a correlation between differences and case outcome. We present the legal framework underlying the study, the methodology applied and preliminary findings. We conclude that there is a gender based difference in access to compensation on the appellate level that cannot be explained either by predisposition, difficult life circumstances or personality. [Publication Abstract]

Lippel, K. (1999). "Workers' compensation and stress: gender and access to compensation." International Journal of Law and Psychiatry **22**(1): 79-89.

This study examines 185 administrative tribunal decisions relating to

compensable stress claims for psychological between 1985 and 1994 in Quebec . The objective of this study is establish and substantiate the presence of discriminatory practices related to claimant gender, determine what aspects of the adjudicative process are likely to create discriminatory endings, and the quantifiable effects of discriminatory practices on claim recognition. Findings from quantitative and qualitative analysis of the adjudicative process reveal gender disparities in access to compensation. While both men and women experience significant challenges relating to access to psychological disability, this difficulty is particularly pronounced for women. Personal problems, legal representation, employer opposition, or nature of stressful situations did not account for differences outcomes. Qualitative analysis suggests that male dominance of tribunals, stereotypes of women and mental health and perceptions women's work as safe as well as perceived inferiority in male-dominated workplaces may lead to discriminatory practices and explain differences in gendered outcomes in compensable psychological disability claims. *gender-based analysis

Lippel, K. (2007). "Workers describe the effect of the workers' compensation process on their health: a Quebec study." International Journal of Law and Psychiatry **30**: 427-443.

This article reports on a Canadian qualitative study designed to examine the workers' experience of the workers' compensation process and to look at the effects of the process on the physical and mental health of claimants. Eighty five in depth individual interviews of injured workers in Québec and six group interviews with workers and worker advocates from Québec, Ontario and British Columbia were analysed to determine the positive and negative impact on claimant health of various steps of the workers' compensation process and of behaviours of significant actors in that process. While superior access to health care and access to economic support both contributed to claimant well-being, various facets of the process undermined the mental health of workers, and in some cases, also had a negative impact on physical health. Primary characteristics of the process that influenced outcomes included stigmatization of injured workers and the significant power imbalance between the claimants and the other actors in the system; the effect of both these mechanisms was tempered by social support. The article describes how caseworkers, physicians, appeal tribunals, employers and compensation boards contribute to the positive or negative impacts on worker health and concludes with recommendations designed to promote the therapeutic aspects of workers' compensation and to curtail those facets that are harmful to worker health. It also has implications for researchers who wish to consider the role of lawyers or compensation in the development or prevention of disability. [Publication Abstract] *sex breakdown

Lippel, K. (2008). Policy, work & mental health: women's issues. Mujer Trabajo & Salud. Zacatecas, Mexico.

The Global Occupational Health Network of the WHO recently reported that work related stress is perhaps one of the most common social determinants of health for the employed and mental health problems are a significant source of disability world-wide. Work-related mental health problems are prevalent in low and middle

income countries as well as industrialized economies. In this paper we will examine, with a gender lens, a selection of legal and public policy approaches designed to reduce the prevalence of psycho-social risk factors at work and to ensure economic support for workers unable to work because of work-related mental health problems. Traditional occupational health legislation has focused on the prevention of physical injury while ignoring or explicitly excluding measures designed to protect mental health of workers. Recently several jurisdictions have introduced a variety of strategies targeting the prevention of mental health problems, often by promoting strategies for risk assessments that include organizational factors. With regard to compensation for work-related mental health problems, situations vary from one jurisdiction to the next. In those jurisdictions where worker' compensation or some other form of disability insurance is available to those unable to work because of work-stress related to illnesses, the criteria for accessing compensation sometimes makes it more difficult for the precariously employed and those juggling work and family commitments to access economic support. The paper will present an overview of the types of legal instruments that are relevant to the prevention or compensation of illness associated with psycho-social risk factors. It will then identify key issues that may undermine effective applications of policies when they are designed without consideration for the specific situations of women workers.*gendered analysis

Luck, S. and J. Hedrick (2004). "The alarming trend of substance abuse in anesthesia providers." Journal of PeriAnesthesia Nursing **19**(5): 308-311.

The role of the anesthesia provider requires a high level of awareness and constant vigilance. Literature indicates, however, that the substance abuse rate in certified registered nurse anesthetists (CRNAs) and anesthesiologists has reached staggering levels. The literature also shows that there has been a change in which controlled drugs are being misused. It is imperative that perianesthesia nurses be aware of the current problem and take steps when indicated toprotect both providers and patients. This article discusses the current trends of addiction in anesthesia providers, treatment, and reentry,as well as the role of the perianesthesia nurse in recognizing, reporting,and preventing substance abuse. [Publication Abstract]

Majomi, P., B. Brown, et al. (2003). "Sacrificing the personal to the professional: community mental health nurses." Journal of Advanced Nursing **42**(5): 527-538.

BACKGROUND. The study of stress in mental health nurses has almost always focused on factors intrinsic to their job roles and has neglected the interaction between work and home roles, which may also be a source of stress. Moreover, role theory has not provided an adequate account of either personal or occupational change, especially when this results from the experience of stress. METHODS. Twenty community mental health nurses agreed to participate in semi-structured interviews about the stresses they experienced at work and at home. A grounded theory analysis disclosed the centrality of conflicts between work and home roles in participants' accounts and this provided the focus for

subsequent detailed readings of the interview transcripts. FINDINGS. Participants described how difficult and often demanding family situations were integrated with professional careers in a climate of rapid organizational change in the health service. As well as being an ongoing source of strain, these competing role demands were often described as leading to sudden changes for individual workers, such as periods of illness or re-evaluation of their work role. To assist in making sense of this process, the term 'punctuated equilibria' was adopted to illuminate the build-up of tension between work and domestic lives, which was described by some workers as leading to a sudden reformulation of their relationship to their work roles and employing organizations. CONCLUSIONS AND LIMITATIONS. The study was small-scale and relied on retrospective self-reports. Nevertheless, it emphasized the importance of considering all the roles that individuals play and highlights the possibility that, even when staff are apparently coping with their roles at work and home, difficulties may be building up which could lead to a sudden period of absenteeism or disillusionment.

Marchard, A. (2007). "Mental health in Canada: are there any risky occupations and industries " International Journal of Law and Psychiatry **30**: 272-283.

This study examined the role of occupations and industries in explaining differences among workers reporting poorer mental health in the Canadian workforce. It used data coming from a large representative sample of 77,377 workers engaged in 139 occupations and 95 industries. Logistic regression analysis was used to identify differences in the odds of reporting poorer mental health, adjusting for gender, age, education, marital status, and household income. Results identify ten occupations and nine industries at higher risk for workers reporting poorer mental health. The article concludes by highlighting implications for actors and policymakers and by specifying potential targets for intervention. [Publication Abstract]

Margallo-Lana, M., K. Reichelt, et al. (2001). "Longitudinal comparison of depression, coping, and turnover among NHS and private sector staff caring for people with dementia." British Medical Journal **322**(7289): 769-770.

Study found psychological distress in about 20% of professionals caring for people with dementia in private and NHS facilities. This level is low compared with reported frequencies of 50% in other healthcare workers" and relatives caring for people with dementia.' Levels of stress in NHS homes were lower than in private facilities (16% v 22%), although the difference was not significant. The study did not have sufficient statistical power to detect a significant difference of this magnitude. [Publication Abstract] *no sex breakdown; no gender-based analysis

Marino, P. A. (1998). "The effects of cumulative grief in the nurse." Journal of Intravenous Nursing **21**(2): 101-104.

This article describes some of the major causes of stress for nurses and other professional care givers who work with the dying, their families, and the bereaved. It specifically addresses the stress of cumulative grief in the work

situation and its effects on the care giver. It also describes some of the strategies far the institution and the individual nurse that can be used to minimize the effects of stress and cumulative grief and can contribute to emotional health in this type of work. [Publication Abstract]

Marshall, N. L. and R. C. Barnett (1992). "Work-related support among women in caregiving occupations." Journal of Community Psychology **20**: 36-42.

The relationship of work-related support to mental and physical health was examined among a random sample of 362 women employed as social workers and licensed practical nurses. Work-related support was found to have a direct effect on employed women's mental and physical health. However, work-related support did not buffer the impact of job demands on health. [Publication Abstract] *women workers; no gender-based analysis

Maunder, R. (2004). "The experience of the 2003 SARS outbreak as a traumatic stress among frontline healthcare workers in Toronto: lessons learned." The Royal Society **359**: 1117-1125.

The outbreak of severe acute respiratory syndrome (SARS) in the first half of 2003 in Canada was unprecedented in several respects. Understanding the psychological impact of the outbreak on healthcare workers, especially those in hospitals, is important in planning for future outbreaks of emerging infectious diseases. This review draws upon qualitative and quantitative studies of the SARS outbreak in Toronto to outline the factors that contributed to healthcare workers' experiencing the outbreak as a psychological trauma. Overall, it is estimated that a high degree of distress was experienced by 29-35% of hospital workers. Three categories of contributory factors were identified. Relevant contextual factors were being a nurse, having contact with SARS patients and having children. Contributing attitudinal factors and processes were experiencing job stress, perceiving stigmatization, coping by avoiding crowds and col leagues, and feeling scrutinized. Pre-existing trait factors also contributed to vulnerability. Lessons learned from the outbreak include: (i) that effort is required to mitigate the psychological impact of infection control procedures, especially the interpersonal isolation that these procedures promote; (ii) that effective risk communication is a priority early in an outbreak; (iii) that healthcare workers may have a role in influencing patterns of media coverage that increase or decrease morale; (iv) that healthcare workers benefit from resources that facilitate reflection on the effects of extraordinary stressors; and (v) that healthcare workers benefit from practical interventions that demonstrate tangible support from institutions. [Publication Abstract] *no sex breakdown; no gender-based analysis

Maurier, W. L. and H. C. Northcott (2000). "Job uncertainty and health status for nurses during restructuring of health care in Alberta." Western Journal of Nursing Research **22**(5): 623-641.

The Alberta health care system experienced dramatic changes after provincial funding cuts to health care from 1993 to 1996. As a result, stressors for nurses

increased. The question of whether job uncertainty, working conditions, cognitive appraisal, and coping strategies influence the health of registered nurses in a context of health care restructuring was examined. Lazarus and Folkman's Transactional Model of Stress was used as the conceptual framework. A total of 271 registered nurses employed in a large, urban, acute-care teaching hospital responded to a self-administered survey questionnaire. Using multiple regression analysis, depression and self-reported physical health were analyzed. The data suggest that the threat of being placed on recall, having a coworker bumped or laid off, and perceived job security were adversely related to physical health. High primary appraisal of threat was associated with high levels of depression and poor physical health. In addition, the findings suggest that various coping strategies had both buffering and exacerbating effects on physical health and depression. [Publication Abstract]

Mayhew, C. and D. Chappell (2007). "Workplace violence: an overview of patterns of risk and the emotional/stress consequences on targets." International Journal of Law and Psychiatry **30**: 327-339.

Violence at work (VAW) is a frequent precursor to mental ill health, and to a lesser degree physical injury, among those exposed to this occupational hazard. In this paper an overview is provided of the nature and prevalence of such violence, of the risk factors involved, and of the impact upon victims. The paper examines the definition of VAW which includes both physical and psychological violence. Attention is given to the influential involvement of the UN affiliated International Labour Organisation in setting benchmarks for defining, preventing and responding to VAW. Evidence about the incidence and severity of VAW on a global basis is examined. It is noted that the reliability of information about VAW is quite variable, especially in non-industrialised countries. The available evidence indicates that psychological aggression is widespread across all sectors of employment and physical violence, although far less common, remains a significant problem. Risks of becoming a victim of VAW vary according to numbers of factors including job category, the nature of the work being performed, gender, age and experience. The paper also focuses on research regarding the effects upon persons experiencing or witnessing VAW. This research indicates that the health related consequences of psychological violence can be as severe as those from physical violence. The paper concludes that VAW is a major occupational health and safety hazard in all nations, regardless of their state of development. A reduction or elimination of this violence, and the health problems it creates, requires concerted and integrated strategies, together with rigorous evaluation of preventive measures [Publication Abstract]

McVicar, A. (2003). "Workplace stress in nursing: a literature review." Journal of Advanced Nursing **44**(6): 633-642.

BACKGROUND. Stress perception is highly subjective, and so the complexity of nursing practice may result in variation between nurses in their identification of sources of stress, especially when the workplace and roles of nurses are

changing, as is currently occurring in the United Kingdom health service. This could have implications for measures being introduced to address problems of stress in nursing. AIMS. To identify nurses' perceptions of workplace stress, consider the potential effectiveness of initiatives to reduce distress, and identify directions for future research. METHOD. A literature search from January 1985 to April 2003 was conducted using the key words nursing, stress, distress, stress management, job satisfaction, staff turnover and coping to identify research on sources of stress in adult and child care nursing. Recent (post-1997) United Kingdom Department of Health documents and literature about the views of practitioners was also consulted. FINDINGS. Workload, leadership/management style, professional conflict and emotional cost of caring have been the main sources of distress for nurses for many years, but there is disagreement as to the magnitude of their impact. Lack of reward and shiftworking may also now be displacing some of the other issues in order of ranking. Organizational interventions are targeted at most but not all of these sources, and their effectiveness is likely to be limited, at least in the short to medium term. Individuals must be supported better, but this is hindered by lack of understanding of how sources of stress vary between different practice areas, lack of predictive power of assessment tools, and a lack of understanding of how personal and workplace factors interact. CONCLUSIONS. Stress intervention measures should focus on stress prevention for individuals as well as tackling organizational issues. Achieving this will require further comparative studies, and new tools to evaluate the intensity of individual distress. [Publication Abstract]

Messing, K. (1997). "Women's occupational health: a critical review and discussion of current issues." Women & Health **25**(4): 39-68.

Action to improve women's occupational health has been slowed by a notion that women's jobs are safe and that any health problems identified among women workers can be attributed to unfitness for the job or unnecessary complaining. With increasing numbers of women in the labour force, the effects of work on women's health have recently started to interest health care providers, health and safety representatives and researchers. We begin our summary of their discoveries with a discussion of women's place in the workplace and its implications for occupational health, followed by a brief review of some gender-insensitive data-gathering techniques. We have then chosen to concentrate on the following four areas: methods and data collection; directing attention to women's occupational health problems; musculoskeletal disease; mental and emotional stress. We conclude by pointing out some neglected occupational groups and health issues. [Publication Abstract]

Messing, K. and S. deGrosbois (2001). "Women workers confront one-eyes science: building alliances to improve women's occupational health." Women & Health **33**(1/2): 125-141.

Women suffer many health problems related to their work, but attempts to improve their situation face obstacles at two levels: recognition of their problems and ability to organize to prevent them. Recognition by occupational health

specialists has been delayed due in part to: A perception that women's issues have been included in research focused on male workers; pressure to deal with more visible issues of mortality and well-established illness; ignorance of women's working conditions; methodological biases and inadequacies. Recognition by unions is slowed when women and their concerns are absent from union membership and/or governing structures. Feminist health advocates have not often participated in these struggles, due to social class differences and difficulties in linking with some male-dominated unions. Also, due to the wide variety of hazardous working conditions, they do not emerge from population-based analyses of health determinants in the same way as do domestic violence, tobacco or poverty. The authors describe three alliances necessary for successful research, policy and practice in women's occupational health: between feminist and working-class organizations; between feminists and occupational health scientists; between researchers and women workers. [Publication Abstract] *discussion of sex and gender-sensitive analysis

Messing, K., K. Lippel, et al. (2000). "Equality and difference in the workplace: physical job demands, occupational illnesses, and sex differences." NSWA Journal **12**(3): 21-49.

Struggles of women for safe and equal integration in the workplace confront discourse on biological differences as well as the reality of job! worker interactions. Biological specificities cannot be easily dismissed from consideration, particularly in blue-collar, manual jobs. Extreme job demands may be incompatible with the physical dimensions and capacity- ties of most women. The authors, who have expertise in genetics, ergonomics, law, and physiology, argue that consideration of biological differences between women and men is necessary in order that the workplace be adapted to the physical dimensions and capacities of both sexes. The alternative to adapting jobs may be risks to women's health and employment possibilities. However, resistance to integrating women has, in the last analysis, little to do with biological differences and must be overcome by political action. The authors have arrived at suggestions for action by consulting working women in the context of a partnership with labour unions. [Publication Abstract] *gendered analysis

Middleton, J. I., N. J. Stewart, et al. (1999). "Caregiver distress related to disruptive behaviors on special care units versus traditional long-term care units." Journal of Gerentological Nursing **25**(3): 11-19.

The link between staff stress and exposure to disruptive behaviours is an important issue in long-term care settings. This study compared the perceptions of two groups of formal caregivers (staff) regarding their distress from the behaviours of residents in their care. Staff on special care units for dementia were less distressed with disruptive behaviours than comparable staff on traditional units, although they reported higher exposure to these behaviours. These results were related to different perceptions of intent to harm and expectations of physical aggression as "part of the job." Implications for nursing include education and support for staff to enhance the quality of life for residents and staff on units where disruptive behaviours occur [Publication Abstract] *no

sex breakdown; no gender-based analysis

Morgan, D. G., K. M. Semchuk, et al. (2002). "Job strain among staff of rural nursing homes. A comparison of nurses, aides, and activity workers." Journal of Nursing Administration **32**(3): 152-61.

Caring for growing numbers of residents with Alzheimer's disease and related dementias increases the potential for stress among nursing home staff. To better understand occupational stress among caregivers in rural nursing homes, the authors studied differences in job strain among registered nurses, nursing aides, and activity workers. The authors discuss data from their survey questionnaires and focus group interviews with staff, providing insight into job strain and possible intervention strategies to improve the work environment. [Publication Abstract] *sex aggregated data; no gender-based analysis

Morgan, D. G., N. J. Stewart, et al. (2005). "Work stress and physical assault of nursing aides in rural nursing homes with and without dementia special care units." Journal of Psychiatric and Mental Health Nursing **12**: 347-358.

PURPOSE: This study compared nursing aides (NAs) employed in rural nursing homes with and without dementia special care units (SCUs) on (1) exposure to and distress from disruptive behaviours exhibited by residents, (2) job strain and (3) physical assault. DESIGN AND METHODS: The data were drawn from a larger study conducted in Saskatchewan, Canada, in which all rural nursing homes of 100 beds that had an SCU were matched to same-sized rural facilities with no SCU. Nursing aides (*n* = 355) completed a mailed survey questionnaire. RESULTS: Nursing aides employed in nursing homes with an SCU reported significantly less frequent exposure to disruptive behaviours (including aggressive and aversive behaviours) than NAs in non-SCU facilities, less distress when these behaviours were directed toward them, less exposure to aggressive behaviour during caregiving, lower job demands and lower job strain. There was a trend toward increased risk of being assaulted in the last year associated with being in a non-SCU facility. Having a permanent position, increased job strain, and feeling inadequately prepared for dementia care were significantly associated with higher risk of being assaulted. In the SCU facilities, NAs who worked more time on the SCU reported more assaults but less distress from disruptive behaviour, lower psychological job demands, lower job strain and greater work autonomy. IMPLICATIONS: Providing more dementia care training and reducing job demands and job strain may help to reduce work-related stress and physical assault of nursing aides employed in nursing homes. [Publication Abstract] *sex breakdown (assault only); sex aggregated data; no gender-based analysis

Muntaner, C., Y. Li, et al. (2004). "Work organization, area labour-market characteristics, and depression among U.S. nursing home workers: a cross-classified multilevel analysis." International Journal of Occupational and Environmental Health **10**(4): 392-400.

Associations between forms of work organization that follow globalization and

depression were examined in U.S. nursing home assistants. A cross-sectional study of 539 nurse assistants in 49 nursing homes in three states in 2000 assessed nursing home ownership type, managerial style, wage policy, nurse assistants' emotional stresses, and area labour-market characteristics (county income inequality, median household income, and social capital) in relation to the prevalence of depression among the nurse assistants. A cross-classified multilevel analysis was used. For-profit ownership, emotional strain, managerial pressure, and lack of seniority pay increases were associated with depression. Labour-market characteristics were not associated with depression once work organization was taken into account. The deregulation of the nursing home industry that accompanies globalization is likely to adversely affect the mental health of nursing home assistants. [Publication Abstract] *women workers; no gender-based analysis

Muntaner, C., Y. Li, et al. (2006). "County and organizational predictors of depression symptoms among low-income nursing assistants in the USA." Social Science & Medicine **63**: 1454-1465.

Low-wage workers represent an ever-increasing proportion of the US workforce. A wide spectrum of firms demand low-wage workers, yet just 10 industries account for 70% of all low-paying jobs. The bulk of these jobs are in the services and retail sales industries. In health services, 60% of all workers are low-paid, with nursing aides, orderlies, personal attendants, and home care aides earning an average hourly wage of just $7.97-a wage that keeps many of these workers hovering near or below the poverty line. Nursing assistants also tend to work in hazardous and grueling conditions. Work conditions are an important determinant of psychological well-being and mental disorders, particularly depression, in the workplace have important consequences for quality of life, worker productivity, and the utilization and cost of health care. In empirical studies of low-wage workers, county-level variables are of theoretical significance. Multilevel studies have recently provided evidence of a link between county-level variables and poor mental health among low-wage workers. To date, however, no studies have simultaneously considered the effect of county-and workplace-level variables. This study uses a repeated measures design and multilevel modeling to simultaneously test the effect of county-, organizational-, workplace-, and individual-level variables on depression symptoms among low-income nursing assistants employed in US nursing homes. We find that age and emotional strain have a statistically significant association with depression symptoms in this population, yet when controlling for county-level variables of poverty, the organizational-level variables used were no longer statistically significant predictors of depression symptoms. This study also contributes to current research methodology in the field of occupational health by using a cross-classified multilevel model to explicitly account for all variations in this three-level data structure, modeling and testing cross-classifications between nursing homes and counties of residence [Publication Abstract] *sex aggregated data; no gender-based analysis

Needham, I., C. Abderhalden, et al. (2005). "Non-somatic effects of patient aggression on nurses: a systematic review." Journal of Advanced Nursing **49**(3).

AIM. This paper describes a systematic review of the predominant non-somatic effects of patient assault on nurses. BACKGROUND. Patient aggression towards nurses is a longstanding problem in most nursing domains. Although reports on the consequences of physical aggression are more numerous, the non-physical effects create much suffering. METHOD. A systematic review of literature from 1983 to May 2003 was conducted using the Medline, CINAHL, PsychINFO and PSYINDEX databases. Articles from international journals in English or German and reporting at least three non-somatic responses to patient aggression were included. FINDINGS The electronic search produced 6616 articles. After application of the inclusion and exclusion criteria, 25 texts from eight countries and four domains of nursing remained. Twenty-eight main effects were found, and these were categorized using a system suggested by Lanza and including bio-physiological, emotional, cognitive, and social dimensions. The predominant responses were anger, fear or anxiety, post-traumatic stress disorder symptoms, guilt, self-blame, and shame. These main effects occurred across most countries and nursing domains. CONCLUSION. Despite differing countries, cultures, research designs and settings, nurses' responses to patient aggression are similar. Standardized questionnaires could help improve estimations of the real prevalence of non-somatic effects. Given the suffering caused by non-somatic effects, research should be aimed at preventing patient aggression and at developing better ways to prepare nurses to cope with this problem. [Publication Abstract]

North, D., L. Delp, et al. (2008). California Home Care: a promising model for workers and recipients. Mujer Trabajo & Salud. Zacatecas, Mexico.

Workers who provide Home Care to disabled elderly people experience stress from the demands of the job, often exacerbated by policies that limit their ability to provide quality care. This presentation will describe (a) California's unique public model for long-term community-based care, typically provided by low income women, and (b) the "Home care Working Group", which aims to bridge the gap between research and practice of in-home and community care. The California model allows for consumer direction of care, provides an avenue for friend and family caregivers to be paid by the state, and gives a voice to both consumers and workers via collective bargaining and consumer support centres. Key issues which this model presents include the need for sustained wages and benefits for workers and consumers, as well as the challenge of meeting all these needs in the face of constant political opposition and threatened funding cuts. The Home Care Working Group, directed by UCLA's Labour Occupational Safely and Health Program, unites researchers, policy advocates, labour union representative, workers, and consumers with an interest in Home Care. The working group meets two to three times per year, publishes policy briefs and other materials which further the interests of Home Care Workers and consumers, and maintains a free website (laborcenter.berkeley.edu/homecare) featuring the latest research and news about Home Care Worker. IHSS system

and Home Care Working group represent innovative and promising strategies to improve the well-being of the primarily female Home Care workforce and for the long-term care of America's aging population. These mechanisms bring together researchers with worker and consumer activists to confront budget threats and to promote policies that enhance worker safety safety, education, wages, benefits and a voice in the workplace.

Occupational Health and Safety Agency for Healthcare in British Columbia (2004). Trends in workplace injuries, illnesses, and policies in healthcare across Canada.

Time loss claims data for post-traumatic stress, anxiety or mental disorder by province between 1997 and 2002 are reported. In Ontario, 58% of post-traumatic stress claims were directly related to violence. Stress-related mental disorder (e.g., post-traumatic stress; anxiety, stress, neurotic disorders; depression) for healthcare workers in BC, Ontario and Québec represents a very small proportion of all time-loss claims. This trend is likely to reflect acceptance criteria than actual incidence of time loss due to workplace stress.

Office of the Auditor General of British Columbia (2004/2005). Report 2 In sickness and in health: healthy workplaces for British Columbia's health care workers.

The Auditor General of British Columbia prepared this report. The purpose of this report was to determine the ability of five provincial health authorities to promote, create, monitor and sustain healthy workplace environments for the healthcare workforce. In terms of mental health (depression, anxiety, stress, and alcohol and drug dependence/abuse), the audit team indicate increasing trends in long-term disability claims reflect concerns related to workload, deteriorating interpersonal relations and increasing violence. Occupational psychosocial concerns have been limited to improving leadership and staff training. The ability to address physical and mental health concerns and mitigate risks is discussed in relation to budgetary restraint. The report offers 11 recommendations to health authorities to enhance leadership, promote healthy work environments, and to monitor and report healthy workplace developments.

Park, K. O. "Social support for stress prevention in hospital settings." Journal of the Royal Society for the Promotion of Health **127**(260-264).

AIMS: The purpose of this study was to identify the effects of social support, interacting with work stressors, on psychological stress prevention in a public hospital, based on Karasek's demand-control-support (DCS) model. METHODS: A self-administered survey was conducted with 240 employees of a public hospital in the south-east of the United States. The survey asked for demographic information, details on job demands and job control as work stressors, social support, and depressive symptoms as the representative psychological stress symptoms. RESULTS: Social support was detected as a primary interpersonal positive factor buffering depressive symptoms. Social support was also related to job control and depressive symptoms in the simple correlation. Only the main effect model with general characteristics was significantly accepted in hierarchical regression analysis (p=.04). High social

support was associated with low depressive symptom scores, which means that social support had a positive association with health care employees' mental well being. However, any two-way or three-way interaction model was not accepted. The main effect part of the demand-control-support model was supported; however, interactions between demands, control, and support failed to be supported. [Publication Abstract] *participant sex breakdown; sex aggregated data; no gender-based analysis

Parkes, K. R. and C. VonRabenau (1993). "Work characteristics and well-being among psychiatric health-care staff." Journal of Community & Applied Social Psychology **3**(4).
Research into stress among health care professionals has tended to neglect staff employed in psychiatric settings. This article reports a study of psychiatric health care workers which focuses on objective work factors (job type, and community versus hospital setting) and the subjective work environment (perceived demand, discretion, and supervisor and co-worker support) as predictors of two affective outcomes (somatic symptoms and job satisfaction). Data were collected by questionnaire (*n* = 145) and analysed within the framework of the demand-discretion model of job stress. Objective job characteristics were significantly related to the perceived environment measures. Hierarchical regression was used to examine the extent to which each outcome was predicted by age, gender and negative affectivity (NA), by job type and work setting, and by the work environment measures. For somatic symptoms, the major predictors were NA, job type (higher occupational levels being associated with lower symptom scores), and perceived demand. In contrast, satisfaction was predicted by discretion, by both measures of support, and by the demand-discretion interaction; markedly low satisfaction was associated with high demand, low discretion conditions. Over and above these effects, NA, job type and hospital versus community work setting were significant predictors of outcome. These results are discussed in relation to the literature on stress in psychiatric health-care, and job stress more generally. [Publication Abstract] *sex breakdown; no gender-based analysis

Peterson, U. (2008). Stress and burnout in healthcare workers. Department of Clinical Neuroscience Section of Personal Injury Prevention. Stockholm, Karolinska Intitutet.
Work-related stress (of which burnout might be an example) is one of the most common work-related health problems. Currently, psychiatric illness (particularly depression, anxiety disorders, and stress related conditions) is the most common cause for long-term sick-leave in Sweden for women, and the second largest for men. Finding adequate strategies to prevent stress and burnout therefore seems important. This thesis is based on a questionnaire survey among all employees in a Swedish County Council. The overall response rate was 65% (n = 3976). The aims of the thesis were to: (1) Investigate how four burnout categories (non-burnout, disengaged, exhausted, and burnout) are linked to constellations of work characteristics, including self-reported sickness absence, sickness presence and overtime. (2) Test the Job Demand-Resources model in a sample of Swedish healthcare workers. (3) Investigate how burnout relates to self-

reported physical and mental health, sleep disturbance, memory and lifestyle factors. (4) Test the effect of participating in a reflecting peer-support group on self-reported health, burnout, and on perceived changes in work conditions. (5) Investigate the factorial structure of the Swedish translation of the Oldenburg Burnout Inventory, and its predictive validity on future long-term sickness absence. Results revealed that burnout is associated with poorer self-rated health, more depression and anxiety, overtime work, and with future long-term sickness absence as measured by register data. Burnout as a possible pathway to an exhaustion disorder is discussed. Contrary to the general belief, that job demands make all the difference, results indicated that it was the access to/lack of adequate job resources that determined whether an employee was classified as burnt out or not. Additional support for the Job Demands-Resources model was found, insofar that job demands were more closely related to exhaustion, while lack of job resources was more associated with disengagement. Reflecting peer-support groups, using a problem-based method, was tested in a randomized controlled trial, and showed positive intervention effects in self-reported health, participation and development opportunities at work, support at work, and in work demands. Based on the result in this thesis, a fair and empowering leadership, a positive social climate at work, control of decision, and support from superiors, as well as a reasonable work load appear to be important factors in the prevention of burnout. Reflecting peer-support groups using a problem-based method could be a useful and comparatively inexpensive tool in alleviating work-related stress and burnout. Further research is needed, before any conclusions about the usefulness of the method for men can be drawn [Thesis Abstract]

Peterson, U., E. Demerouti, et al. (2008). "Work characteristics and sickness absence in burnout and nonburnout groups: a study of Swedish healthcare workers." International Journal of Stress Management **15**(2): 153-172.

The aim of this study was to search for constellations of work characteristics that discriminate people who experience burnout from those who do not, and also from those who score high in exhaustion but not in disengagement, and vice versa. The study is based on data from 3,719 employees in a County Council in Sweden. Discriminant analysis revealed that four burnout categories (nonburnout, disengaged, exhausted, and burnout), related in different ways to self reported work characteristics. The proportions of respondents with overtime, sickness absence, and sickness presence were higher in the burnout and the exhausted groups compared with the nonburnout group. The most common professions in the burnout group were, unexpectedly, dental nurses, secretaries, and service staff. [Publication Abstract] *sex breakdown of participants; sex aggregated data; no gender-based analysis

Peterson, U., E. Demerouti, et al. (2008). "Burnout and physical and mental health among Swedish healthcare workers." Journal of Advanced Nursing **62**(1): 84-95.

AIM: This paper is a report of a study to investigate how burnout relates to self-reported physical and mental health, sleep disturbance, memory and lifestyle

factors. BACKGROUND: Previous research on the possible relationship between lifestyle factors and burnout has yielded somewhat inconsistent results. Most of the previous research on possible health implications of burnout has focused on its negative impact on mental health. Exhaustion appears to be the most obvious manifestation of burnout, which also correlates positively with workload and with other stress-related outcomes. METHOD: A cross-sectional study was conducted, using questionnaires sent to all employees in a Swedish County Council (N = 6118) in 2002. The overall response rate was 65% (n = 3719). A linear discriminant analysis was used to look for different patterns of health indicators and lifestyle factors in four burnout groups (non-burnout, disengaged, exhausted and burnout). RESULTS: Self-reported depression, anxiety, sleep disturbance, memory impairment and neck- and back pain most clearly discriminated burnout and exhausted groups from disengaged and non-burnout groups. Self-reported physical exercise and alcohol consumption played a minor role in discriminating between burnout and non-burnout groups, while physical exercise discriminated the exhausted from the disengaged group. CONCLUSION: Employees with burnout had most symptoms, compared with those who experienced only exhaustion, disengagement from work or no burnout, and the result underlines the importance of actions taken to prevent and combat burnout [Publication Abstract] *participant sex breakdown; sex aggregated data; no gender-based analysis

Petterson, I. L. and B. B. Arnetz (1998). "Psychosocial stressors and well-being in health care workers: the impact of an intervention program." Social Science & Medicine **47**(11): 1763-1772.

There have been few prospective studies of the impact of workplace interventions on employee and organizational well-being within health care settings. This study was conducted at a large regional hospital in Sweden in 1994 with a follow-up in 1995. Effects of a structured organizational and staff intervention program on perceived psychosocial work quality, supporting resources and self-reported health and well-being were evaluated, Based on department-specific results from the baseline assessment in 1994, each department formulated their own improvement goals. They also made their own decisions on relevant improvement activities. Since there was no formal reference group in this study, departments with high and low rating levels, respectively, with regard to intervention activities were compared. Despite an overall worsening in most of the measures most likely due to a notice of 20° staff reduction prior to the follow-up assessment, the intervention appeared to have attenuated negative changes in the high as compared with the low activity group. Manager-rated impact of the program as well as positive stall attitudes and staff involvement in the enhancement process were identified as important determinants for more favourable changes. The study points out the relevance of structured workplace interventions for organizational and employee well-being especially in times of cut-backs and organizational turmoil. Department-specific factors will determine the impact of such programs. The study indicates that the psychosocial impact of personnel cut-backs in health care may be attenuated

through management initiatives. [Publication Abstract] *no sex-breakdown; no gender-based analysis

Rees, D. and C. L. Cooper (1992). "Occupational stress in health service workers in the UK." Stress Medicine **8**: 79-90.

Levels of occupational stress were examined in 1176 employees of all occupational groups within one large UK health authority. In comparison with the most recently established normative group of workers from non-health care sectors, health workers reported significantly greater pressure at work but scored lower on measures of Type A behaviour pattern and employed coping strategies more frequently. The health care workers reported, in contrast with previous studies, fewer symptoms of mental ill-health and similar levels of job satisfaction. Job satisfaction and psychosomatic ill-health were related to sickness absence among health workers. Approximately one in 12 health workers had stress symptoms of equal magnitude to patients attending clinical psychology outpatient clinics. The major occupational groups within the health worker sample were compared on stress measures. General managers were found to report the lowest levels of pressure, were high on Type A (nearly as high as doctors), were found to be the most 'internal' in their perceived locus of control, had the lowest levels of ill-health symptoms, the highest levels of job satisfaction and the lowest sickness absence rate. Nurses reported the highest levels of pressure. Ancillary staff and scientists and technicians, on the other hand, had very low levels of job satisfaction and high sickness absence [Publication Abstract] *sex aggregated data; no gender-based analysis

Rees, D. W. and C. L. Cooper (1990). "Occupational stress in health service employees." Health Serves Management Research **3**(3): 163-172.

Levels of occupational stress were examined in 383 employees of various occupations in one health district, as a preliminary to devising a strategy to reduce the negative effects of stress in the workplace. In comparison with white collar and professional workers in industry, health workers reported significantly greater pressure at work, higher ratings of physical and mental ill health, lower job satisfaction, less internal control over their working environment but used more coping strategies. Approximately one in eight of the subjects has stress symptoms of equal magnitude to patients attending clinical psychology outpatient clinics. It was also found that job satisfaction and psychosomatic ill health were related to sickness absence amongst health employees. The implications of these findings and the consequent challenges facing health service managers are discussed. [Publication Abstract] *sex aggregated data; no gender-based analysis

Revicki, D., M. E. Gallery, et al. (1993). "Impact of work environment characteristics on work-related stress and depression in emergency medicine residents: a longitudinal study." Journal of Community & Applied Social Psychology **3**(4): 273-284.

This study examined the effect of work environment characteristics on work-related stress and depression in emergency medicine residents. Data were

collected from three cohorts of emergency medicine residents between 1989 and 1991 and followed to 1992. There were 556 first year, 369 second year and 192 third year medical residents in this ongoing study. Each year, residents were administered mail surveys including the Work-Related Strain Inventory, Center for Epidemiologic Studies Depression scale and scales assessing task-role clarity and work group support. Regression analyses indicated that work-related stress and first year depression were significant predictors of depression in the second residency year (r^2 = 0.32). and In the third residency year, women and those with high work-related stress had more depression (r^2 = 0.38). Results also showed that residents with low task-role clarity were most likely to report depression, even when work group support was strong. These findings suggest that task and role conflict and work-related stress contribute to symptoms of depression in emergency medicine residents. [Publication Abstract] *no gender analysis

Richards, D. A., P. Bee, et al. (2006). "The prevalence of nursing staff stress on adult acute psychiatric in-patient wards. A systematic review." Social Psychiatry and Psychiatric Epidemiology **41**: 34-43.

BACKGROUND: Concerns about recent changes in acute in-patient mental health care environments have led to fears about staff stress and poor morale in acute in-patient mental health care staff. AIM: To review the prevalence of low staff morale, stress, burnout, job satisfaction and psychological well-being amongst staff working in in-patient psychiatric wards. METHOD: Systematic review. RESULTS: Of 34 mental health studies identified, 13 were specific to acute in-patient settings, and 21 were specific to other non-specified ward-based samples. Most studies did not find very high levels of staff burnout and poor morale but were mostly small, of poor quality and provided incomplete or non-standardised prevalence data. CONCLUSIONS: The prevalence of indicators of low morale on acute in-patient mental health wards has been poorly researched and remains unclear. Multi-site, prospective epidemiological studies using validated measures of stress together with personal and organizational variables influencing staff stress in acute in-patient wards are required. [Publication Abstract]. *no gender-based analysis

Robinson, J. R., K. Clements, et al. (2003). "Workplace stress among psychiatric nurses: prevalence, distribution, correlates, and predictors." Journal of Psychosocial Nursing and Mental Health Services **41**(4): 32-41.

Vicarious trauma and burnout are serious manifestations of workplace stress. Both can have substantial consequences for health care professionals, health services, and consumers. This article reports results of a study examining the prevalence, distribution, correlates, and predictors of vicarious trauma and burnout among registered psychiatric nurses (RPNs). A survey was distributed to all practicing RPNs in Manitoba, Canada (N = 1,015). The survey contained the Maslach Burnout Inventory, the Traumatic Stress Institute Belief Scale (i.e., a measure of vicarious trauma), and a section on symptoms of posttraumatic stress disorder (PTSD). The RPNs were found to be experiencing high levels of

emotional exhaustion (i.e., high burnout) and even higher levels of personal accomplishment (i.e., low burnout). No significant differences were found between respondents' total scores on the Traumatic Stress Institute Belief Scale and instrument norms for mental health care professionals. Predictors of burnout and vicarious trauma also are presented in this article. Stress experienced by RPNs, as well as strengths on which to build, clearly are evident in the study results. Strategies for reduction in workplace stress may benefit psychiatric nurses, clients, and health services [Publication Abstract] *participant sex breakdown; sex aggregated data; no gender-based analysis

Ruggiero, J. (2005). "Health, work variables, and job satisfaction among nurses." Journal of Nursing Administration **35**(5): 254-258.

BACKGROUND: Evidence from several studies suggests that there is widespread job dissatisfaction among nurses. Coupled with a critical shortage of RNs, this situation threatens the provision of safe healthcare. OBJECTIVE: The purpose of this study was to explore the relationships and relative contributions of selected work (stress, work load, weekends off), shift worker health (sleep, depression), and demographic variables (age, number of individuals needing care after work) to job satisfaction in a random, nationwide sample of 247 critical care RNs. METHODS: The Dillman Tailored Design Method of survey research was used to recruit participants and collect data. A descriptive, correlational design evaluated the relationships between the variables. RESULTS: There were no significant differences in these variables among self-defined day-, night-, and rotating-shift nurses. Hierarchical regression analyses indicated that more weekends off per month and less depression and emotional stress contributed significantly to job satisfaction in nurses. CONCLUSIONS: Improvements in scheduling and interventions designed to reduce depression and emotional stress may help to improve job satisfaction in nurses and aid in nurse recruitment and retention [Publication Abstract] *no sex breakdown; no gender-based analysis

Salerno, S., M. G. Bosco, et al. (2008). Good practices in hospital work organization for women's mental health. Mujer Trabajo & Salud. Zacatecas, Mexico.

Although the hospital is a place where people seek health, working in the hospital represents a risky environment in which occupational illnesses and occupational injuries can occur. Most often, such injuries involve women workers. In Italy 60% of all health care workers and 76% of all hospital nurses are women. In order to enhance good practices for women's mental health we studies selected hospital high stress units (psychiatric ward, emergency room, general medicine) and collected data on job content and sources of stress for each task performed. Methods Applying the Organizational Congruencies (Grieco A., Maggi, 1991) we analysed one hundred nursing tasks (technical actions) in terms of their organizational constraints and the organizational solutions of each task. Results: We identified constraints related to biological, chemical, physical and musculoskeletal work risk factors. Mental and social constraints (such as monotony and repetitiveness, relations with patients, aggressive behaviour,

responsibility, time pressure, etc.) were reported less frequently by the nurses, although these were recorded more frequently with the Method of the Organizational Congruencies. On the basis of these data and taking into account the organizational solutions proposed by women workers themselves (training, shared practices, health promotion with auxiliary devices, psychological support etc.) we prepared a selected series of "good practices" to be experimented in the hospital work settings. The efficacy and efficiency of the organizational solutions to enhance women's mental health are discussed. The paper also discusses the need to share organizational decision-making and to follow-up and evaluate the organizational change by the introduction of good practices [Conference Paper Abstract] *gender-based analysis

Schmieder, R. A. and C. S. Smith (1996). "Moderating effects of social support in shiftworking and non-shiftworking nurses." Work & Stress **10**(2): 128-140.

The effects of social support on the job stress (role ambiguity)-strain (job dissatisfaction, intent-to-turnover, health problems) relationship were investigated in shiftworking (second and third shifts) and non-shiftworking (first shift) groups of nurses (N = 191). Previous research indicates that shiftworkers frequently report problems of social integration as a negative aspect of their jobs. Additionally, shiftworkers demonstrate a number of stress-related illnesses. Social support has been hypothesized to show its strongest stress-buffering (i.e. moderating) effects in high stress environments. In other words, persons with higher levels of social support are less likely to be negatively affected by high stress environments. It was hypothesized that individuals working on shiftwork would demonstrate stronger moderating effects of social support on the job stress-strain relationship than non-shiftworkers because of the stressful nature of shiftwork and the importance of social integration difficulties to shiftworkers. The dependent measures used in the analyses were global job satisfaction, intent-to-quit, and perceived health problems. Main and moderating effects of social support were found for several of the analyses. For shiftworkers, this buffering effect was significantly greater for supervisor social support on global job satisfaction and intent-to-quit. Implications of the findings are discussed [Publication Abstract] *participant sex breakdown; sex aggregated data; no gender-based analysis

Seifert, A. M. and K. Mesisng (2004). "Looking and listening in a technical world: effects of discontinuity in work schedules on nurses' activity." Perspectives interdisciplinaires sur le travail et la santé (PISTES) **6**(1).

Shamian, J., L. O'Brien-Pallas, et al. (2003). "Nurse absenteeism, stress and workplace injury: what are the contributing factors and what can/should be done about it?" The International Journal of Sociology and Social Policy **23**(8/9): 81-103.

Health care workers generally, and nurses in particular, experience higher rates of absenteeism and injury than other types of Canadian workers. The health of nurses, and their availability for work, is a major concern of employers, funders, and nurses themselves. According to the Statistics Canada's employment survey

(1999), Canadian nurses have the highest absenteeism rate of all workers. The nature of this absenteeism varies from a single day to long-term disabilities. Nurses experience both physical and stress-related illnesses. Some of the illnesses are work-induced and trigger workers' compensation claims. This paper reviews the current literature on nurses' health, and describes the results of a qualitative study in which nurses, Chief Nurses, Chief Executive Officers, and Occupational Health experts were interviewed to ascertain their perspectives on factors that contribute to nurses musculoskeletal injuries, stress and absenteeism. As well, this study offers further understanding of what are possible solutions to deal with musculoskeletal injuries and stress among nurses in the workplace. The findings also emphasize the importance of a common understanding of solutions among nurses and key decision makers in the workplace setting [Publication Abstract] *no sex breakdown; no gender-based analysis

Shamian, J., L. O'Brien-Pallas, et al. (2002). "Musculoskeletal injuries, stress, and absenteeism." Canadian Nurse **98**(9): 12-17.

Restructuring has brought drastic changes to the work environment of hospital nurses. Only the most acute patients are now admitted to hospitals, and hospital beds have been eliminated. Inpatient days have declined, and with the reduced length of stay, nurses' work has been compressed into a shorter and more intense time frame.(1) All of these factors, along with the continuing uncertainty of current working environments, create significant stress, frustration and anxiety for nurses.(2) The resulting emotional burnout in nurses has been linked both to the health of nurses and to patient satisfaction with nursing care.(3) The authors were part of a research team looking at how job strain -- including staffing, workload, organizational factors and individual nurse characteristics -- affects the health of Ontario nurses as measured by lost-time compensation claim rates.(9) The goals of the study were to describe nurses' health status, examine trends in injury compensation claims and determine factors contributing to high-injury claim rates. We also asked nurses to rank interventions aimed at improving their workplace health and safety and gathered input from nurses, hospital administration, and occupational health and safety officers on factors related to nurse injuries, stress and absenteeism. This article reviews some of our findings. Musculoskeletal injuries among nurses. Nurses in both high-claim and low-claim hospitals most often identified workload as being a contributing factor to high-injury rates. Said one nurse, "I call it trying to beat the clock. You are looking for shortcuts and a shortcut often hurts you. Instead of thinking it through, you do it yourself... trying to save time. I have eight hours to do a nine-hour job." Said another, "You hear different departments always saying to the nurses, 'That is not my job; I am not going to do it.' But it always seems if it is not someone else's department's job, it is always the nurses' job." [Publication Abstract] *no sex breakdown; no gender-based analysis

Shaw, M., M. P. McGovern, et al. (2004). "Physicians and nurses with substance use disorders." Journal of Advanced Nursing **47**(5): 561-571.

BACKGROUND. The literature addressing substance use patterns among medical professionals suggests that specialty, gender, age, familial substance abuse, and access/familiarity with prescription drugs are associated with particular chemical dependencies. These studies have rarely compared nurses and physicians directly, thereby making if difficult to tailor interventions to the potentially unique needs of each group. AIM. This paper reports a study to compare the initial clinical presentations, service utilization patterns, and post-treatment functioning of nurses and physicians who received services in an addiction treatment programme. METHOD. This exploratory study combined data collected through retrospective record reviews and prospective questionnaires. There were three types of dependent variables: initial clinical characteristics, treatment utilization patterns, and post-treatment functioning. The independent variable was membership of either professional group. Time both in treatment and between discharge and follow-up were covariates. RESULTS. Nurses and physicians showed comparable results in most domains. Among the statistically significant differences between groups, a subset was particularly noteworthy. Prior to participating in the programme nurses showed significantly less personality disturbance than physicians, although they tended to work and live in environments with more triggers to relapse, such as other substance users. After the index hospitalization, nurses received less primary treatment, worked longer hours, and were more symptomatic than physicians. Furthermore, nurses reported more frequent and severe work-related sanctions as a consequence of their behavioural disorders. CONCLUSION. In most areas of study, nurses and physicians demonstrated comparable results; however, a series of statistically significant differences suggest that these groups may have unique clinical needs. The policy implications of these findings are discussed [Publication Abstract]
*participant sex breakdown; sex aggregated data; no gender-based analysis

Shields, M. and K. Wilkins (2006). Finding from the 2005 national survey of the work and health of nurses, Health Canada.

This report discusses finding from a national survey of 19,000 regulated nurses (e.g., registered nurses (RNs), licensed practical nurses (LPNs) and registered psychiatric nurses (RPNs) in Canada to examine many aspects of their work, including work conditions and characteristics, challenges to work performance, and physical and mental well-being. Nurses answered questions about a variety of physician-diagnosed chronic conditions, pain and its impact, depression, health problems that interfered with job performance, and time taken off work for health-related reasons. Chapter 5 of this report presents data relating to the physical and mental health of regulated nurses. Key finding: Nurses were more likely to have experienced depression in the previous year compared to all other employed workers. Of all employed women in Canada, 7% had reported experiencing depression, and of employed men, 4%. These figures compared with 9% of both female and male nurses. Many nurses reported challenges with managing workload as a result of their mental health issues. Nurses employed in long-term care facilities were more likely than nurses working in other care sectors to report fair/poor mental health.

Skillen, D. L. (1995). Nurses work hazards in public health units. Invisible: issues in women's occupational health. K. Messing, B. Neis and L. Dumais. Charlottetown, P.E.I, gynergy books.

Reconceptualization of work hazards as a problem of the organization rather than of the individual guided an exploratory study, completed in 1992, on female health care workers employed in a predominately female organization. Fifty-seven staff and managerial public health nurses in five autonomous public health units across the province of Alberta participated in the study. Self-administered questionnaires, semi-structured interviews and moderated focus groups were used to document employee perceptions of their work hazards and the organizational factors associated with them. Data collection and analysis preceded simultaneously using the consent comparative method of grounded theory (Glaser and Strauss, 1967). Public health nurses described safety, psychological, biological, ergonomic, and physical hazards. Results indicate that organizational factors are inseparable from the hazards respondents perceived in their physical and psychosocial work environments. Four elements that influence organizational hazard surveillance emerged from the data: conditions for collegiality; control over the physical plant; the structures for surveillance; and hazard information transfer. The conditions for collegiality have particular relevance for women workers in a predominately female organization and are presented here. The research assisted women in a neglected sector of the workforce - public health professionals - to assess their work environments for hazards to their health and safety. It illuminated the complex relationship between organizational and systematic factors and the work hazards of women in a human service organization. [Publication Abstract] *gender-based analysis

Smailes, E. (2006). Changing the work environment: improving the mental health of hospital workers. Final Report (Phase I). Provincial Healthy Workplace Initiative, Occupational Health & Safety Agency for Healthcare in British Columbia

This report summarizes key findings from Phase I of the “Changing the Workplace: Improving the Mental Health of Hospital Workers” project. The purpose of this study was to determine the level and nature of exposures to work-stressors that adversely affect the mental and physical health, behavioural outcomes of frontline workers (e.g., registered nurses, registered practical nurses, care aides, and unit clerks) in the province of British Columbia. In 2006, 28 focus group sessions with 187 frontline healthcare workers and interviews with executives, managers and union representatives were conducted to explore work conditions across seven categories: to job satisfaction; unit and organizational work experiences; work-life balance; coping; mental health, physical health, and behavioural outcomes; programs and solutions; facilitators and barriers to program access and implementation. Findings in relation to mental health reveal that more than 60 percent of frontline workers experience burnout, depression, anxiety, and irritability in response to work stressors. *no sex breakdown.

Spence Laschinger, H. K., J. A. Sabiston, et al. (2001). "Voices from the trenches: nurses' experiences of hospital restructuring in Ontario." Canadian Journal of Nursing Leadership **14**(1): 6-13.

Nurses, the largest occupational group in health care, have been disproportionately affected by health care restructuring initiatives. A survey of registered nurses in Ontario was conducted in the fall of 1998 to examine factors influencing their work life quality in hospital settings. As a part of this survey, respondents were provided with an opportunity to share their concerns about work conditions in an open ended section of the questionnaire. Almost sixty percent of the nurses chose to respond to the open ended question (n = 230), divided equally between males and females. The purpose of the qualitative component of the study was to obtain a more in depth analysis of the effects of hospital restructuring initiatives on staff nurses' working conditions. All geographic areas of the province were represented in the responses. A content analysis of the data was conducted to determine major themes. Similar themes were found across all geographic areas. The four major categories of concerns that emerged from the qualitative analysis were quality of worklife, quality of patient care, relations with management, and cumulative impact of work conditions on feelings and attitudes. Nurses' perceptions of their quality of work life, concern for the quality of patient care and their emotional and attitudinal responses were very similar to those reported in a recent study of hospital staff nurses in the United States. The decade of the 1990's has been characterized as one of constant change bordering on chaos within the health care system in Canada and the United States. In Canada, government fiscal policies have resulted in less money being directed toward health care forcing the system to reorganize in order to meet new financial realities. Many of the organizing efforts have been directed toward the acute care sector of the health care system. Nurses, as the largest occupational group within the health care system, have been disproportionately affected by these efforts. The purpose of this study was to tap nurses concerns about the effects of these changes on their personal and work experiences. [Publication Abstract] *sex breakdown; no gender-based analysis

Stinson, J., N. Pollak, et al. (2005). Impacts on worker's health and well-being. The pains of privatization: how contracting out hurts health support workers, their families, and health care.

Using qualitative, interview-based methods, this study examines the experiences of health care workers in cleaning and food preparation services in relation to the privatization of these health support services in British Columbia, Canada. Work and employment conditions and implications for work health and well-being, family, social and community support and the health care system are discussed. Health support workers are predominately women, many of immigrant and or of visible minority status. Seventy-five percent of study participants reported feeling of depression, anxiety, powerlessness, anger and frustration in relation to the changing nature, demands, and conditions of their work. Heavy workload and

absence of supervisory support were reported to be significant sources of emotional distress for home support workers. Key points relating to health and well-being: 83 per cent (20/24) of participants said their job negatively affected their physical health: exhaustion, pain, illness, and injury were the norm; 75 per cent (18/24) said their job negatively affected their emotional or spiritual well-being: frustration, anxiety, depression, feelings of powerlessness, and conflict were common; Job dissatisfaction was widespread and far above the provincial average (p.25)

Stone, P. W., D. Yunling, et al. (2007). "Organizational climate and occupational health outcomes in hospital nurses." Journal of Occupational and Environmental Medicine **49**(1): 50-58.

OBJECTIVE: The objective of this study was to determine relationships between organizational climate (OC) factors and occupational health outcomes (lost workdays, musculoskeletal injury, blood and body fluid exposures, injuries, and burnout) among hospital-based nurses. METHODS: Measures were obtained through a self-administered, anonymous survey distributed in 13 New York City hospitals. Multivariate models appropriate for clustered data were developed. These analyses controlled for nurse and employment characteristics. Independent effects of OC factors were examined. RESULTS: Surveys from 2047 predominantly registered nurses were obtained (response rate 50%). More than 75% reported lost workdays due to illness in the previous 4-month period and over one third reported experiencing some type of injury. OC factors were independently associated with injuries and measures of burnout ($P \leq 0.05$). CONCLUSIONS: OC is significantly associated with the health and well-being of hospital nurses. [Publication Abstract] *sex breakdown; no gender-based analysis

Thornhill, J. and M. Dault (2008). "CHSRF knowledge transfer: healthy healthcare workplaces: improving the health and work environments of professionals." Healthcare Quarterly **11**(4): 16-19.

Health human resources have long been a top issue facing Canada's healthcare policy makers and managers. It is also an issue that has seen a dramatic shift in terms of decision-makers' perspectives in recent years. At the beginning of this decade, decision-makers tended to have a rather simplistic understanding of health human resources. In particular, they appeared preoccupied with issues of supply and, as such, were eager to learn about forecasting models to plan for cycles of surplus and shortage (Gagnon et al. 2001). Several short years later, there was a progression in their thinking - they adopted an appreciation for issues of the workforce (i.e., facilitating inter-professional collaboration and regulating scope of practice) versus those of the workplace (i.e., organizational structures and management practices and workplace productivity, stress and absenteeism) (Dault et al. 2004). Today, decision-makers have developed an even more sophisticated understanding of the issues. They have an appreciation for new models for staffing (i.e., new team mixes that include non-traditional health system workers), new models of practice (i.e., collaborative models of

care and self-care) and strategies to keep workers, healthy, happy and in the workplace longer (Law et al. 2008). [Publication Abstract]

Trinkoff, A., W. Eaton, et al. (1991). "The Prevalence of substance abuse among registered nurses." Nursing Research **40**(3): 172-174.

The purpose of this research was to estimate the prevalence of substance abuse and depression among a population-based sample of registered nurses. In addition, to estimate the degree to which substance abuse and depression were associated with nurses, a comparison was made between nurses and other employed individuals. Respondents were obtained from a probability sample of households that were part of the National Institute of Mental Health Epidemiologic Catchment Area Program (ECA). Of the adults interviewed as part of the ECA, 143 were under age 65 and currently working as registered nurses. These nurses were matched by neighbourhood of residence (census tract) and gender to a comparison group of non-nurses from the ECA who were also employed at the time of interview. Estimates of the odds of substance use and depression among the nurses (n = 143) and non-nurses (n = 1410) were calculated. Nurses were no more likely to have engaged in illicit drug use or to have experienced depression than non-nurses. Nurses were also less likely to have experienced problems with alcohol abuse than non-nurses [Publication Abstract] *no sex breakdown; no gender-based analysis

Trinkoff, A., C. L. Starr, et al. (2001). "Physically demanding work and inadequate sleep, pain medication use, and absenteeism in registered nurses." Journal of Occupational and Environmental Medicine **43**(4): 355-363.

Pain and fatigue are early indicators of musculoskeletal strain. This study examined associations among eight physical demands and inadequate sleep, pain medication use, and absenteeism in 3727 working registered nurses (RNs). Among the demands, awkward head/arm postures were associated with each outcome (inadequate sleep: odds ratio [OR], 1.96; 95% confidence interval [CI], 1.41 to 2.72; pain medication: OR, 1.65; CI, 1.12 to 2.24; absenteeism: OR, 1.60; CI, 1.26 to 2.04). A dose-response relationship was present; as the number of demands increased, the likelihood of each outcome increased. Odds ratios for eight demands versus no demands were as follows: inadequate sleep (OR, 5.88; CI, 2.30 to 15.50), pain medication (OR, 3.30; CI, 1.34 to 8.11), and absenteeism (OR, 2.13; CI, 1.15 to 3.94). Adjustment using multiple logistic regression for lifestyle, demographics, and work schedule did little to alter the findings. Interventions to promote nurses' health should limit the physical demands of the work [Publication Abstract] *participant sex breakdown; sex aggregated data; no gender-based analysis

Trinkoff, A. and C. Storr (1998). "Substance use among nurses: differences between specialties." American Journal of Public Health **88**(4): 581-585.

OBJECTIVES: Valid data on factors that increase a health care worker's likelihood of substance use are integral in ensuring professional standards and quality health care for consumers. This study explored the association between

nursing specialty and past-year substance use. METHODS: In an anonymous mailed survey, a balanced stratified sample of registered nurses (n = 4438) reported their use of marijuana, cocaine, and prescription-type drugs, as well as cigarette smoking and binge drinking. RESULTS: Prevalence of use of all substances was 32%. Rates varied by specialty, even when sociodemographics were controlled. Compared with nurses in women's health, pediatrics, and general practice, emergency nurses were 3.5 times as likely to use marijuana or cocaine (odds ratio [OR] = 3.5; 95% confidence interval [CI] = 1.5, 8.2); oncology and administration nurses were twice as likely to engage in binge drinking; and psychiatric nurses were most likely to smoke (OR = 2.4; 95% CI = 1.6, 3.8). No specialty differences appeared for prescription-type drug use. CONCLUSIONS: Certain nursing specialties were more likely than others to be associated with substance use. The differences were not explained by demographic characteristics. Inasmuch as a comparison of these results for nurses with prior work on physicians found considerable agreement by specialty, preventive initiatives should consider inter-disciplinary approaches to substance use education. [Publication Abstract] *participant sex breakdown; sex aggregated data; no gender-based analysis

Van Dussen, D. and C. Muntaner (2004). "Work organization, economic inequality, and depression among nursing assistants: multilevel modeling approach." The Gerontologist **44**(1): 647-648.

The purpose of the current investigation is to investigate the relationships between nursing home work environment, emotional strain and depression in nursing assistants in Ohio and West Virginia. A cross sectional study was conducted of 368 nurse assistants in forty-nine nursing homes in Ohio and West Virginia. Organizational attributes were measured independently at the individual and organizational levels. Multi-level modeling techniques were used to analyze the data. We examined nursing home organizational structure (ownership type, managerial style), work organization (emotional strain), in relation to the prevalence of depression among nurse assistants. Workplace emotional strain and age are associated with increased odds of depression. Implications: Nursing home work and the environment it fosters has a strong effect on emotional strain and depression among nursing assistants. [Publication Abstract] *no gender-based analysis

Van Servellen, G. and B. Leake (1993). "Burn-out in hospital nurses: a comparison of acquired immunodeficiency syndrome, oncology, general medicine, and intensive care unit nurse samples." Journal of Professional Nursing **9**: 169-177.

Previous research has shown that job-related stress and burn-out are associated with high levels of demand placed on the worker, especially in situations where influence is low . This study examined burn-out among nurses working on acquired immunodeficiency syndrome (AIDS) special cars units (SCUs), oncology SCUs, medical intensive care units (ICUs) and general medical units to measure the extent to which delivery method (SCU, ICU, and general unit), patient diagnosis, or other key personal and work-related characteristics were

associated with the level of distress in these nurses. A sample of 237 nurses from 18 units in seven hospitals were surveyed using the Maslach Burnout Inventory. This study showed no significant differences in burn-out scores across nurse samples representing variations in patient diagnosis and delivery method. Specifically, nurses on AIDS, SDIJs, oncology SCUs, medical ICUs, and general medical nursing units reported similar levels of distress on the burn-out subscales. There was one exception: medical ICU nurses scored significantly lower on the Personal Accomplishment subscale (P < .00l). Regression analyses for the Emotional Exhaustion and Personal Accomplishment subscales indicated that greater job influence had a significant protective effect on emotional exhaustion and enhanced personal accomplishment (P < .05). As expected, job tension was a key predictor of exhaustion (P < .00l), and being white was associated with greater feelings of accomplishment (P < 402). Working in a medical ICU continued to show a negative impact on accomplishment when race and other important covariates were controlled for (P < .05), and working on an AIDS SCU was predictive of exhaustion in a multivariate [Publication Abstract] *sex breakdown; no gender-based analysis

Van Vegchel, N., J. de Jong, et al. (2001). "Different effort constructs and effort-reward imbalance: effects on employee well-being in ancillary health care workers." Journal of Advanced Nursing **34**(1): 128-136.

AIMS. The present study investigates the relationship between Effort–Reward Imbalance (ERI) and employee well-being, using three different concepts of efforts (i.e. psychological demands, physical demands and emotional demands). BACKGROUND The ERI model had been used as a theoretical framework, indicating that work stress is related to high efforts (i.e. job demands) and low occupational rewards (e.g. money, esteem and security/career opportunities). The ERI model also predicts that, in overcommitted workers, effects of ERI on employee well-being are stronger compared with their less committed counterparts. METHODS. A cross-sectional survey among 167 ancillary health care workers of two nursing homes was conducted. Multiple univariate logistic regression analyses were used to test the relationship between ERI and employee well-being. RESULTS. Results of the logistic regression analyses showed that employees with both high (psychological, physical and emotional) efforts and low rewards had higher risks of psychosomatic health complaints, physical health symptoms and job dissatisfaction (odds ratios (ORs) ranged from 5·09 to 18·55). Moreover, employees who reported both high efforts and high rewards had elevated risks of physical symptoms and exhaustion (ORs ranged from 6·17 to 9·39). No support was found for the hypothesis on the moderating effect of overcommitment. CONCLUSION. Results show some support for the ERI model; ancillary health care workers with high effort/low reward imbalance had elevated risks of poor employee well-being. In addition, results show that the combination of high efforts and high rewards is important for employee well-being. Finally, some practical implications are discussed to combat work stress in health care work. [Publication Abstract] *no gender-based analysis

Viitasara, E. and Magnus Sverke et Ewa Menckel (2003). "Multiple risk factors for violence to seven occupational groups in the Swedish Caring Sector." Relations industrielles **2003**(202-231).

Violence towards health-care personnel represent an increasing problem, but little is known in terms of how different occupational groups are affected. A questionnaire was sent to a stratified sample of 2,800 of 173,000 employees in the Swedish municipal health and welfare sector. Seven major groups working with the elderly or persons with developmental disabilities were considered: administrators, nursing specialists, supervisors, direct carers, nursing auxiliaries, assistant nurses, and personal assistants. The response rate was 85 percent. Fifty-one percent of respondents reported exposure to violence or threats of violence over one year. The most vulnerable groups were assistant nurses and direct carers (usually of the developmentally disabled). Individual characteristics, such as age and organizational tenure, were related to exposure. Work-related characteristics, such as type of workplace, working full-time with clients, organizational downsizing, and high workload, were also associated with risk. Greater knowledge of impacts on different professional groups and relevant prevention are required. [Public Abstract] *sex breakdown

Vlerick, P. (1996). "Burnout and work organization in hospital wards: a cross-validation study." Work & Stress **10**(3): 257-265.

The relationship between nurses' work organization in hospital wards and the level of burnout experienced by them was analysed in two independent and highly comparable samples of nurses. The hypothesis that the greater the number of nurses who are responsible for, or are having contact with, one patient during one work shift, the higher their experienced level of burnout will be, was partially confirmed in one of the two samples. We have attributed the contradictory results to differences in the management of nurses' work organization, and warned against fashionable ideas concerning the ideal type of nurses' work organization in hospital wards [Publication Abstract] no sex breakdown; no gender-based analysis

Vogel, L. (2003). The gender workplace health gap in Europe, European Trade Union Technical Bureau for Health and Safety.

Generally speaking, women's issues are absent from health and safety policies: the hazards involved are either unknown or underestimated; and priorities are defined in male-dominated sectors and occupations, and so on. This failure to take account of women's health issues in the workplace constitutes a barrier to effective policies on occupational health and equal opportunities. For several years now, the TUTB and the ETUC have been trying to incorporate gender into their workplace health and safety policy. In 2001, the TUTB and ETUC decided to carry out a survey in the 15 EU countries aiming at assessing the situation in two areas: (1) The inclusion of gender issues in health and safety policies. The aim was to ascertain the extent to which issues to do with women's health are taken into account when defining priorities, research activities and statistical data, and also the extent to which they are taken on board by the respective

players and institutions (2) Practical experiences involving health and safety actions at the workplace that take account of gender issues. This book reviews the key issues addressed by the research (developments, policies and prospects) and case studies from different EU countries illustrating research action in various sectors on different categories of risks. [Editor's Presentation/Description]

Wall, T. D., R. I. Bolden, et al. (1997). "Minor psychiatric disorder in NHS trust staff: occupational and gender differences." British Journal of Psychiatry **171**: 519-523.
BACKGROUND: It is widely suggested that many National Health Service (NHS) workers experience high levels of minor psychiatric disorder. However, inadequacies of sampling and measurement in studies to date have not allowed this suggestion to be properly evaluated. METHOD: The present study was designed to overcome these methodological weaknesses by using a sample of over 11,000 employees from 19 NHS trusts and a well-established measure of minor psychiatric disorder for which there are comparative data. RESULTS: The findings show that 26.8% of the health service workers reported significant levels of minor psychiatric disorder, compared with 17.8% of people in the general population. Psychiatric morbidity was highest among managers, doctors, nurses and professions allied to medicine, with each of these groups recording higher rates than their professional counterparts outside the health service. It was lower among those in support occupations, such as administrative and ancillary staff. A feature of the findings was that female doctors and managers showed a much higher prevalence of minor psychiatric disorder than their male colleagues. CONCLUSION: Studies are required to establish the organisational, occupational and individual determinants of minor psychiatric disorder among NHS employees. [Publication Abstract] *sex breakdown

Walsh, B. and S. Walsh (2001). "Is mental health work psychologically hazardous for staff? a critical review of the literature." Journal of Mental Health **10**(2): 121-129.
Recent studies have highlighted the poor mental health of healthcare workers. This paper hypothesises that mental health staff in particular, face risks to their mental health. The relevant literature is reviewed to investigate this, and explores whether patient contact or other work factors may predict poor staff mental health. The review reveals that despite methodological flaws in the existing research, there is sufficient evidence to conclude that mental health work may be psychologically hazardous for staff. Contributing factors are likely to include intensive contact with severely ill patients, low professional status, organisational change and task characteristics such as inadequate feedback, uncertainty about role and low support. Future research should aim to clarify mechanisms by which psychiatric work may affect staff. A more detailed understanding could allow jobs to be designed in such a way that risks to staff mental health are minimised. [Publication Abstract]

Walters, V., S. French, et al. (1997). "The effects of paid and unpaid work on nurses' well-being: the importance of gender." Sociology of Health & Illness **19**(3): 328-347.

A handful of studies have started to explore the effects on health of both paid and unpaid work among women and men. This paper reports on a survey of a proportional random sample of 2285 women and men nurses from three regions of Ontario. We examine the effects of paid and unpaid work on their well-being. The data were analysed for the full sample and then multiple regression analyses were run separately for men and women. In our discussion we emphasise several points: unless such data are analysed in terms of gender, as well as controlling for sex, marked differences between the experiences of men and women may be neglected; that in understanding health, it is important to take into account the influence of both paid and unpaid work; and that certain features of paid and unpaid work are often associated with well-being - control over work, the degree of challenge that work presents, recognition, satisfaction with work, social support, number of children and the level of overall stress experienced. Workload issues are also associated with women's well-being.[Publication Abstract] *women workers; gender analysis

Walters, V., R. Lenton, et al. (1996). "Paid work, unpaid work and social support: a study of health of male and female nurses." Social Science & Medicine **43**(11): 1627-1636.

Paid work, unpaid work in the home and social support are important elements of the social production of health and illness, though their combined effects on both women and men have only recently become a focus of research. This paper examines their association with the health problems of nurses, presenting data from a survey of a proportional random sample of 2285 male and female nurses registered in the Province of Ontario. The data are first analysed for the full sample and then multiple regression analyses are run separately for male and female Registered Nurses. The demands of paid work (overload, exposure to hazards), unpaid work (time pressures, caring for a dependent adult) and overall stress in life are associated with greater health problems. There is also evidence of significant links between social support and health, A poor relationship with a supervisor is associated with health problems. On the other hand, enjoying a confiding relationship with a friend and having up to 4 children reduces the likelihood of experiencing health problems. The features of nursing associated with fewer health problems are challenge, satisfaction with work and working under 20 hours a week. Several common themes emerge in the analyses of women and men: overload, hazard exposure, satisfaction with work, having 3-4 children and level of overall stress in life. Yet the models are also very different and point to the need for further analyses of the social production of health problems in relation to gender. They also suggest that female nurses, in particular, may suffer the effects of restructuring in the health care sector. Workload issues are especially important for women. Younger women, those reporting time pressures and caring for a dependent adult are more likely to report health problems. Having a confiding relationship with a friend is associated with fewer health problems for women. Among men, those who dislike housework are more likely to experience health problems. Satisfaction with work and overall stress in life were associated with health problems for both men and

women, though there may be gender differences in what generates satisfaction and stress [Publication Abstract] *sex breakdown; gender analysis

Weinberg, A. and F. Creed (2000). "Stress and psychiatric disorder in healthcare professionals and hospital staff." Lancet **355**(9203): 533-37.

BACKGROUND Previous studies of stress in healthcare staff have indicated a probable high prevalence of distress. Whether this distress can be attributed to the stressful nature of the work situation is not clear. No previous study has used a detailed interview method to ascertain the link between stress in and outside of work and anxiety and depressive disorders. METHODS Doctors, nurses, and administrative and ancillary staff were screened using the general health questionnaire (GHQ). High scorers (GHQ>4) and matched individuals with low GHQ scores were interviewed by means of the clinical interview schedule to ascertain definite anxiety and depressive disorders (cases). Cases and controls, matched for age, sex, and occupational group were interviewed with the life events and difficulties schedule classification and an objective measure of work stress to find out the amount of stress at work and outside of work. Sociodemographic and stress variables were entered into a logistic-regression analysis to find out the variables associated with anxiety and depressive disorders. FINDINGS 64 cases and 64 controls were matched. Cases and controls did not differ on demographic variables but cases were less likely to have a confidant (odds ratio 0·09 [95% CI 0·01-0·79]) and more likely to have had a previous episode of psychiatric disorder (3·07 [1·10-8·57]). Cases and controls worked similar hours and had similar responsibility but cases had a greater number of objective stressful situations both in and out of work (severe event or substantial difficulty in and out of work-45 cases *vs* 18 controls 6·05 [2·81-13·00], p<0·001; severe chronic difficulty outside of work-27 *vs* 8, 5·12 [2·09-12·46], p<0·001). Cases had significantly more objective work problems than controls (median 6 *vs* 4, *z*=3·81, p<0·001). The logistic-regression analyses indicated that even after the effects of personal vulnerability to psychiatric disorder and ongoing social stress outside of work had been taken into account, stressful situations at work contributed to anxiety and depressive disorders. INTERPRETATION Both stress at work and outside of work contribute to the anxiety and depressive disorders experienced by healthcare staff. Our findings suggest that the best way to decrease the prevalence of these disorders is individual treatment, which may focus on personal difficulties outside of work, combined with organisational attempts to reduce work stress. The latter may involve more assistance for staff who have a conflict between their managerial role and clinical role. [Publication Abstract] *sex aggregated data; no gender-based analysis

Wilkins, K. (2007). "Work stress among health care providers." Health Reports **18**(4): 33-36.

According to data from the 2003 Canadian Community Health Survey (CCHS), nearly one in three employed Canadians, about 5.1 million, reported that most days at work were “quite” or “extremely” stressful. This article focuses on workers

entrusted with providing health care to Canadians. Clearly, the wellbeing of this group of workers, which includes not only doctors and nurses, but also occupations such as ambulance attendants, technicians and therapists, is an important concern. The analysis compares levels of work stress—a factor that has been linked to poor physical and mental health and to occupational injury—among various types of health care providers. Associations between stress and selected job-related, socio-demographic and personal characteristics are also described. [Publication Abstract] *no sex breakdown; no gender-based analysis

Woodward, C. A., H. S. Shannon, et al. (1999). "The impact of re-engineering and other cost reduction strategies on the staff of a large teaching hospital." Medical Care **37**(6): 556-569.

OBJECTIVES. To examine changes over time in the hospital staff's perceptions of how rapid organizational change, caused by fiscal constraints imposed by governments, affects them, their work environment, and the quality of care and services that they provide. METHODS. A random sample of hospital employees (n = 900) of a large Ontario teaching hospital participated in a longitudinal study which involved surveys at 3 measurement periods over a 2-year period. The questionnaire used in this study included scales reflecting work environment, emotional distress, personal resources, spillover from work to home and vice versa, and perceptions regarding patient care and the hospital as an employer. RESULTS. Significant increases in depression, anxiety, emotional exhaustion, and job insecurity were seen among employees, particularly during the first year of the change process. By the end of the second year, employees reported deterioration in team work, increased unclarity of role, and increased use of distraction to cope. Job demands increased throughout the period whereas little change occurred in the employee's job influence or decision latitude. Overall, the work environment was negatively affected. Although patient care was unaffected in the first year, a significant decline in perceptions of patient care, attention to quality improvement, and overall quality of care were later seen. CONCLUSIONS. This study raises questions about whether hospital re-engineering and mergers will be able to achieve the cost reductions sought without sacrificing quality of work life. Along with the rapid change, there was increase in emotional distress among staff and a deterioration in their relationship with their employer. [Publication Abstract] *women workers; no gender-based analysis

Yassi, A. (1994). "Assault and abuse of healthcare workers in a large teaching hospital." CMAJ **159**(9): 1273-1279.

OBJECTIVES: To determine the nature, extent and costs of injuries to health care workers caused by physical abuse. DESIGN: Retrospective study. SETTING: Large acute and tertiary care teaching hospital in Winnipeg. PARTICIPANTS: All health care workers at the hospital who filed reports of abuse-related injuries and of verbal abuse and threatening behaviour from Apr. 1, 1991, to Mar. 31, 1993. OUTCOME MEASURES: Frequency of physical and verbal abuse of hospital personnel according to job category, type of injury, hours

of staff time lost and estimates of costs compensated for abuse-related injuries. RESULTS: Of the 242 reported abuse-related injuries 194 (80.2%) occurred among the nursing personnel. The nurses in the medical units filed most (33.1%) of the reports. Although the psychiatric nurses filed fewer reports (35 [14.5%]) they had the highest rate of injuries per 100,000 paid hours among the nursing staff. Not surprisingly, the security officers were at highest risk, 53.5% having reported an abuse-related injury for a rate of 16.8 such injuries per 100,000 paid hours. Male staff members had a higher injury rate than their female counterparts in all occupational groups. Bruising or crushing was the most frequent type of injury (in 126 cases); the next most frequent were cuts and lacerations (in 47) and human bites and exposures to blood or body fluids (in 23). However, the 36 sprains and strains resulted in the largest amount of time lost. In all, over 8000 hours were lost due to abuse-related injuries, and over $76,000 was paid in workers' compensation benefits. Concurrently, 646 incidents of verbal abuse and threatening behaviour were reported. Only three abuse-related injuries and two incidents of verbal abuse were reported by physicians. CONCLUSIONS: Abuse-related injuries to health care workers in an urban hospital are prevalent, serious and can be costly in terms of time off work and compensation. Underreporting is likely, especially among physicians [Publication Abstract]. *sex breakdown; no gender-based analysis

Yassi, A., M. Gilbert, et al. (2005). "Trends in injuries, illnesses, and policies in Canadian healthcare workplaces." Canadian Journal of Public Health **96**(5): 325-327.

The purpose of this research was to estimate the prevalence of substance abuse and depression among a population-based sample of registered nurses. In addition, to estimate the degree to which substance abuse and depression were associated with nurses, a comparison was made between nurses and other employed individuals. Respondents were obtained from a probability sample of households that were part of the National Institute of Mental Health Epidemiologic Catchment Area Program (ECA). Of the adults interviewed as part of the ECA, 143 were under age 65 and currently working as registered nurses. These nurses were matched by neighborliood of residence (census tract) and gender to a comparison group of non-nurses from the ECA who were also employed at the time of interview. Estimates of the odds of substance use and depression among the nurses (n = 143) and non-nurses (n = 1410) were calculated. Nurses were no more likely to have engaged in illicit drug use or to have experienced depression than non-nurses. Nurses were also less likely to have experienced problems with alcohol abuse than non-nurses [Publication Abstract] *aggregate data

Yassi, A. and T. Hancock (2005). "Patient safety - worker safety: building a culture of safety to improve health care worker and patient well-being." Healthcare Quarterly **8**: 32-38.

Patient safety within the Canadian healthcare system is currently a high national priority, which merits a comprehensive understanding of the underlying causes of adverse events. Not least among these is worker health and safety, which is

linked to patient outcomes. Healthcare workers have a high risk of workplace injuries and more mental health problems than most other occupational groups. Many healthcare professionals feel fatigued, stressed, in pain, or at risk of illness or injury - factors they feel impede their ability to provide consistent quality care. With this background, the Occupational Health and Safety Agency for Healthcare (OHSAH) in British Columbia, jointly governed by healthcare unions and healthcare employers, launched several major initiatives to improve the healthcare workplace. These included the promotion of safe patient handling, adaptive clothing, scheduled toileting, stroke management training, measures to improve management of aggressive behaviour and, of course, infection control - all intended to improve the safety of workers, but also to improve patient safety and quality of care. Other projects also explicitly promoting physical and mental health at work, as well as patient safety are also underway. Results of the projects are at various stages of completion, but ample evidence has already been obtained to indicate that looking after the well-being of healthcare workers results in safer and better quality patient care. While more research is needed, our work to date suggests that a comprehensive systems approach to promoting a climate of safety, which includes taking into account workplace organizational factors and physical and psychological hazards for workers, is the best way to improve the healthcare workplace and thereby patient safety. [Publication Abstract] *no gendered analysis

Yassi, A., A. Ostry, et al. (2002). Caring for the caregivers of "alternate level care" patients: the impact of healthcare organizational factors on nurse health, well-being, recruitment, and retention in the South Fraser Region of British Columbia.

This project examines the implications for the occupational health, well-being, and retention of the healthcare workforce (e.g., nurses, licensed practical nurses, care aides, and rehabilitation staff) caring for alternate level care patients. Interviews and focus group discussions were conducted with managers and nursing staff. Direct care workers (patient-handling staff) completed questionnaires to assess work environment factors were associated with each alternate model of care. Findings from this study suggest the organization of patient care has significant implications for healthcare workforce risk of injury and job satisfaction. Compared to low-mix units, extended-care/alternate-level units, high-mix units, and geriatric units, findings indicate dedicated alternate-level wards have fewer implications in terms of occupational risk. *no sex breakdown; no gender-based analysis

Yassi, A., A. S. Ostry, et al. (2002). "A collaborative evidence-based approach to making healthcare a healthier place to work." Healthcare Quarterly **5**(3): 70-78.

Difficulties in recruitment and retention, high rates of work injuries, illnesses and absences from work, and escalating costs plague Canada's healthcare system. The well-being of the healthcare workforce merits serious consideration by healthcare decision-makers. It is increasingly well documented that a collaborative problem-solving approach is more effective in addressing workplace health concerns than an adversarial approach. Combining this with strategies

based on good evidence is key to success. On this premise, a trial was conducted in British Columbia, beginning in July 1999, based on a collaborative approach in which healthcare workers and managers work together to identify and implement evidence-based initiatives to improve the health and working conditions of healthcare workers. A province-wide needs assessment was conducted, world literature was reviewed, focus groups were held with the various stakeholders, and direct input was sought from researchers as well as local practitioners. Cost-benefit analyses were conducted and key decision-makers brought together to reach agreements. "Best practice" guidelines were therefore developed on patient handling, complete with a training program and funding agreements to obtain the capital equipment needed. An innovative best practice program was also developed to promote early and safe return-to-work for injured hospital workers. Other evidence-based pilot programs are being developed, implemented and evaluated. Results to date illustrate that a collaborative evidence-based approach, where all parties work together in the face of challenge, is the way forward in addressing the occupational health needs of the healthcare workforce. [Publication Abstract]

Yassi, A., G. J. Wickstrom, et al. (2004). "Globalization and the health of the health care workforce." International Journal of Occupational and Environmental Health **10**(4): 355-359.

Zboril-Benson, L. R. (2002). "Why nurses are calling in sick: the impact of health-care restructuring." Canadian Journal of Nursing Research **33**(4): 89-107.

Absenteeism among registered nurses is a major concern for employers; it is costly and results in decreased standards of care. Despite the international interest in and research on absenteeism, there is relatively little cumulative knowledge regarding its determinants. This quantitative, non-experimental study profiled the reasons for absenteeism in a random sample of 2,000 front-line nurses in the Canadian province of Saskatchewan. Absence was defined as time away from work excluding holidays, strike, or layoff. Major causes of absenteeism were identified, including minor ailment and fatigue related to work overload. A total of 450 respondents had seriously considered leaving the nursing profession, with 50.4% citing overwork and stress as the primary causes. Higher rates of absenteeism were found to be associated with lower job satisfaction, longer shifts, working in acute care, and working full-time. Moderate job dissatisfaction was found to be associated with longer shifts and working in acute care. In light of the current nursing shortage, strategies for reducing absenteeism and increasing job satisfaction are warranted. [Publication Abstract]

Zeytinoglu, I. U. and M. Denton (2005). Satisfied workers, retained workers: effects of work and work environment on homecare workers' job satisfaction, stress, physical health, and retention, Canadian Health Services Research Foundation.

This study examines how homecare worker characteristics and work conditions affects worker job satisfaction, stress, physical health, and retention. Factors such as work organization, physical and psychosocial work conditions, and

organizational change were considered. The goal of this report is aid policy makers and human resources develop policies and strategies to facilitate homecare workforce retention and promote healthy and safe work conditions for this sector. Homecare workers report high levels of occupational stress, burnout, and physical problems linked to health care restructuring, organizational change and work design. Zeytinoglu et al. discuss these preventable occupational health concerns in relation to job satisfaction, retention and effects on the health of the homecare workforce.

Zeytinoglu, I. U., M. Denton, et al. (1999). Casual jobs, work schedules and self-reported musculoskeletal disorders among visiting home care workers, Canadian Health Services Research Foundation.

This paper examines associations between casual jobs, work schedules, and, and self-reported musculoskeletal disorders (MSDs) among visiting home care workers. This paper builds upon our previous analysis of associations between physical and psychosocial work, work-related injuries, individual factors and MSDs in home care work. Results are based on 674 survey respondents. Results show that neither casual jobs nor work schedules are associated with MSDs; instead stress, physical effort at work, hazards in clients' homes, workrelated injuries, age and money problems are significantly associated factors. Implications of findings are discussed. [Publication Abstract] *women workers; sex/gender conflated

Zeytinoglu, I. U., M. Denton, et al. (2006). "Retaining nurses in their employing hospitals and in the profession: effects of job preference, unpaid overtimes, importance of earnings and stress." Health Policy **79**(1): 57-72.

The purpose of this paper is to examine the effects of job preference, unpaid overtime, importance of earnings, and stress in retaining nurses in their employing hospitals and in the profession. Data come from our survey of 1396 nurses employed in three teaching hospitals in Southern Ontario, Canada. Data are analyzed first for all nurses, then separately for full-time, part-time, and casual nurses. Results show that the key to understanding the effects of these variables may be to pay attention to the work status of nurses. With regards to retaining nurses in their hospitals, working in their preferred type of job is important, particularly for part-time nurses. Working unpaid and longer than agreed hours is also a factor for increasing the likelihood of part-time nurses to leave the profession. All nurses are less inclined to leave as the importance of their earnings for the family increases, but it is particularly important for part-time nurses. Stress is an ongoing concern for retaining nurses in their hospitals and within the profession. We suggest managers and policy makers pay attention to employing nurses in jobs they prefer, decrease unpaid overtime, and consider the importance of earnings for them and their families in developing policies and programs to retain nurses. More importantly, stress levels should be lowered to retain nurses. [Publication Abstract] *participant sex breakdown; data aggregated; no gender-based analysis

Zeytinoglu, I. U., M. Denton, et al. (2007). "Associations between work intensification, stress, and job satisfaction: the case of nurses in Ontario." Industrial Relations **62**(2): 201-225.

Health sector reform of the 1990s affected most health care workers in Ontario and in other provinces. As a result of organizational changes, many workers experienced work intensification. This paper examines the associations between work intensification, stress and job satisfaction focusing on nurses in three teaching hospitals in Ontario. Data come from our 2002 survey of 949 nurses who worked in their employing hospital since the early 1990s when the health sector reform era began. Results show that nurses feel their work has intensified since the health sector reform of the 1990s, and work intensification contributed to increased stress and decreased job satisfaction. Results provide empirical support to the literature which suggests that work intensification has an adverse effect on workers' health and well-being, and work attitudes. [Publication Abstract] *no gender-based analysis