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**Balogun-Mwangi O, DeTore NR, and Russinova Z. "We don't get a chance to prove who we really are": a qualitative inquiry of workplace prejudice and discrimination among Black adults with serious mental illness. *Psychiatric Rehabilitation Journal*. 2023; 46(1):4-13.**

<https://doi.org/10.1037/prj0000527>

**Abstract:** OBJECTIVE: Studies focused on prejudice and discrimination have traditionally explored the impact of one kind of prejudicial experience (e.g., race, gender, criminal history) within a particular context and thus, there is weak base of understanding about the experiences of individuals who may contend with concurrent prejudicial and/or discriminatory experiences across multiple characteristics. In this study, our aim was to better understand the prejudicial and/or discriminatory work experiences of Black adults with serious mental illness (SMI). Specifically, we highlight instances where individuals endorse the salience of multiple sources of prejudice and discrimination during a given workplace incident. METHOD: Using a semistructured interview guide and a grounded theory approach, we interviewed 24 Black adults with SMI recruited from two clubhouses in the Boston metropolitan area. To validate findings, we also conducted follow-up focus groups with participants (n = 9) at each recruitment site. RESULTS: We identified 19 personal attributes/characteristics contributing to the prejudicial/discriminatory experiences of Black adults with SMI in the context of work. We also found that respondents would organize these prejudicial/discriminatory experiences in clusters whereby two or more characteristics were viewed as the reasons for prejudice and discrimination during a given workplace incident. CONCLUSIONS AND IMPLICATIONS FOR PRACTICE: Black adults with SMI contend with a

range of prejudicial and discriminatory experiences, often experienced simultaneously, highlighting the importance of an intersectional framework in research designs and/or clinical interventions addressing the needs of this population. (PsycInfo Database Record (c) 2023 APA, all rights reserved)

**van den Berge BA, Wiberg A, Werker PMN, Broekstra DC, and Furniss D. Dupuytren's disease is a work-related disorder: results of a population-based cohort study.**

**Occupational and Environmental Medicine. 2023; 80(3):137-145.**

<https://doi.org/10.1136/oemed-2022-108670> [open access]

**Abstract:** Objectives: Dupuytren's disease (DD) is a fibroproliferative disorder of the hands, characterised by the development of fibrous nodules and cords that may cause disabling contractures of the fingers. The role of manual work exposure in the aetiology of DD is controversial. We investigated whether current occupational exposure to manual work is associated with DD, and if there is a dose-response relationship. Methods: In this population-based cohort analysis, we used data from the UK Biobank cohort. Our primary outcome was the presence of DD. The exposure of interest was manual work, measured for each participant in two different ways to allow two independent analyses to be undertaken: (1) the current manual work status of the occupation at the time of recruitment, and (2) a cumulative manual work exposure score, calculated based on the occupational history. We performed propensity score matching and applied a logistic regression model. Results: We included 196 265 participants for the current manual work analysis, and 96 563 participants for the dose-response analysis. Participants whose current occupation usually/always involved manual work were more often affected with DD than participants whose occupation sometimes/never involved manual work (OR 1.29, 95% CI 1.12 to 1.49,  $p < 0.001$ ). There was a positive dose-response relationship between cumulative manual work exposure score and DD. Each increment in cumulative work exposure score increased the odds by 17% (OR 1.17, 95% CI 1.08 to 1.27,  $p < 0.001$ ). Conclusions: Manual work exposure is a risk factor for DD, with a clear dose-response relationship. Physicians treating patients should recognise DD as a work-related disorder and inform patients accordingly.

**Brall F and Schmid R. Automation, robots and wage inequality in Germany: a decomposition analysis. Labour. 2023; 37(1):33-95.**

<https://doi.org/10.1111/labr.12236> [open access]

**Abstract:** We conduct a decomposition analysis based on recentred influence function (RIF) regressions to disentangle the relative importance of automation and robotization for wage inequality in the manufacturing sector in Germany between 1996 and 2017. Our measure of automation threat combines occupation-specific scores of automation risk with sector-specific robot densities. We find that besides changes in the composition of individual characteristics, structural shifts among different automation threat groups are a non-negligible factor associated with wage inequality between 1996 and 2017. Moreover, the

increase in wage dispersion among the different automation threat groups has contributed significantly to higher wage inequality in the 1990s and 2000s.

**Chim JMY and Chen TL. Prediction of work from home and musculoskeletal discomfort: an investigation of ergonomic factors in work arrangements and home workstation setups using the COVID-19 experience. *International Journal of Environmental Research and Public Health*. 2023; 20(4):3050.**

<https://doi.org/10.3390/ijerph20043050> [open access]

Abstract: The COVID-19 pandemic provided an opportunity for office workers to experience work from home (WFH). The aims of this study are to investigate the prevalence rate of musculoskeletal discomfort (MSD) and the work conditions of homeworkers during WFH as well as to evaluate the association and predicted risk of ergonomic factors and MSD. A total of 232 homeworkers completed questionnaires. Chi-square test and logistic regression were used to analyze the association and prediction of work arrangements and home workstation setups and musculoskeletal outcomes. The result showed that 61.2% of homeworkers reported MSD while WFH. Because of the small living spaces in Hong Kong, 51% and 24.6% of homeworkers worked in living/dining areas and bedrooms, respectively, potentially affecting their work and personal life. Additionally, homeworkers adopted a flexible work style, but prolonged computer use while WFH. Homeworkers who used a chair without a backrest or a sofa could predict a significantly higher risk of MSD. The use of a laptop monitor posed about a 2 to 3 times higher risk of suffering from neck, upper back, and lower back discomfort than the use of a desktop monitor. These results provide valuable information to help regulators, employers, homeworkers, and designers create better WFH guidelines, work arrangements, and home settings

**Duan P, Goh YM, and Zhou J. The impact of COVID-19 pandemic on construction safety in China and the U.S.: a comparative study. *Safety Science*. 2023; 161:106076.**

<https://doi.org/10.1016/j.ssci.2023.106076>

**Fagerlund P, Salmela J, Pietilainen O, Salonsalmi A, Rahkonen O, and Lallukka T. Life-course socioeconomic circumstances in acute, chronic and disabling pain among young employees: a double suffering. *Scandinavian Journal of Public Health*. 2023; 51(2):257-267.**

<https://doi.org/10.1177/14034948211062314> [open access]

Abstract: BACKGROUND: Pain is known to be socioeconomically patterned and associated with disability. However, knowledge is scarce concerning life-course socioeconomic circumstances and pain among young adults. Our aim was to examine the associations of childhood and current socioeconomic circumstances with acute pain and chronic pain with low and high disability levels among young Finnish municipal employees. METHODS: We analysed questionnaire data retrieved from the Young Helsinki Health Study (n=4683) covering 18-39-year-old employees of the City of Helsinki, Finland. We included multiple indicators of childhood and current socioeconomic circumstances and examined their

associations with acute pain and with chronic pain with low and high disability levels. The level of chronic pain-related disability was assessed by the chronic pain grade questionnaire. Multinomial logistic regression analyses were conducted with stepwise adjustments for sociodemographic, socioeconomic and health-related covariates. RESULTS: Childhood and current socioeconomic disadvantage were associated with acute and chronic pain, particularly with chronic pain with high disability level. The strongest associations after adjustments for covariates remained between chronic pain with high disability level and low educational level (odds ratio (OR) 3.38, 95% confidence interval (CI) 2.18-5.24), manual occupation (OR 3.75, 95% CI 1.92-7.34) and experiencing frequent economic difficulties (OR 3.07, 95% CI 2.00-4.70). CONCLUSIONS: Pain is a common complaint that contributes to disability among young employees, particularly the most socioeconomically vulnerable. There is a socioeconomic gradient in both pain chronicity and the level of chronic pain-related disability. Life-course socioeconomic factors should be considered in pain-preventing strategies and in clinical practice

**Harada A, Tateishi S, Ishimaru T, Nagata M, Eguchi H, Tsuji M, et al. Association between types of chronic disease and receiving workplace accommodations: a cross-sectional study of Japanese workers. *Journal of Occupational & Environmental Medicine*. 2023; 65(2):93-97.**

<https://doi.org/10.1097/JOM.0000000000002723>

Abstract: OBJECTIVE: This study aimed to evaluate the association between the type of chronic disease and receiving workplace accommodations. METHODS: This online cross-sectional study analyzed a self-reported questionnaire administered in Japan. A total of 6775 full-time workers who reported needing work accommodations were included. RESULTS: Workplace accommodations were more likely to be provided for workers with cancer, mental illness, and benign gynecological disorders than for workers with no disease under treatment. In contrast, workplace accommodations were less likely for workers with low back pain and skin diseases. CONCLUSIONS: Receiving workplace accommodations depends on the type of chronic disease. Chronic diseases for which workers frequently receive workplace accommodations may be those for which support is encouraged by law. It is necessary to support workers with chronic diseases that do not receive adequate workplace accommodations

**Karihtala T, Valtonen AM, Kautiainen H, Hopsu L, Halonen J, Heinonen A, et al. Relationship between occupational and leisure-time physical activity and the need for recovery after work. *Archives of Public Health*. 2023; 81(1):17.**

<https://doi.org/10.1186/s13690-022-01017-8> [open access]

Abstract: Background: Health benefits of physical activity are very well acknowledged but the role of both occupational physical activity (OPA) and leisure time physical activity (LTPA) in recovery after work is not thoroughly understood. The purpose of this study was to investigate the association between accelerometer-measured OPA and LTPA and the need for

recovery after work (NFR) in early childhood education and care (ECEC) professionals. Methods: The study participants were 217 female ECEC professionals aged 17-64. Physical activity was recorded with a three-axis accelerometer (ActiGraph GT9X Link, ActiGraph, USA) for seven consecutive days. Separate analyses were conducted for both OPA and LTPA and reported as hours/day based on different intensity levels (light, moderate, vigorous, very vigorous). The NFR was measured with the Need For Recovery (NFR) scale (0%-100%). Results: Participants' average physical activity for both OPA and LTPA was about 4 h/day, and the mean NFR score was 38.4%. OPA was significantly associated with the NFR but not with LTPA. The relationship remained significant after adjustments for age, body mass index, work ability, mental health status, and sleep difficulties ( $p < 0.024$ ). Conclusion: According to this study, the OPA level is related to the level of the NFR in female ECEC professionals. Based on the results, it seems that LTPA has no relevance to the NFR. Results suggest that long-lasting OPA, even without strenuous physical activity at work, may predispose individuals to a high NFR.

**Laloo D, Lewsey J, Katikireddi SV, Macdonald EB, Campbell D, and Demou E. Comparing anxiety and depression in information technology workers with others in employment: a UK biobank cohort study. *Annals of Work Exposures and Health*. 2022; 66(9):1136-1150. <https://doi.org/10.1093/annweh/wxac061> [open access]**

Abstract: OBJECTIVES: Despite reported psychological hazards of information technology (IT) work, studies of diagnosed mental health conditions in IT workers are lacking. We investigated self-reported mental health outcomes and incident anxiety/depression in IT workers compared to others in employment in a large population-based cohort. METHODS: We evaluated self-reported mental health outcomes in the UK Biobank cohort and incident diagnosed anxiety/depression through health record linkage. We used logistic regression and Cox models to compare the risks of prevalent and incident anxiety/depression among IT workers with all other employed participants. Furthermore, we compared outcomes within IT worker subgroups, and between these subgroups and other similar occupations within their major Standard Occupational Classification (SOC) group. RESULTS: Of 112 399 participants analyzed, 4093 (3.6%) were IT workers. At baseline, IT workers had a reduced odds (OR = 0.66, 95%CI: 0.52-0.85) of anxiety/depression symptoms and were less likely (OR = 0.87, 95%CI: 0.83-0.91) to have ever attended their GP for anxiety/depression, compared to all other employed participants, after adjustment for confounders. The IT technician subgroup were more likely (OR = 1.22, 95%CI: 1.07-1.40) to have previously seen their GP or a psychiatrist (OR = 1.31, 95%CI: 1.06-1.62) for anxiety/depression than their SOC counterparts. IT workers had lower incident anxiety/depression (HR = 0.84, 95%CI 0.77-0.93) compared to all other employed participants, after adjustment for confounders. CONCLUSIONS: Our findings from this, the first longitudinal study of IT worker mental health, set the benchmark in our understanding of the mental health of this growing workforce and identification of

high-risk groups. This will have important implications for targeting mental health workplace interventions

**McDonnall MC, Cmar JL, and McKnight Z. What predicts job quality of vocational rehabilitation consumers who are blind or have low vision? Rehabilitation Counseling Bulletin. 2023; 66(2):100-111.**

<https://doi.org/10.1177/00343552211060012>

**Ng PHF, Chen PQ, Sin ZPT, Lai SHS, and Cheng ASK. Smart Work Injury Management (SWIM) system: a machine learning approach for the prediction of sick leave and rehabilitation plan. Bioengineering. 2023; 10(2):172.**

<https://doi.org/10.3390/bioengineering10020172> [open access]

Abstract: As occupational rehabilitation services are part of the public medical and health services in Hong Kong, work-injured workers are treated along with other patients and are not considered a high priority for occupational rehabilitation services. The idea of a work trial arrangement in the private market occurred to meet the need for a more coordinated occupational rehabilitation practice. However, there is no clear service standard in private occupational rehabilitation services nor concrete suggestions on how to offer rehabilitation plans to injured workers. Electronic Health Records (EHRs) data can provide a foundation for developing a model to improve this situation. This project aims at using a machine-learning-based approach to enhance the traditional prediction of disability duration and rehabilitation plans for work-related injury and illness. To help patients and therapists to understand the machine learning result, we also developed an interactive dashboard to visualize machine learning results. The outcome is promising. Using the variational autoencoder, our system performed better in predicting disability duration. We have around 30% improvement compared with the human prediction error. We also proposed further development to construct a better system to manage the work injury case

**Pullen E, Fischer MW, Morse G, Garabrant J, Salyers MP, and Rollins AL. Racial disparities in the workplace: the impact of isolation on perceived organizational support and job satisfaction. Psychiatric Rehabilitation Journal. 2023; 46(1):45-52.**

<https://doi.org/10.1037/prj0000543>

Abstract: OBJECTIVE: Prior research indicates Black employees may be particularly vulnerable to job dissatisfaction and that social support at work is a potential resource that could influence employee outcomes. This study examined racial differences in workplace social networks and support, and how these factors may contribute to perceived organizational support and, ultimately, job satisfaction among mental health workers. METHOD: Using data from an all-employee survey in a community mental health center (N = 128), we assessed racial differences in social network supports, hypothesizing that Black employees would report smaller and less supportive social networks, and lower levels of organizational support and job satisfaction compared to White employees. We also hypothesized that workplace

network size and support would be positively associated with perceived organizational support and job satisfaction. RESULTS: Hypotheses were partially supported. Compared to Whites, Blacks had smaller workplace networks that were less likely to include supervisors, were more likely to report workplace isolation (naming no workplace social ties), and were less likely to seek advice from their social ties at work. Regression analyses showed that Blacks and employees with smaller networks were more likely to perceive lower levels of organizational support, even after controlling for background variables. However, race and network size did not predict overall job satisfaction. CONCLUSIONS AND IMPLICATIONS FOR PRACTICE: These findings suggest that Black mental health services staff are less likely to have rich, diverse workplace networks than their White colleagues, which may put them at a disadvantage in terms of accessing support and other resources. (PsycInfo Database Record (c) 2023 APA, all rights reserved)

**Richey MM, Golightly Y, Marshall SW, Novicoff W, Keil A, Nocera M, et al. Trends in fatal occupational injury rates among older workers before and after the Great Recession of 2008. *Occupational and Environmental Medicine*. 2023; 80(3):154-159.**

<https://doi.org/10.1136/oemed-2022-108587>

Abstract: BACKGROUND: Older workers experience higher rates of fatal occupational injury than younger workers worldwide. In North Carolina, the population of older workers more than doubled between 2000 and 2017. In 2008, the Great Recession changed occupational patterns among all age groups. We examined annual rates and distribution of fatal occupational injuries experienced by older workers, comparing the pre-recession period (2000-2007) to the post-recession period (2009-2017). METHODS: Detailed information on all fatal occupational injuries during the period between 1 January 2000 and 31 December 2017 were abstracted from the records of the North Carolina Office of the Chief Medical Examiner and the office of vital records. The decennial Census and American Community Survey were used to estimate the population at risk and derive annual rates of fatal occupational injury. RESULTS: During the study period, 537 occupational fatalities occurred among workers 55+ years of age. The rate of fatal occupational injury among older workers declined 2.8% per year, with a 7.7% yearly decline in the pre-recession period compared with a 1.4% increase per year in the post-recession period. Workers 65+ years of age experienced rate increases in both periods. The highest rates of unintentional fatal occupational injury (injuries that were not purposefully inflicted) were observed in forestry, fishing hunting and trapping, and wood building manufacturing. Intentional fatal occupational injury rates (homicide, suicide) were highest in transportation, gas/service stations and grocery/food stores. CONCLUSIONS: Older workers have persistently high rates of fatal occupational injury in North Carolina before and after the Great Recession

**Solymanzadeh F, Rokhafroz D, Asadizaker M, and Dastoorpoor M. Prediction of risk of coronary artery disease based on the Framingham risk score in association with shift work among nurses. *International Journal of Occupational Safety & Ergonomics*. 2023; 29(1):56-61.**

<https://doi.org/10.1080/10803548.2021.2024403>

**Abstract:** Objectives. This study aimed to determine the prediction of risk of coronary artery disease (CAD) based on the Framingham risk score (FRS) in association with shift work among nurses. Methods. This cross-sectional and descriptive-analytic study was conducted with nurses working in three hospitals located in Abadan, southwest Iran. The sample size was 120 participants, divided into 60 shift workers and 60 day workers (non-shift workers). Demographic data and medical and occupational history were collected through a checklist and interviews. CAD risk assessment tools used to estimate the 10-year cardiovascular disease (CVD) risk included the FRS. Data were analysed by Mann-Whitney U test,  $\chi^2$  test and one-way analysis of variance (ANOVA) using SPSS version 22.0. Results. There were statistically significant differences between blood pressure (BP), total cholesterol (TC), body mass index (BMI) and shift work ( $p = 0.001$ ). There was a statistically significant difference between prevalence of CAD risk and shift work based on the FRS ( $p = 0.04$ ). Conclusion. The study findings showed that shift work is a risk factor for CAD disturbances. Therefore, particular follow-up of shift workers should be recommended for screening and preventing CAD.

**Wijkander M, Farrants K, and Magnusson Hanson LL. Exposure to work-related violence and/or threats of violence as a predictor of certified sickness absence due to mental disorders: a prospective cohort study of 16,339 Swedish men and women in paid work. *International Archives of Occupational & Environmental Health*. 2023; 96(2):225-236.**

<https://doi.org/10.1007/s00420-022-01917-w> [open access]

**Abstract:** Objectives: The aim of this prospective cohort study was to investigate if exposure to work-related violence and/or threats of violence predict certified sickness absence due to mental disorders. Methods: Information on work-related exposure to violence and/or threats of violence were derived from the biannual Swedish Longitudinal Occupational Survey of Health (SLOSH) study 2012-2016, including individuals in paid work across Sweden and from different occupations/sectors ( $n = 16,339$ ). Certified sickness absence due to mental disorders were ascertained from register data from the Swedish Social Insurance Agency. Odds ratios of certified sickness absence due to mental disorders according to exposure to work-related violence were estimated using multiple logistic regression. Several potential confounding variables, such as demographic and socio-economic factors, age, sex, cohabitation, children living at home, socio-economic status, educational level, as well as other types of psychosocial work environmental factors, were adjusted for in the analyses. Results: In the total study sample, 9% reported exposure to violence and/or threats of violence and the prevalence of sickness absence due to mental disorders was 5%. Exposure to work-related violence and/or threats of violence was associated prospectively with



certified sickness absence due to mental disorders (odds ratio 1.46, 95% confidence interval 1.17-1.82,  $p < 0.01$ ). Analysis of possible interaction showed no difference in association when comparing women to men and different age groups. Conclusions: Exposure to work-related violence and/or threats of violence appear to increase the odds of certified sickness absence due to mental disorders. Preventive measures aiming to lower the risk of exposure is thus of great importance.

**Xu Y, Wang M, Feng Y, Xu Y, and Li Y. Does managers' walking around benefit workplace safety? A safety climate intervention field study. *Safety Science*. 2023; 161:106062.**

<https://doi.org/10.1016/j.ssci.2023.106062>

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