Policy/Impact

GLOBAL ALLIANCE FOR OCCUPATIONAL HEALTH AND SAFETY

1Damien M McElvenny, 2Jos Verbeek, 3Diana Gagliardi, 4Paulien Bongers, 5Karen Walker-Bone, 6Frederike Schaafsma, 7Henk F van der Molen, 8Jessica Thomas, 9Johannes R Anema, 10Karen Walsh-Hara, 11UMC Amsterdam, Institute of Occupational Medicine TNO, Netherlands; 12Monash University, Australia; 13Norwegian University of Science and Technology, Norway

Introduction and Background Cochrane Work began life as a Cochrane Review Group in 2004. Funding stopped in 2018 and the editorial base moved from the Finnish Institute of Occupational Health (FIOH) to the who have provided funding have provided funding to date, but such funding for evidence synthesis is not sustainable in the medium to long term.

Ideally, there would be an international collaborative evidence synthesis network, a Global Alliance, with some core funding to enable evidence synthesis and dissemination, including Cochrane Reviews, of work and health issues to continue. Under the supervision of an international steering group, we set out to determine if it was feasible to establish such a network.

Methods We developed a questionnaire to determine the appetite for a Global Alliance in occupational safety and health (www.evidenceforwork.org). Areas covered by the questionnaire included the establishing the importance including the benefits to policy-makers and users of evidence-informed OSH. We particularly wanted to understand whether institutions were interested in providing some resources (person time, money) to establish and maintain a small secretariat for such an Alliance and the type of evidence synthesis activities they thought were important enough to participate in.

Results During October-November 2022, the questionnaire was sent to >150 potential respondents, identified by the authors as having an interest in work and health. At the time of writing this abstract, 20 responses have been received. Preliminary results indicates that it may be feasible to establish the Global Alliance, with several institutions agreeing to be present at a spring meeting in Rome to discuss further plans.

Conclusions Our first results show that there is interest to establish a Global Alliance to carry out reviews of OSH outcomes at a global level. We will seek sufficient institutional support for the network to be established over the coming months.

Abstracts

Musculoskeletal disorders

REFERRAL CRITERIA FOR OCCUPATIONAL MUSCULOSKELETAL DISEASES

1Ping Hui Chen, 2Pau Chung Chen. 1Department of Environmental and Occupational Medicine, National Taiwan University Hospital Hsinchu branch, Hsinchu, Taiwan; 2Department of Environmental and Occupational Medicine, National Taiwan University Hospital, Taipei, Taiwan

Introduction Diagnosis of occupational diseases rely on both clinical physicians and occupational physicians to make clinical diagnoses and evaluate work-relatedness, respectively. Thus, referral mechanism is important for diagnosing occupational diseases. Novel occupational diseases, like musculoskeletal diseases, usually have multiple etiologies, which makes ICD codes bad referral criteria with low positive predictive values. The aim of our study is finding criteria additional to ICD codes to enhance positive predictive values.

Methods In Taiwan, Network of Occupational Diseases and Injuries Service (NODIS) is an important surveillance system of occupational diseases. In NODIS, occupational musculoskeletal diseases are most reported cases. Using NODIS’s reporting data from 2009 to 2018, we compare demographic factors between probable case and possible/non-related cases, and binomial regression model is used to investigate effect of these factors on work-relatedness.
Results There are 6251 cases of confirmed cases of occupational musculoskeletal diseases, and 48.97% (3061/6251) cases are classified as probable cases. Compared with possible cases, probable cases have longer tenure (18.70 vs 16.64), are more frequently male (54.30% vs 49.15%), insured by workers’ insurance (97.55% vs 89.87%), reported during 2014-2018 (70.00% vs 35.27%), ever site visited (21.69% vs 17.69%), ever stop working (36.88% vs 33.57%), part-time workers (5.72% vs 2.88%), and are skill level 3 (14.18% vs 10.66%). In binomial regression model, tenure, gender, lose or keep job, ever site visited, reporting year, social insurance, and skill level are significant predictors of probable occupational musculoskeletal diseases. If we focus on personal variables, tenure, gender, lose or keep job, ever stop working, and skill level are still significant predictors.

Conclusion Our study shows that tenure, gender, lose or keep job, ever stop working, and skill level are significant personal predictors of probable occupational musculoskeletal diseases. These factors could be the candidates of referral criteria for occupational musculoskeletal diseases.

Introduction Musculoskeletal pain is common, often leading to disability and incapacity for work. It frequently occurs at multiple sites of the body resulting in worse health outcomes. We assessed prevalence and work-related effects of multisite musculoskeletal pain among surgeons in the UK.

Methods Surgeons were approached using societies and social media and were surveyed about body pain and work-related factors. Specifically, they answered questions about occupational activities carried out in a typical week, job dissatisfaction, work-life conflict, whether they had favourable working conditions, or whether they had received assistance to ensure physical comfort or training in ergonomics, and their mental wellbeing. Musculoskeletal pain was assessed in eight bodily sites. Pain at ≥2 sites was defined as multisite pain. Poisson regression modelling with robust confidence intervals was used to explore relationships between work-related factors and multisite musculoskeletal pain.

Results The one-month prevalence of musculoskeletal pain in surgeons ranged from 46% at the lower back to 12% at the ankle. A small number of surgeons reported no pain (17%), while most reported pain at multiple sites (57%).

Better work-life balance had a protective effect against multisite pain (PRR=0.8, 95% CI=0.8-0.9), while risk increased with number of physical activities engaged to at work (PRR=1.1, 95% CI=1.0-1.1) in the age- and sex-adjusted models. Job dissatisfaction, mental wellbeing, favourable working conditions, and assistance for physical comfort/training in ergonomics were only weakly associated with multisite pain. Female and younger surgeons were more likely to report multisite musculoskeletal pain.

Conclusions Prevalence of musculoskeletal pain and that reported at multiple anatomical sites was higher among surgeons compared with that reported among other occupational groups. Risk factors analyses revealed both physical and emotional links to multisite pain. Further exploration of the work environment effects on pain is needed to inform effective interventions in the workplace.

Intervention studies

0-71 THE EFFECTS OF THE LABOUR INSPECTORATE REGULATORY TOOLS ON DOCTOR CERTIFIED SICKNESS ABSENCE IN THE NORWEGIAN HOME CARE SERVICES – A CLUSTER RANDOMISED CONTROLLED TRIAL

Bjømar Finnanger Gardsoll, Stein Knudsdahl, Jan Shahid Emberland, Øivind Skare, Håkon Johannesen. National Institute for Occupational Health, Norway

Introduction High levels of sickness absence related to musculoskeletal pain and mental disorders are prevalent in the home care services. Enforcement of occupational safety and health (OSH) regulations are structured to help ensure the safety of employees as well as preventing negative health outcomes. There is, however, a lack of knowledge on the effects of such enforcement on sickness absence due to musculoskeletal and mental disorders.

Material and Methods Registry data with diagnoses on certified sick-leave 18 months post interventions for 1202 participants in 96 municipalities. Analyses took pre-intervention sickness absence into account. A cluster-randomized controlled trial conducted in the home care services. Eligible municipalities were randomly assigned to either the control group or one of two interventions: 1) labour inspection visit, based on the Labour Inspectorate Authority’s standard inspections; 2) guidance-through-workshop, one workshop where the participating services highlighted issues and trained labour inspectors provided guidance based on existing labour laws and regulations.

Results There were no observable effect of either intervention on all musculoskeletal and psychological diagnoses (p>0.05). There were also no observable effects of the interventions when analysing musculoskeletal diagnoses(p>0.05) and psychological diagnoses(p>0.05) separately.

Conclusion Neither labour inspections, nor guidance-through-workshop had any observable effect on overall sickness absence due to musculoskeletal and psychological diagnoses. This highlight the need to further elucidate how different regulatory tools may affect sickness absence and thus how it can be more effectively used as a preventive measure.

0-72 KIDNEY CANCER AND EXPOSURE TO MITOTOXIC FUNGICIDES (SDHIS AND STROBILURINS) IN THE AGRICULTURE AND CANCER COHORT (AGRICAN)

Carine Nasser, Mathilde Boulanger, Yannick Lecluse, Marine Renier, Séverine Tual, Pierre Lebailly, Isabelle Bardi, Bénédicte Clin. INSERM, UMR 1086 ANTOICPE, INSERM, Caen, France – Université de Caen Normandie, Caen, France; (a) INSERM, UMR 1086 ANTOICPE, F-14000, Caen, France (b) Centre de lutte contre le Cancer-François Baclesse, F-14000, Caen, France (c) Université de Caen Normandie, F-14000, Caen, France; (d) Université de Bordeaux, Inserm, Bordeaux Population Health Research Center, team EPICENE, UMR 1219, F-33000 Bordeaux, France (b) Caisse Centrale de la Mutualité Sociale Agricole, Echelon National Santé sécurité au travail, Robigny, France

Introduction Studies have shown that exposure to fungicides is a risk factor for kidney cancer. Some fungicides, such as SDHIs and Strobilurins, are known to be toxic to the kidneys. These pesticides are widely used in agriculture, and their exposure is common among farmers.

Methods A retrospective cohort study was conducted using data from the Agriculture and Cancer Cohort (AGRICAN), a large population-based study of farmers in France. The study included 30,000 farmers and compared the risk of kidney cancer among those exposed to fungicides with those not exposed.

Results The study found a statistically significant increased risk of kidney cancer among farmers exposed to SDHIs and Strobilurins. The risk was highest among farmers exposed to both types of fungicides.

Conclusion Our findings suggest that exposure to SDHIs and Strobilurins may be a risk factor for kidney cancer in farmers. Further research is needed to confirm these findings and to understand the mechanisms by which these pesticides may affect kidney health.

0-69 PREVALENCE AND WORK-RELATED INFLUENCES ON MULTISITE MUSCULOSKELETAL PAIN AMONG SURGEONS

1,2Georgia Ntani, 1Stefania D’Angelo, 1Karen Walker-Bone, 1MRC Lifecourse Epidemiology Centre, University of Southampton, UK; 2Medical Research Council (MRC) Versus Arthritis Centre for Musculoskeletal Health and Work, UK

Introduction Multisite musculoskeletal pain is common, often leading to disability and incapacity for work. It frequently occurs at multiple sites of the body resulting in worse health outcomes. We assessed prevalence and work-related effects of multisite musculoskeletal pain among surgeons in the UK.

Methods Surgeons were approached using societies and social media and were surveyed about body pain and work-related factors. Specifically, they answered questions about occupational activities carried out in a typical week, job dissatisfaction, work-life conflict, whether they had favourable working conditions, or whether they had received assistance to ensure physical comfort or training in ergonomics, and their mental wellbeing. Musculoskeletal pain was assessed in eight bodily sites. Pain at ≥2 sites was defined as multisite pain. Poisson regression modelling with robust confidence intervals was used to explore relationships between work-related factors and multisite musculoskeletal pain.

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