Veille documentaire
Médecine du travail du personnel hospitalier

- Literature Follow-up : occupational health for Healthcare Workers -

Février 2006

Objectif

L'objectif de ce travail est de fournir un outil de veille aux médecins du travail concernant les nouvelles connaissances scientifiques relative à la santé au travail des personnels de soins. La priorité est donnée aux documents en français. Ce travail est réalisé par les documentalistes de l'équipe CISMeF et le service de médecine du travail et de pathologie professionnelle du CHU de Rouen (Dr JF Gehanno), dans le cadre d'un projet financé par la CNRACL (Caisse Nationale de Retraites des Agents des Collectivités Locales). Les résultats proposés sont issus de la surveillance mensuelle d'une sélection de périodiques, de sites Internet d'organismes spécialisés et des bases de données CISMeF, PubMed et BDSP.
La veille juridique est réalisée par l'ISTNF (Institut de santé du nord de la France).
Pour obtenir un document, vous pouvez vous adresser à la BIUM (http://www.bium.univ-paris5.fr/) ou à l'INIST-CNRS (http://www.inist.fr/).

Sommaire

1. Allergies

- Documents en anglais :

Occup Environ Med. 2006 Feb;63(2):121-5.
Latex allergy: a follow up study of 1040 healthcare workers.
Filon FL, Radman G.
UCO Medicina del Lavoro, Dipartimento di Scienze di Medicina Pubblica, Universita degli Studi di Trieste, Trieste, Ital y. Larese@univ.trieste.it
BACKGROUND: Natural rubber latex allergy can cause skin and respiratory symptoms The aim of this study was to evaluate the prevalence and incidence of latex related symptoms and sensitisation among a large group of healthcare workers in Trieste hospitals, followed for three years before and after the introduction of powder-free gloves with low latex release. METHODS: In the years 1997-99 the authors evaluated 1040 healthcare workers exposed to latex allergen for latex related symptoms and sensitisation by means of a questionnaire, a medical examination, skin prick tests, and IgE specific antibody assay. The second evaluation was carried out in the years 2000-02, subsequent to the changeover to a powder-free environment. RESULTS: Glove related symptoms were seen in 21.8% of the nurses (227), mostly consisting of mild dermatitis: 38 (3.6%) complaining of contact urticaria and 24 (2.3%) of asthma and/or rhinitis. These symptoms were significantly related to skin prick tests positive to latex (OR = 9.70; 95% CI 5.5 to 17) and to personal atopy (OR = 2.29; 95% CI 1.6 to 3.2). Follow up was completed in 960 subjects (92.3%): 19 new subjects (2.4%) complained of itching erythema when using gloves, but none was prick positive to latex. Symptoms significantly improved and in most cases disappeared (p<0.0001). CONCLUSIONS: Simple measures such as the avoidance of unnecessary glove use, the use of non-powdered latex gloves by all workers, and use of non-latex gloves by sensitised subjects can stop the progression of latex symptoms and can avoid new cases of sensitisation.
MeSH Terms: Adult - Age Distribution - Dermatitis, Allergic Contact/epidemiology - Dermatitis, Allergic Contact/etiology - Epidemiologic Methods - Female - Gloves, Protective/adverse effects - Humans - Italy/epidemiology - Latex Hypersensitivity/epidemiology - Latex Hypersensitivity/etiology* - Latex Hypersensitivity/prevention & control - Male - Middle Aged - Occupational Diseases/epidemiology - Occupational Diseases/etiology* - Occupational Diseases/prevention & control - Personnel, Hospital* - Powders - Respiratory Hypersensitivity/epidemiology - Respiratory Hypersensitivity/etiology - Skin Tests/methods
Substances: Powders
Publication Types: Multicenter Study

2. Bonnes pratiques

3. Conditions de travail et santé psychologique

- Documents en français :

DOCUMENTS CLEIRPPA. CAHIER, Vol. 20, p. 24-27, 10/2005
La souffrance des soignants.
PLOTON (L.)
Cet article reprend un travail plus ancien mené par l'auteur sur la souffrance des soignants.
profession santé, souffrance, épuisement professionnel, charge mentale, relation soignant soigne, relation aide thérapeutique, culpabilité, comportement, vieillissement, représentation vieillesse, formation, besoin, soins, représentation mort, gériatrie, deuil, pratique médicale, structure sociale personne âgée, psychologue, rôle du professionnel

Rev Infirm. 2005 Nov;(115):25-7.
La souffrance des stagiaires face a la mort.
Poac C, Gaborit B, Piolot A.
CHU Henri Mondor, Creteil.
MeSH Terms: Adaptation, Psychological* - Adolescent - Adult - Attitude of Health Personnel* - Attitude to Health* - Burnout, Professional/etiology - Burnout, Professional/prevention & control - Burnout, Professional/psychology* - Clinical Competence - Education, Nursing, Baccalaureate - Fear - Female - France - Grief - Helping Behavior - Humans - Male - Nurse's Role - Nursing Methodology Research - Questionnaires - Self Efficacy - Students, Nursing/psychology*

L'AIDE SOIGNANTE, Vol. 67, p. 11-23, 05/2005
Les conditions de travail à l'hôpital.
MACREZ (.) / coor.
Dossier de 4 articles. Les conditions de travail des soignants sont difficiles et ressenties comme telles. La crise de l'hôpital (pénurie d'investissements, 35 heures, manque de personnel...) aggrave ces conditions. Plusieurs études statistiques européenne et française font ce constat de crise qui incite les soignants à abandonner leur métier.
profession santé, condition travail, hôpital, crise, personnel hospitalier, profession paramédicale, aide soignant

REVUE DU PRATICIEN MEDECINE GENERALE, Vol. 19, 704-705, p. 1097-1098, 10/10/2005
Stress professionnel des médecins. Comment y remédier ?
GALAM (Eric)
Le stress professionnel des médecins est désormais notoire. Quelles en sont les principales causes ? Comment le prendre en charge ? Comment le prévenir ? Quels sont les dispositifs d'aide aux médecins existant ?
stress, épuisement professionnel, médecin, maladie professionnelle, dépistage, prévention, écoute, France

- Documents en anglais :

Arch Intern Med. 2005 Dec 12-26;165(22):2595-600.
Burnout and internal medicine resident work-hour restrictions.
Gopal R, Glasheen JJ, Miyoshi TJ, Prochazka AV.
Division of General Internal Medicine, Department of Internal Medicine, University of Colorado Health Science Center, Aurora, CO, USA. Ravi.Gopal@med.va.gov
BACKGROUND: Burnout is very common in internal medicine residents. Effective July 2003, all residents were restricted to work less than an average of 80 hours per week and no more than 30 hours of continuous duty for patient care and educational obligations. We evaluated rates of burnout in internal medicine residents before and after the implementation of the new work-hour restriction. METHODS: University of Colorado Health Science Center internal medicine residents were surveyed in May 2003 and May 2004. The survey contained the Maslach Burnout Inventory, organized into 3 subscales (ie, emotional exhaustion, depersonalization, and personal accomplishment); the Primary Care Evaluation of Mental Disorders depression screen; and self-reported quality of care and education. RESULTS: The response rate was 87% (121 of 139 residents) and 74% (106 of 143 residents) in 2003 and 2004, respectively. Self-reported hours worked decreased from a mean of 74.6 to 67.1 (P = .003). In 2004, 13% fewer residents experienced high emotional exhaustion (42% vs 29%; P = .03). There was a trend toward fewer residents with high depersonalization (61% vs 55%; P = .13) and fewer residents with a positive depression screen (51% vs 41%; P = .11). Personal accomplishment did not change. The assessment of self-reported quality of care did not significantly change from 2003 to 2004. Residents reported attending fewer educational conferences per month (18.99 vs 15.56; P = .01). Overall residency satisfaction decreased 6 mm on a 100-mm visual analogue score (P = .02). CONCLUSIONS: Burnout continues to be a major problem. Reducing hours may be the first step to reduce burnout but may also affect education and quality of care.
MeSH Terms: Adult - Burnout, Professional/psychology* - Colorado - Female - Humans - Internal Medicine/education* - Internship and Residency* - Job Satisfaction - Longitudinal Studies - Male - Personnel Staffing and Scheduling* - Physicians/psychology - Prospective Studies - Quality of Health Care - Questionnaires - Research Support, Non-U.S. Gov't - Work Schedule Tolerance

J Adv Nurs. 2005 Aug;51(3):276-87.
Burnout contagion among intensive care nurses.
Bakker AB, Le Blanc PM, Schaufeli WB.
Department of Social and Organizational Psychology, Utrecht University, Utrecht, The Netherlands. a.bakker@fss.uu.nl
AIM: This paper reports a study investigating whether burnout is contagious. BACKGROUND: Burnout has been recognized as a problem in intensive care units for a long time. Previous research has focused primarily on its organizational antecedents, such as excessive workload or high patient care demands, time pressure and intensive use of sophisticated technology. The present study took a totally different perspective by hypothesizing that--in intensive care units--burnout is communicated from one nurse to another. METHODS: A questionnaire on work and well-being was completed by 1849 intensive care unit nurses working in one of 80 intensive care units in 12 different European countries in 1994. The results are being reported now because they formed part of a larger study that was only finally analysed recently. The questionnaire was translated from English to the language of each of these countries, and then back-translated to English. Respondents indicated the prevalence of

burnout among their colleagues, and completed scales to assess working conditions and job burnout. RESULTS: Analysis of variance indicated that the between-unit variance on a measure of perceived burnout complaints among colleagues was statistically significant and substantially larger than the within-unit variance. This implies that there is considerable agreement (consensus) within intensive care units regarding the prevalence of burnout. In addition, the results of multilevel analyses showed that burnout complaints among colleagues in intensive care units made a statistically significant and unique contribution to explaining variance in individual nurses' and whole units' experiences of burnout, i.e. emotional exhaustion, depersonalization and reduced personal accomplishment. Moreover, for both emotional exhaustion and depersonalization, perceived burnout complaints among colleagues was the most important predictor of burnout at the individual and unit levels, even after controlling for the impact of well-known organizational stressors as conceptualized in the demand-control model. CONCLUSION: Burnout is contagious: it may cross over from one nurse to another.
MeSH Terms: Adult - Burnout, Professional/epidemiology - Burnout, Professional/etiology* - Depersonalization - Europe/epidemiology - Female - Humans - Intensive Care Units* - Interprofessional Relations* - Male - Middle Aged - Nursing Research - Nursing Staff, Hospital/psychology* - Prevalence - Psychometrics - Regression Analysis - Research Support, Non-U.S. Gov't - Stress, Psychological/psychology - Workload
Publication Types: Multicenter Study

Health Prog. 2005 Nov-Dec;86(6):37-43.
Who will care for the caregivers?
Tellis-Nayak V.
MylnnerView, Inc., Wausau, WI, USA.
Research shows that stable leadership provided by a nursing home's director of nursing (DON) is the foundation of good quality. Conversely, a high DON turnover often results in a quality meltdown at all levels. A recent study, seeking to uncover the root causes of DON turnover, looked at 103 DONs working in Virginia nursing homes. Although DONs overwhelming affirmed their role and agreed that they were overall satisfied, a majority said they would not choose to be a DON again or recommend the role to others. Not surprisingly, low staff retention rates, mounting administrative responsibilities, growing regulatory and legal constraints, and unrealistic time commitments were the leading causes of frustration. Given less time to spend on the responsibilities that lie at the very heart of their mission-direct-care and clinical issues, quality improvement, family relations, staff mentoring and professional development-DONS are likely to experience burnout unless long-term care owners and managers reconfigure their role.
MeSH Terms: Burnout, Professional/etiology - Career Choice - Data Collection - Humans - Job Satisfaction* - Leadership - Nurse Administrators/psychology* - Nurse's Role - Nursing Homes/organization & administration* - Personnel Loyalty - Personnel Turnover - Virginia

4. Hygiène et gestion des risques

- Documents en français :

SCIENCES SOCIALES ET SANTE, N 23, 3, p.37-58,09/2005
"On sait qu'il n'y pas de" vrais "risques" : discours et pratiques de soignants autour des infections nosocomiales.
AMIEL (Céline)
L'hygiène hospitalière tend à lutter contre la transmission d'agents pathogènes au sein d'une structure de soins.
Les pratiques des soignants ne répondent pas toujours aux recommandations hygiéniques. L'approche anthropologique de cette question permet de mettre au jour les logiques qui sous-tendent les discours et les actes des professionnels de santé. Inscrite dans le quotidien des soignants, la gestion de l'hygiène est l'objet de réinterprétations de leur part, faisant appel à leur propre grille de lecture. La perception du risque apparaît comme le résultat d'une appréhension et d'un jugement subjectifs des situations auxquelles sont confrontés les professionnels de santé (Résumé d'auteur). Alain Durocher, praticien hospitalier de réanimation, complète cet article en étudiant "l'infection nosocomiale comme indicateur de (non) qualité des soins : l'exemple de la réanimation" (p. 59-68).

In Hygiènes, 2005 - Volume XIII - n 5
Désinfection des locaux des établissements de soins - Résultats d'une enquête nationale réalisée dans les centres hospitaliers universitaires et les centres de lutte contre le cancer en 2004
X. Verdeil, L. Daubisse-Marliac
La désinfection des locaux des établissements de soins ne fait pas l'objet d'un consensus en ce qui concerne les indications et les procédures mises en œuvre. En France, une enquête nationale a été

réalisée en mai-juin 2004 auprès des équipes d'hygiène des centres hospitalo-universitaires et des centres de lutte contre le cancer. Le taux de réponse était de 78 %. L'abandon de la désinfection par voie aérienne était déclaré par 76 % des établissements. Pour 50 % des établissements utilisant cette technique de désinfection, celle-ci restait d'utilisation exceptionnelle. La désinfection des surfaces par dispersats dirigés était la technique la plus fréquemment utilisée (74 % des établissements). Treize établissements (26 %) citaient comme technique de « nettoyage-désinfection » l'application de détergent-désinfectant seul sur les surfaces. Les pratiques de désinfection des locaux se sont modifiées essentiellement depuis les années 1990. Ces évolutions prennent en compte la toxicité des produits utilisés. Elles peuvent également s'expliquer par l'avis des équipes d'hygiène sur l'inadéquation de la réglementation en vigueur en France jusqu'en août 2004. La nouvelle réglementation a supprimé le lien artificiel existant entre désinfection des locaux et déclaration obligatoire d'une maladie. La désinfection des locaux doit dorénavant être réalisée, lorsqu'elle est nécessaire, par des produits biocides selon des procédés ou des produits agréés. Les hygiénistes, en collaboration avec d'autres professionnels, devraient pouvoir se prononcer sur les indications de cette désinfection
Sujet Âgé - Centre de Soins Long Séjour - Maison Médicalisée Personnes âgées - Infection Croisée - Épidémiologie - Facteur Risque.
Article depériodique

In Hygiènes 2005 - Volume XIII - n 5
La problèmatique des effluents liquides hospitaliers
P. Hartemann, A. Hautemaniere, M. Joyeux
"Les eaux usées hospitalières ont la réputation d'être dangereuses pour l'environnement en raison des micro-organismes qu'elles pourraient disséminer. Les volumes d'eau utilisés journellement sont très importants, croissants avec la taille de l'établissement jusqu'à 750 l à 1 m3 par lit et par jour. Ceci entraîne une forte dilution de la charge microbienne et les études réalisées montrent que sur le plan microbiologique les eaux usées hospitalières sont quantitativement moins chargées que les eaux usées urbaines. Le danger est plutôt lié à la résistance de certaines bactéries aux antibiotiques. En revanche, la contamination chimique de ces effluents pose beaucoup plus de problèmes, tant quantitatifs que qualitatifs. Antibiotiques, désinfectants, cytostatiques, produits de contraste, métaux et autres résidus médicamenteux sont présents à des concentrations non négligeables et, compte tenu des volumes, contribuent nettement à la contamination de la ressource en eau. L'avenir conduira certainement les hôpitaux à devoir mettre en place des filières de collecte sélective des excreta de certains patients et des installations de traitement des eaux usées avant introduction dans le réseau général de collecte."
Eau Égout - Traitement Déchets - Hôpital - Microbiologie Eau - Pollution Chimique Eau - Pollution Radioactive Eau -Purification Eau.
Article de périodique

J Chir (Paris). 2005 Jul-Aug;142(4):226-30.
Le gantage chirurgical en France: une evolution lente mais necessaire.
Caillot JL.
Service des Urgences Chirurgicales, Centre Hospitalier Lyon-Sud, Pierre-Benite, EA 37-38 Faculte de Medecine Lyon-Sud, Oullins. JL.Caillot@wanadoo.fr
Since the end of the 19th century, surgeons have used gloves to prevent infectious complications to the patient. The AIDS epidemic of the 1980's sparked the use of universal precautions to protect the surgeon from infection and vice-versa. The interface between surgeon and patient is in effect a two-way street. Surgical techniques must be modified and barrier protection optimized to minimize these risks. A single layer glove is a fragile barrier to blood exposure; unrecognized glove perforations may lead to unrecognized and prolonged exposure. Double gloving, though far from being a widespread practice in France, seems to be the best protection from pathogen exposure. Glove powder and latex allergies have their own inherent risks to both surgeon and patient in the form of latex allergies and adhesive peritonitis. New institutional protocols will be necesssary in order to make powder-free non-latex gloves available to French surgeons.
MeSH Terms: Disease Transmission, Patient-to-Professional/prevention & control* - English Abstract - France - Gloves, Surgical/utilization* - Humans - Infection Control - Latex Hypersensitivity - Peritonitis/etiology - Physician's Practice Patterns/statistics & numerical data* - Risk Factors
Publication Types: Review

- Documents en anglais :

MMWR, Recommendations and Reports, December 30, 2005 /Vol. 54/No. RR-17
Guidelines for Preventing the Transmission of Mycobacterium tuberculosis in Health-Care Settings, 2005
Paul A. Jensen, PhD, Lauren A. Lambert, MPH, Michael F. Iademarco, MD, Renee Ridzon, MD
Division of Tuberculosis Elimination, National Center for HIV, STD, and TB Prevention
http://www.cdc.gov/mmwr/preview/mmwrhtml/rr5417a1.htm
http://www.cdc.gov/mmwr/PDF/rr/rr5417.pdf

J Adv Nurs. 2005 Aug;51(3):208-16.
Healthcare workers' hand decontamination practices: compliance with recommended guidelines.
Creedon SA.
Lecturer, School of Nursing and Midwifery, University College Cork, Cork, Ireland.
sile.creedon@ucc.ie
AIM: This paper reports a study of healthcare workers' handwashing/hand hygiene practices from a behavioural perspective. BACKGROUND: Hospital acquired infection poses a very real and serious threat to all who are admitted to hospital. Pathogens are readily transmitted on healthcare workers' hands, and hand hygiene substantially reduces this transmission. Evidence-based guidelines for healthcare workers' hand hygiene practices exist, but compliance with these is internationally low. METHODS: A quasi-experimental design with a convenient sample was used. The Predisposing, Reinforcing, Enabling Constructs in Educational Diagnosis and Evaluation Health Education Theory was used as the theoretical framework, and the data were collected in 2001. Healthcare workers' handwashing practices (observation of behaviour, n = 314) and their predisposition (attitudes, beliefs and knowledge) towards compliance with hand hygiene guidelines (questionnaire, n = 62) were studied. Nurses, doctors, physiotherapists and care assistants involved in direct patient care in the study unit participated in the study. The interventional hand hygiene programme aimed to predispose healthcare workers to adopt hand hygiene behaviour (poster campaign and educational handout), reinforce (feedback on pretest results) and enable the behaviour (provision of an alcohol hand rub beside each patients bedside). RESULTS: Implementation of the multifaceted interventional behavioural hand hygiene programme resulted in an overall improvement in compliance with hand hygiene guidelines (51-83%, P < 0.001). Furthermore, healthcare workers believed that their skin condition improved (P < 0.001). An increase in knowledge about handwashing guidelines was also found. CONCLUSIONS: In order to be effective, efforts to improve compliance with handwashing guidelines must be multifaceted. Alcohol hand rubs (with emollients) need to be provided at each patient's bedside. Issues surrounding healthcare workers' skin irritation need to be addressed urgently.
MeSH Terms: Attitude of Health Personnel - Cross Infection/prevention & control* - Disease Transmission, Professional-to-Patient/prevention & control - Guideline Adherence - Handwashing/standards* - Health Knowledge, Attitudes, Practice - Humans - Intensive Care Units/standards - Ireland - Personnel, Hospital/psychology - Personnel, Hospital/standards* - Practice Guidelines*
Publication Types: Review

5. Infections nosocomiales

- Documents en français :

In NOSO-info, VOL. IX n 3, 3ème trimestre 2005, p.2-4
Barrières à la vaccination Influenza (grippe) au sein d'un centre hospitalo-universitaire
M. Gerard, R Van Esse, Hygiène Hospitalière , CHU Saint Pierre
article de périodique
accès au texte intégral : http://www.md.ucl.ac.be/nosoinfo/Noso-Info-0305.pdf

In NOSO-info, VOL 9 - N 3, 3ème trimestre 2005, p.4-5
Et pourtant cela marche ... Réduction du taux de grippe nosocomiale en pédiatrie par l'augmentation de la vaccination des prestataires de soins
O. Engels, M. Doyen, N. Goldman, M. Duys, D. Van Beers et A. Vergison
article de périodique
Accès au texte intégral : http://www.md.ucl.ac.be/nosoinfo/Noso-Info-0305.pdf

6. Risques biologiques

- Documents en anglais :

NIOSH 2005 Dec; :1-9
Recommendations for protecting laboratory, field,and clinical workers from West Nile Virus exposure
MacMahon-K; Harney-AG
The West Nile virus (WNV) is most often spread to humans from the bite of an infected mosquito. The virus may also be transmitted in other ways--through organ transplants, blood transfusions, and breast milk, and from mother to fetus. But the risk of such transmission is very low. WNV was first reported in the United States in 1999, and occupational exposures have been documented. By 2004, the virus was reported throughout the continental United States. Most human infections with WNV (about 80%) cause no symptoms, and about 20% cause flu-like symptoms--including fever, fatigue, headache, and muscle or joint pain. Fewer than 1% of humans infected with WNV become severely ill. Severe symptoms include high fever, stiff neck, disorientation, tremors, muscle weakness, and paralysis. Severely affected persons may develop encephalitis (inflammation of the brain) or meningitis (inflammation of the membranes of the brain or spinal cord). Severe cases may be fatal. People of all ages and conditions may be affected. However, those who are above age 50 or who have had an organ transplant are at increased risk of severe illness.
Infection-control; Infectious-diseases; Viral-diseases; Viral-infections; Disease-control; Disease-prevention; Disease-vectors; Disease-transmission; Bloodborne-pathogens; Health-science-personnel; Health-care-personnel; Laboratory-workers
http://www.cdc.gov/niosh/docs/2006-115/pdfs/2006-115.pdf

6.1 Accident d'exposition au sang

- Documents en français :

In Revue du soignant en santé publique, 2006 - Numéro 11 - pp: 12...
Professions de santé et risque VIH : la protection des technologies médicales
J.-M. Manus
"À l'occasion de la Journée mondiale de lutte contre le sida, le Syndicat national de l'industrie des technologies médicales (SNITEM) a tenu à rappeler son implication dans la protection des personnels de santé contre le risque d'accidents d'exposition professionnelle au sang (AES). Plus d'un million de soignants utilisant quotidiennement des matériels piquants ou tranchants, en particulier lors d'actes invasifs, sont potentiellement exposés au risque de contamination"
article de périodique

NOSO-INFO, Vol. 9, 2, p. 6-9, 2005
Résultats préliminaires de la surveillance des accidents exposant au sang dans les hôpitaux belges.
LEENS (E.)
En juin 2003, l'Institut scientifique de santé publique a commencé la surveillance des accidents exposant au sang (AES), accidents de piqûre, coupure, éclaboussure - au sein du personnel hospitalier dans les hôpitaux.
Ce résumé donne un premier aperçu du nombre et du type d'AES, les circonstances dans lesquelles les accidents se produisent, le matériel utilisé et les mesures de prévention prises.
personnel hospitalier, hôpital, Belgique, surveillance épidémiologique, exposition sang
Accès au texte intégral : http://www.md.ucl.ac.be/nosoinfo/Noso-Info-0205.pdf

- Documents en anglais :

Nurs Stand. 2005 Oct 12-18;20(5):23-5.
Eye on the needle. Interview by Lynne Pearce.
O'Toole S.
Sally O'Toole has been a driving force in the introduction of safer cannulas and reducing the number of sharps injuries in her large NHS trust. Sharps injuries featured among the top three categories of injuries in the trust. Getting key stakeholders on board was crucial to the introduction of new cannulas. Working with the manufacturer meant product costs were not increased. An extensive programme of staff training was undertaken. Changing the way sharps injuries are reported should allow better monitoring.
MeSH Terms: Accidents, Occupational/prevention & control* - Accidents, Occupational/statistics &

numerical data - Attitude of Health Personnel - Benchmarking - Education, Nursing, Continuing/organization & administration - England/epidemiology - Hospitals, Teaching - Humans - Inservice Training/organization & administration - Medical Waste Disposal - Needlestick Injuries/epidemiology - Needlestick Injuries/prevention & control* - Nurse Clinicians/organization & administration - Nurse Clinicians/psychology - Nurse's Role - Nursing Staff, Hospital*/education - Nursing Staff, Hospital*/statistics & numerical data - Occupational Health/statistics & numerical data* - Professional Staff Committees/organization & administration - Safety Management/organization & administration* - State Medicine
Publication Types: Interview

6.2 Contamination soignant-soigné

- Documents en français :

In BEH n 02-03 , 17 janvier 2006, p.26
Estimation du nombre de transmissions du VHC de soignants à soignés et évaluation des stratégies de dépistage des soignants en France, 2005-2020
Yann Le Strat, Florence Lot, Elisabeth Delarocque-Astagneau, Jean-Claude Desenclos
Institut de veille sanitaire. Saint-Maurice
Article de périodique
Accès au texte intégral : http://www.invs.sante.fr/beh/2006/02_03/index.htm

6.3 Transmission aérienne

6.4 Transmission de contact

6.5 Vaccination

- Documents en anglais :

J Gen Intern Med. 2006 Jan 20; [Epub ahead of print]
BRIEF REPORT: Influenza Vaccination and Health Care Workers in the United States.
King WD, Woolhandler SJ, Brown AF, Jiang L, Kevorkian K, Himmelstein DU, Bor DH.
CARE Center, Department of Infectious Disease, University of California, Los Angeles, CA, USA.
OBJECTIVE: To determine influenza vaccination rates among U.S. health care workers (HCWs) by demographic and occupational categories. DESIGN AND PARTICIPANTS: We analyzed data from the 2000 National Health Interview Survey (NHIS). Weighted multivariable analyses were used to evaluate the association between HCW occupation and other variables potentially related to receipt of influenza vaccination. HCWs were categorized based on standard occupational classifications as health-diagnosing professions, health-assessing professions, health aides, health technicians; or health administrators. MAIN INDEPENDENT VARIABLES: Demographic characteristics and occupation category. MAIN OUTCOME VARIABLES: Receipt of influenza vaccination within 12 months of survey. ANALYSIS: Descriptive statistics and weighted multivariable logistic regression. RESULTS: There were 1,651 HCWs in the final sample. The overall influenza vaccination rate for HCWs was 38%. After weighted multivariable analyses, HCWs who were under 50 (odds ratio [OR] 0.67%, 95% confidence interval [CI]: 0.50 to 0.89, compared with HCWs 50 to 64), black (OR 0.57 95% CI: 0.42, 0.78, compared with white HCWs), or were health aides (OR 0.73%, 95% CI: 0.51, 1.04, compared with health care administrators and administrative support staff) had lower odds of having been vaccinated against influenza. CONCLUSIONS: The overall influenza vaccination rate among HCWs in the United States is low. Workers who are under 50, black, or health aides have the lowest rates of vaccinations. Interventions seeking to improve HCW vaccination rates may need to target these specific subgroups.

Infect Control Hosp Epidemiol. 2005 Nov;26(11):855-8.
Influenza vaccination among healthcare workers in a university children's hospital.
Tapiainen T, Bar G, Schaad UB, Heininger U.
University Children's Hospital, PO Box, CH-4005 Basel, Switzerland.
OBJECTIVES: To evaluate the attitudes of pediatric healthcare workers (HCWs) toward influenza vaccination and to increase their rate of immunization. METHODS: A survey was conducted among pediatric HCWs using an anonymous questionnaire. Survey results were used to design an intervention to increase the immunization rate of staff. Immunization rates before (2003-2004) and after (2004-2005) intervention were assessed using immunization clinic records. SETTING: A university children's hospital in Switzerland. INTERVENTIONS: (1) An informational letter based on misconceptions noted in the survey, (2) educational conversations with head nurses, (3) more "walk-

in" immunization clinics, and (4) a direct offer of influenza immunization on the wards. RESULTS: Among vaccine nonrecipients, doubts about the efficacy and necessity of influenza immunization were prevalent and more often reported by nurses than physicians (75% vs 41%, P = .002; and 55% vs 23%, P = .001, respectively). Physicians more often than nurses reported lack of time as a reason for not receiving influenza vaccination (23% vs 5%, P = .01). After intervention, the immunization rate of HCWs increased from 19% to 24% (P = .03). The immunization rate of physicians increased from 43% to 64% (P = .004). No change was noted among nurses (13% vs 14%) and other HCWs (16% vs 16%). CONCLUSIONS: Misconceptions about influenza vaccination were prevalent among pediatric staff, particularly nurses. Active promotion and educational efforts were successful in increasing the immunization rate of physicians but not nurses and other HCWs.
MeSH Terms: Attitude of Health Personnel* - Health Knowledge, Attitudes, Practice - Hospitals, Pediatric* - Hospitals, University* - Humans - Influenza Vaccines/administration & dosage* - Influenza, Human/prevention & control - Personnel, Hospital* - Questionnaires - Research Support, Non-U.S. Gov't - Vaccination/statistics & numerical data*
Substances: Influenza Vaccines

Infect Control Hosp Epidemiol. 2005 Nov;26(11):882-90.
Influenza vaccination of healthcare workers and vaccine allocation for healthcare workers during vaccine shortages.
Talbot TR, Bradley SE, Cosgrove SE, Ruef C, Siegel JD, Weber DJ.
Department of Medicine, Vanderbilt University School of Medicine, A-2200 Medical Center North, 1161 21st Avenue South, Nashville, TN 37232, USA. tom.talbot@vanderbilt.edu
Influenza causes substantial morbidity and mortality annually, particularly in high-risk groups such as the elderly, young children, immunosuppressed individuals, and individuals with chronic illnesses. Healthcare-associated transmission of influenza contributes to this burden but is often under-recognized except in the setting of large outbreaks. The Centers for Disease Control and Prevention has recommended annual influenza vaccination for healthcare workers (HCWs) with direct patient contact since 1984 and for all HCWs since 1993. The rationale for these recommendations is to reduce the chance that HCWs serve as vectors for healthcare-associated influenza due to their close contact with high-risk patients and to enhance both HCW and patient safety. Despite these recommendations as well as the effectiveness of interventions designed to increase HCW vaccination rates, the percentage of HCWs vaccinated annually remains unacceptably low. Ironically, at the same time that campaigns have sought to increase HCW vaccination rates, vaccine shortages, such as the shortage during the 2004-2005 influenza season, present challenges regarding allocation of available vaccine supplies to both patients and HCWs. This two-part document outlines the position of the Society for Healthcare Epidemiology of America on influenza vaccination for HCWs and provides guidance for the allocation of influenza vaccine to HCWs during a vaccine shortage based on influenza transmission routes and the essential need for a practical and adaptive strategy for allocation. These recommendations apply to all types of healthcare facilities, including acute care hospitals, long-term-care facilities, and ambulatory care settings.
MeSH Terms: Communicable Disease Control/standards* - Health Personnel* - Health Planning Guidelines - Humans
Influenza Vaccines/administration & dosage* - Influenza Vaccines/supply & distribution* - Influenza, Human/prevention & control* - Vaccination/standards*
Substances: Influenza Vaccines

AAOHN J. 2005 Nov;53(11):477-83.
Influenza vaccination: incidence of symptoms and resulting absenteeism in hospital employees.
Speroni KG, Dawson E, Atherton M, Corriher J.
Inova Loudoun Hospital, Leesburg, VA, USA.
A conv enience sample of hospital workers, those receiving influenza vaccine and those not receiving vaccine, were asked to complete questionnaires delineating the occurrence of symptoms (e.g., fever, headache, extreme tiredness, dry cough, sore throat, runny nose, stuffy nose, muscle aches) and absenteeism in the 7-day period post-vaccination if vaccinated. Those unvaccinated completed the questionnaire in a self-selected 7 consecutive day period during the study conducted from November 2004 to February 2005. Those receiving either Fluzone or FluMist reported significantly fewer symptoms and related absenteeism than the unvaccinated group ($p < .05$). Administration of influenza vaccine did not result in higher rates of post-vaccination symptoms as compared to an unvaccinated group. Further, vaccinated employees did not experience higher absenteeism rates as a result of receiving either influenza vaccine. However, for those reporting absenteeism as a result of symptoms, mean absenteeism days were highest in the FluMist group (4.5 days) compared to the unvaccinated group (2.1 days) and the Fluzone group (1.9 days).
MeSH Terms: Absenteeism - Administration, Intranasal - Adult - Case-Control Studies - Female -

Humans - Immunization Programs* - Incidence - Influenza Vaccines/administration & dosage - Influenza, Human/epidemiology - Influenza, Human/prevention & control* - Injections, Intramuscular - Male - Middle Aged - Occupational Health Services* - Personnel, Hospital* - Program Evaluation - Virginia/epidemiology
Substances: Influenza Vaccines

7. Risques chimiques

- Documents en français :

In Archives des Maladies Professionnelles et de l'Environnement, Vol 66 - N 5 - Décembre 2005, p. 438 - 446
Évaluation de l'exposition du personnel à un gaz anesthésique en IRM pédiatrique par différentes méthodes de dosage
E. Langlois , C. Lefèvre
"Le but de cette étude est d'évaluer l'exposition du personnel soignant d'un service d'IRM pédiatrique au sévoflurane, dans des locaux qui ne sont pas destinés à des actes d'anesthésie. L'environnement particulier lié à cette activité : manque de place, gestes techniques lourds, champ magnétique intense, rend les techniques d'évaluation classiques délicates voire impossibles à mettre en œuvre. Le dispositif de prélèvement passif Gabie ®, particulièrement simple d'utilisation, a été utilisé et validé à l'aide de techniques de prélèvement traditionnelles."
Exposition , gaz anesthésique , prélèvement passif
Article de périodique

- Documents en anglais :

J Oncol Pharm Pract. 2005 Sep;11(3):101-9.
Antineoplastic agent workplace contamination study: the Alberta Cancer Board Pharmacy perspective.
Schulz H, Bigelow S, Dobish R, Chambers CR.
Cross Cancer Institute Site, Edmonton, Alberta, Canada. heidis@cancerboard.ab.ca
STUDY OBJECTIVE: To investigate the feasibility of routine monitoring for workplace antineoplastic agent contamination in the Alberta Cancer Board (ACB) pharmacy practice environment. SETTING: The ACB in the Canadian province of Alberta, which includes two public tertiary centres and 17 associated community satellite sites based around the province in existing hospitals. METHODS: Obtained organizational support and input prior to launching the feasibility study (Phase I). Samples were analysed for a common cytotoxic agent - cyclophosphamide. Surfaces chosen were within the biological safety cabinets, workplace counter tops and on external surfaces of vials provided by manufacturers. Blank samples and known contaminated controls were included in Phase I to reconfirm the methodology in a previously published study. Feasibility aspects of logistics and financial expenses were examined. A second phase (Phase II) was completed to test other areas of the pharmacy and vials, with blank samples included to reconfirm previously mentioned methodology. RESULTS: The results determined that the samples tested were below acceptable detection limits with the exception of the known contaminated sample (Phase I) and exterior surfaces of vials (Phase II). CONCLUSION: This project has increased staff awareness of the sources for antineoplastic agent workplace contamination. Some practice changes were instituted during the project itself. Logistics and expenses were realistic for routine monitoring to be adopted.
MeSH Terms: Alberta - Antineoplastic Agents/analysis* - Cancer Care Facilities - Cyclophosphamide/analysis* - Drug Packaging - Environmental Monitoring/methods* - Environmental Monitoring/standards - Feasibility Studies - Gloves, Protective/standards - Humans - Occupational Exposure/analysis* - Occupational Exposure/prevention & control - Pharmacies/standards* - Pharmacy/standards* - Pharmacy Service, Hospital - Safety Management
Substances: Antineoplastic Agents - Cyclophosphamide

Ind Health. 2005 Oct;43(4):703-7.
Formaldehyde exposure in some educational hospitals of Tehran.
Ghasemkhani M, Jahanpeyma F, Azam K.
Occupational Health Department, School of Public Health and Institute of Public Health Research, Tehran University of Medical Sciences, P.O.Box: 14155-6145 Tehran, I.R. Iran.
This research was conducted to determine formaldehyde exposure of staffs in pathology laboratories, surgery rooms and endoscopy wards in eight large hospitals of Tehran University of Medical Sciences located at Tehran, Iran. Air sampling have been made by both long and short-term methods. Total numbers of samples were 160 for both methods. Nineteen samples of 160 samples were collected as

blank in other non-exposed environments such as administrative sections. The mean (SD) levels of formaldehyde in long-term methods were 0.96 (0.74), 0.25 (0.21) and 0.13 (0.18) ppm, at pathology laboratories, surgery rooms and endoscopy wards, respectively. The results of measurements showed that mean (SD) concentration of formaldehyde in one hour sampling at short intervals were 0.83 (0.29), 0.23 (0.16) and 0.75 (0.25) ppm at pathology labs, surgery rooms and endoscopy wards, respectively. There were significant differences in the mean levels of formaldehyde (long-term) at surgery rooms ($p < 0.02$) and endoscopy wards ($p < 0.005$) in eight hospitals of this study. It is concluded that the concentration levels of formaldehyde at pathology laboratories exceeded recommended limit which established by the American Conference of Governmental and Industrial Hygienists ACGIH (TLV-C = 0.3 ppm). It is recommended that local exhaust ventilation should be installed to minimize the contact to formaldehyde in the staffs.
MeSH Terms: Air Pollutants, Occupational/analysis* - Cross-Sectional Studies - Endoscopy/statistics & numerical data - Environmental Monitoring - Formaldehyde/analysis* - Hospitals, University/statistics & numerical data* - Humans - Iran - Laboratories, Hospital/statistics & numerical data - Maximum Allowable Concentration - Occupational Exposure/analysis* - Occupational Exposure/statistics & numerical data - Operating Rooms/statistics & numerical data - Pathology Department, Hospital/statistics & numerical data - Risk Factors - Time Factors -
Substances: Air Pollutants, Occupational - Formaldehyde

Med Hypotheses. 2006 Jan 20; [Epub ahead of print]
Second-hand exposure to aerosolized intravenous anesthetics propofol and fentanyl may cause sensitization and subsequent opiate addiction among anesthesiologists and surgeons.
McAuliffe PF, Gold MS, Bajpai L, Merv es ML, Frost-Pineda K, Pomm RM, Goldberger BA, Melker RJ, Cendan JC.
Department of Surgery, University of Florida College of Medicine, 1600 SW Archer Road, PO Box 100286, Gainesville, FL 32610, United States.
We hypothesize that aerosolization of anesthetics administered intravenously to patients in the operating room may be an unintended source of exposure to physicians. This may lead to inadvertent sensitization, which is associated with an increased risk for developing addiction. This may contribute to the over-representation of certain specialties among physicians with addiction. We retrospectively reviewed the de-identified demographic information of all licensed physicians treated for substance abuse in the State of Florida since 1980, to determine if medical specialty was associated with addiction in this group of individuals. Then, to identify the potential for exposure, two mass spectrometry assays were developed to detect two intravenously administered drugs, fentanyl and propofol, in air. Since 1980, 7.6% of licensed Florida physicians underwent treatment for addiction. Addiction in anesthesiologists was higher than expected. Opiate abuse was greater in anesthesiologists and surgeons compared to other specialties. Aerosolized fentanyl was detected in the air of the cardiothoracic operating room, in patients' expiratory circuits, and in the headspace above sharps boxes, but not in adjoining hallways. Aerosolized propofol was detected in the expirations of a patient undergoing transurethral prostatectomy. While access and stress may place anesthesiologists and surgeons at greater risk for substance abuse, an additional risk factor may be unintended occupational exposure to addictive drugs. This report provides preliminary evidence of detection of aerosolized intravenous anesthetics using two newly developed analytical methods. We conclude that the potential exists for chronic exposure to low levels of airborne intravenously administered drugs. Further studies are under way to determine the significance of this exposure.

8. Risques physiques

- Documents en anglais :

Prehosp Emerg Care. 2005 Oct-Dec;9(4):405-11.
Occupational injuries among emergency medical services personnel.
Maguire BJ, Hunting KL, Guidotti TL, Smith GS.
The Department of Emergency Health Services, University of Maryland, Baltimore, Ma ryland 21250, USA. maguire@umbc.edu
BACKGROUND: Emergency medical services (EMS) personnel treat 22 million patients a year in the United States, yet little is known of their injury risks. OBJECTIVES: To describe the epidemiology of occupational injuries among EMS personnel, calculate injury rates, and compare the findings with those for other occupational groups. METHODS: This was a retrospective review of injury records kept by two urban agencies. The agencies submitted all 617 case reports for three periods between January 1, 1998, and July 15, 2002. The agency personnel worked an estimated 2,829,906 hours during the study periods. Cases were coded according to U.S. Department of Labor (DOL) criteria. RESULTS: Four hundred eighty-nine cases met the DOL inclusion criteria. The overall injury rate was

34.6 per 100 full-time (FT) workers per year (95% confidence interval [CI] 31.5-37.6). "Sprains, strains, and tears" was the leading category of injury; the back was the body part most often injured. Of the 489 cases, 277 (57%) resulted in lost workdays, resulting in a rate of 19.6 (95% CI 17.3-21.9) per 100 FT workers; in comparison, the relative risks for EMS workers were 1.5 (95% CI 1.35-1.72) compared with firefighters, 5.8 (95% CI 5.12-6.49) compared with health services personnel, and 7.0 (95% CI 6.22-7.87) compared with the national average. CONCLUSIONS: The injury rates for EMS workers are higher than rates reported by DOL for any industry in 2000. Funding and additional research are critical to further defining the high risks to EMS workers and developing interventions to mitigate this serious problem.
MeSH Terms: Accidents, Occupational/statistics & numerical data* - Adult - Comparative Study - Emergency Medical Services/statistics & numerical data* - Emergency Medical Technicians/statistics & numerical data - Female - Humans - Male - Middle Aged - Retrospective Studies - Sprains and Strains/epidemiology - United States/epidemiology - Urban Population - Wounds and Injuries/epidemiology*

8.1 Rayonnements ionisants

- Documents en anglais :

J Nucl Med Technol. 2005 Sep;33(3):172-4.
131I in blood samples: a danger for professionals? A problem for immunoassays?
Vialard-Miguel J, Georges A, Mazere J, Ducassou D, Corcuff JB.
Nuclear Medicine Department, University Hospital of Bordeaux and University Bordeaux 2, Bordeaux, France. julie.miguel@chu-bordeaux.fr
OBJECTIVE: Our objective was to investigate the safety of radioactive blood samples from patients receiving 131I and whether the radioactivity affects the validity of assays. METHODS: First, the activity of samples from patients given 131I was measured by 3 methods and compared with the upper threshold. Then, pilot sera were spiked with 131I, and possible interference was investigated using 2 immunoradiometric assays. RESULTS: The activity of 13 of the 15 samples was below the European limit; the other 2 samples were from patients with reduced renal clearance rates. No differences in thyroglobulin level or thyroid-stimulating hormone level were found between sera that were spiked with 131I and sera that were not. CONCLUSION: These blood samples are safe because they contain negligible activity, and the use of radioimmunoassays or immunoradiometric assays on them produces reliable results.
MeSH Terms: Artifacts* - Europe - Health Personnel* - Hematologic Tests - Iodine Radioisotopes/blood* - Iodine Radioisotopes/therapeutic use - Occupational Exposure/analysis* - Radiation Dosage - Radiation Injuries/prevention & control - Radiation Protection/methods - Radioimmunoassay/methods* - Radiometry/methods* - Risk Assessment/methods* - Risk Factors
Substances: Iodine Radioisotopes

Occup Environ Med. 2005 Dec;62(12):861-7.
Incidence of haematopoietic malignancies in US radiologic technologists.
Linet MS, Freedman DM, Mohan AK, Doody MM, Ron E, Mabuchi K, Alexander BH, Sigurdson A, Hauptmann M.
Division of Cancer Epidemiology and Genetics, National Cancer Institute, Department of Health and Human Services, Bethesda, MD 20892, USA. linetm@mail.nih.gov
BACKGROUND: There are limited data on risks of haematopoietic malignancies associated with protracted low-to-moderate dose radiation. AIMS: To contribute the first incidence risk estimates for haematopoietic malignancies in relation to work history, procedures, practices, and protective measures in a large population of mostly female medical radiation workers. METHODS: The investigators followed up 71,894 (77.9% female) US radiologic technologists, first certified during 1926-80, from completion of a baseline questionnaire (1983-89) to return of a second questionnaire (1994-98), diagnosis of a first cancer, death, or 31 August 1998 (731,306 person-years), whichever occurred first. Cox proportional hazards regression was used to compute risks. RESULTS: Relative risks (RR) for leukaemias other than chronic lymphocytic leukaemia (non-CLL, 41 cases) were increased among technologists working five or more years before 1950 (RR = 6.6, 95% CI 1.0 to 41.9, based on seven cases) or holding patients 50 or more times for x ray examination (RR = 2.6, 95% CI 1.3 to 5.4). Risks of non-CLL leukaemias were not significantly related to the number of years subjects worked in more recent periods, the year or age first worked, the total years worked, specific procedures or equipment used, or personal radiotherapy. Working as a radiologic technologist was not significantly linked with risk of multiple myeloma (28 cases), non-Hodgkin's lymphoma (118 cases), Hodgkin's lymphoma (31 cases), or chronic lymphocytic leukaemia (23 cases). CONCLUSION: Similar to results for single acute dose and fractionated high dose radiation exposures, there was increased

risk for non-CLL leukaemias decades after initial protracted radiation exposure that likely cumulated to low-to-moderate doses.
MeSH Terms: Adult - Age Factors - Cohort Studies - Female - Hematologic Neoplasms/epidemiology* - Hematologic Neoplasms/mortality - Humans - Incidence - Leukemia/epidemiology - Leukemia/mortality - Lymphoma/epidemiology - Lymphoma/mortality - Male - Middle Aged - Multiple Myeloma/epidemiology - Multiple Myeloma/mortality - Neoplasms, Radiation-Induced/epidemiology* - Neoplasms, Radiation-Induced/mortality - Occupational Exposure - Personnel, Hospital* - Proportional Hazards Models - Radiation Dosage - Research Support, N.I.H., Extramural - Risk Assessment - Sex Factors - Technology, Radiologic/manpower* - Time Factors - United States/epidemiology

J Nucl Med Technol. 2005 Sep;33(3):175-9.
Technologist radiation exposure in routine clinical practice with 18F-FDG PET.
Guillet B, Quentin P, Waultier S, Bourrelly M, Pisano P, Mundler O.
Unite de Radiopharmacie, Service Central de Medecine Nucleaire, CHU Timone, Marseille, France.
OBJECTIVE: The use of 18F-FDG for clinical PET studies increases technologist radiation dose exposure because of the higher gamma-radiation energy of this isotope than of other conventional medical gamma-radiation-emitting isotopes. Therefore, 18F-FDG imaging necessitates stronger radiation protection requirements. The aims of this study were to assess technologist whole-body and extremity exposure in our PET department and to evaluate the efficiency of our radiation protection devices (homemade syringe drawing device, semiautomated injector, and video tracking of patients). METHODS: Radiation dose assessment was performed for monodose as well as for multidose 18F-FDG packaging with both LiF thermoluminescence dosimeters (TLD) and electronic personal dosimeters (ED) during 5 successive 18F-FDG PET steps (from syringe filling to patient departure). RESULTS: The mean +/- SD total effective doses received by technologists (n = 50) during all of the working steps were 3.24 +/- 2.1 and 3.01 +/- 1.4 microSv, respectively, as measured with ED and TLD (345 +/- 84 MBq injected). These values were confirmed by daily TLD technologist whole-body dose measurements (2.98 +/- 1.8 microSv; 294 +/- 78 MBq injected; n = 48). Finger irradiation doses during preparation of single 18F-FDG syringes were 204.9 +/- 24 and 198.4 +/- 23 microSv with multidose vials (345 +/- 93 MBq injected) and 127.3 +/- 76 and 55.9 +/- 47 microSv with monodose vials (302 +/- 43 MBq injected) for the right hand and the left hand, respectively. The protection afforded by the semiautomated injector, estimated as the ratio of the doses received by TLD placed on the syringe shield and on the external face of the injector, was near 2,000. CONCLUSION: These results showed that technologist radiation doses in our PET department were lower than those reported in the literature. This finding may be explained by the use of a homemade syringe drawing device, a semiautomated injector, and patient video tracking, allowing a shorter duration of contact between the technologist and the patient. Extrapolation of these results to an annual dose (4 patients per day per technologist) revealed that the annual extrapolated exposure values remained under the authorized limits for workers classified to work in a radioactivity-controlled area.
MeSH Terms: Allied Health Personnel/statistics & numerical data* - Body Burden - Fluorodeoxyglucose F18/analysis* - Fluorodeoxyglucose F18/diagnostic use - France/epidemiology - Humans - Occupational Exposure/analysis* - Occupational Exposure/statistics & numerical data* - Physician's Practice Patterns/statistics & numerical data* - Positron-Emission Tomography/statistics & numerical data* - Radiation Dosage - Radiation Monitoring/methods* - Radiation Protection - Radiopharmaceuticals/analysis - Radiopharmaceuticals/diagnostic use - Relative Biological Effectiveness - Risk Assessment/methods - Risk Factors - Whole-Body Counting/methods
Substances: Radiopharmaceuticals - Fluorodeoxyglucose F18

8.2 Troubles musculo-squelettiques

- Documents en anglais :

Int J Occup Saf Ergon. 2005;11(4):431-40.
Epidemiology of musculoskeletal symptoms among Korean hospital nurses.
Smith DR, Choe MA, Jeon MY, Chae YR, An GJ, Jeong JS.
Department of Hazard Assessment, National Institute of Industrial Health, Kawasaki, Japan. smith@niih.go.jp
We investigated the epidemiology of musculoskeletal symptoms (MSS) among a complete cross-section of 330 nurses from a large Korean hospital, by means of a questionnaire survey (response rate: 97.9%). The prevalence of MSS at any body site was 93.6%, with symptoms most commonly reported at the shoulder (74.5%), lower back (72.4%), neck (62.7%), lower legs (52.1%) and hand/wrist (46.7%). Logistic regression indicated that nurses who undertook manual handling of patients were 7.2 times as likely to report MSS (OR 7.2, 95%CI 1.2-42.3, P = .0275), while nurses suffering from periodic depression experienced a 3.3-fold MSS risk (OR 3.3, 95%CI 1.3-8.3, P =

.0104). Overall, our study suggests that Korean nurses incur a very high MSS burden when compared internationally. A greater commitment is needed to improve physical conditions, occupational tasks and psychosocial work issues among nurses in this country.
MeSH Terms: Adult - Age Distribution - Confidence Intervals - Female - Health Surveys - Humans - Incidence - Korea/epidemiology - Logistic Models - Low Back Pain/diagnosis - Low Back Pain/epidemiology* - Male - Middle Aged - Musculoskeletal Diseases/diagnosis - Musculoskeletal Diseases/epidemiology* - Nursing Staff, Hospital/statistics & numerical data* - Occupational Diseases/diagnosis - Occupational Diseases/epidemiology* - Odds Ratio - Probability - Questionnaires - Risk Assessment - Severity of Illness Index - Sex Distribution

AAOHN J. 2005 Oct;53(10):450-7; quiz 458-9.
Ergonomic evaluation: part of a treatment protocol for musculoskeletal injuries.
Grayson D, Dale AM, Bohr P, Wolf L, Evanoff B.
Washington University in St Louis, General Medical Sciences, St Louis, MO, USA.
Ergonomic analyses and interventions are used as primary prevention methods to reduce physical stressors in the workplace and to prevent work-related musculoskeletal disorders (WMSDs). These methods can also be used for the treatment of injured employees. In this study, 103 employees with WMSDs resulting in more than 5 days away from usual work received an ergonomic evaluation which consisted of observation of usual work tasks, recommendations to minimize identified stressors, and case coordination. The goal of the intervention was to make simple job changes that would assist employees to return safely to usual job duties. The process for implementing this protocol for health care, airline, and university employees is described. The results show that after ergonomic evaluations were performed, the majority of recommendations were fully or partially (89%) implemented. Behavior changes were more likely to occur than administrative and equipment changes ($p < .001$). Occupational health nurses can use a similar program to enhance treatment plans for clients with WMSDs.
MeSH Terms: Aviation - Case Management/organization & administration - Clinical Protocols - Cumulative Trauma Disorders/etiology - Cumulative Trauma Disorders/prevention & control - Female - Human Engineering/methods* - Humans - Male - Midwestern United States - Musculoskeletal System/injuries* - Nurse's Role - Occupational Diseases/etiology - Occupational Diseases/prevention & control* - Occupational Health - Occupational Health Nursing/organization & administration - Occupational Health Services/organization & administration* - Personnel, Hospital - Posture - Program Evaluation - Research Support, Non-U.S. Gov't - Research Support, U.S. Gov't, Non-P.H.S. - Risk Factors - Task Performance and Analysis* - Universities - Work Capacity Evaluation
Publication Types: Evaluation Studies

9. Violence

- Documents en français :

ANNALES MEDICO-PSYCHOLOGIQUES, Vol. 163, 8, p. 664-667, 10/2005
Violence et urgence.
ELCHARDUS (J.M.), GANSEL (Y.), GRISON-CURINIER (J.)
A travers l'analyse de la violence naissant du seul fait de l'urgence, les auteurs étudient le processus "d'acting".
Dans les services d'urgence, la technicité et l'efficacité médicales se lient paradoxalement à la confusion et aux difficultés de communication. Ce lieu devient ainsi propice à une mise en acte, dans la réalité, de fantasmes, de scènes familiales, de drames dont le déroulement s'agit à l'insu des malades, de leur famille et des praticiens. La scène des urgences ne doit pas être celle d'un psychodrame sauvage. L'urgentiste doit aussi tenir compte de l'opacité du fait psychique pour tenter de prévenir, au sein de son service, la commission d'actes violents qui n'émanent pas toujours de ses malades.
violence, hôpital, urgence hospitalière, profession santé, prévention, identité professionnelle

- Documents en anglais :

J Emerg Nurs. 2005 Dec;31(6):519-25.
A descriptive study of the perceptions of workplace violence and safety strategies of nurses working in level I trauma centers.
Catlette M.
Mid Delta Health Systems, Belzoni, Miss 39038, USA. mcatlette@bellsouth.net
INTRODUCTION: Workplace violence is a significant occupational hazard in health care. As the largest group of employees in health care, nurses are particularly vulnerable to workplace violence,

with those who work in emergency departments being especially at risk. The purpose of this research was to study the phenomenon of workplace violence by interviewing emergency nurses who had experienced violence while on duty. METHOD: A descriptive study approached the issue of workplace violence from the perspective of 8 registered nurses from 2 level I trauma centers who volunteered to be interviewed. Cross-case comparison of the interview responses was used to analyze the data from verbatim transcripts. RESULTS: Emergency nurses identified specific experiences of violence at work. Inadequate safety measures and vulnerability were the 2 themes that were consistently verbalized through out the interviews. IMPLICATIONS FOR NURSING PRACTICE: The emergency nurses who were interviewed discussed their experiences with patients, family members, and others who exhibited violent and aggressive behavior. They identified safety measures that they believed were inadequate and discussed their feelings of vulnerability because of violent incidents at work. Further research with larger samples could confirm specific safety problems in emergency departments that must be addressed to provide a safer workplace for emergency nurses, their colleagues, and their patients.
MeSH Terms: Aggression - Attitude of Health Personnel* - Comparative Study - Cross-Sectional Studies - Emergency Nursing/methods* - Female - Humans - Male - Nurse-Patient Relations - Nursing Research - Nursing Staff, Hospital/psychology* - Occupational Health* - Questionnaires - Risk Assessment - Security Measures - Social Perception - Trauma Centers* - United States - Violence* - Workplace/psychology* - Workplace/statistics & numerical data
Publication Types: Multicenter Study

Emerg Med Australas. 2005 Aug;17(4):351-8.
Epidemiology of unarmed threats in the emergency department.
Knott JC, Bennett D, Rawet J, Taylor DM.
Emergency Department, Royal Melbourne Hospital, Melbourne, Victoria, Australia.
Jonathan.knott@mh.org.au
OBJECTIVE: To evaluate the precipitants, subject characteristics, nature and outcomes of unarmed threats in the ED. METHODS: A 12 month prospective survey of security codes precipitated by an unarmed threat (Code Grey). RESULTS: Data were collected on 151 subjects. The Code Grey rate was 3.2/1000 ED presentations. They were most frequent on Saturday and in the late evening/early morning. There were verbal or physical threats of violence made to staff on 104 occasions (69%, 95% confidence interval [CI] 61-76) and a perceived threat of patient self-harm on 114 occasions (76%, 95% CI 68-82). Median time to be seen by a doctor was 8 min (interquartile range [IQR]: 2-21 min) and median time from presentation to Code was 59 min (IQR: 5-222 min). Sixteen subjects (11%, 95% CI 6-17) had a history of violence, 45 (30%, 95% CI 23-38) were affected by alcohol, 25 (17%, 95% CI 11-24) had used illicit drugs and 79 (52%, 95% CI 44-60) had a significant mental illness contributing to the Code Grey. Seventy-one patients (47%, 95% CI 39-55) required psychiatric admission, 49 (79%, 95% CI 66-88) involuntarily. CONCLUSION: Acutely agitated subjects pose a threat to themselves and the staff caring for them. The reason for the agitation is multifactorial and the majority arrive in a behaviourally disturbed state requiring early intervention. The times most likely to result in a Code Grey coincide with least available resources: ED and hospital risk management policies must account for this. A coherent approach by ED to this population is required to optimize patient and staff outcomes.
MeSH Terms: Adult Age Distribution - Aggression* - Comorbidity - Emergency Service, Hospital/statistics & numerical data* - Female - Hospitalization/statistics & numerical data - Humans - Male - Mental Disorders/epidemiology - Middle Aged - Occupational Exposure/statistics & numerical data - Prospective Studies - Research Support, Non-U.S. Gov't - Restraint, Physical/statistics & numerical data - Sex Distribution - Substance-Related Disorders/epidemiology - Victoria/epidemiology - Violence/statistics & numerical data*

AAOHN J. 2005 Nov;53(11):489-98.
Injuries and assaults in a long-term psychiatric care facility: an epidemiologic study.
Myers D, Kriebel D, Karasek R, Punnett L, Wegman D.
University of Illinois at Chicago, IL, USA.
The objectives of this study were to document the high rates of acute injuries and physical assaults among nurses and certified nursing assistants working in long-term psychiatric care facilities and to identify risk factors for assaults and injuries to inform prevention strategies. A mixed-design cohort study was conducted. Acute injury and physical assault data were obtained from administrative records. Using staff rosters and schedule records, incidence rates were calculated by job title, gender, shift, and floor. Rates were also reported by severity, body part, type, and nature. Targeted interviews with staff members provided measures of physical lifting and resident combativeness. Injury rates were calculated by degree of lifting and assault rates were calculated by degree of resident combativeness. Overall rates of injuries (55.6 per 100 person-years) and assaults (67.3 per 100 person-years) were substantially higher than expected. Predictably, injuries were associated with resident lifting and assaults were associated with contact with combative residents. A higher risk of

assault was found among women and higher risks of injury and assault were observed among full-time employees compared to per diem or pool agency workers. In addition, weekend shifts were found to have a higher rate of injuries and a lower rate of assaults than weekday shifts. In similar long-term care facilities with psychiatric populations, efforts should be made to reduce lifting and avoid circumstances that agitate residents. Work organization factors should be taken into consideration when developing interventions.
MeSH Terms: Adult - Alzheimer Disease/nursing - Female - Humans - Logistic Models - Long-Term Care - Male - Mental Disorders/nursing* - New England/epidemiology - Nursing Homes* - Occupational Exposure/statistics & numerical data* - Research Support, U.S. Gov't, P.H.S. - Risk Factors - Violence* - Wounds and Injuries/epidemiology* - Wounds and Injuries/prevention & control

10. Autres

- Documents en français :

In Revue de l'infirmière, 2006 - Numéro 117 - pp: 25-28
Dermatoses professionnelles en milieu hospitalier
A. Barbaud
Les dermatoses professionnelles sont fréquentes parmi les personnels soignants. Il s'agit le plus souvent de dermatites d'irritation favorisées par le travail en milieu humide, la manipulation d'antiseptiques et de désinfectants, le lavage répété des mains et les antécédents de dermatite atopique.
article de périodique

Auton Neurosci. 2005 Oct 30;122(1-2):94-9. Epub 2005 Sep 30.
Cardiac autonomic imbalance in female nurses with shift work.
Ishii N, Dakeishi M, Sasaki M, Iwata T, Murata K.
Department of Environmental Health Sciences, Akita University School of Medicine, Japan.
The pathophysiology underlying the shift work-related cardiovascular disease is still poorly understood. The chronic effects of shift work on cardiac autonomic functions were assessed in 47 hospital nurses working under a rotating three-shift system (shift nurses) and 36 public health nurses without shift work (non-shift nurses). The heart rate variability, %LF and %HF (i.e., proportions of sympathetic and vagal activities, respectively), and LF/HF ratio were calculated from the electrocardiographic RR intervals by using autoregressive spectral analysis, and heart rate-corrected QT interval (QTc and QT index) was also measured. The LF/HF ratio, %LF, and QT index were significantly larger in the shift nurses than in the non-shift nurses; also, the power spectral density of HF (PSD(HF)) was significantly decreased in the shift nurses. There was a significant, inverse correlation between the corrected QT interval and PSD(HF) in the non-shift nurses, but not in the shift nurses. It is suggested that shift work in female nurses may cause a sympathodominant state due to depressed vagal tones. Also, a pathophysiology of shift work-related cardiovascular disease, derived from the present and previous findings, may be characterized by the attenuation of the inverse association between the corrected QT interval and vagal activity observed in non-shift workers.
MeSH Terms: Adult - Autonomic Nervous System/physiopathology* - Electrocardiography - Female - Heart/physiopathology* - Heart Rate/physiology - Humans - Middle Aged - Nurses* - Occupational Health - Research Support, Non-U.S. Gov't - Work Schedule Tolerance/physiology*

Br J Nurs. 2005 Oct 13-26;14(18):973-5.
Exercise: who needs it?
Blaber AY.
School of Health and Social Care, University of Greenwich, Avery Hill Road, Eltham, London.
Nurses will be involved in delivering the UK Government's 'Choosing Activity: a physical activity action plan' (Department of Health, 2005), so it is important to ensure that nurses benefit from the implementation of this policy. It is accepted that in some areas of nursing, the daily routine can be physically and mentally demanding; all the more reason to examine lifestyle and the benefits of exercise. This article considers some factors that may affect nurses' physical and mental health. The potential value of the Healthy Workplace Award Scheme is discussed and some recommendations are made about future strategies that employers could adopt or develop to give nurses the opportunity to improve their physical and mental well-being within the workplace. These opportunities could improve nurses' health and impact on the care nurses provide.
MeSH Terms: Burnout, Professional/prevention & control - Burnout, Professional/psychology - Exercise Therapy/organization & administration* - Great Britain - Health Planning/organization & administration - Health Promotion/organization & administration* - Health Services Needs and Demand - Humans - Life Style - Mental Health - Nurse's Role* - Nursing Staff*/organization & administration - Nursing Staff*/psychology - Occupational Health* - Occupational Health

Nursing/organization & administration - State Medicine/organization & administration - Workplace/organization & administration - Workplace/psychology
Publication Types: Review

Am J Ind Med 2005 Dec; 48(6):400-418
The global burden of selected occupational diseases and injury risks: methodology and summary
Nelson-DI; Concha-Barrientos-M; Driscoll-T; Steenland-K; Fingerhut-M; Punnett-L; Pruss-Ustun-A; Leigh-J; Corvalan-C
Around the globe, work has a heavy impact on health. To better advise policy makers, we assessed the global burden of disease and injury due to selected occupational hazards. This article presents an overview, and describes the methodology employed in the companion studies. Using the World Health Organization (WHO) Comparative Risk Assessment methodology, we applied relative risk measures to the proportions of the population exposed to selected occupational hazards to estimate attributable fractions, deaths, and disability-adjusted life years (DALYs). Numerous occupational risk factors had to be excluded due to inadequate global data. In 2000, the selected risk factors were responsible worldwide for 37% of back pain, 16% of hearing loss, 13% of chronic obstructive pulmonary disease (COPD), 11% of asthma, 8% of injuries, 9% of lung cancer, and 2% of leukemia. These risks at work caused 850,000 deaths worldwide and resulted in the loss of about 24 million years of healthy life. Needlesticks accounted for about 40% of Hepatitis B and Hepatitis C infections and 4.4% of HIV infections in health care workers. Exposure to occupational hazards accounts for a significant proportion of the global burden of disease and injury, which could be substantially reduced through application of proven risk prevention strategies.
Occupational-diseases; Injuries; Diseases; Occupational-health; Risk-analysis; Occupational-hazards; Risk-factors; Mortality-data; Mortality-rates; Health-care-personnel; Workers; Worker-health; Back-injuries; Hearing-loss; Pulmonary-system-disorders; Bronchial-asthma; Lung-cancer

Veille juridique

Décret n° 2006-72 du 24 janvier 2006 relatif à la réanimation dans les établissements de santé et modifiant le code de la santé publique (dispositions règlementaires)
http://www.legifrance.gouv.fr/WAspad/UnTexteDeJorf?numjo=SANH0523147D

Décret n° 2006-73 du 24 janvier 2006 relatif aux activités de soins faisant l'objet d'un schéma interégional d'organisation sanitaire prévu à l'article L. 6121-4 du code de la santé publique.
http://www.legifrance.gouv.fr/WAspad/UnTexteDeJorf?numjo=SANH0523641D

Décret n° 2006-74 du 24 janvier 2006 relatif aux conditions techniques de fonctionnement auxquelles doivent satisfaire les établissements de santé pour pratiquer les activités de réanimation pédiatrique et de surveillance continue pédiatrique
http://www.legifrance.gouv.fr/WAspad/UnTexteDeJorf?numjo=SANH0523148D