

# **THOR ROI**

# The Health and Occupation Research network in the Republic of Ireland

Centre for Occupational and Environmental Health
The University of Manchester
http://research.bmh.manchester.ac.uk/epidemiology/COEH/research/thor/schemes/ireland/

Dr Annemarie Money, Dr Melanie Carder & Prof Martie van Tongeren December 2018

INTERIM REPORT, covering the period: July 2018 to September 2018

Dear colleague,

I am pleased to enclose the latest Interim Report of the THOR ROI, summarising the data that were collected from July to September 2018. I would like to thank you for your continued support.

We hope that you find the information in this report useful and informative. As mentioned previously, we are currently reviewing the format and content of the interim reports. Please let us know if there are particular items that you would like us to cover in these updates.

The Lane Lecture this year was delivered by Professor John Cherrie on Tuesday 6<sup>th</sup> November; John talked about the topic of the Exposome and work. Next year, we are planning a celebration of the SWORD reporting scheme as it will be 30 years since the late Professor Corbett McDonald started this reporting scheme. Please watch this space!

I would like to wish you all a Merry Christmas and all the very best for 2019!

Yours sincerely

Martie van Tongeren

Professor of Occupational and Environmental Health

#### **BACKGROUND**

Chest physicians and dermatologists in the Republic of Ireland (ROI) have been reporting voluntarily to The Health and Occupation Research network (THOR-ROI) since January 2005, whilst occupational physicians have been reporting since January 2007, and general practitioners since 2015. The policy within all the THOR schemes is to work on a three month lag to enable thorough data cleaning procedures to be carried out. Therefore, this document provides a brief update of the cases reported during the period July to September 2018, inclusive. This report should not be viewed as a 'stand alone' document but as a supplement to previous interim quarterly reports and 'substantive' annual reports (the most recent of which was submitted in September 2018).

#### **OVERVIEW OF CASE REPORTS**

#### **OPRA-ROI**

The 30 occupational physicians currently reporting to OPRA-ROI returned a total of 34 case reports between July and September 2018 (total ever cases up to September 2018 = 1770). Figure 1 shows the proportion of work-related ill-health diagnoses reported by major diagnostic category.

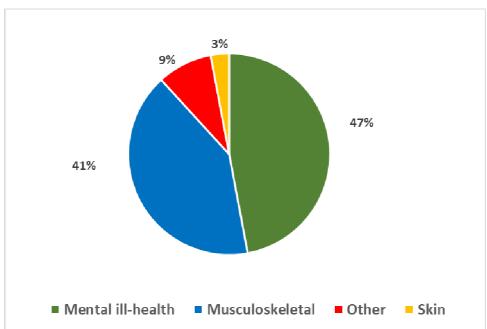


Figure 1 Proportion of work-related ill-health diagnoses reported by occupational physicians to OPRA-ROI by major diagnostic category (July – Sept 2018)

Cases were predominantly female (65%) and the age range (all cases) was 25 to 63 years (mean age = 45 years). 27/34 (79%) of the cases reported this quarter were employed in the health and social care sector, 4/34 cases (12%) in the manufacturing sector, and 3 cases (9%) reported in land transport sector. The occupations of reported cases from the health and social care sector included nurses, nursing auxiliaries and care assistants, porter, doctor, social worker, physiotherapist, domestic and dental nurse.

OPs reported 16 cases under the mental ill-health category; these comprised 8 diagnoses of anxiety / depression; 6 diagnoses of 'other psychiatric problems' (e.g. adjustment disorder, post trauma reaction) and 2 diagnoses of work-related stress. The precipitating events (as recorded by the physicians) associated with the mental ill-health cases included assault, work overload, interpersonal relationships, professional complaints and abusive threats.

The 14 cases of work-related musculoskeletal disorders were related to the following anatomical sites; back (4 cases); shoulder (3 cases); foot (2 cases); 'other' (2 cases, specified as rib) and 1 case reported in hand/wrist/arm, elbow and knee. The tasks and movements associated with the musculoskeletal cases (as recorded by the physicians) included manual handling, falls / accidents, repetitive action and ergonomics.

3 cases were reported under the 'other work-related ill-health' category and specified as headache (in a social care worker attributed to noise); chemical conjunctivitis (in a general operative attributed to dimethylacetamide) and an umbilical hernia (in a general operative attributed to manual handling).

In addition, OPs reported 1 case of work-related skin disease this quarter, specified as irritant contact dermatitis in a general operative attributed to cyanoacrylate.

#### **EPIDERM-ROI**

The 12 dermatologists currently participating in EPIDERM-ROI reported 5 cases of work-related skin disease (total ever cases up to Sept 2018 = 494). All 5 cases were reported as contact dermatitis; 3/5 cases (60%) reported in males.

Case details are as follows:

Allergic contact dermatitis

welder attributed to rubber accelerator in gloves;

a farmer attributed to rubber;

a manufacturing operative attributed to acrylates; and

a care assistant attributed to drugs and medicaments.

Irritant contact dermatitis:

process worker attributed to hand washing.

## **SWORD-ROI**

Three cases of work-related respiratory disease were reported by chest physicians during the third quarter of 2018. The cases were diagnosed as follows:

bronchitis/emphysema (2 cases, both female, 1 carpenter attributed to wood; 1 general worker attributed to compost/formaldehyde),

non-malignant pleural disease (1 case, male electrician attributed to asbestos).

In total (January 2005 to Sept 2018), the 11 chest physicians have reported 204 case reports.

## **THOR-GP-ROI**

Twenty two general practitioners are currently enrolled in the scheme in ROI. In the third quarter of 2018 just 1 case of work-related ill-health was reported (total cases reported since the scheme commenced in 2015 = 32). The case was reported under the musculoskeletal category and was

specified as shoulder pain / tendonitis in a female catering assistant attributed to repetitive duties and heavy lifting.

## **BECK REPORT**

We are most grateful to Dr Mark Wilkinson for this quarter's 'Beck Report', which provides a commentary for cases of work-related skin disease reported to THOR and THOR-GP UK this quarter.

## BECK REPORT

July to September seem to have been quiet months with only 63 skin cases (usually just under 100) reported to EPIDERM, 1 to OPRA and none to THOR-GP. However, cases of acrylate allergy in nail technicians continue unabated with 5 (8%) cases from this exposure. The lack of education and training was highlighted by one beauty worker who, found to be allergic, stopped applying acrylic nails but continued using gel which contains the same chemicals! Unsurprisingly their rash persisted. Following on from the SCCS opinion, representatives of the member states of the EU are due to discuss the issue in December. It is to be hoped that the dermatology societies that are responding to the consultation can encourage improved labelling to increase the awareness of both nail technicians and consumers of the risk of allergy and encourage a requirement for improved training of nail technicians in their use to reduce the risk of sensitisation. Continued home use, where education on safety measures is likely to be poorer with an increased risk of contamination, also needs to be considered.

Formaldehyde allergy in a metal machinist also allergic to the formaldehyde releasers Bioban CS 1135 & diazolidinyl urea was reported. However, formaldehyde was not reported as being present in any safety data sheets (SDS) of currently used cutting fluids. I always take SDS with a pinch of salt as generally they're only as good as the person writing them. In one survey of 137 SDS analysed, 18.6% were deficient. Of these, a R43/H317 warning was missing when an allergen was present in 63%, a preservative (such as formaldehyde) was not declared when present in 49% and allergy was not mentioned despite containing an allergen in 20%<sup>1</sup>. For cosmetics, which are more tightly regulated and INCI (International Nomenclature of Cosmetic Ingredient) labelling is mandatory, one study found 7% of products said not to contain formaldehyde actually did so at concentrations that might induce dermatitis using the chromotropic acid test<sup>2</sup>. It might pay therefore to be wary and follow up on your suspicions if you have a friendly laboratory to hand.

I was initially perplexed by the male picture framer allergic to the nail varnish allergen phthalic anhydride/trimetallic anhydride/glycols copolymer. Presumably, used as varnish for the pictures or frames? Copolymers are large molecular weight chemicals and it had been thought that they would not be allergenic as a consequence. However, there are a steady stream of case reports<sup>3</sup> usually in the context of cosmetic allergy<sup>4</sup>.

Dr Mark Wilkinson, Consultant Dermatologist, Leeds General Infirmary

<sup>&</sup>lt;sup>1</sup> Difficulties in using Material Safety Data Sheets to analyse occupational exposures to contact allergens. Friis UF, Menné T, Flyvholm MA, et al. Contact Dermatitis. 2015; 72: 147-53.

<sup>&</sup>lt;sup>2</sup> Ten-year trends in contact allergy to formaldehyde and formaldehyde-releasers. Fasth IM, Ulrich NH, Johansen JD. Contact Dermatitis. 2018; 79: 263-269.

<sup>&</sup>lt;sup>3</sup> Allergic contact dermatitis caused by PEG-22/dodecyl glycol copolymer in a skin-repairing cream. Amsler E, Al-Raddadi R, Frances C. Contact Dermatitis. 2017; 77: 54-55.

<sup>&</sup>lt;sup>4</sup> Allergic contact dermatitis to copolymers in cosmetics--case report and review of the literature. Quartier S, Garmyn M, Becart S, Goossens A. Contact Dermatitis. 2006; 55: 257-67.

## **DISSEMINATION OF RESULTS**

Professor Raymond Agius, Emeritus Professor of Occupational and Environmental Medicine at the University of Manchester, and Professor James Hayes (Chest physician) both presented THOR-ROI data at the Irish Thoracic Society meeting held in Belfast on the 22<sup>nd</sup> November 2018.

# REMINDER OF HOW WE CAN HELP YOU

We would again like to take this opportunity to encourage THOR-ROI reporters to contact us if they would like to present THOR-ROI or THOR-UK data at future meetings; simply email <a href="mailto:Annemarie.money@manchester.ac.uk">Annemarie.money@manchester.ac.uk</a>

# **THOR CONTACTS**

Many thanks for your continued support of THOR-ROI, please contact us (Table 1) if you have any queries or data requests.

**Table 1 THOR Contact details** 

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