April 2004

Presentation on the "**Health Issues in Construction**" by Dr. Mary Kinoulty, Medical Inspector, EMAS.

The Chairman welcomed Mary and outlined her career in several large Midlands companies, before joining EMAS in Birmingham. Her work involves a significant proportion of visits to Construction sites.

Mary began by quantifying the scale of the problem by referring to the 1.9 million construction workers, 85% of whom worked for firms employing 3 persons, or fewer. This mobile workforce, obviously, had restricted access to primary health care and limited family support and it was estimated, Mary added, that 7% of the workforce were affected by illness caused, or made worse by, work. But the most shocking statistic was the 3,000+ deaths in 2001 caused by mesothelioma, of which 600 were in construction. This was expected to peak in 2010. Looking beneath the headline figures, Mary went on to give an analysis of the main types of ill health: -

- Musculoskeletal disorders – 5% workforce
- Noise-induced hearing loss – 87,000 in UK
- Hand Arm Vibration Syndrome – 36,000 in UK
- Dermatitis – 3,900 new cases /year in UK
- Asbestos related problems.

Currently, Mary suggested, there was little common understanding of how to tackle this problem, which manifested itself in so many diverse ways on different sites. The general duty placed on employers by Health and Safety at Work etc., Act does not provide the answer, but the supporting legislation in the Management of Health and Safety at Work Regulations, at least, points us towards a logical structure through Risk Assessment. Mary then addressed some of the main hazards: -

Manual Handling

- Designers and Specifiers should see this as a priority, looking at block sizes and cement bags, together with the provision of mechanical aids.
- Everyone should challenge existing work practises – there's always a better method!
- Project Managers, supervisors and site workers should receive proper training
- People who develop problems should be actively managed with suitable medical treatment and a positive programme to rehabilitate them.

Noise

- Design and Training are, again, in the forefront of the risk control process.

- Eliminate the noisy processes
- Reduce the numbers of workers exposed by segregation. Special note should be made of neighbouring workers who may not be wearing PPE!
- Identify 'at risk' workers and ensure that they are placed in a 'hearing conservation' programme. This should include Audiometry and checks to make sure that PPE actually works!

Hand Arm Vibration

This is topical at the moment because of the sizeable compensation awarded to miners in recent years. The risk is increased in cold weather and Mary showed a slide illustrating affected fingers.

- Eliminate high risk practices
- Manage exposure by tool selection and job rotation. The latter can be defeated by workers who like to retain their 'favourite tasks'.
- Ensure that tools are properly maintained in order to preserve their 'low noise' performance. Good tools are useless without good maintenance
- At the moment, the daily limit for HAV is 2.8m/sec^2 and the threshold to require health surveillance will halved in future. It is important to watch out for the symptoms and not to rely purely on surveillance carried out by a medical practitioner.

Cement Dermatitis

- Educate all on site about the risk
- Reduce the need for worker contact with wet cement
- Provide adequate welfare facilities
- Identify 'at risk' workers and issue pre-start questionnaires
- Institute a system of skin checks by a responsible person

Mary presented a slide showing serious burns on both knees suffered by a victim who had knelt on a floor for several hours. She emphasised the dangers of an allergic reaction to the chrome in cement and said that injuries were so severe because they developed without any pain sensation. The longer the skin is in contact with the skin the more likely it is for a complaint to develop. This is why it is supremely important to have good washing facilities, with warm water and good personal hygiene discipline,

Asbestos

- Not uncommon during building and maintenance operations
- Keep detailed records of any exposure incident itemising the person(s), duration, and levels (was it a dense cloud – could you see through it?)
- Advise individuals to ask their GP to log the details on their medical record.
- A routine chest X-ray is not advised.
- Offer counselling if required to convey the message that "we don't know if cancer will develop"
- Emphasise the importance of giving up smoking that can aggravate any asbestos related illness.

Welfare

The main requirements are for Washing, toilet, rest and changing facilities – particularly somewhere clean to eat and drink during breaks.

Toilets

- Adequate numbers
- Lockable doors
- Connected to a main sewer, if possible, or regularly serviced, if a portable unit.
- Supplies of toilet paper

Mary showed a slide of a particularly bad example and said that she had seen many bad ones in her site inspections.

Washing Facilities

- Adjacent to toilets and changing areas
- Sinks large enough to wash hands, forearms and face
- Hot and cold running water. This is particularly significant for work with cement
- Soap and towels or dryer
- Showers if particularly dirty and/hot work

Break/Rest Area

- Suitable seating area
- Clean
- Washing facilities nearby
- Means to eat food and drink
- Drinking water available

Changing Facilities

- Needed if employees required to change from street clothes to work clothes
- Requires seating, hanging area, privacy
- Located near washing facilities

Other Health Issues

- Sunlight – In UK the problem is outstripping Australia because of poor attitude. Workers need hat and shirts, with creams on other exposed skin.
- Lead – Surveillance is required with blood testing by a HSE appointed doctor
- Silica
- Infectious diseases – Hepatitis from needlestick injuries or Weil's disease from animals
- Stress – The suicide rate is in the hundreds *per annum*

Mary then posed the question "Why bother with an Occupational Health programme?" She went on to suggest a few reasons, like the need to comply with legal requirements, protecting you mast valuable resource, disruption to work progress and significant civil liabilities in an increasingly claim conscious culture!

Choosing a provider can also have its pitfalls, so it should not be done on the spur-of-the-moment.

- Identify your OH needs systematically.

- Identify local providers by recommendations from people you **trust.** As with any other 'contractor' there are good and bad and some with narrow specialisms.
- Other sources are the EMAS list or Yellow Pages
- The Management Regulations require employers to appoint "competent assistance", which should be assessed by reviewing experience, qualifications and discussion with other clients
- Qualifications for Doctors would be a Diploma, Associateship or Membership of the Faculty of Occupational Medicine (DipOM, AFOM, MFOM)
- Nurses would hold a Diploma or Degree in Occupational Safety and Health or an MSc
- As in other fields, remember that qualifications do not guarantee competence, but they do indicate that a course has been undertaken and a rigorous examination passed.

When making the appointment, other issues to be settled must be: -

- Basis of fess
- Who will do the work, will any of it be subcontracted
- Matters of confidentiality and conflict of interest
- Form of feedback to client and employee – this must indicate, at the very least, whether an individual is fit for work
- Reviewing the process

The OH programme should also accommodate aspects that Inspectors may enquire about during a visit, such as: -

- Evidence from risk Assessments that health issues have been considered
- Details of the Health Surveillance programme
- Sight of the information provided from the HS carried out, e.g. Fit/Unfit/Fit with restrictions
- Evidence of action taken, e.g. improved controls, job change or modification, RIDDOR reporting
- Worker understanding of the HS programme and the risks of exposure

Mary also mentioned some specific aspects of relevance to Construction: -

- A pre-employment assessment to ensure fitness for particular tasks – a very worthwhile precaution!
- Specific HS for HAVS, skin problems, noise, specific chemicals
- Health monitoring for drivers
- Sickness absence monitoring
- Rehabilitation/Counselling/Health Education

Mary concluded by listing some HSE publications, which are relevant: -

- www.hse.gsi.gov.uk
- Infoline 08701 545500
- HSG137, Health Risk Management

- MISC499, High 5
- HSE Construction Information Sheets (CIS Series)
- INDG233L, Preventing dermatitis at work
- INDG175, Health Risks from Hand Arm Vibration, (Employers) & INDG126 (Employees)
- INDG289, Working with Asbestos in buildings
- INDG255, Asbestos dust kills

Members' Questions

Andy Fraser of Mansell Construction Services Ltd. asked if the conventional Portaloo, with a cold water supply, only, was an acceptable standard of toilet and washing facility. **Mary** said that it definitely was not, and Chairman **Warwick Adams** confirmed this by stating that the HSE even insisted on the provision of hot water from the start of work on the first day on any new site.

Jim Hathaway of Beiersdorf UK asked about monitoring the fitness of Fork Lift Drivers to check, say, neck mobility to carry out all-round observation. Mary replied that EMAS had a checklist that provided guidance on suitable questionnaires. **Warwick Adams of Interserve** extended the topic to ask about confidentiality of replies if managers asked employees about their health. Mary replied that answer should not be filed in general filing systems and **Andy Chappell** quoted a **"Medical-in-Confidence"** category, which segregated such information into special files. **President Morris Cooke** said that the General Medical Council had published a document on Confidentiality for Medical Professionals but added it was difficult to implement in small firms. **Graham Stanford of Old House Holdings** said that his firm used an external provider to process questionnaires for about £10 per person and the reports went direct to that person.

Carl Lewis of M.J.Gleason asked if it was acceptable to have one hot water source serving two adjacent basins, through one rotating delivery pipe. He was also concerned about whether this system was suitable to enable persons to wash their forearms adequately. The general consensus was that one source was adequate, but the basin must be large enough to accommodate a forearm.

Steve Burke of Fitzgerald Contractors enquired about obtaining a diagnosis of Vibration White Finger. Mary said that General Practitioners could not do this and that the case should be referred to a FOM specialist. **Morris Cooke** added that it should be referred to a neurologist for an expert opinion.

Warwick Adams asked if Mary could give any news about an Occupational Health Service for the Construction Industry. Mary replied that she had heard of a pilot scheme in Scotland with OH Nurses and that it might start in Autumn 2004

As there were no other questions, Warwick thanked Mary for her very timely presentation and asked the members to show their appreciation in the normal manner.