

The physical sessions, which should be led by a health professional (eg physiotherapist, occupational therapist), are aimed at improving strength and endurance using graded activity. Relaxation and energy conservation sessions should be included with the aim to equip the employee with effective coping strategies. Education on ergonomics may be included as well.

The psychosocial component, which should be led by a health professional (eg psychologist, occupational therapist), is aimed at improving coping strategies using cognitive behavioural techniques and preparation for return to work including liaison with the employer. Education on effective coping mechanisms for pain should also be included.

- 3 For employees absent from work due to non-specific arm pain for more than four weeks, an individualised return-to-work plan should be agreed, in advance of their return to work, following liaison between the rehabilitation team, the employer and the worker.
- 4 Employers should consider offering those workers with non-specific arm pain whose condition is aggravated by work, temporarily modified duties to allow time for the condition to improve.

#### Tenosynovitis

- 1 For those workers with tenosynovitis using display screen equipment, the existing workstation assessment should be reviewed by the employer, with the involvement of the employee, and the findings acted on. This should be revised whenever a substantive change to the workstation or work processes occurs, as required by the Display Screen Equipment Regulations.

- 2 Employers should consider offering those workers with tenosynovitis whose condition is aggravated by work, temporarily modified duties to allow time for the condition to improve.

#### Tennis elbow

- 1 Employers should consider offering those workers with lateral epicondylitis (tennis elbow) whose condition is aggravated by work, temporarily modified duties to allow time for the condition to improve.

#### Useful information

- HSE musculoskeletal disorders webpage: [www.hse.gov.uk/msd/index.htm](http://www.hse.gov.uk/msd/index.htm)
- HSE Infoline – Tel: 0845 345 0055, Fax: 0845 408 9566, Minicom: 0845 408 9577 or email: [hse.infoline@natbrit.com](mailto:hse.infoline@natbrit.com)

#### References

- 1 NHS Plus, Royal College of Physicians, Faculty of Occupational Medicine. *Upper limb disorders: occupational aspects of management. A national guideline*. London: RCP, 2009.
- 2 Department for Work and Pensions. *DB1 – a guide to Industrial Injuries Disablement Benefits*. London: DWP, 2008. Available at [www.dwp.gov.uk/advisers/db1/](http://www.dwp.gov.uk/advisers/db1/)
- 3 Health and Safety Executive. *Upper limb disorders in the work place*. HSG60, 2nd edn. London: HSE Books, 2002.
- 4 Health and Safety Executive. *Work with display screen equipment: Health and Safety (Display Screen Equipment) Regulations 1992 as amended by the Health and Safety (Miscellaneous Amendments) Regulations 2002*. Rev edn. London: HSE Books, 2003. Available at [www.opsi.gov.uk/si/si1992/Uksi\\_19922792\\_en\\_1.htm](http://www.opsi.gov.uk/si/si1992/Uksi_19922792_en_1.htm)

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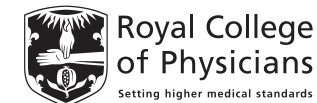
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For the full version of the guidelines on the occupational management of upper limb disorders, see: [www.nhsplus.nhs.uk](http://www.nhsplus.nhs.uk)



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# Upper limb disorders

## Occupational aspects of management

Evidence-based guidance for employers



Royal College of Physicians  
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Introduction

This leaflet tells you about a review of the workplace management of four upper limb disorders: carpal tunnel syndrome, non-specific arm pain, tenosynovitis and lateral epicondylitis (tennis elbow).<sup>1</sup> The work was carried out by a Guideline Development Group including representatives from employers, patients (employees), occupational health, general practice, rheumatology, ergonomics, physiotherapy, occupational therapy and the Health and Safety Executive (HSE). This leaflet looks at the workplace management of upper limb disorders but does not give medical or therapeutic advice.

What are upper limb disorders?

This term covers a range of musculoskeletal conditions in the arms.

- **Carpal tunnel syndrome** (CTS) causes pins and needles over the thumb, index, middle and ring fingers and results from pressure on the median nerve at the wrist.
- **Non-specific arm pain** is upper limb pain not due to any other condition. There has been much debate over the name and it may also be referred to as repetitive strain injury (RSI).
- **Tenosynovitis** is redness, swelling, stiffness and pain over the wrist tendons.
- **Tennis elbow** gives pain on the outer side of the elbow. This condition worsens with a lot of lifting or twisting at the wrist eg using a screwdriver.

Can work cause upper limb disorders?

Only a few robust studies show that work causes upper limb disorders. However, many suggest that working in awkward positions, with high force, rapid movements and/or use of power tools or computers can increase the risk. Organisational factors such as low supervisor support may also play a part. Carpal tunnel syndrome and

tenosynovitis are ‘prescribed diseases’ for certain jobs. This means some jobs double the risk of developing these conditions. Affected workers in such jobs may be eligible for Industrial Injuries Disablement Benefit.<sup>2</sup>

How common are upper limb disorders?

- 1 in 20 adults gets carpal tunnel syndrome.
- 1 in 4 adults with an upper limb disorder has non-specific arm pain.
- 1 in 100 men and 1 in 50 women get tenosynovitis.
- 1 in 75 men and 1 in 90 women get tennis elbow.

Why is it important for employers to know about upper limb disorders?

These conditions are common. The good news is most people will recover in time. However, some workers will have continuing problems. Early action may stop them from getting worse. Avoiding or reducing tasks that increase symptoms may help. Work may worsen problems and so may hobbies like gardening, sport or DIY. Effective risk management carried out by employers is likely to reduce costs in terms of absence and replacement of staff.

What should I do for my employees with upper limb disorders?

According to the law, you must identify jobs that might cause upper limb disorders. You must assess the risks, prevent or control them as far as it is reasonably practicable to do so and inform workers about these risks. A competent assessor of display screen equipment, an occupational health specialist, occupational therapist or occupational physiotherapist should carry out the assessment of display screen equipment. Organisational pressures may be relevant so it is important to manage workplace stress. The HSE stress management guidelines ([www.hse.gov.uk/stress/index.htm](http://www.hse.gov.uk/stress/index.htm))

provide useful advice on this subject. You can do several things that may help people with upper limb disorders. These include task modification (doing the job differently), job rotation (varying the job), job enlargement (reducing the need for the same repetitive action), temporary reduction in working hours, staff training (ensuring good working technique) and introducing regular short breaks into the working day (to allow time for recovery). For example, computer users can use keyboard shortcuts to minimise mouse use or trial alternative designs of mouse. For some people, voice-activated software or administrative support may also help. The Disability Discrimination Act 2005, which may apply to some workers with upper limb disorders, requires that employers make reasonable changes to help disabled workers.

Where can I get more information about upper limb disorders?

The HSE guide on upper limb disorders in the workplace<sup>3</sup> contains useful advice. Information is also available from the HSE website and the HSE Infoline (Tel: 0845 345 0055). Occupational health staff can advise you and your worker about work and reducing risks. In difficult cases, you may need help from a specialist (eg an ergonomist or human factors engineer) in the management of employees with upper limb disorders.

Recommendations

This review looks at the limited high-quality evidence available on what employers can do to support a worker with an upper limb disorder once it starts. There may be other factors that improve the condition but which have not yet been trialled and so lack the evidence base to be recommended.

Carpal tunnel syndrome

- 1 For those workers with carpal tunnel syndrome using display screen equipment, the existing

workstation assessment should be reviewed by the employer, with the involvement of the employee, and the findings acted on. The assessment should be revised whenever a substantive change to the workstation or work processes occurs, as required by the Display Screen Equipment Regulations.<sup>4</sup>

- 2 Employers should consider offering computer operators with carpal tunnel syndrome the opportunity to trial different computer keyboards.
- 3 Workers with carpal tunnel syndrome who are exposed to hand-transmitted vibration should have their risk from vibration exposure reassessed and, depending on medical advice and reasonable practicability, should have their exposure reduced.
- 4 Employers should consider offering those workers with carpal tunnel syndrome whose condition is aggravated by work, temporarily modified duties to allow time for the condition to improve.

Non-specific arm pain

- 1 For those workers with non-specific arm pain using display screen equipment, the existing workstation assessment should be reviewed by the employer, with the involvement of the employee, and the findings acted on. The assessment should be revised whenever a substantive change to the workstation or work processes occurs, as required by the Display Screen Equipment Regulations.
- 2 In workers with non-specific arm pain who have been absent from work for at least four weeks, multidisciplinary rehabilitation programmes including both physical and psychosocial approaches should be offered, or facilitated, by employers.