Imperial College: Computer Health Code of Practice

- 1. Introduction
- 2. Application
- 3. <u>Departmental Arrangements</u>
- 4. Standards for Workstations
- 5. Information
- 6. <u>Workstation Assessments</u>
- 7. Training
- 8. Work Routines
- 9. Eyesight Tests
- 10. Additional Sources of support

Appendix 1 Definitions

Appendix 2 Web links

1. Introduction

This code of practice provides practical advice on measures to implement the College Computer Health and Safety Policy and ensure that the College complies with the Health & Safety (Display Screen Equipment) Regulations 1992. This requires that work with computers in College is effectively managed and that all users of computers follow recommended practice.

The principal duties of Heads of Departments, Managers, the College Occupational Health Service, and users of computers are defined in the College Computer Health and Safety Policy.

2. Application

2.1. Staff

- 2.1.1. The policy applies to all staff whose work involves use of a computer. They must be provided with information on safe working with computers. Computer equipment and furniture provided for their use must meet ergonomic standards and be assessed to ascertain this. Any computer equipment supplied for use at home must also meet ergonomic standards.
- 2.1.2. Staff classed as computer users are entitled to eyesight tests and in some instances to provision of spectacles paid for by the College. Departments are responsible for funding eye tests for individual computer users.

2.2. Contractor and Agency staff

2.2.1. Computer equipment provided for use by employees of contractors or agencies should meet the same ergonomic standards as for College staff. Their employer is responsible for information, training and eye tests (if applicable).

2.3. Students

- 2.3.1. Most students use computers regularly and are at the same risk of health problems as staff. The Health and Safety (Display Screen Equipment) Regulations 2002 do not cover non-employees. However, under College Health & Safety Policy, equipment provided for students or demands placed on them must not endanger their health.
- 2.3.2. Workstations provided for students should, as far as is practical, meet the same ergonomic standards as for staff.
- 2.3.3. Students who are required to use computers in their studies should be given information on computer health and safety as part of their induction. The guidance issued by the College OH Service provides suitable information.
- 2.3.4. Students are not entitled to free optician's eye tests, however if departments consider it necessary for their

research the can arrange to reimburse the cost of eye tests and contribute to the cost of lenses to the equivalent value of those provided for staff.

3. Departmental Arrangements

3.1. Head of Department

- 3.1.1. A Head of Department is responsible for ensuring all work with computers in their Department is managed to avoid health risks and can comply with the College Policy. Most of the tasks necessary to achieve this can be delegated to a departmental Computer Health Assessor, if appointed, and to line managers. Some tasks e.g. notifying the Assessor of new staff or workstations may be better delegated to a departmental administrator.
- 3.1.2. The Head of Department may need to be directly involved to resolve resource problems, or to take action to deal with non-compliance with policy, providing support to the Computer Health Assessor or direction to line managers where necessary.

Box 1: The Head of Department's role

A Head of Department should:

- 1. Appoint a Departmental Computer Health Assessor (see 3.3)
- 2. Ensure Computer Health Assessors are provided with appropriate information and resources (see 3.3)
- 3. Ensure line managers are aware of their responsibilities (outlined in Box 2)
- 4. Ensure computer equipment & furniture complies with minimum standards and replace damaged/defective equipment.
- 5. Ensure there are adequate resources available to address any problems that arise concerning computer health and safety

3.2. Line Manager

- 3.2.1. Line managers are responsible for ensuring safe use of computers in their work area. Their role is summarised in Box 2.
- 3.2.2. Some of the line manager's responsibilities e.g. provision of information and basic training in safe use of computers can be covered in departmental induction programmes. The Head of Department may delegate others to the Departmental Computer Health Assessor, e.g. ensuring assessments are undertaken, authorising referrals for eye tests. Where such responsibilities are delegated, there must be effective means of notifying the Assessor of new staff or equipment.
- 3.2.3. Managers should seek assistance from their Departmental Computer Health Assessor in the first instance to resolve problems identified through workstation assessments.
- 3.2.4. Managers should ensure any staff reporting health problems or symptoms of discomfort that they think may be caused by computer work are referred to the College OH Service for assessment and advice, particularly if their symptoms have not been dealt with effectively by the departmental Computer Health Assessor.

Box 2 The Line Manager's role

A line manager should:

- 1. Ensure new staff are provided with information on safe use of their computers during induction.
- 2. Ensure workstations of new staff are assessed at first use and equipment adjusted to their needs
- 3. Take action to resolve problems identified through workstation assessments.
- 4. Ensure staff are appropriately trained on use of computers and software where necessary.
- 5. Ensure allocated computer tasks are organised to avoid excessive periods of uninterrupted screen use.
- 6. Identify staff who should be classed as Computer Users.
- 7. Ensure that computer Users are informed of arrangements for eyesight tests & authorise referral as necessary.
- 8. Refer staff reporting possible computer-related health problems to Occupational Health for further assessment and advice.

advice and assistance to managers or to users reporting problems related to computer ergonomics. The role of a Departmental Computer Health Assessor is outlined in Box 3

- 3.3.2. In small departments, the Safety Officer may be best placed to take on the role. In large departments, it may be more effective to allocate the role to another person. Departments spread over several locations may require an assessor for each locale.
- 3.3.3. The person appointed needs to be competent in assessing computer workstations, and aware of health problems that can arise in computer work. They need to be familiar with the College Computer Health and Safety Policy, this Code of Practice and Guidance Notes.
- 3.3.4. The Occupational Health Service provides training for new Computer Health Assessors. Assessors can contact an OH advisor for assistance in dealing with identified problems when necessary.
- 3.3.5. The Occupational Health Service holds update briefings once per year (see Para 7). These briefings should be attended by all Computer Health Assessors as any changes to College policy are discussed as well as any changes to the regulations themselves.
- 3.3.6. Computer Health Assessors need to have sufficient time for their work. If the assessor is involved in departmental induction training programmes additional time may need to be allocated for this.
- 3.3.7. Computer Health Assessors may need to be provided with information on new staff appointments to monitor workstation assessments.
- 3.3.8. Although Assessors are not responsible for the management of computer users, they should actively promote good practice in the department.

Box 3 The role of a Departmental Computer Health Assessor

- 1. Monitoring the conduct & outcome of work-station assessments.
 - Checking that assessments are carried out when appropriate (Para 6.1).
 - Maintaining suitable records of workstation assessments (Para 6.2).
 - Assisting with the assessment of workstations provided for multiple users, e.g. student classrooms, hot
 desks.
 - Assisting with departmental induction training programmes, if required.
- 2. Advising on resolution of problems identified during assessments.
 - Some users may require assistance or instruction to undertake a workstation assessment.
 - Assessors should be the first source of advice on how to resolve ergonomic problems identified in workstation assessments.
 - Assessors may be delegated responsibility for authorising referrals for optician's eye examination (Para 9).
- 3. Promoting good practice amongst users.
 - Assessors can deliver user training locally
- 4. Reporting problems.
 - The Head of Department should be informed of problems in achieving compliance with the College Policy and of unresolved resource issues.
 - Cases of possible health problems relating to computer use should be reported to the Departmental Safety
 Officer and the College Occupational Health Service.

computer is used, or computer work organised by the individual is as important a cause of health problems as equipment problems.

The OH Service manages the provision of optician eye tests Users must seek prior approval from their line manager or departmental administrator. Information on eye test eligibility and how it can be arranged can be accessed via the eye care portal on the Occupational Health Web page.

3.4.2. Users are required to assist with workstation assessments and should follow College guidance on this issued under the College Policy. They also should report possible symptoms of computer-related symptoms to either their manager, Departmental Assessor or the College OH Service as early as possible.

BOX 4: The User's role

Users should:

1. Check & adjust their workstation to fit their needs.

Assessments should be carried out at first use of their computer. The assessment checklist on the OH Web pages should be used to guide the user through an assessment.

2. Organise their work to avoid overuse problems.

The guidance notes for computer use produced by the College OH service describe best practice.

3. Seek assistance to resolve problems where necessary

The Departmental Computer Health Assessor can help on problems with set-up & adjustment to workstations. Users should inform their manager of unresolved workstation problems, or if the user develops musculoskeletal problems.

Computer users with possible work related upper limb pain (RSI WRULD) or other computer-related health problems should consult with one of the College's OH Advisers

4. <u>Seek prior approval from their Line manager or Computer Health Assessor to arrange an eye test</u> via the Eyecare Portal on the Occupational Health Web pages

4. Standards for workstations

All computer equipment and furniture provided by college for use by staff must conform to minimum standards. These are outlined in box 5.

The prime requirement is for the equipment and furniture provided to allow the user to achieve a comfortable working position. This will usually require sufficient space for the user to be able to change position and to rearrange equipment and materials according to the task at hand and for the user to be able to adjust the computer screen to achieve a legible image. The standards cover both desk-top and portable computers when used at a desk. They may be inappropriate for some other equipment utilising display screens e.g. CCTV monitor banks or process control equipment. User comfort must still be taken into account when designing installations of such equipment.

Workstations specifically designed for short-term use, e.g. enquiry points need not meet the minimum standards in their entirety; the desk size can be smaller and seating may not be necessary. It is essential, however, that the monitor and screen meet the minimum requirements to allow legible viewing. The tilt mechanism on the monitor will allow various heights of potential users to be taken into account.

Specific recommendations for portable computers are available on the OH Services web pages.

Hot desks: Where multiple user workstation is provided users should be reminded to adjust chair height and monitor height to suit their individual needs

4.1. Workstation Equipment

BOX 5: Minimum Standards for furniture and equipment

1. Work surface

The work desk or work-surface must have:

- Adequate space available for the user to arrange the screen, keyboard and related equipment so as to achieve a comfortable working position.
- A non-gloss finish to prevent distracting reflections.
- Adequate space for the use and storage of related equipment & materials e.g. telephones, printers & other peripherals, work documents.
- Adequate leg space underneath the work-surface.
 - The size required will depend on type and amount of the equipment in use and, in particular, the size and type of screen provided. As a guide the desk should ideally be deep enough for the screen to be placed 60cm from the front edge of the desk. The minimum acceptable depth should allow space to rest hands in front of the keyboard. The available width should be at least twice the width of the keyboard. Table height should be between 66 cm and 73 cm (fixed height optimum 72 cm). Shelving should be located so as not to interfere with positioning of the computer screen. Where desk space or overhang is limited, flat screens and/or floor mounted computer cases may be necessary.
- Height adjustable desks (standing desks) can be an effective solution for those who experience lower back pain aggravated by extended periods of sitting.

2. Seating

The work chair provided must allow the user to achieve a comfortable working position. For most users to achieve this and in all circumstances where the chair is be used more than one person this will require that the chair provided must:

- Allow the seat height to be adjusted.
- Allow the height and angle of the seat back to be adjusted.
- Have a stable five-footed base to achieve stability and a swivel seat for user comfort.
- A footrest is required if a user is unable to adjust the work surface height and/or chair height to allow their feet to rest flat on the floor while working.

3. The computer monitor must: -

- Display characters as clear and stable images of adequate size for legibility.
- Allow adjustment of the brightness and contrast of the screen by the user.
- Allow easy adjustment of the tilt and swivel of the screen by the user.
- Be free of distracting reflection from its surface.
- Monitors should be height adjustable or be positioned on a stand to allow for optimum comfort.
- Problems with reflections off the screen can usually be solved by adjusting the position of the screen in relation to light sources or by altering lighting conditions. Only in exceptional circumstances where this cannot be achieved will an 'add-on' anti-glare screen be necessary.

4. The keyboard must: -

- Be tiltable and separate from the screen base (except for portable computers).
- Have legible symbols.
- Have a matt finish.
- There must be sufficient space, in front to allow the specified user to rest/support their hands.

5. Pointing devices (mice, trackballs, etc.).

- There should be sufficient space to allow unimpeded use.
- Individuals who have experienced symptoms of discomfort may benefit from an alternative pointing device.
- **6. Document holders** are not an absolute requirement but should be provided when working from copy is a significant aspect of the person's computer work.

Where one is provided it must be: -

- Stable & adjustable
- Hold the document at a similar height, viewing distance and angle to that of the display screen.
- Not interfere with the readability of the document.

Please note: These standards apply to desktop computers. Recommendations for laptops are available on the OH web pages.

4.2. Software

- 4.2.1. The software provided should be suitable for the task for which it is used.
- 4.2.2. When selecting or modifying software, ease of use as well as the abilities of the intended users and training needs should be taken into account. The College's staff Learning & Development Centre offers training for a number of software packages.

4.3. Environmental Standards.

- 4.3.1. Space: Prolonged sitting in a static position can be harmful. There should be sufficient space for the user to sit down and get up without difficulty and allow for changes in posture whilst working.
- 4.3.2. Lighting: The general lighting around a computer workstation should be suitable for the range of work activities carried out there. Equipment should be positioned to prevent distracting glare or reflections from the screen or other equipment. In general, screens should be positioned side-on to windows or the light source causing the reflection.
- 4.3.3. Heat: Users should be provided with a comfortable thermal environment. Care should be taken to minimise draughts which may contribute to poor posture.

5. Information

- 5.1. All users must be provided with information regarding computer health and safety. Information requirements are outlined in Box 6.
- 5.2. New staff will be sent an e-mail from the College OH Service when they first log on to the College IT Network directing them to the guidance available on the OH Services web pages.
- 5.3. In addition to the information provided via the OH Service's e-mail, staff will need to be given information on specific local arrangements e.g. how to contact their Departmental Computer Health Assessor; arrangements for obtaining authorisation for an Opticians eye test (staff Users only).

Users not connected to the College IT network will need to be provided with full information at induction.

- 5.4. Managers should check that staff have received information and encourage them encourage new staff to read and follow the guidance provided.
- 5.5. Information on other computer ergonoimic topics (e.g. use of laptops, pointing devices, etc.) is available on the OH services web pages.

BOX 6: Health & safety information for computer users

1. Information provided to all users should include:

- Information on symptoms of health problems associated with computer work
- How to set up and adjust the equipment provided
- How and when to carry out a risk assessment
- How to resolve any problems identified through an assessment.
- Guidance on how to organise computer work
- Departmental arrangements for the reporting of problems
- Information on training offered and how to access this training.

2. Significant users should be provided with information on:

- Eligibility for eyesight testing
- How to arrange for an eyesight test
- How to obtain authorisation for an optician's eyesight test
- Items covered in the OH Service's guidance

6. Workstation Assessments

6.1 Assessments

6.1.1. All workstation provided for use by staff must be assessed to check they are suitable and adjusted to the needs of the user.

Assessments should be done where:

- There is a new user
- The user has experienced a health problem
- New equipment or furniture is brought into use
- The workstation is moved
- There is a significant change to the use of the workstation
- 6.1.2. Initial assessments should be carried out when a workstation is first used or an existing workstation is taken over by a new user. Assessments of personal workstations should be carried out by the user. All new staff will be sent information by e-mail from the OH service on how to carry out a workstation assessment after they log on to the College e-mail network for the first time, (usually the following week). The responsibility for ensuring that the assessment is actually carried out lies with the person's manager or supervisor.
- 6.1.3. The extent of an assessment should depend on the reason for which it is carried out. Initial assessment of a new workstation or an existing workstation taken over by a new user should be comprehensive. Where an assessment is being carried out because of some alteration either to equipment or to the way it is used, the assessment can be limited to aspects affected by the change.
- 6.1.4. Initial assessments should be carried out during the induction of a new user. The assessment needs to involve the user and should take into account the tasks for which the computer is being used. Users should be provided with the Guidance Notes and Assessment Checklist available on the College OH Service's web pages before carrying out an assessment.
- 6.1.5. Assessments of workstations designated for common use should be organised by the person responsible for them or delegated to the Departmental Computer Health Assessor.
- 6.1.6. Advice on problems identified through assessment should be sought from the Departmental Computer Health Assessor unless the user is able to resolve the problem themselves.

6.2. Records

- 6.2.1 Completed assessments should be passed to the Departmental Computer Health Assessor.
- 6.2.2. The Departmental Computer Health Assessor should keep a record of when assessments were carried out, problems identified and their resolution, for audit purposes. The record of an individual assessment need only be retained where problems have been identified and until the problem has been rectified.

7. Training

- 7.1. The training needs of all staff using computers should be assessed during induction or when new equipment or software is introduced.
- 7.2. For most users, provision of the OH Service's guidance on safe use of computers and on how to carry out a workstation assessment will be sufficient.
- 7.3. User training: The computer user training sessions provided by the OH service give detailed training in the safe use of computers and the role of users in the prevention of health problems.

- 7.4. Assessor training: The Computer Health Assessors Course covers the ergonomic assessment and set up of a computer workstation, how to resolve problems identified during an assessment, plus good practice in computer work. Assessors can also deliver User training in their local area. Assessors should also attend the annual assessors update meetings run by the college OHS.
- 7.5. Information on Computer Health and Safety training is listed in the Safety section of the Learning & Development Centre's web pages
- 7.6. Additional departmental training sessions for users can be arranged exceptionally with the Occupational Health Service.
- 7.7. Software training needs should be assessed and appropriate training provided. The staff development unit offers training for standard software used in College.

8. Work Routines

- 8.1. Evaluation of work routines should form part of the assessment of a workstation. Prolonged periods of uninterrupted work with computers predispose towards the development of health problems and should be avoided.
- **8.2.** Job Design: Jobs involving the use of computers should, where possible, be designed to consist of a mixture of screen-based and other work so that breaks away from screen work occur naturally and vary the physical and psychological demands made on the user. Where it is impossible to provide a user with non-computer work, rest breaks should be introduced.
- 8.3. Rest Breaks Where it is necessary to introduce rest breaks users should be allowed some discretion on when they take breaks. The frequency, length, and timing of breaks will vary according to demands the work makes on the user. Users should not be expected to work for longer than 1 hour without a break of at least 5 minutes away from screen based work.
- 8.4. Users should not be allowed to forego breaks in favour of a shorter working day.

9. Eyesight tests

- 9.1. Staff Users are entitled to have an eyesight test carried out by an optician at the College's expense.
- 9.2. Arrangements for Optician's test: Eye tests are arranged online through a supplier (currently ASE Corporate Eyecare) using a voucher system
- 9.3. Authorisation: Only staff Users are eligible. Staff using a computer for more than 5 hours per week can apply for an eye test voucher without prior authorisation. Those who use a computer for less than 5 hours per week must first obtain authorisation from their manager, Departmental Administrator or Departmental Computer Health Assessor before applying for a voucher.
- 9.4. Details of how to apply for an eye-test voucher and obtain an opticians test are provided on the Eyecare portal on the OH Service's web pages
- 9.5. Free provision of spectacles: Under the DSE Regulations, where an optician recommends that a User requires spectacles specifically for reading a computer screen the employer is required to pay for supply of suitable spectacles for this purpose. If a user requires spectacles for viewing at other distances e.g. for reading or for distance vision, which would also correct a visual defect at the person's normal screen viewing distance, the employer is not responsible for the costs of providing spectacles.

- 9.6. Costs: Opticians fees are settled by the College OH Service. Departments are cross-charged on a monthly basis by the OH Service for vouchers issued to their staff. If the member of staff wishes to purchase frames other than those provided under the College's contract with Eyecare then the member of staff is responsible for the full cost of these.
- 9.7. The College is not responsible for costs of eye tests or spectacles provided for computer Users, other than those obtained via the Eyecare voucher scheme

10. Additional Sources of support

10.1. The College Occupational Health Service is the key source of advice on the prevention & management of health problems linked to work with computers. As well as organising training and producing guidance for computer users the College OH Service can:

Assess and advise on the management of staff or students developing health problems relating to computer use Assess and advise on equipment needs & support of staff with disabilities affecting use of a computer

Advise on ergonomic issues relating to refurbishments or new buildings

Assist with assessment of non-standard computer equipment

The OH Service can in exceptional circumstances provide training for departments on safe use of computers if required to supplement that provided by the department's own Computer Health Assessor.

The OH Service also produces a range of guidance notes on safe use of computer equipment. These are available on the Services web pages. (see Appendix1)

- 10.3. The OH Service has a range of alternative key boards, pointing devices, chairs and ergonomic aids which can be loaned out on a trial basis to staff or students suffering from musculo-skeletal problems, to test their suitability.
- 10.4. The College Disability Advisory Service will assess and advise on equipment needs of students with disabilities affecting use of a computer.
- 10.5. The Learning and Development Centre provides a range of training courses on computer software

Appendix 1

Definitions

A computer workstation:

The computer equipment, including monitor, keyboard, pointing devices and other peripherals (printers, scanners etc) plus the desk and chair provided for use and the immediate environment. Associated equipment such as document holders or footrests, if provided, are also included.

Appendix 2 Web Links

Computer Health and Safety Policy
Guidance for computer users
Mouse Information
Laptop information
Eye test information
Checklist