

## **ERGONOMICS:**

A way of thinking about the design of tools and equipment, the layout of workplaces and the overall organization of work.

The goal of ergonomic is to “fit the job to the person”, rather than making the person fit the job.



# ERGONOMIC CONSIDERATIONS

## WORK AREA

The work area should be large enough to accommodate you, allow the full range of motions involved in performing required tasks, and provide room for the equipment and materials that make up the workstation.

Use a headset for lengthy or frequent telephone work.

Place the items you use most frequently directly in front of you.

Avoid overcrowding computer work areas.

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## DESK/WORKSTATION

Standard furniture cannot accommodate everyone's needs. A taller person may need a one-time adjustment to have his or her work surface raised somewhat; a shorter person may need a footrest or other accessories. Adjustable furniture may be needed in situations where people share or use the same workstation.

The desktop should be organized so that frequently used objects are close to the user to avoid excessive extended reaching.

The area underneath the desk should always be clean/uncluttered to accommodate the user's legs and allow for stretching.

Position your desk lamp (if you use one) so that it illuminates source documents without causing either glare on the computer screen or direct illumination to your eyes.

A document holder should be used if documents are referred to during keying.

The document holder should:

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## MONITOR

Make sure the surface of the viewing screen is clean.

Adjust brightness and contrast to optimum comfort.

Position the monitor directly in front of the user to avoid excessive twisting of the neck.

User must position the monitor at a comfortable viewing distance, approximately 18-30 inches from the user (arms length away).

Get regular eye check-ups.

Adjust as needed for larger screens. You may need to sit farther away and increase the font size to take full advantage of the larger screen.

Bifocal and trifocal wearers have to pay particular attention to the placement of their monitor. Wearers of bifocals and trifocals often unknowingly tilt their heads backwards so they can read the screen through the lower portion of their glasses. This can sometimes lead to neck, shoulder, and back discomfort.

Potential solutions include either lowering the computer monitor or purchasing glasses designed specifically for working at the computer.

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## **KEYBOARD**

Adjust keyboard height so shoulders can relax and allow arms to rest at sides. An articulating keyboard tray is often necessary to accommodate proper height and distance.

Position the keyboard directly in front and be close to the user to avoid excessive extended reaching.

Forearms parallel to the floor (approximately 90 degree angle at elbow).

Mouse should be placed adjacent to keyboard and at the same height as the keyboard. Avoid extended and elevated reaching for keyboard and mouse. The back of the wrist should be kept flat (in a neutral position). Do not rest the hand on the mouse when your are not using it. Rest hands in your lap when not entering data.

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## **MOUSE, TRACKBALL, OR OTHER INPUT DEVICE**

Placing the input device directly in your immediate reach zone offers natural comfort and maximum hand-to-eye coordination.

Do not bend your wrist upward. Make sure you are sitting high enough for the workstation to be slightly below elbow height so that your hand rests naturally on the mouse.

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## **WORK HABITS**

Repetitious static work (working at the computer) is very fatiguing on your upper extremities as well as your eyes. It is important that breaks from working at the computer be taken every 20 to 40 minutes in order for your body to rest and recover. Taking a short break (3 to 5 minutes) does not mean you have to stop working, other activities such as talking to a co-worker, making copies, filing, etc. could be done during breaks from typing.

It is also important to change positions periodically. Sitting in one position or leaning on your arms for an extended period of time can interfere with circulation.

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## **LIGHTING**

Close drapes/blinds to reduce glare.

Adjust lighting to avoid glare on screen (light source should come at a 90 degree angle, with low watt lights rather than high).

Avoid intense or uneven lighting in your field of vision.

Place monitor at 90 degree angle to windows (where possible).

**CHAIR ADJUSTMENTS:**

- Select a chair that allows clearance behind knees when seated against the back of the chair.
- Utilize the back of the chair for support. Try to avoid “perching” on the edge of the chair (leaning forward).
- Adjust the height of the chair to achieve a proper posture.
- Adjust the keyboard or chair height to keep forearms, wrists and hands in a straight line while using the keyboard.