Title
An ergonomic or chiropractic computer workstation

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ABSTRACT

An ergonomic or chiropractic computer workstation having a horizontal work surface with a front portion and a rear portion, the front portion adapted to support a computer keyboard and/or other interactive devices such as a mouse, and the rear portion comprising a recessed platform or lower shelf adapted to support a pedestal based computer monitor or screen. In use, the platform or shelf positions the screen wherein the lower horizontal margin of the screen is substantially at the level of the work surface, thereby providing an operator with a downward gaze level to relieve or prevent neck of back strain.
FIELD OF THE INVENTION

This invention relates to ergonomic or chiropractic furniture in particular but not exclusively to a computer workstation specially designed to relieve or prevent arm, back or neck strain when spending long periods of time working in front of a computer monitor.

BACKGROUND OF THE INVENTION

Repetitive strain injuries (RSI) and neck pain developed in the base of the neck from constant gazing at a computer monitor or screen located on a desk is a problem that is common to operators spending long periods of time on the computer. In most cases, with prior art monitors which are invariably located at eye level when the operator is seated, constant movement of the head is still required when looking or working in front of a computer screen. The constant movement can cause discomfort at the base of the neck and across the shoulder region. As computer screens and monitors are improved with display speed, as well as being larger in size, it is necessary to address the working
comfort of computer operators who are required to man such workstations often for long
periods of time. The increase in downtime due to repetitive strain injuries and other
injuries as a result of long hours working at a computer is costly to industry in addition to
medical expenses borne by the taxpayer at large. Prior art solutions to this problem are
 manifold. In some examples, desks are fitted with special keyboard supports that allow
the keyboard to slide away when the desk is not in use. While this feature is useful so
that an operator can slide away and get up from a desk without injury, it also allows for
the desktop to be cluttered with things other than the keyboard. Some desks provide
other forms of supporting a monitor but this only appears to free the desk for other items.

While there are computer screens mounted on articulated platforms or suspended
overhead, most computer screens are at eye level when seated in an upright position.

There is no facility to actually lower the screen with respect to the desk wherein the base
of the screen is at desk level with prior art designs of workstations. This disadvantage of
the prior art includes the fact that it does not in any shape or form address the changing
design and size of computer monitors. Original monitors were much smaller than they
are today, and displayed far less information for the operator to process. Current prior
art monitors are very much larger and often display information on a multiple or split
screen format, and it is difficult for an operator to view the entire screen comfortably from an upright, straight backed, sitting position, even though the screen is at eye level.

OBJECT OF THE INVENTION

It is therefore the object of the present invention to provide a novel and innovative ergonomic or chiropractic computer workstation which seeks to alleviate all or some of the problems of the prior art, or to at least provide the public with a useful choice.

STATEMENT OF INVENTION

In one but not necessarily the only aspect, the invention resides in an ergonomic or chiropractic computer workstation having:

a horizontal work surface with a front portion and a rear portion;

the front portion adapted to support a computer keyboard and/or other interactive devices, for example a mouse;

the rear portion comprising a recessed platform or lower shelf adapted to support a pedestal based computer monitor or screen,

wherein in use,
the platform or shelf positions the screen wherein the lower horizontal margin of the
screen is located substantially at the level of the work surface, thereby providing an
operator with a downward field of view or gaze level to relieve or prevent arm, neck or
back strain.

Preferably, the platform or shelf is approximately 5 cm to 10 cm lower than the level of
the work surface.

In one example, the shelf or platform can comprise a well to the rear of and extending
the length of the working surface.

In an alternative design, the shelf or platform is supported on a pole or other structure,
pneumatic or otherwise, at a position that is lower than the working surface.

Preferably, the height of the shelf or platform is adjustable to accommodate different
pedestal heights of commercially available computer monitors or screens wherein
adjustment of the angle of the screen in combination with the lowered height of the shelf
contributes to an optimal downward gaze level for the operator.
BRIEF DESCRIPTION OF DRAWINGS

In order for the invention to be better understood and put into practical effect, reference will now be made to the accompanying drawings, wherein;

Figure 1 shows a preferred embodiment of the invention.

Figure 2 shows detail of the invention of Figure 1.

DETAILED DESCRIPTION OF THE DRAWINGS

Referring now to Figure 1 there is shown an ergonomic or chiropractic computer work station 10 according to a preferred example.

As will be noted, the horizontal work surface has a front portion 12 providing support for a keyboard and a rear portion 14 which has a recess platform or lower shelf 16 to support the pedestal 18 of a computer monitor 20. The lower margin of the computer monitor 20a is substantially at the same height as the work surface such that an operator seated in the chair 22 at the computer work station has a downward gaze level when viewing the display on the monitor.

It will be obvious that by adjusting the angle of the computer monitor 20 with respect to its pedestal 18 in combination with the reduced height of the platform or shelf that an optimal downward viewing level for an operator can be achieved.
Figure 2 shows greater detail of the level of the computer screen 20 with respect to the horizontal working surface 12. Both Figures 1 and 2 show a corner application of the invention. It will be obvious that any other embodiments such as a standalone or island workstation can also incorporate the ergonomic and chiropractic advantages of the invention.

VARIATIONS

It will of course be realised that while the foregoing has been given by way of illustrative example of this invention, all such and other modifications and variations thereto as would be apparent to persons skilled in the art are deemed to fall within the broad scope and ambit of this invention as is herein set forth.

In the specification the terms "comprising" and "containing" shall be understood to have a broad meaning similar to the term "including" and will be understood to imply the inclusion of a stated integer or step or group of integers or steps but not the exclusion of any other integer or step or group of integers or steps. This definition also applies to variations on the terms "comprising" and "containing" such as "comprise", "comprises", "contain" and "contains".

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CLAIMS

1. An ergonomic or chiropractic computer workstation having:

   a horizontal work surface with a front portion and a rear portion;
   
   the front portion adapted to support a computer keyboard and/or other interactive
   devices, typically a mouse;
   
   the rear portion comprising a recessed platform or lower shelf adapted to support a
   pedestal based computer monitor or screen,

   wherein in use,

   5 the platform or shelf positions the screen wherein the lower horizontal margin of the
   screen is located substantially at the level of the work surface, thereby providing an
   operator with a downward field of view or gaze level to relieve or prevent arm, neck or
   back strain.

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2. The ergonomic or chiropractic computer workstation as claimed in Claim 1, wherein the

   shelf or platform comprises a well to the rear of and extending the length of the working
   surface.

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3. The ergonomic or chiropractic computer workstation as claimed in Claim 1, wherein the shelf or platform is supported on a pole or other structure, pneumatic or otherwise, at a position that is lower than the working surface.

4. The ergonomic or chiropractic computer workstation as claimed in Claim 1, wherein the height of the shelf or platform is adjustable to accommodate different pedestal heights of computer monitors or screens wherein adjustment of the angle of the screen in combination with the lowered height of the shelf contributes to an optimal downward gaze level for the operator.

5. The ergonomic or chiropractic computer workstation as claimed in Claim 1, wherein the platform or shelf is between 5 cm to 10 cm lower than the level of the work surface.