

Ergonomic Tips

“Ergonomics” can be a black hole of suggestions, with ideal positions and posture to do just about anything. There is a daunting list of rights and wrongs, but there are basic rules to follow to feel comfortable, and to allow your body to tolerate using a computer comfortably, longer.

The Rules to Comfort!

- ✓ Ideally **work on a tabletop surface**, such as a desk, counter, or kitchen table. (If you must work from your lap, tilt the screen and support your elbows or forearms as cued below).
- ✓ Your seat needs to **keep your lower back arched**, and to allow your forearms to be parallel with the table top height. This key position should enable you to properly relax all other body parts, allowing the chair to do the work, and you're your back or neck.
- ✓ Your **elbows should rest by your sides**, bent 90 degrees to enable you to you're your forearms on the tabletop.
- ✓ If possible, it's even more ideal to be able to rest your elbows and forearms on the table, as long as your **shoulders are not elevated**.
- ✓ **Tuck your chair in** close to the table surface or you'll likely slouch away from the chair's back, changing your entire spinal posture, neck and shoulder positions.
- ✓ **Support your feet**, to keep your hips/knees bent to relatively 90/90 as well.
- ✓ Keep your head aligned over your spine and shoulders, **rolling your chin down** so your eyes gaze straight ahead to the top edge of the display screen.
- ✓ For even better ergonomics, **use an external keyboard and mouse when possible**, especially if you're going to be there a while! Prop your screen to eye level, and use a supportive chair to get the right fit.
- ✓ Keep your other studying items close by, **reaching within your arm's length** to keep from having to slouch to get them.
- ✓ **Take regular breaks** of at least 20 seconds every 20-30 minutes. Stretch, bend, reach about.

Best Places to Avoid Laptop Use



- ✓ Lying on the couch, floor or bed
- ✓ Any chair without back support
- ✓ Perching on the edge of your seat
- ✓ Sitting in any soft or cushiony chair in which you can't readily reproduce your low back arch!

Some Fun Review Videos for Optimal Laptop Use:

- ✓ For kids
<http://www.youtube.com/watch?v=ZLwIP8cBaWA>
- ✓ For Adults
<http://www.youtube.com/watch?v=S3z7uYMmaZ0&feature=related>

Optimal Recommendations When Working at Your...

Desktop:

- ✓ Just putting the laptop on the counter, table or desk lowers the viewing screen below the recommended 'eye-level' height.
- ✓ Tilt your head on your neck like nodding, but keep your head's weight centered over your shoulders, rather than rolling your whole head down towards the screen if it's to be used in your lap
- ✓ Adjust the screen so that it is parallel with your face
- ✓ Your eyes should align straight ahead to the top edge of the viewing screen
- ✓ Try to sit with any window or other strong light source 90 degrees to your side in order to minimize glare
- ✓ Look to have lights overhead, and slightly behind your computer instead of behind you
- ✓ Try to have your seat height elevated so that your elbows can rest comfortably on the table surface.
- ✓ Shouldn't need to use a wrist support; laptops don't typically need wrist supports as one is built into the computer's chassis.

What about my chair?

- ✓ The most important part of any ergonomic setup!
- ✓ Most chairs are made for "one size fits all", but we're obviously not all the same!
- ✓ Any chair can be adjusted to suit the needs of the particular user, but it takes pillows and props
- ✓ You want to start with sitting tall, maintaining your lower back arch. That's the same amount of arch you have when you're standing up, relaxed.
- ✓ "Ergonomic chairs" have an arch built into their backs, but you have to use it!
- ✓ If the depth of the seat is too deep, may be best to fill with a contour support
 - http://www.contourliving.com/p-15-contour-freedom-backreg-support-cushion.aspx?gclid=CN6n-J_106oCFQjc4AodPRxyzg
- ✓ May need to fill the gap b/w the chair and your back with a pillow. Contour pillows are best
- ✓ Feet should be supported underneath to keep your hips/knees b/w 90-110 deg
- ✓ Try to use a seat that matches your width. Pillows can fill the gaps
- ✓ Elbows should be bent 90 degrees/at a right angle, shoulders relaxed, down and back.
- ✓ Forearms should slide directly onto the keyboard then in front of you; not be elevated, nor dropped

In your lap:

- ✓ Elevate the computer so that your elbows and shoulders remain relaxed, and bent 90/90 as above. Elbow supported in this position is more supportive
- ✓ Tilt the laptop screen back and roll your head downward to have your eyes gazing straight ahead to the top edge of the viewing screen
- ✓ Remember the chair needs to be properly supporting your spine, and hence everything else

At the kitchen table:

- ✓ Ideally, have the screen directly in front of you. Constantly being turned L or R to view and type can lead to other issues

Common Questions about Ergonomics

✓ What about using a detachable keyboard/mouse?

Great idea for most people. Usually lets you find the most optimal alignment to sit with, or can even relax back in a recliner

✓ Should I use a pull-out tray support for a keyboard/mouse?

Often a great solution for optimizing desktop space, but need to be aware that your seat height likely needs to be changed

✓ How long should I be able to stay in any one place without tiring or hurting?

20 minutes is typical before one becomes fidgety due to ergonomic discomfort. Most recommendations suggest brief stretching and shifting in your seat every half hour, and taking a 5 minute break for every hour of work.

✓ Do I need to get a new chair?

Often times no, but adapting what you have can do the trick
Depends more on where do you most often use your laptop

✓ What about sitting on a ball or kneeling chair?

No ball nor kneeling chair is ideal, but they do offer good alternatives to help you sit up with a more properly aligned lower back. Change of position is often better than always using the same one chair or setup.