

The Eyes Have It: A Quick Stress Reduction Strategy

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If there is a way for you to quickly and easily be in a relaxed alert state in any situation do you want to know what it is?

Ancient cultures knew this secret, and followers of Hawaiian Huna used it to access altered states. In recently martial artists use it as a way to develop relaxed alertness, and today speed-readers use it to create a relaxed alert state before reading books at speeds of 25,000 words per minute. Since the relaxed alert state is the best state in which to study to perform in any situation from public speaking to test taking.

What is the secret? It has to do with how you use your eyes! It may be hard to believe, however, your eyes are an important link to your stress and learning how to use your eyes properly can give you an easy quick strategy for reducing your stress at any time. Before we look at how to do this, let me describe two types of vision.

Foveal Vision (focused vision): The center of gaze, called the “fovea,” has a higher density of cones than anywhere else on the retina. In fact, at the fovea, there are no rods at all. The fovea evolved to have the highest possible visual acuity, and the cones are as small as they can possibly be, and still function. Moreover, in the fovea, the retinal ganglion cells have smaller receptive fields, and in the periphery, they have much larger receptive fields.

We have surprisingly low visual acuity (resolution) in parts of the visual field that are not at the center of gaze — where we are looking. We are not aware of this because we instinctively direct our center of gaze to where we are looking.

Normally, in Western society, we use 'foveal' vision, where we concentrate on one point in front of us and notice all the details about that one point – watching TV, looking at a computer screen, reading, talking to someone – and ignore everything around it.

Foveal vision is linked to arousal of the sympathetic nervous system (the part of the 'involuntary' or autonomic nervous system associated with activity, adrenalin and stress). It seems that the stress response triggers foveal or tunnel vision because we need to higher visual acuity to save our lives.

Peripheral vision (side vision): takes in the whole panorama of what is happening in front of us and around us. It uses different light receptors in the retina and different neural pathways in the brain. Peripheral vision is the work of the rods, nerve cells located largely outside the macula (the center) of the retina. The rods are also responsible for night vision and low-light vision but are insensitive to color. Despite the vitality of cones to our vision, we have 125 million rods and only 6 million cones.

Peripheral vision is linked to parasympathetic arousal (the part of the nervous system associated with relaxation, calmness and healing). In fact, to the extent that you are truly in the peripheral vision state, you can block anxiety or stress; the two states are physiologically incompatible. When we are relaxed we are in peripheral vision. Conversely, we can trigger the parasympathetic nervous system by purposely going into peripheral vision

Peripheral vision is known and used in many older cultures as a tool for achieving useful states. In hunter-gatherer cultures, peripheral vision when hunting allows you to catch movements of prey without having to move your head and give your position away; it also dispels fear. In martial arts, peripheral vision allows you to be aware of any movement an opponent makes with his hands, for example, while keeping the rest of him in view. You can see how useful that would be if there was more than one person coming at you at once. In sports, athletes are taught to see the “entire field” (peripheral vision). We are often amazed at an athlete’s ability to “sense” where others are and move in the right direction to pull off an amazing play or apparently know when someone is behind him.

Good driving instructors teach their students to focus their attention ten to twelve car lengths down the road so they will see the panorama and not just license plate of the car in front of them. By doing so, they are also triggering the relaxed alert state that is important for driving effectively.

Going Peripheral

To learn to purposely trigger peripheral vision it is important to first “teach” your mind to feel the difference between foveal and peripheral vision. Find a point in front of you and at about 45° above the plane of the floor and focus on it. Purposely focus your eyes to see all the details in that point. Be aware of any colors or textures you see. Stare at that spot for about one minute, noticing how your body feels.

Now gradually relax the muscles around your eyes and become aware of what's around that spot and let your vision spread out in front of you to the corners of the room, as your eyes continue to look at that point and you become more and more aware of the periphery of your vision. If you stretch out a hand to one side of you, you might find the point on the edge of your vision where you only see that hand when you waggle the fingers. Let your awareness also spread behind you. I'm not suggesting that you can literally see what's behind you, but let your senses of hearing, touch, smell and spatial awareness spread out to the periphery as well...and notice what changes in your physiological state. You may notice a shift in your breathing or a relaxation in your muscles as you go into peripheral vision more and more deeply.

Repeat the process of going into foveal vision and then gradually relaxing your eyes into peripheral vision about three or four times. Each time you rehearse this process, do it a little more quickly. After three or four times you won't need to practice foveal vision. By just thinking that you want to be in peripheral vision or relaxing your eyes and taking a deep breath you are signaling your mind and body to relax.

As you experience your peripheral vision, you might notice certain physiological changes – perhaps a shift in your breathing from higher to lower in the chest, a relaxation of face and jaw muscles, and maybe later your hands became warm. If you normally have an internal dialogue going on, you might have noticed it was quieter than usual, or stopped altogether.