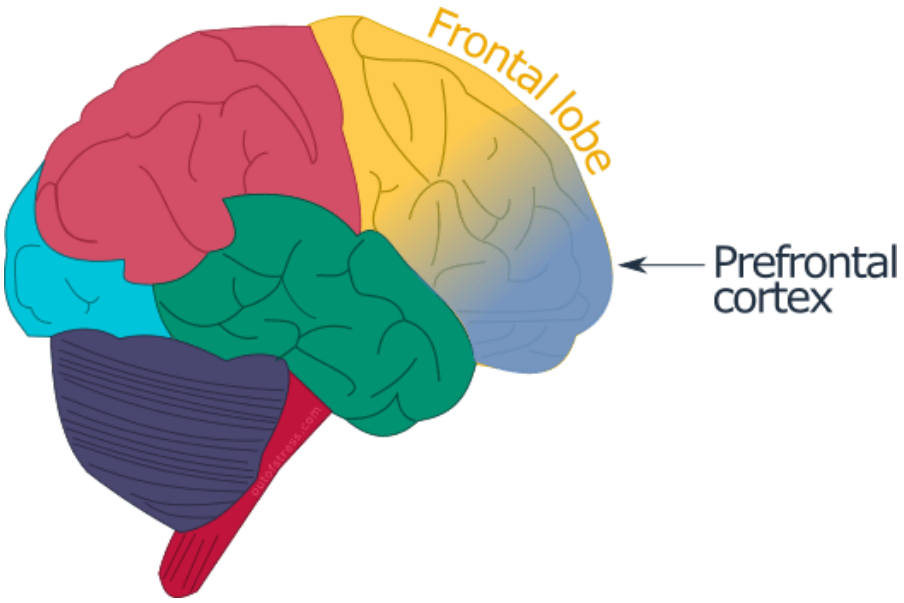
MEET YOUR PREFRONTAL CORTEX

neuroscience

pause AT WORK®



WHAT IS THE PREFRONTAL CORTEX?

Just like working out specific muscles in our body, mental exercises help us strengthen distinct areas in our brain that improve our focus and allow us to respond to stressful events with greater flexibility and ease.

There are now thousands of neuroscience and behavioral studies that demonstrate the positive benefits of consistent mental exercise. The prefrontal cortex (PFC) is one area of the brain that has been widely tested. It is **located behind the top region of the forehead and is responsible for our "executive functions"** which are a set of mental processes that support us in goal-oriented behaviors.

We use our PFC for activities like:

- organizing
- planning
- strategizing
- focusing
- remembering details

CONTINUED -->

WHAT DOES THE PREFRONTAL CORTEX DO?

The PFC supports our executive functions by **helping to integrate the activity of multiple parts of the brain.** Dan Siegel, author of *The Mindful Brain*, suggests that there are many aspects of wellbeing that can be cultivated when we stimulate the PFC through mindfulness training, including the following:

Body Regulation: the state of coordination and balance between the brakes and accelerator of the nervous system. When our body is regulated, our level of alertness and energy is appropriate to the setting.

Self Awareness: our sense of ourselves, creating a coherent life story by connecting present awareness, our life story, and images of the future. This is a key to building positive social connections.

Emotional Regulation: emotional experience that is appropriately activated, so life has vitality and meaning. When emotions are dysregulated, we become overwhelmed and emotionally chaotic. When emotions are not regulated, we may experience stagnation or depression or a sense that our life is not meaningful.

Fear Modulation: our ability to calm and soothe, or even unlearn our own fears.

Siegel, Daniel J. (2007). The Mindful Brain. New York: W.W. Norton & Company.