

Calm Your Body's Alarm System

Six calming practices — with an honest look at the evidence for each

A racing heart, a tight chest, thoughts on fast-forward — that's the body's alarm system doing its job a little too well. The same body carries a built-in braking system: the parasympathetic nervous system, whose main pathway is the vagus nerve, a long nerve linking brain, heart, lungs, and gut. The six practices below are ways of leaning on that brake.

One honest note first. Social media is full of tricks that promise to “reset your vagus nerve” in thirty seconds. There is no reset button — no exercise flips a nerve on or off. What exists is quieter and more useful: ordinary calming practices, a few with real trial evidence behind them. Each one below carries a plain evidence grade, so you know exactly what you're getting.

How to use this

- 1. Practice while calm first.** A skill rehearsed on an ordinary Tuesday is much easier to reach for mid-storm.
- 2. Expect calmer, not calm.** These practices turn the intensity down a notch; they don't switch feelings off. The first two are the workhorses — start there.
- 3. Give it minutes, not seconds** — and days, not one heroic try. Gentle repetition is what makes any of these usable when it counts.

If a practice ever leaves you dizzy, panicky, or more keyed up, stop and let your breathing return to normal. That's information about what your body needs, not a failure.

1 • Slow breathing — about six breaths a minute

Breathe in through your nose for a count of about four, then out — slowly, like fogging a mirror — for a count of about six. The long exhale is the active ingredient: the heart naturally slows on the out-breath. Keep it going for two to five minutes.

Evidence: strong for in-the-moment calming. A 2022 review by Laborde and colleagues in Neuroscience & Biobehavioral Reviews pooled 58 studies of voluntary slow breathing: most of the interventions tested shifted the body toward its rest state and lowered anxiety and arousal.

2 • The physiological sigh

Take a deep breath in through your nose and, right at the top, a second short sip of air. Then let everything out through your mouth in one long, slow exhale until your lungs feel empty. One to three of these is the in-the-moment dose; about five minutes of them daily is the practice version.

Evidence: good — with one honest limit. In a randomized month-long study of 108 adults (Balban and colleagues, 2023, Cell Reports Medicine), five minutes a day of this “cyclic sighing” improved mood and lowered resting breathing rate more than mindfulness meditation did. The same study found no significant change in heart-rate variability — so treat it as a mood-and-arousal tool, not a “vagal tone” upgrade.

3 • A paced-breathing habit, kept for weeks

Practice 1, made routine: five to ten minutes of slow, paced breathing most days, with a free app or audio track keeping the pace so you don't have to count. (Clinics teach a version with a heart-rate sensor — HRV biofeedback — but the sensor is optional.)

Evidence: good for stress and anxiety over time. A 2017 meta-analysis of 24 studies by Goessl and colleagues found large average drops in self-reported stress and anxiety after this kind of training; Lehrer and colleagues' 2020 review found the largest effects for anxiety, depression, and anger.

4 • Progressive muscle relaxation

Moving from feet to face, tense one muscle group for about five seconds, then release it completely for ten, noticing the difference. Full version, ten minutes; emergency version, sixty seconds — shoulders, jaw, fists.

Evidence: good. Developed by physician Edmund Jacobson in the 1930s, tested in randomized trials for decades, and still a standard ingredient of evidence-based treatment for anxiety and stress.

5 • Cold water on your face

From dialectical behaviour therapy (DBT, developed by psychologist Marsha Linehan): lean forward and hold something cool — cold water or a wrapped cool pack — against your cheeks and around your eyes for fifteen to thirty seconds, breathing normally. The face answers cold with a slower heartbeat — the “dive reflex.” **Skip this practice if you have a heart condition, arrhythmia, a very low resting heart rate, or an eating disorder — and never combine cold water with breath-holding.**

Evidence: mixed. The brief heart-rate slowing is well-documented physiology, but mood benefits beyond the moment are unclear: a 2025 PLOS One review of cold-water immersion (11 studies) judged the evidence limited and mostly short-term. Optional — a calm nervous system does not require cold.

6 • Humming or slow singing

Hum a low note on a long exhale, or sing something slow, for a few minutes. Humming is often sold online as a direct “vagus nerve stimulator”; no controlled trial shows that humming, gargling, or ear massage resets anything.

Evidence: weak — but low-risk. If humming calms you, the likely reason is ordinary: it forces a long, slow exhale, which is practice 1 arriving through the back door. Enjoy it; just don't expect it to outperform slow breathing.

So do “vagus nerve reset” exercises work?

The vagus nerve is real — the main pathway of the body's rest-and-settle system. The “reset button” is the myth: no exercise switches a nerve on or off, and health writers who examined the popular routines (Northwell Health; The Conversation) found no controlled evidence behind most of them. Much of the jargon around them comes from polyvagal theory (Stephen Porges) — widely used in therapy, though several of its core scientific claims are contested (Paul Grossman published a detailed 2023 critique in *Biological Psychology*; Porges disputes it). None of the six practices above depends on how that debate ends: each stands on its own trial evidence.

When calming practices aren't enough

These practices are for waves of stress. If the alarm feels stuck on — constant anxiety, panic attacks, trauma reactions, sleepless nights — it deserves more than a handout: therapy looks at what set the alarm, not just the volume. TEO Counselling offers virtual counselling across British Columbia, Ontario, Alberta, Saskatchewan, Manitoba, and Newfoundland & Labrador; you can book a free 15 minute consultation at teocounselling.com.

This handout is educational material, not therapy or medical advice. If you are in crisis or thinking about suicide, call or text 9-8-8 anywhere in Canada, any time. In BC you can also call 1-800-SUICIDE (1-800-784-2433).