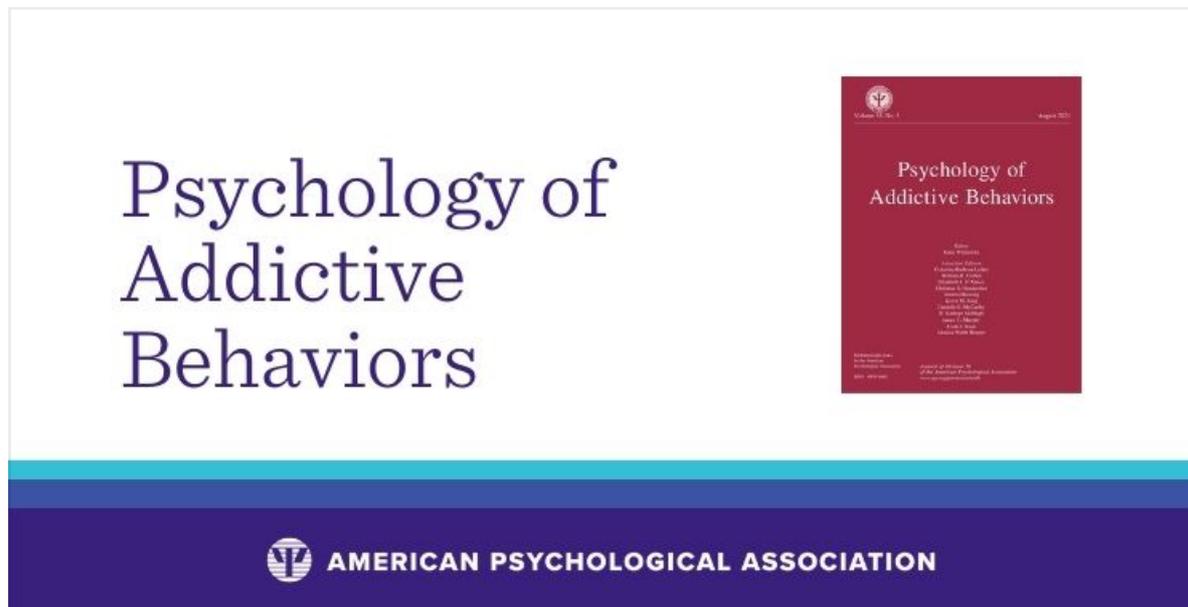


Practicing self-control lowers the risk of smoking lapse (2010) *Psychology of Addictive Behaviors*



Muraven, M. (2010). Practicing self-control lowers the risk of smoking lapse. *Psychology of Addictive Behaviors*, 24(3).

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Abstract

Recent research has suggested that practicing small acts of self-control can lead to an improvement in self-control performance. Because smoking cessation requires self-control, it was hypothesized that a treatment that builds self-control should help in quitting smoking. [...] **Individuals who practiced self-control remained abstinent longer than those who practiced tasks that did not require self-control.** [...] increased survival times were a product of **building self-control strength** and were not produced by changes in feelings that practicing should help in cessation, effort exerted on the practice task, or thinking more about self-control while practicing.

Article Quotes & Comments

"no treatment program has addressed the key underlying principle that ultimately the individual must inhibit his or her desire, however weak or well managed, to smoke."

"it may be possible to increase people's capacity for self-control. [...] **all self-control efforts depend on a limited resource known as self-control strength.** That is, any time a person exerts self-control to override, inhibit or stop a thought, emotion, urge, or behavior, he or she draws upon this strength. **Individuals who have more self-control strength are more likely to succeed at self-control compared to individuals whose self-control strength is**

weaker"

"it appears that self-control outcomes depend on having enough self-control strength to resist the temptation."

"regular practice of **small acts of inhibiting or stopping moods, urges, thoughts or feelings when interspersed with rest should increase self-control reserves**. That is, it should be possible to build self-control strength by exercising small acts of self-control. This increased self-control strength should **generalize to any and all tasks that require self-control** and should continue even after the practice has ended."

In this model, self-control is considered like a muscle that, with practice, can be built and strengthened.

"the particular self-control task being practiced is unimportant, providing it requires the individual to inhibit a response."

Again, by this model it's not the particular exercise that strengthens the muscle but the practice thereof ... likes going to the gym and using all sorts of exercises to tackle a particular muscle group.

"individuals who regulated their eating habits by avoiding unhealthy foods or who inhibited the automatic tendency to have bad posture for two weeks subsequently performed better on a task that required overriding physical discomfort. Other building self-control strength training programs, such as avoiding colloquialisms or cursing while speaking, or using the nondominant hand, have been shown to improve people's ability to regulate their use of stereotypes"

The idea here is not so much the specific practice but the *actual* practice of *any* task that involves self-control. Like a muscle, it appears self-control can be built. The less use of it the more risk of losing it (**use it or lose it principle** applies here). Of course, one must find an appropriate task to practice, one that you can get on board with—you've gotta feel like it's something you *want* to do instead of something someone is hoisting on you.

A clinically interesting practice that I think *could* apply here is to *visualise* yourself performing the self-control task in-session before practising on your own. Other research cited in Dispenza's book ***You Are The Placebo*** visualisation has the potential to help at a physical level: "In [a] study of 30 people over a 12-week period, some regularly exercised their little fingers, while others just

imagined doing the same thing. While the group that actually did the physical exercises increased the strength of their little fingers by 53 percent, **the group that only imagined doing the same thing also increased the strength of their little fingers—by 35 percent.** Their bodies had changed to look as if they were having the physical experience in external reality over and over again—but they only experienced it in their minds. **Their minds changed their bodies.** In a similar experiment, ten volunteers each imagined flexing one of their biceps as hard as they could five times a week. Researchers recorded the subjects' electrical brain activity during the sessions and measured their muscle strength every two weeks. **Those who only imagined flexing increased their bicep muscle strength by 13.5 percent in just a few weeks, and they maintained the gain for three months after the training stopped.** Their bodies responded to a new mind. A final example is a French study that compared subjects who either lifted or imagined lifting dumbbells of different weights. **Those who imagined lifting heavier weights activated their muscles more than did those who imagined lifting lighter weights.** In all three of these studies on mental rehearsal, the subjects were able to measurably increase their body strength using *only their thoughts.*"

"In the building strength phase of the study, participants were assigned to practice one of four tasks for two weeks prior to their attempt to quit smoking: **avoiding sweets, handgrip, math problems, or diary.**"

Some conditions required self-control, others ... not so much. Important: these tasks were assigned to different groups—experimental (sweets and handgrip) and control (math and diary).

"Participants in the *avoiding sweets* group were asked to **avoid eating sweets for the two weeks prior to quitting cigarettes.** Participants were told to eat as little cake, cookies, pies, candy, and other dessert foods that are high in sugar as possible."

"Participants in the *handgrip* group were given commercially available exercise handgrips purchased in a sporting goods store and instructed to **hold the handgrip for as long as possible twice a day.** Prior research has shown that squeezing and holding a handgrip for as long as possible requires considerable self-control, as the person must inhibit fatigue, pain, and the desire to let go"

"Smokers who practiced small acts of self-control were more successful at quitting smoking than those who did not. **Those smokers who squeezed a**

handgrip or avoided sweets for two weeks before quitting cigarettes remained abstinent longer and had fewer lapses overall as compared to smokers who practiced tasks that did not require self-control."

Clinically, I find it very difficult to get buy-in for clients to adopt self-control practices as a way to quit a substance. Yes, experimentally we see a significant boost in quitting and abstinence rates ... but how often are these translated into the counselling room?

"thinking the task required self-control was most effective in helping people quit when combined with a task that actually required self-control."

Okay, this is an interesting consideration and speaks to the importance of good psychoeducation that influences one's mindset. Consider Alia Crum (mindset researcher from Stanford in Huberman Lab): "[Mindsets] matter in shaping our motivation [...] **whether or not they're true or false, right or wrong, they have an impact.** And they have an impact not just through the motivational mechanisms that [Carol] Dweck and others have studied, but as our lab has started to reveal, **they also shape physiological mechanisms by changing what our bodies prioritize and prepare to do.**"

"These results imply that the active ingredient in the treatment was practicing self-control, and the **results cannot be explained by feelings of working hard, thinking it will help, or increased awareness of self-control.** Hence other models that suggest the effects of practicing self-control lead to improved self-control through changes in self-awareness, confidence, or expectations that it should help alone are not enough to explain the improvement in smoking outcomes observed in the present study."

"Practicing may also lead to greater willingness to use available resources [...] or tolerate distress"

Affect regulation—the more capable one is at distress tolerance the more effective they will be at regulating urges and considering the bigger picture. And, importantly, to 'stick to it' once started.

Final reflections: Years ago I wrote on the relationship between willpower and addiction. Much of the inspiration for that book was Baumeister's work—the same guy who has worked closely with Muraven to research self-regulation and control in habit formation. Baumeister cited Muraven's study in his

book *Willpower: Rediscovering The Greatest Human Strength*, among many other studies, arguing that were we to set our minds to build this muscle we'd be in a much better place. One of my favourite quotes from the book: "The shift in people's characters was noticed by a psychoanalyst named Allen Wheelis, who in the late 1950s revealed what he considered a dirty little secret of his profession: **Freudian therapies no longer worked the way they were supposed to.** In his landmark book, *The Quest for Identity*, Wheelis described a change in character structure since Freud's day. The Victorian middle-class citizens who formed the bulk of Freud's patients had intensely strong wills, making it difficult for therapists to break through their ironclad defenses and their sense of what was right and wrong. Freud's therapies had concentrated on ways to break through and let them see why they were neurotic and miserable, because once those people achieved insight, they could change rather easily. By midcentury, though, people's character armor was different. Wheelis and his colleagues found that people achieved insight more quickly than in Freud's day, but then the therapy often stalled and failed. *Lacking the sturdy character of the Victorians, people didn't have the strength to follow up on the insight and change their lives.*"

I've seen the latter in my own clinical practice: the mere suggestion of trying the relatively simple exercises like those delivered in the above study requires can turn an eyebrow.

These notes were collected by psychotherapist and author Emil Barna in January 2026 in his efforts to assist with professional development and further education for himself and those who read them. But remember, they are but a glimpse of what the article is actually about—for more context, read it at length and make up your own mind. You can find out more about Emil by visiting www.barnacc.com

**"A text without a context is a pretext to a proof text."
—Dr. Don Carson**

