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David S. Black, Ph.D.

Highlights by
Seth Segall, Ph.D.

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Interventions

Articles testing the applied science and implementation of mindfulness-based interventions

Bagherzadeh, R., Sohrabineghad, R., Gharibi, T.,...Vahedparast, H. (2022). **Effects of mindfulness-based stress reduction training on rumination in patients with breast cancer.** *BMC Women's Health.* [\[link\]](#)

Brann, L. S., Razza, R. A., & Smith, C. S. (2022). **The Feasibility and Preliminary Effectiveness of a Mindfulness Intervention on Preschooler's Executive Function and Eating Behaviors.** *Early Education and Development.* [\[link\]](#)

Donnelly, K. Z., Nelson, J., Zeller, S., ...& Davis, D. (2022). **The feasibility, acceptability, and effectiveness of the multimodal, community-based LoveYourBrain Retreat program for people with traumatic brain injury and caregivers.** *Disability and Rehabilitation.* [\[link\]](#)

Ferreira-Valente, A., Van Dyke, B. P., Day, M. A., ...& Jensen, M. P. (2022). **Immediate Effects of Hypnosis, Mindfulness Meditation, and Prayer on Cold Pressor Outcomes: A Four-Arm Parallel Experimental Study.** *Journal of Pain Research.* [\[link\]](#)

Garrote-Caparrós, E., Lecuona, Ó., Bellosta-Batalla, M., ...& Cebolla, A. (2022). **Efficacy of a mindfulness and compassion-based intervention in psychotherapists and their patients: Empathy, symptomatology, and mechanisms of change in a randomized controlled trial.** *Psychotherapy.* [\[link\]](#)

Hanson, P., Villarreal, M., Khan, M., ...& Sankar, S. (2022). **Effect of an Online Mindfulness Course for Hospital Doctors During COVID-19 Pandemic on Resilience and Coping.** *Journal of Primary Care & Comm Health.* [\[link\]](#)

Kang, M. Y., Nan, J. K. M., & Yuan, Y. (n.d.). **Effects and mechanisms of an online short-term audio-based mindfulness program on positive affect: A randomized controlled trial including exploratory moderator analyses.** *Applied Psychology: Health and Well-Being.* [\[link\]](#)

Lenze, E. J., Voegtler, M., Miller, J. P., ...& Wetherell, J. L. (2022). **Effects of Mindfulness Training and Exercise on Cognitive Function in Older Adults: A Randomized Clinical Trial.** *JAMA.* [\[link\]](#)

Liu, F., Zhang, Z., Liu, S., & Feng, Z. (2022). **Effectiveness of brief mindfulness intervention for college students' problematic smartphone use: The mediating role of self-control.** *PLOS ONE.* [\[link\]](#)

Pepe, R. B., Coelho, G. S. de M. A., Miguel, F. da S., ...& Melo, M. E. de. (2022). **Mindful eating for weight loss in women with obesity: A randomized controlled trial.** *British Journal of Nutrition.* [\[link\]](#)

Possemato, K., Bergen-Cico, D., Buckheit, K., ...& Pigeon, W. R. (2022). **Randomized Clinical Trial of Brief Primary Care-Based Mindfulness Training Versus a Psychoeducational Group for Veterans With Posttraumatic Stress Disorder.** *The Journal of Clinical Psychiatry.* [\[link\]](#)

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Puthusserry, S. T., & Delariarte, C. F. (2023). **Development and implementation of mindfulness-based psychological intervention program on premenstrual dysphoric symptoms and quality of life among late adolescents: A pilot study.** *Journal of Affective Disorders Reports.* [\[link\]](#)

Rana, M., Bock, L., Riedel, E., ...& Rana, M. (2022). **The Effectiveness of a Four-Week Online Mindfulness Training Course on Individual Mindfulness Skills and Personal Perception of Stress in Company Employees Working from Home.** *International Journal of Environmental Research and Public Health.* [\[link\]](#)

Terzioğlu, Z. A., Çakır-Çelebi, S. G., & Yıldız, M. (2022). **Effect of online mindfulness-based physical exercise program on psychological well-being and life satisfaction during the Covid-19 pandemic.** *Current Psychology.* [\[link\]](#)

Associations

Articles examining the correlates and mechanisms of mindfulness

Chen, X., & Reed, P. (2022). **The effect of brief mindfulness training on the micro-structure of human free-operant responding: Mindfulness affects stimulus-driven responding.** *Journal of Behavior Therapy and Experimental Psychiatry.* [\[link\]](#)

Cochran, L. M., & Parker Peters, M. (2023). **Mindful preparation: An exploration of the effects of mindfulness and SEL training on pre-service teacher efficacy and empathy.** *Teaching and Teacher Education.* [\[link\]](#)

Dambrun, M., Martinon, L., Juneau, C., ...& Pellerin, N. (2022). **Changes in Self-Location During the Practice of Mindfulness Meditation in Novices.** *Mindfulness.* [\[link\]](#)

Herschel, E., Hennessy, S., Cahn, B. R., ...& Habibi, A. (2022). **Effects of Online Choir or Mindfulness Interventions on Auditory Perception and Well-Being in Middle- and Older-Aged Adults During the COVID-19 Pandemic: A Randomized Controlled Trial.** *Music & Science.* [\[link\]](#)

Llaneza, D. H., Llaneza, A. J., & Kozlov, E. (2022). **Perceived Benefits and Barriers of mHealth Mindfulness Use for Caregivers of Older Adults with Cognitive Impairment: A Qualitative Exploration.** *Clinical Gerontologist.* [\[link\]](#)

Nardi, W. R., Elshabassi, N., Spas, J., ...& Loucks, E. B. (2022). **Students experiences of an 8-week mindfulness-based intervention at a college of opportunity: A qualitative investigation of the mindfulness-based college program.** *BMC Public Health.* [\[link\]](#)

Piovesan, A., Mirams, L., Poole, H., & Ogden, R. (2022). **The effect of mindfulness meditation on the perceived duration of pain.** *Journal of Cognitive Psychology.* [\[link\]](#)

Sakki, S. E., Penttinen, H. M., Hilgert, O. M., ...& Raevuori, A. (2022). **Mindfulness is associated with improved psychological well-being but no change in stress biomarkers in breast cancer survivors with depression: A single group clinical pilot study.** *BMC Women's Health.* [\[link\]](#)

Schroter, F. A., Siebertz, M., & Jansen, P. (2022). **The Impact of a Short Body-Focused**

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Meditation on Body Ownership and Interoceptive Abilities. *Mindfulness.* [\[link\]](#)

Williams, S., Clarke, S., & Edginton, T. (n.d.). **Mindfulness for the self-management of negative coping, rumination and fears of compassion in people with cancer: An exploratory study.** *Cancer Reports.* [\[link\]](#)

Methods

Articles developing empirical procedures to advance the measurement and methodology

Aliyari, R., Mirrezaie, S. M., Kazemeini, T., ...& Azizi, A. (2022). **Effect of psychosocial interventions on risky driving behaviours among offender drivers by using simulated and real driving: Study protocol for a non-randomised controlled trial.** *Injury Prevention.* [\[link\]](#)

Bigelow, L. B. (2022). **Mindfulness Meditation Programs Informed by Transgender Youth.** *Mindfulness.* [\[link\]](#)

Ch, N. A. N., Ansah, A. A., Katrahmani, A., ...& Lee, J. D. (2023). **Virtual nature experiences and mindfulness practices while working from home during COVID-19: Effects on stress, focus, and creativity.** *International Journal of Human-Computer Studies.* [\[link\]](#)

Courbet, O., Daviot, Q., Kalamarides, V., ...& Villemonteix, T. (2022). **Promoting psychological well-being in preschool children: Study protocol for a randomized controlled trial of a mindfulness- and yoga-based socio-emotional learning intervention.** *Trials.* [\[link\]](#)

Donovan, M. O., Briscoe-Hough, K., Barkus, E., ...& Pickard, J. A. (2022). **Mindfulness and Imagery Enhanced Behavioral Parenting: Effectiveness Pilot of the Confident Carers Cooperative Kids Program.** *Journal of Child and Family Studies.* [\[link\]](#)

Garland, E. L., Roberts, R. L., Hanley, A. W., ...& Keefe, F. J. (2022). **The Mindful Reappraisal of Pain Scale (MRPS): Validation of a New Measure of Psychological Mechanisms of Mindfulness-Based Analgesia.** *Mindfulness.* [\[link\]](#)

Hadash, Y., Ruimi, L., & Bernstein, A. (2022). **Looking inside the black box of mindfulness meditation: Investigating attention and awareness during meditation using the mindful awareness task (MAT).** *Psychological Assessment.* [\[link\]](#)

Jennings, P. A. (2023). **Minding the Gap: Attending to Implementation Science and Practice in School-Based Mindfulness Program Research.** *Mindfulness.* [\[link\]](#)

Kariyawasam, L., Ononaiye, M., Irons, C., & Kirby, S. E. (2022). **Exploring the Cross-cultural Applicability of a Brief Compassionate Mind Training: A Study Comparing Sri Lankan and UK People.** *Mindfulness.* [\[link\]](#)

Lee, Y.-H., Chang, Y.-P., Lee, J.-T., ...& Lai, L.-J. T. (2022). **Heart rate variability as an indicator of the beneficial effects of Qigong and mindfulness training on the mind-body well-being of cancer survivors.** *Supportive Care in Cancer.* [\[link\]](#)

Li, Y., Nazari, N., & Sadeghi, M. (2022). **Internet delivered, non-inferiority, two-arm,**

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assessor-blinded intervention comparing mindfulness-based stress reduction and cognitive-behavioral treatment for insomnia: A protocol study for a randomized controlled trial for nursing staff with insomnia. *Trials.* [\[link\]](#)

LoBasso, M., Jones, I. A., Shapiro, J., ...& Wray, A. (2022). **The impact of a mindfulness bracelet on emotional affect in medical students: A prospective cohort study.** *BMC Medical Education.* [\[link\]](#)

Nguyen, H. T. M., Nguyen, H. V., & Bui, T. T. H. (2022). **The psychometric properties of the Vietnamese Version of the Five Facet Mindfulness Questionnaire.** *BMC Psychology.* [\[link\]](#)

Redquest, B., Tint, A., St. John, L., ...& Lunskey, Y. (2022). **Virtual group-based mindfulness program for autistic women: A feasibility study.** *Women's Health.* [\[link\]](#)

Ruimi, L., Amir, I., Hadash, Y., Goldstein, P., ...& Bernstein, A. (2022). **Meta-Awareness and Control of Internal Attention: A Simulated Thoughts Paradigm Investigation.** *Mindfulness.* [\[link\]](#)

van Boxtel, M. P. J., Sansom, S. A., & Kersemaekers, W. (2022). **Intervention Fidelity in Mindfulness-Based Research and Practice: Developing Criteria to Acknowledge New Training Programs.** *Global Advances in Health and Medicine.* [\[link\]](#)

Warschburger, P., Wortmann, H. R., Gisch, U. A., ...& Bergmann, M. M. (2022). **An experimental approach to training interoceptive sensitivity: Study protocol**

for a pilot randomized controlled trial. *Nutrition Journal.* [\[link\]](#)

Reviews

Articles reviewing content areas of mindfulness or conducting meta-analyses of published research

Davis, D., Carrier, B., Cruz, K., ...& Navalta, J. (2022). **A Systematic Review of the Effects of Meditative and Mindful Walking on Mental and Cardiovascular Health.** *International Journal of Exercise Science.* [\[link\]](#)

Li, P., Mao, L., Hu, M., ...& Hu, Z. (2022). **Mindfulness on Rumination in Patients with Depressive Disorder: A Systematic Review and Meta-Analysis of RCTs.** *International J Environmental Research Public Health.* [\[link\]](#)

Sosa-Cordobés, E., Ramos-Pichardo, J. D., Sánchez-Ramos, J. L., ...& Garrido-Fernández, A. (2023). **How Effective Are Mindfulness-Based Interventions for Reducing Stress and Weight? A Systematic Review and Meta-Analysis.** *International J Environmental Research and Public Health.* [\[link\]](#)

Sverre, K. T., Nissen, E. R., Farver-Vestergaard, I., ...& Zachariae, R. (2023). **Comparing the efficacy of mindfulness-based therapy and cognitive-behavioral therapy for depression in head-to-head RCTs: A systematic review and meta-analysis of equivalence.** *Clinical Psychology Review.* [\[link\]](#)

Trials

Research studies newly funded by the National Institutes of Health (DEC 2022)

None reported

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Highlights

A summary of select studies from the issue, providing a snapshot of some of the latest research

Older adults on average exhibit signs of mild cognitive impairment compared to younger adults. It is not clear how much of this normal decline in memory and cognitive functioning is inevitably due to aging, and how much might be counteracted by healthy lifestyle changes.

Lenze et al. [JAMA] conducted a large-scale, multi-site, randomized, controlled trial to test whether mindfulness meditation and/or daily exercise could reduce cognitive impairment in older adults compared to an active control group. Prior studies had shown some support for both types of intervention, and many health experts recommend exercise to counteract cognitive impairment.

The researchers randomized 585 older adults with subjective mental decline but without dementia (average age = 71 years; 72% female; 82% Caucasian) to Mindfulness-Based Stress Reduction (MBSR), an exercise group, MBSR + exercise, or a health education control. MBSR was delivered in the standard 8-week plus half-day retreat format. After the initial eight week course, participants received monthly booster classes for the remaining 16 months of the study. The program encouraged 60 minutes of daily home meditation practice throughout the length of the study.

The exercise program focused on aerobic exercise, resistance training, and functional exercises. The program met for two 1.5 hour classes weekly for the first six months, and then once weekly for the remaining 12 months of the study. A combined total of 300 minutes of exercise per week was recommended. Participants in the combined MBSR+exercise group participated in both full programs simultaneously. The health education control met for the same session length and frequency as the MBSR group and

offered a didactic curriculum focused on leading a healthy lifestyle.

Participants were assessed at baseline and 6- and 18-month follow-up on a neuro-psychological battery assessing memory and cognitive functioning as well as measures of functioning in activities of daily life and quality of life. Participants had structural MRIs taken of hippocampal volume and dorsolateral pre-frontal cortex (dlPFC) surface area and cortical thickness. Additionally, participants were assessed on measures of physical health and fitness including aerobic fitness, insulin sensitivity, body fat, plasma cortisol, sleep quality, and body strength. Retention in the trial was good, with 97% of participants completing the 6-month assessment and 81% completing the 18-month assessment.



The results showed no significant differences between study groups on memory and cognitive function at either 6- or 18-month follow-up. All groups showed a reduction in hippocampal volume and dlPFC surface area and cortical thickness at 18 months consistent with normal atrophy due to aging. Contrary to expectation, the reduction in hippocampal volume was significantly greater in the MBSR group. Only the exercise groups showed significant improvement in aerobic fitness, physical strength, and sleep quality over time.

The study showed that, relative to a health education curriculum, neither mindfulness nor exercise improved memory or cognitive functioning or slowed brain tissue atrophy in this cohort of older adults with subjective cognitive complaints. The study participants were mostly college educated, Caucasian females with no evidence of dementia, and these findings may not generalize to clinical populations.

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Some types of human behavior are habit-like. That is, an individual will respond to a stimulus with little-to-no awareness of the reward for performing the behavior. Other responses appear to be more intentional and goal directed. That is, an individual acts with conscious awareness of the relationship between the behavior and likely rewards. Mindfulness training may make people more sensitive to and aware of reward contingencies, thereby giving them greater control over their behavior.

Chen & Reed [Journal of Behavior Therapy and Experimental Psychiatry] performed an experiment to see whether a brief mindfulness intervention could make an operantly conditioned behavior less like habitual and more like goal-directed behavior. Goal-directed behaviors are more under conscious control, more easily guided by verbal behavior, and more easily deliberately modified.

The researchers randomly assigned 52 meditation-naïve college undergraduates (average age = 20 years; 64% female) to a mindfulness, mind-wandering, or “no treatment” condition. The mindfulness condition involved 15 minutes of breath-focused meditation after one-time brief verbal instruction. Mind-wandering participants were told to “let their mind wander” for 15 minutes. “No treatment” participants were given 15 minutes to do whatever they wanted (look at their phones, read, rest, etc.). After the 15 minutes were up, participants engaged in a conditioning “game” on a computer. The aim of the game was to earn as many points as possible by pressing a computer space bar, but participants were not informed about how many or what frequency of space bar presses would earn points and had to learn the optimal strategy by experience.

The researchers compared rates of responding to random ratio versus random interval reward schedules following a mindfulness, mind-wandering, or control intervention. Ratio schedules provide

rewards after a set number of responses, while interval schedules provide rewards for responses after a set time interval has elapsed. Behavior typically occurs in bursts of activity called “bouts.” The initial response at the onset of a bout (“bout-initiation”) is “habit-like” in that it is relatively insensitive to reinforcement schedules. Responses after a bout has already begun (“within-bout” behavior) are more sensitive to reinforcement schedule and more goal directed. Within-bout response rates are higher during ratio than interval reward schedules, while bout-initiation rates are the same for either schedule. The researchers sought to discover whether mindfulness training could make bout-initiation responses more sensitive to the influence of reward schedule.



Participants started off with 100 points and pressed the computer space bar to earn additional points. Each space bar press cost 1 point, but if they were on a trial for which a reward was available, the space bar press earned 40 points. There were four eight-minute periods of play with each period divided into 4 minutes on a ratio schedule followed by 4 minutes on an interval schedule. The changeover from ratio to interval was signaled by a color change in a box on the computer screen. The number of reward points available within each 4-minute interval schedule was yoked to the number of reward points received during the prior ratio schedule.

The results showed that, as expected, overall response rates were significantly higher during the ratio than during the interval schedule ($\eta^2 p = .72$) for all groups. Also, as expected, within-bout response rates were higher during ratio than interval without any between experimental group differences. Most importantly, bout-initiation rates were the same for the ratio and interval schedules for the mind-wandering and

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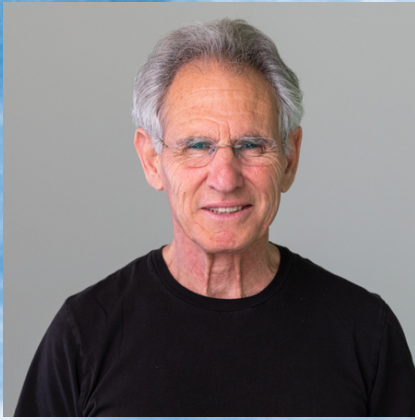
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control groups but not for the mindfulness group ($\eta^2p = .12$). The mindfulness group alone had a significantly higher rate of bout-initiation responses to the ratio than the interval schedule ($\eta^2p = .26$).

The study shows that a brief mindfulness meditation can make habit-like behavioral responses more sensitive to reward schedules. This supports the hypothesis that mindfulness increases awareness of previously unconscious reward contingencies related to performing a behavior. The researchers did not check to see if there was a difference to the extent in which participants in different groups could verbalize their awareness of the reward contingencies in relation to their behavior.



Join Jon Kabat-Zinn & Rebecca Eldridge

The Virtues and Challenges of Lying Down Meditation

Workshop

Join Jon Kabat-Zinn and Rebecca Eldridge on **Thursday, January 26th** as they discuss the virtues, challenges, and opportunities of lying down meditation. Jon will also guide a brief period of lying down practice, and engage in dialogue with participants about their experiences. This is an opportunity to explore what lying down meditation practices might hold for you. Then, return on **Thursday, March 2nd** for a follow-up session in which we will share our experiences and both the virtues and challenges of this kind of mindfulness practice.

Teachers

Jon Kabat-Zinn is the founder of mindfulness-based stress reduction (MBSR) and author of *Full Catastrophe Living*. He is also professor emeritus of medicine and the creator of the Stress Reduction Clinic and the Center for Mindfulness (CFM) in Medicine, Health Care, and Society at University of Massachusetts Medical School.

Rebecca Eldridge served as senior teaching faculty at the CFM at University of Massachusetts Medical School and also co-founded East Coast Mindfulness. She developed the first interactive live online version of MBSR and trained CFM faculty to teach it; she continues to train MBSR teachers globally. Before teaching mindfulness, she taught at Christopher Newport University in Virginia and served as a home hospice volunteer.

Cost

By donation. 80% of donations go to Edmarc, the first hospice created in the US specifically for children with life-threatening illnesses.

NOTE: Both sessions will be video-recorded and shared with everyone who registers.

Register

Donate online: www.eastcoastmindfulness.com

Email info@eastcoastmindfulness.com if you have questions.

