U.S. POINTER Study — Executive Summary

U.S. Study to Protect Brain Health Through Lifestyle Intervention to Reduce Risk

Background

Launched by the Alzheimer's Association to test whether multidomain lifestyle interventions targeting modifiable risk factors can protect cognitive function in older adults who are at increased risk for cognitive decline.

Study Design

2-year randomized controlled trial at 5 U.S. sites. Enrolled ~2,100 adults aged 60–79 at increased risk due to sedentary behavior, suboptimal diet, family history of memory loss, and cardiometabolic risk factors. The population was intentionally diverse.

Interventions

- **Structured (high-intensity):** 38 facilitated team meetings; prescribed aerobic exercise 4×/week, resistance training 2×/week, MIND diet, BrainHQ cognitive training 3×/week, biannual cardiovascular monitoring.
- **Self-Guided (low-intensity):** 6 facilitated peer meetings; publicly available educational materials and general encouragement only.

Primary Outcome

Global cognition composite score (mean of executive function, episodic memory, and processing speed z-scores), assessed at baseline and every 6 months.

Key Results

- **Primary finding:** Both groups improved, but the structured intervention yielded significantly greater benefit (+0.029 SD/year vs. self-guided; $p < 0.001$).
- **Cognitive domains:** Executive function and processing speed drove the effect; episodic memory did not differ between groups — consistent with FINGER trial findings.
- **Subgroups:** Benefits were consistent across APOE ε4 status, age, sex, and cardiometabolic health. Participants with lower baseline cognition benefited most.
- **Safety:** High adherence; serious adverse events were similar (structured 12% vs. self-guided 14%).
- **Frailty:** Structured intervention also reduced deficit accumulation frailty more than self-guided (mean difference −0.014; $p < 0.0001$).

Limitations

Not powered to assess conversion to dementia. No no-intervention control group — practice effects and general trial participation cannot be excluded. Clinical significance requires further investigation.

Implications

Confirms that structured, multidomain lifestyle interventions can be safely delivered to at-risk older adults, with greater intensity producing superior cognitive benefits. Results have broad implications for public health and dementia prevention strategies.

Ongoing Research

Continued analyses include POINTER Imaging biomarker substudies (MRI/PET), functional outcomes, and a 4-year Alumni Extension follow-up to assess long-term impact and mechanisms.

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Key reference: *Baker, L. D., et al. (2025). JAMA, 334(8), 681–691. https://doi.org/10.1001/jama.2025.12923*

Reflect: Check Your McCance Brain Care Score (BCS) - Scan QR Code

A 21-point tool measuring 12 modifiable risk factors — higher scores mean better brain health and meaningfully lower risk of dementia, stroke, and depression.

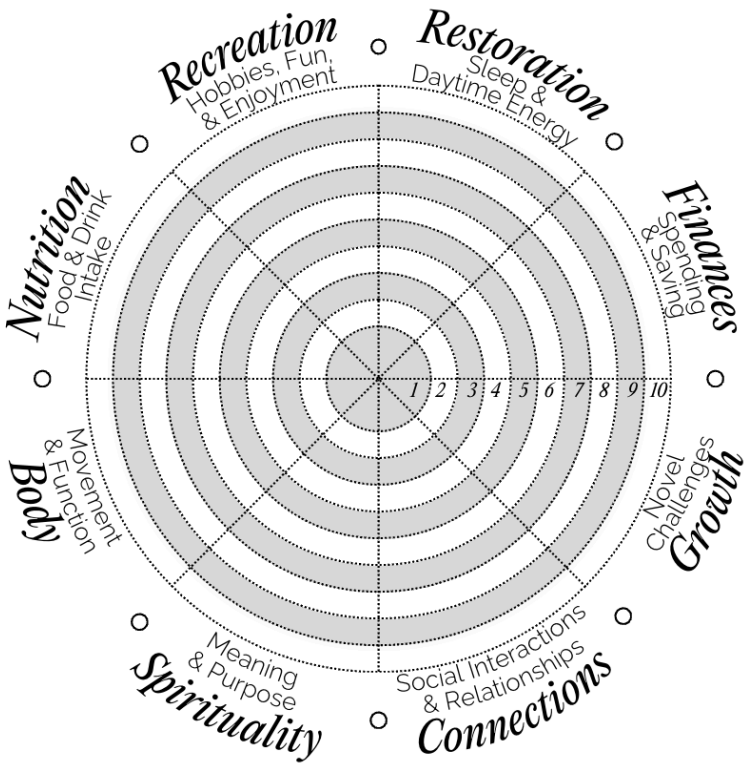
What a 5-point improvement is associated with:

- 59% lower dementia risk
- 48–52% lower stroke risk
- 33% lower depression risk
- 43% lower cardiovascular disease risk
- Works regardless of your genetic risk (including APOE ε4)
- Every 1-point annual increase → 4% lower risk of all three conditions

Reflect: Circle of Vitality (Balanced Brain, 2025)

1 = Much room to grow
10 = Thriving

Step 1: Reflect on well being in each domain *right now*. Mark it with a dot, upon completing all the domains, connect all the dots.
Step 2: Reflect on your ideal for each domain, mark that with a second dot, and connect all the dots.



Optimize - Goal Setting

Reflect on your answers above, develop 3 goals or habits you want to work on in the next 30 days. Aim to make goals SMART: **S**pecific, **M**easurable, **A**ttainable, **R**ealistic/**R**elevant, **T**ime Bound.

1. _____

2. _____

3. _____

Singh, S. D., Oreskovic, T., Carr, S., et al. (2023). The predictive validity of a brain care score for dementia and stroke: Data from the UK Biobank cohort. Frontiers in Neurology, 14, 1291020. https://doi.org/10.3389/fneur.2023.1291020