

Editorial

High-Risk Factors for Brain Aging

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Editorial

The overall health of the US population has been improving for the last 100 years. People are living longer although healthcare disparities continue. By 2050, the number of US adults over 40 living with dementia is projected to increase from 5.2 million people to 10.5 million, according to The Lancet published in January 2022. The number of people with dementia will be nearly tripling globally. Dementia is an escalated cost in healthcare, social welfare and emotional and financial burdens to the caregivers.

Lowering the risk factors for older adults is a step forward in improving lifestyle. The 12 risk factors most often mentioned may assist in preventing 40% of dementia cases worldwide. These factors are low education, hypertension, hearing impairment, smoking, obesity, depression, physical inactivity, diabetes, low social contact, excessive alcohol consumption, traumatic brain injury and exposure to air pollution [1].

There are clinical factors, such as peripheral artery diseases, such as strokes, infarcts and white matter hyperintensities that can also increase the likelihood of developing Alzheimer's or vascular dementia [1].

Stressful life events activate psychological responses in us. Individuals with a previous history of mental health are a risk factor for Alzheimer's. Stressful life events during midlife and childhood are correlated with an increased risk of Alzheimer's disease and neuroinflammation as one of the studies published in Annals of Neurology.

Chronic musculoskeletal pain is a characteristic of persistent pain in different parts of the body which is a leading cause of disability worldwide. And impacts a person's brain. Older adults with chronic musculoskeletal pain experience a greater rate of cognitive decline and higher dementia risk [2].

The SLC39A8 gene demonstrated pleiotropy between brain aging accelerations and KOA. These are highly expressed in microglial cells and astrocytes which were meant to enhance synaptic structure and neurodevelopment [2].

On the elderly T2DM population and examine the role of sarcopenia as a confounding factor in dementia. T2DM patients with sarcopenia had a significantly higher risk of developing dementia compared with those without sarcopenia [3]. Despite the unique characteristics of our study population, findings align with the growing body of evidence suggesting that sarcopenia may be a common risk factor for cognitive decline, irrespective of diabetes status [3].

In the field of primary care, probably, more than 50% of patients with cognitive impairment remain incorrectly diagnosed due to lack of access or tools [4]. As anti-A β trials move toward targeting a preclinical population with a lower prevalence of A β abnormalities, a cost-effective screening tool. targeting p-tau217 in blood has yielded the best results as a diagnostic and prognostic tool the important role of plasma p-tau217 as an initial screening tool in the management of cognitive impairment by underlining those who may benefit from anti-amyloid immunotherapies [4].

Checklist After Diagnosis with Alzheimer's or Dementia Related Diseases:

Mood Assessment completed by a mental health professional.

Follow up with your doctor or advanced practice practitioner.

Find support and services. The local chapter of the Alzheimer's Association at 800 272 3900 and the Eldercare Locator at 1 800 677-1116.

Consult with an Elder Law Attorney to determine whether your living will, health care proxy and finances are all in order. Consult with an occupational therapist to determine if your home is safe. Contact the American Occupational Therapy Association.

Living A Healthier and Longer Life

Resistance training is good for brain health and reduces depression and early bilingualism helps to protect against age-related declines, making friends, quitting smoking, cuddling with pets and regular snoozing help you to live longer, foods that are rich in a diet of healthy fruits and vegetables, whole grains, olive oil and fish, eat like an Okinawan which is 80% of the plate, 2.5 hr of regular moderate physical activity a week, sunlight keeps your brain healthy, spiritual participation, let off anger and practice forgiveness, sleepy hygiene of sleeping 7-9 hrs a day, avoid alcohol, caffeine, electronics for better sleep, practice mindfulness, box breathing 4-4-4-4, yoga and Ikigai, having a sense of purpose and meaning in life.

In the field of aging and psychology, you don't have to go to college to play puzzles, just keep the scores and compare how you did today to tomorrow with yourself and others.

There is research determined that higher compliance to the Mediterranean-Dash Intervention for Neurodegenerative Delay diet (MIND) decelerated the pace of aging as measured by DunedinPACE and reduced risks for dementia and mortality as per Daniel Belsky, Ph.D., at Columbia School of Public Health and the Columbia Aging Center and author of the study.

Conflict of Interests

Author declares that there is no conflict of interest for this paper.

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