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Healthy childhood diet can 'keep mind sharp into 70s' and ward off dementia

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A healthy diet earlier in life could help keep you mentally sharp into your 70s, and even ward off dementia, according to research that followed thousands of Britons for seven decades.



While most studies on diet and cognitive ability have focused on people already in or reaching old age, the new review was the first to track people throughout their life – from the age of four to 70 – and suggests the links may start much earlier than previously recognised.

The research adds to a growing body of evidence that a healthy diet could reduce the risk of Alzheimer's disease and slow age-related cognitive decline. The findings were presented at the annual meeting of the American Society for Nutrition.

"These initial findings generally support current public health guidance that it is important to establish healthy dietary patterns early in life in order to support and maintain health throughout life," said Kelly Cara, of Tufts University in Massachusetts.

"Our findings also provide new evidence suggesting that improvements to dietary patterns up to midlife may influence cognitive performance and help mitigate, or lessen, cognitive decline in later years."

Cognitive performance can still improve well into middle age, but typically begins to decline after age 65, the researchers said. More serious conditions such as dementia can also develop alongside age-related decline.

For the new research, scientists studied 3,059 adults from the UK who were enrolled as children in a study called the National Survey of Health and Development. Members of the cohort, called the 1946 British Birth Cohort, have provided data on dietary intakes, cognitive outcomes and other factors via questionnaires and tests over more than 75 years.

Researchers analysed participants' diet at five time points in relation to their cognitive ability at seven time points. Dietary quality was closely linked with trends in cognitive ability, they found.

For example, only 8% of people with low-quality diets sustained high cognitive ability and only 7% of those with high-quality diets sustained low cognitive ability over time compared with their peers.

Cognitive ability can have a significant impact on quality of life and independence as people age, the researchers said. For example, by the age of 70, participants in the highest cognitive group showed a much higher retention of working memory, processing speed and general cognitive performance compared with those in the lowest cognitive group.

In addition, nearly a quarter of participants in the lowest cognitive group showed signs of dementia at that time point, while none of those in the highest cognitive group showed signs of dementia.

While most people saw steady improvements in their diet throughout adulthood, the researchers noted that slight differences in diet quality in childhood seemed to set the tone for later life dietary patterns, for better or worse.

“This suggests that early life dietary intakes may influence our dietary decisions later in life, and the cumulative effects of diet over time are linked with the progression of our global cognitive abilities,” Cara said.

Study participants who sustained the highest cognitive abilities over time relative to their peers tended to eat more recommended foods such as vegetables, fruits, legumes and whole grains, and less sodium, added sugars and refined grains.

“Dietary patterns that are high in whole or less processed plant-food groups including leafy green vegetables, beans, whole fruits and whole grains may be most protective,” said Cara.

“Adjusting one’s dietary intake at any age to incorporate more of these foods and to align more closely with current dietary recommendations is likely to improve our health in many ways, including our cognitive health.”