Submission Id: 3075

Title
Older Adults’ Willingness to Take Magnesium to Treat Depression

Priority 1 (Research Category)
Behavioral, psychosocial, and mental illness

Presenters
Benjamin Littenberg, MD, Lisa Natkin, PhD, Emily Tarleton, PhD, RD, Haley Mason, Alexander Miller, Jessica Clifton, PhD

Abstract
Context: Depression affects up to 15% of community-dwelling older adults. Late-life depression is frequently underdiagnosed and undertreated. When depression in older adults is identified, up to 80% of treatment occurs in primary care. Currently available treatments have significant limitations (e.g., modest effectiveness, high costs, adverse effects, poor adherence, and social stigma), therefore additional treatment options are essential. Over the counter magnesium chloride is inexpensive, widely available, generally safe, well-absorbed, and was efficacious in prior studies, often within 2 weeks.
Objective: To collect background information on magnesium supplement use and acceptability in older adults with a depression.
Study Design: Online survey.
Setting or Dataset: National sample.
Population studied: Adults 65 and older living in the United States currently experiencing symptoms of depression based on Patient Health Questionnaire (PHQ-2) results.
Outcome Measures: The primary outcome was willingness to take magnesium supplements instead of prescription medication for the treatment of depression. Secondary measures included current supplement use, comfort level with taking magnesium to treat depression, and whether they think magnesium would help improve symptoms of depression.
Results: Of 153 respondents, 97 (63%) were female, 143 (93%) identified as white, and 130 (85%) were between the ages 65 and 75 years. 112 (73%) took a supplement daily, including 15 (10%) taking magnesium. 50 (33%) were currently being treated for depression. On a 4-point Likert scale ranging from “Strongly Agree” to “Strongly Disagree,” 83% of respondents “Agreed” or “Strongly Agreed” in terms of their willingness to take magnesium instead of a prescription medication. A majority also “Agreed” or “Strongly Agreed” that they were willing (89%) and comfortable (89%) with taking magnesium to treat depression and also that it would improve symptoms of depression (73%). Women were more likely to agree with these statements (p<0.05), but there were no differences based on age or current treatment for depression.
Conclusions: A majority of older community-dwelling adults are willing to take magnesium for the treatment of depression. Many adults are already taking at least 1 over the counter supplement daily. Further research is needed to determine the efficacy of magnesium supplements as an alternative treatment option in this population.