Depression and Dementia in Older Adults: Associations in Oral Health

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Abstract

Objective: Psychological state and behavioral health have important implications for oral health behaviors. While there is a growing research effort addressing the connections between mental health status and oral health, there is a need to study such relations among older adults with dementia living in rural, low-income, and underserved areas. The present study explored the relations of oral health, general health, depression, and dementia among older adults with dementia in Appalachia.

Method: Participants were 87 older adults, ages 69-100 years (SD=8.90, 67±0.0). Oral disease is now implicated in peptic ulcers, respiratory and cardiovascular illness. Poor oral health appears to contribute to the decline of quality of life. Pain and difficulty with eating can lead to poor levels of nutrition. Although clinical evaluations did not show significant differences in the self-perceived evaluations even if they have mild to moderate dementia, it is important for the healthcare providers pay attention to the patients for total caries, total missing teeth or ratio caries/total remaining teeth. Depressed participants reported higher caries and increased number of missing teeth compared to the non-depressed participants, this difference, however, did not reach statistical significance.

Results

The study was approved by the Institutional Review Board (IRB) for Health Sciences at West Virginia University, Morgantown, WV. The criteria for participating in this study included those who live in one of the 55 counties in West Virginia, are 65 years or older, dentate (have at least 4 remaining natural teeth), have been diagnosed with mild to moderate dementia, and are living independently in communities or in assisted living facilities. The participants must be able to care for themselves in daily activities except with some assistance if physical limitations exist or with some household chores. Each participant completed an oral evaluation by a licensed dentist which includes number of missing teeth, number and type of restorations, caries, plaque scores and gingival health conditions. Each participant completed a 15 question Geriatric Depression Scale (GDS) questionnaire. A score of 5 and above suggests depression. An informant for the participant also provided information on the participant’s medical history, oral health practices, and cognitive and functional performances.

Conclusions

- The self-perceived oral health and general health in this population of non-institutionalized older adults with mild to moderate dementia showed positive correlation with their mental health status.
- Although clinical evaluations did not show significant differences between mental and health status, self- report of the oral health conditions in this population can be reliable; they correlate with the number of missing teeth and selected oral behaviors.
- Mental state may interfere with the incidence and progression of oral diseases and results of dental treatments. Depressed patients tend to have poorer oral hygiene behavior and need more assistance in oral health care.
- Older adults with dementia who have higher caries incidences report poorer oral health related quality of life. Although our small sample size did not show correlations between quality of life and depression, it is important for the healthcare providers pay attention to the patients for total caries, total missing teeth or ratio caries/total remaining teeth.