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Different Quality of Life Between GERD and Barrett's Esophagus

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Summary

Lippmann et al.[1] published a report entitled "Quality of life in GERD and Barrett's esophagus is related to gender and manifestation of disease" in the September issue of American Journal of Gastroenterology in 2009.

Authors carried out a cross-sectional analysis of data from a case-control study of Barrett's esophagus (BE) and gastroesophageal reflux disease (GERD) patients to examine whether patients with BE have different health-related quality of life (HRQoL) than patients with erosive reflux disease (ERD) and non-erosive reflux disease (NERD), after controlling for patient's perception of GERD symptom severity. Participants completed questionnaires assessing generic HRQoL [medical outcomes study short form-36 (SF-36)], disease-specific HRQoL [gastrointestinal quality of life index (GIQLI)], a measure of psychological distress (the Revised Hopkins Symptom Checklist: SCL-90R), and a patient-centered assessment of the impact of disease severity [the GERD health-related quality of life measure (GERD HRQL)]. Patients with BE had the lowest symptom severity compared with those suffering from NERD or ERD. Those with BE also had better disease-specific quality of life compared with NERD or ERD patients. After adjusting for potential confounding variables including symptom severity and gender, BE patients continued to demonstrate better disease-specific HRQoL (GIQLI) than NERD or ERD patients, as well as better generic HRQoL (SF-36) than NERD or ERD patients. There were no significant differences between groups in psychological distress, as demonstrated by the SCL-90R global severity index, although BE patients scored lower on the somatization domain compared with NERD and ERD patients. When stratified by gender, females with NERD and BE had worse disease-specific HRQoL (GIQLI) than males. This finding suggests that patients with BE have better generic and disease-specific HRQoL when compared with patients suffering from NERD and ERD. In addition, female was associated with worsened HRQoL regardless of GERD disease manifestation.

Comment

Symptoms associated with GERD include heartburn, acid regurgitation, and chest pain, as well as "extraesophageal" manifestations such as nausea, chronic cough, asthma, and hoarseness. All of these symptoms may compromise HRQoL. In addition, sleep disturbance and associated daytime sleepiness, decrease in

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mealtime enjoyment, and increased medication costs may contribute to the burden of disease. Whereas the negative effect of GERD alone on HRQoL has been examined in numerous studies,[2-4] the HRQoL of BE has been less well studied.[5,6] Although their histological manifestation is less severe, NERD patients have been shown to have severe impairment in HRQoL.[7] In this study, previously validated tools were used to assess HRQoL (SF-36, GIQLI)[8-10] and psychological stress (SCL-90R)[11,12] and authors have controlled the potentially confounding factors including GERD symptom severity (GERD-HRQL).[13]

Interestingly, this study showed that patients with BE to have better generic and disease-specific HRQoL compared to those with NERD or ERD. After adjusting for symptom severity, this difference was statistically significant as when measured by the GIQLI, and the SF-36 physical component summary. There were few differences between groups with respect to the SCL-90-R; apart from the finding of BE patients to have somewhat less somatization than other groups. These findings suggest that the HRQoL decrement in BE is related to loss-of-function secondary to physical symptoms, but not psychological distress. As BE patients presumably had true acidic insults to their esophagus in the past to have undergone metaplasia, the NERD patients might be expected to have the best HRQoL, as their disease manifestation would be the least severe. However, NERD patients showed the worst quality of life in this study. In addition, women in each group were observed to have worse quality of life than men on most study measures. Improved HRQoL in BE patients may be because of fewer symptoms, as some authors have described.[14] However, this observation persisted even after controlling for symptom severity. Therefore, the trends might be due to a the heightened sensitivity and symptom perception of patients with NERD.

Patients with GERD and BE in this study had a worse quality of life on every dimension of the SF-36 compared to general population.[8] Kulig et al.[6] reported a similar result to this study for BE patients. But NERD patients scored higher in the physical component summary and lower in the mental component score compared with this study. Eloubeidi et al.[5] reported no significant differences between BE and GERD with respect to either of the HRQoL measure. But, above 2 studies were not controlled by the symptom severity. Previous studies that used the SCL-90 in GERD patients reported higher scores on dimensions of somatization, obsessiveness, interpersonal sensitivity, phobia, psychosis, and the global severity index compared with healthy controls.[15,16] Although no studies were performed previously using the SCL-90R in BE patients, several studies have used the Hospital Anxiety and Depression scale to evaluate psychological symptoms.[17,18] A study reported that BE patients had higher anxiety scores than the general population, but a second study demonstrated only minimal depression and anxiety of BE patients on by the Hospital Anxiety and Depression scale.[17,18]

In conclusion, patients with GERD have worse quality of life than patients with BE, even after controlling for GERD symptoms. When stratified, females have worse quality of life than males. In addition, patients with GERD symptoms and NERD have higher levels of psychological distress.

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