Association between multimorbidity patterns and chronic pain in elderly primary care patients: a cross-sectional observational study.

Abstract:
Multimorbidity is a highly prevalent health problem, which may reduce adherence, produce conflicts in treatment, and is not yet supported by evidence-based clinical recommendations. Many older people suffer from more than one chronic disease as well as from chronic pain. There is some evidence that disease management can become more complex if multimorbid patients suffer from chronic pain. In order to better consider the patients’ comorbidity spectrum in clinical pain treatment recommendations, evidence is needed regarding which disease combinations are frequently related with the presence of chronic pain. Therefore, our aim is to identify diseases and disease combinations in a multimorbid population, which are associated with the patient-reported presence of chronic pain. Analyses are based on cross-sectional data of the MultiCare Cohort Study, an observational cohort study based on interviews with 3189 multimorbid patients aged 65+, randomly selected from 158 practices, and their GPs. The response rate was 46.2%. Data were collected in GP interviews and comprehensive patient interviews. Diseases and disease combinations associated with chronic pain were identified by CART.
(classification and regression tree) analyses performed separately for both genders. 46 chronic conditions were used as predictor variables and a dichotomized score from the Graded Chronic Pain Scale was used as outcome variable. About 60% of the study participants were female. Women more often reported chronic pain than men. The most important predictor of a higher pain level in the female population was chronic low back problems, especially if combined with chronic gastritis, hyperuricemia/gout, cardiac insufficiency, neuropathies or depression. Regarding the pain level the male population was also divided best by chronic low back problems, especially if combined with intestinal diverticulosis, neuropathies or chronic ischemic heart disease. Our analyses are a first step in identifying diseases and disease combinations that are related to chronic pain. The most important condition seems to be low back problems. Back pain and pain in other body regions seems to be interrelated with cardiometabolic conditions. In women, psychosocial issues like depression also seem to be relevant. ISRCTN89818205.