Abstract:

How to determine if a population group has better overall (multidimensional) health status than another is a central question in the health and social sciences. We apply a multidimensional first order dominance concept that does not rely on assumptions about the relative importance of each dimension. In particular, we show how one can explore the ''depth'' of dominance relations by gradually refining the health dimensions to see which dominance relations persist. We analyze a Danish health survey with many health indicators. These are initially collapsed into a single composite health dimension and then refined to four, seven, and ten health dimensions, each representing an (increasingly refined) area of health. Overall we find that younger age groups dominate older age groups in up to four dimensions, but no dominance relations are present with a more refined view of health. Comparing education groups, we often see dominance relations in four and seven dimensions, but the depth of the dominance vary considerably. We also compare groups based on gender, marital status, region, and ethnicity, where we generally find less dominance relations. Our empirical illustration shows that it is possible to operationalize and meaningfully apply the multidimensional first order dominance concept with gradual refinements of health status in up to ten health dimensions.