R in Psychometrics and Psychometrics in R

Jan de Leeuw
UCLA Statistics

In psychometrics, and in the closely related fields of quantitative methods for the social and educational sciences, R is not yet used very often. Traditional mainframe packages such as SAS and SPSS are still dominant at the user-level, Stata has made inroads at the teaching level, and Matlab is quite prominent at the research level.

In this paper we define the most visible techniques in the psychometrics area, we give an overview of what is available in R, and we discuss what is missing. We then outline a strategy and a project to fill in the gaps. The outcome will hopefully be a more prominent position of R in the social and behavioral sciences, and as a result less of a gap between these disciplines and mainstream statistics.