



CONDUCTING MULTIVARIATE ANALYSES BASED ON DATA SUMMARIES OF PUBLISHED RESEARCH

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Abstract

Most multivariate analyses use variance-covariance matrices and descriptive statistics, such as means and standard deviations, as their starting points. Inclusion of correlation matrices and descriptive statistics summaries in reporting results is recommended by journal editors and the American Psychological Association (APA) style guidelines. These descriptive data summaries in published research articles provide other researchers and graduate students in social science fields with opportunities to replicate or verify the results of the analyses without requiring access to the raw data. Developing transferable skills and increasing student-faculty collaboration make these types of analysis of published research ideal for use in classroom examples and research projects. The aim of this paper is to illustrate how to conduct various analyses, such as multiway frequency analysis, multivariate analysis of variance (MANOVA), multiple regression, and factor analysis via IBM SPSS syntax based on descriptive summary statistics reported in published research.

Keywords: Multivariate analysis, Quantitative research courses, Teaching, Replication, IBM SPSS syntax.