

1. Record Nr.	UNINA9910364956003321
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Titolo	Finite Form Representations for Meijer G and Fox H Functions : Applied to Multivariate Likelihood Ratio Tests Using Mathematica®, MAXIMA and R // by Carlos A. Coelho, Barry C. Arnold
Pubbl/distr/stampa	Cham : , : Springer International Publishing : , : Imprint : Springer, , 2019
ISBN	3-030-28790-4
Edizione	[1st ed. 2019.]
Descrizione fisica	1 online resource (xviii, 515 pages)
Collana	Lecture Notes in Statistics, , 2197-7186 ; ; 223
Disciplina	519.5 519.24 (edition:23)
Soggetti	Statistics Mathematical statistics - Data processing Statistical Theory and Methods Statistics and Computing Applied Statistics
Lingua di pubblicazione	Inglese
Formato	Materiale a stampa
Livello bibliografico	Monografia
Nota di contenuto	Preface -- Setting the Scene -- The Meijer G and Fox H Functions -- Multiple Products of Independent Beta Random Variables with Finite Form Representations for Their Distributions -- Finite Form Representations for Extended Instances of Meijer G and Fox H Functions -- Application of the Finite Form Representations of Meijer G and Fox H Functions to the Distribution of Several Likelihood Ratio Test Statistics -- Mathematica, MAXIMA and R Packages to Implement the Likelihood Ratio Tests and Compute the Distributions in the Previous Chapter -- Approximate Finite Forms for the Cases not Covered by the Finite Representation Approach -- Index.
Sommario/riassunto	This book depicts a wide range of situations in which there exist finite form representations for the Meijer G and the Fox H functions. Accordingly, it will be of interest to researchers and graduate students who, when implementing likelihood ratio tests in multivariate analysis, would like to know if there exists an explicit manageable finite form for the distribution of the test statistics. In these cases, both the exact

quantiles and the exact p-values of the likelihood ratio tests can be computed quickly and efficiently. The test statistics in question range from common ones, such as those used to test e.g. the equality of means or the independence of blocks of variables in real or complex normally distributed random vectors; to far more elaborate tests on the structure of covariance matrices and equality of mean vectors. The book also provides computational modules in Mathematica®, MAXIMA and R, which allow readers to easily implement, plot and compute the distributions of any of these statistics, or any other statistics that fit into the general paradigm described here.
