

## REMARKS FROM THE NEW EDITOR-IN-CHIEF

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# EDUCATIONAL TESTING SERVICE

It is a great honor to be chosen the editor of Psychometrika, the flagship journal of the Psychometric Society. In a remarkable coincidence, when I was chosen as the editor, my office was in Thurstone Hall that is named after L. L. Thurstone, who is one of the few individuals who were instrumental in starting the Society and the journals. The following are some thoughts on how I plan to maintain the high standards of Psychometrika.

Psychometrika started when Paul Horst and Albert Kurtz wanted to create a new journal devoted to work in quantitative psychology. Therefore, I believe that any original research in quantitative psychology is within-scope for Psychometrika. However, like any former editor, I have my own opinion on the meaning of "original research" that is of enough interest to the readers of Psychometrika. I will primarily look for articles that present sound psychometric methodology to solve practical problems in quantitative psychology, or, more generally, quantitative social and behavioral sciences, and demonstrate the methodology using simulated and real data. Studies that primarily include simulations, either to demonstrate properties of an existing method or to compare several existing methods, will be given low priority.

A major strength of Psychometrika is that the journal publishes pioneering theoretical research in quantitative psychology that often advances an area, starts a new line of research, and immensely helps researchers and practitioners. Psychometrika articles by Akaike (1987), Cronbach (1951), and Kruskal (1964) are still regularly cited by researchers interested in model selection, reliability, and multidimensional scaling, respectively. To promote this area of strength, I plan to encourage theoretical research that promises to be useful in the future even if the research does not seem to offer immediate help. One area that I would like to nurture is research that offers elegant solutions to important practical problems; examples of such papers are those published by Satorra & Bentler (2001) on a scaled difference chi-square test statistic that had a huge influence on the practice of structural equation modeling and on the field of psychometrics in general. In addition, given a recent increase in anti-testing sentiment, I would like to publish papers that emphasize learning and other positive aspects of new or existing types of assessments. I would also like to nurture papers on emerging areas including (a) psychometric modeling and machine-learning of output (including data on writing processes) from learning systems and new types of assessments, (b) use of biometrics (such as eye-tracking) in psychological measurement, (c) quantitative methods in social psychology such as social network analysis, (d) network psychometrics, (e) analysis of health-outcome data, and (f) quality-control methods.

Whenever possible, articles should include real-data analyses and explain the article's relevance to researchers and practitioners interested in quantitative psychology.

Articles lacking relevance to quantitative psychology will be referred to other outlets. When submitting an article, please try to keep it clear, concise and use efficient data displays. I believe that most Psychometrika readers are unlikely to understand a manuscript if it has too much of numerous jargons, incomplete information, and highly mathematical content. Thus, some manuscripts will be returned to the authors with a request to resubmit after making them clearer.

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#### **PSYCHOMETRIKA**

I will strongly encourage the authors to make their software code easily available to the readers. When possible, please make the data available to the readers as well. Psychometrika currently operates a Type 2 research data policy (data sharing and evidence of data sharing encouraged). To support open science policy, I will aim for Psychometrika to switch to a Type 3 research data policy (data sharing encouraged and statements of data availability required). I will work with Nidhi Kohli, the ARCS section editor, and the Editorial Council, to establish policies regarding the use of large language models. We already established policies regarding the appointment of Associate Editors.

I also support the current Psychometrika's eventual goal of becoming a fully open access journal as a transformative journal and will work with the Psychometric Society in facilitating a solution that works well for all authors. I believe that a fully open access will lead to greater impact of Psychometrika and will encourage the authors to consider open access when they have funding for their accepted manuscripts.

I plan to follow the advice of Carroll (2001) to reduce review times and will do my best to send the decisions from the first round of review to the authors within four months of submission of a reviewable manuscript. I have been handling new manuscripts since 1 July 2023, and according to recent calculations by the journal publishers, the average review time in 2023 for Psychometrika was 30 days less than that in 2022; I plan to continue with improvements like this. The Associate Editors and reviewers can contribute to making the review process quicker by taking decisions and completing reviews in a timely manner. So I request the reviewers to kindly inform the associate editor or me as soon as possible if they think that they cannot finish an assigned review within the given time limit and suggest alternate reviewers.

Please feel free to contact me if you have any questions about any aspects of the review process or regarding an article you are thinking of submitting to Psychometrika.

The current issue, the first under me, includes several articles that were accepted by Matthias von Davier, the previous Editor-in-Chief, of the journal. These articles include one on (i) deep cognitive diagnostic models (written by Yuqi Gu); (ii) nodal heterogeneity in relational event models (Rūta Juozaitienė and Ernst C. Wit), (iii) variational estimation for multidimensional item response theory (Chenchen Ma, Jing Ouyang, Chun Wang & Gongjun Xu), (iv) a latent hidden Markov model for process data (Xueying Tang), (v) a knowledge-based multivariate method with interpretable composite indexes (Gyeongcheol Cho and Heungsun Hwang), (vi) detection of differential item functioning for the case of unknown groups and anchor items (Gabriel Wallin, Yunxiao Chen, & Irini Moustaki), (vii) a multidimensional model to facilitate within person comparison of attributes (Mark Davison, Seungwon Chung, Nidhi Kohli & Ernest Davenport Jr.), (viii) regularized variational estimation for exploratory item factor analysis (April Cho, Jiaying Xiao, Chun Wang, & Gongjun Xu), and (ix) adjusted residuals for evaluating conditional independence in item response theory models for multistage adaptive testing (Peter van Rijn, Usama Ali, Hyo Jeong Shin & Sean-Hwane Joo). The issue includes one book review (by Huilin Chen). I invited the recent Psychometric Society Presidents to submit their presidential addresses to the journal.<sup>1</sup> The current issue begins with four of those addresses—by Terry Ackerman, Cees Glas, Robert Mislevy, and Klaas Sijtsma (three of whom worked with their colleagues). The issue concludes with the minutes from the meeting of the Psychometric Society Members, which were graciously provided by Alison Cheng.

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<sup>&</sup>lt;sup>1</sup> Publication of these addresses in Psychometrika used to be a tradition in the past, but the tradition seems to have lapsed recently. I want to reinstate the tradition because of my belief that we all have quite a bit to learn from the Society Presidents.

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