

On the History of Measurement Theory

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In this paper we briefly overview the development of measurement theory and the impact of scale types classified by Stanley Smith Stevens. The father of scales taxonomy that shows up even in the latest statistics textbooks (nominal, ordinal, interval and ratio scales) was a psychologist, although his theory had a great effect on the researchers in measurement sciences. His theory of permissible statistics and invariance has found numerous followers, but his disciplines have undergone several aspects of criticism. Thanks to the fact that this field gained significant contribution from a mathematical viewpoint, from researches such as R. Duncan Lee and Louis Narens, some of the original theorems have been mathematically proved. Some of Stevens's thoughts have been disproved, some have been further improved, but his pioneer contribution is unarguable.

In this study, the history of the development of measurement theory is reviewed based on original papers, including ordinal-interval controversy and its consequences, as well as the latest results in this field.

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