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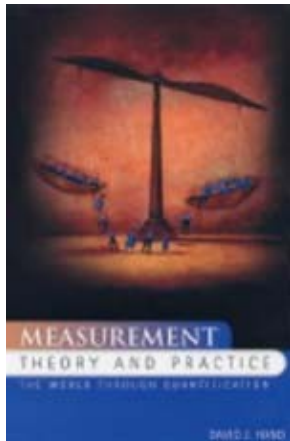
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January 2005

Reviews

## 'Measurement theory and practice'

reviewed by Helen Joyce



## Measurement theory and practice: The world through quantification

by David J. Hand

Measurement is a tricky business, and rarely leaves the thing measured unchanged, as Heisenberg's Uncertainty Principle states at the quantum level. But statistician David Hand has gone back to the foundations, examining measurement right across the various disciplines: psychology, medicine, physical sciences, economics, the social sciences and elsewhere. He must treat in a unified manner scales used to measure phenomena as different as pain, retail prices and magnetism.

"Measurement is the activity which produces the raw material which statistical methods analyse," says Hand. He seeks to present a broad view of this enormous field: the attempt to quantify in order to describe and understand.

Hand admits that there are those who criticise the ever-greater reach of measurement. He quotes business psychologist John Seddon, who said: "People do what you count, not what counts." He discusses particular

## 'Measurement theory and practice'

problems, such as grade inflation, which occur when what you measure are people, rather than unthinking objects – but he states firmly that, although there are justified criticisms, they simply mean that "more sophisticated measurement tools need to be identified."

The book contains a great deal of interesting historical material, and is not a heavy read considering its subject matter. It should be of interest to anyone who is at all interested in the foundations of science, or in the numbers used to maintain the trappings of a modern nation state – in short, in the relationship between numbers and things.

### **Book details:**

*Measurement theory and practice: The world through quantification*

David J. Hand

paperback – 288 pages (2004)

Hodder Arnold

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