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**Fuzzy sets and statistical data.** (English) Zbl 0588.62002

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Specific features of probability and possibility theories are discussed with emphasis on semantical aspects. Instead of putting forward the acknowledged usefulness of possibility theory for the non-statistical modelling of subjective categories, we try to figure out how statistical data and possibility theory could be matched. As a result, procedures for constructing weak possibilistic substitutes of probability measures, and for processing imprecise statistical data are outlined. They provide new insights on the relationship between fuzzy sets and probability theories.

**MSC:**

**62A01** Foundations and philosophical topics in statistics

**60A99** Foundations of probability theory

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semantical aspects; weak possibilistic substitutes of probability measures; imprecise statistical data; fuzzy sets

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