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ALGEBRAIC ASPECTS OF NON-EXTENSIONAL MEREOLGY

Summary

An extensional mereology was subjected to analysis of many authors. It was proved that it corresponds to a Boolean algebra without a null element. A slightly modified version of this model in which the primitive relation of being a part does not fulfill the Extensional Principle, will be called: Non-extensional Mereology. There is no systematic analysis for such a model until now. Some authors present partial descriptions of it. In this work we would like to propose a detailed and systematic analysis of Non-extensional Mereology. We present a minimal set of axioms and show that this model, under certain conditions, corresponds to an implicative lattice.

Summarized and translated by Lidia Obojska

Słowa kluczowe: zasada ekstensjonalności, mereologia, kraty.

Key words: Extensional Principle, mereology, lattices.

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