Axiomatic Potentialism

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Overview

Background

2 Warm Up: Height Potentialism

Height and Width Potentialism

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3 Height and Width Potentialism

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Potentialism

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is the idea that a mathematical object (e.g. a set) is the sort of thing that may *merely possibly* exist.

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- Still deeper roots in mathematics in general.

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- E.g. Hamkins and Linnebo showed in MT potentialism with the structures initial segments of V that S5 at a world V_{κ} is equivalent to Σ_3 correctness of κ .
- Here we will be focussed on axiomatic potentialism, and on relations between potentialist axiom systems and their first order counterparts.

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Axioms

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Inconsistency?

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A Model

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Connection to Standard Set Theory

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Thanks!