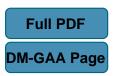
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DISTRIBUTIVE ORDERED SETS AND RELATIVE PSEUDOCOMPLEMENTS

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Abstract

Brouwerian ordered sets generalize Brouwerian lattices. The aim of this paper is to characterize α -complete Brouwerian ordered sets in a manner similar to that used previously for pseudocomplemented, Stone, Boolean and distributive ordered sets. The sublattice G(P)in the Dedekind-Mac Neille completion DM(P) of an ordered set Pgenerated by P is said to be the characteristic lattice of P. We can define a stronger notion of Brouwerianicity by demanding that both P and G(P) be Brouwerian. It turns out that the two concepts are the same for finite ordered sets. Further, the so-called antiblocking property of distributive lattices is generalized to distributive ordered sets.

Keywords: Brouwerian ordered set, distributive ordered set, relative pseudocomplement.

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