

Some Families of Effect Algebras and Existence of States Abstract

RIECANOVA Zdenka

¹*Department of Mathematics, Faculty of Electrical Engineering STU
Ilkovičova 3, SK-812 19 Bratislava
Slovak Republik
E-mail: Zdenka.Riecanova@stuba.sk*

There are even finite effect algebras admitting no states. On the other hand there are known some families of effect algebras such that there exists a state on every effect algebra from this families. We show some further families of effect algebras with this property. For instance, family of all Archimedean atomic lattice effect algebras with at most five bloks, family of all effect algebras which are effect algebraic extensions of generalized effect algebras, family of all complete atomic effect algebras satisfying certain condition for atoms and others.

References

[1] Dvurečenskij, A. and Pulmannová, S.: *New Trends in Quantum Structures*, Kluwer Academic Publishers, Dordrecht, Ister Science, Bratislava, 2000.

12:15, Friday, Nov 30, 2007

Wiedner Hauptstrasse 8-10, 1040 Wien, 5. Stock

Algebra Research Group, Vienna University of Technology