PAIRWISE BICOMPACTNESS IN BISPACES AND PRODUCT OF BISPACES

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Abstract: In this paper we have studied the idea of K-pairwise bicompactness and FHP pairwise bicompactness in a bispace. Also we have investigated few results in the product of bispaces.

Keywords and Phrases: σ-space, bispace, FHP pairwise bicompactness, K-pairwise bicompactness, product bispace.

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1. Introduction

One of the important generalizations of the notion of a topological space is that of Alexandroff space [1] or σ-space or simply space where only countable union of open sets were taken to be open. The idea of a bitopological space was introduced by J. C. Kelly [4]in 1963. Later many works on topological properties were done in the setting of a bitopological space ([8, 9, 11] etc.). In 1968 Y. W Kim [5] introduced a special type of compactness called K-pairwise compactness in a bitopological space. The concept of compactness for bitopological space was also studied by Fletcher, Hoyle and Patty [3] which is known as FHP pairwise compactness. But the two definitions are not the same.