

CONVEXITY STRUCTURES OF BECKENBACH FAMILIES

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Beckenbach families are sets of continuous functions possessing the property that each pairs of points of the plane, with distinct first coordinates, can be interpolated by a unique member of the family. Applying Beckenbach families, the convexity of sets and functions can also be extended. The aim of the talk is to prove the analogue of the Radon, Helly, Carathéodory and Minkowski Theorems in this generalized setting. The most important properties of generalized convex functions are also presented. As applications, some separation results are given.

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