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拓扑线性空间中的Drop定理与Drop性质

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摘要   给出了拓扑线性空间中的一个Drop定理. 利用此Drop定理,
证明了拓扑线性空间中的每个序列紧凸集具有Drop性质; 每个可数紧闭凸集具有拟Drop性质.
而且给出了拓扑线性空间中Drop性质和拟Drop性质的序列流特征.
也讨论了Drop性质和拟Drop性质与泛函取极值之间的联系.

关键词   拓扑线性空间   Drop定理   Drop性质

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Drop Theorem and Drop Property in Topological Linear Spaces

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Abstract In this paper, Drop theorem in topological linear spaces is established. From this, we obtained that every sequentially compact convex set in topological linear spaces has the Drop property; every countably compact closed convex set in topological linear spaces has the quasi-Drop property. And we give the streaming sequence characterizations of the Drop property and quasi-Drop property in topological linear spaces. We also investigate the relationship between the Drop property and the quasi-Drop property and the problem concerning some class of functions attaining the extreme values.

Key words   topological linear spaces   Drop theorem   Drop property

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