Twisted differential K-characters and D-branes

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Abstract

Starting from the definition of twisted Cheeger-Simons K-character, we show how to describe D-brane world-volumes, the Wess-Zumino action and topological D-brane charges within the K-theoretical framework in type II superstring theory. We stress in particular how each feature of the old cohomological classification can be reproduced using the K-theoretical language.