Asymptotic behavior of eigenvalues of Toeplitz operators and applications.

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Abstract: Let \( A^2 \) be the standard Bergman space on the unit disc \( \mathbb{D} \). Let \( \mu \) be a positive Borel measure on \( \mathbb{D} \) and \( T_\mu \) be the Toeplitz operator, associated with \( \mu \), acting on \( A^2 \). In this talk, we will express the behavior of eigenvalues of \( T_\mu \) in terms of geometrical properties of \( \mu \). We will give some applications to composition operators and to Volterra type operators. Hardy and Dirichlet spaces will also be considered.

Keywords: Toeplitz Operators • Volterra operators • Bergman space • Hardy space • Dirichlet space

References


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