

Combinatorics of orthogonal polynomials in the q -Askey scheme

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Abstract

Combinatorics of orthogonal polynomials have been studied from 1980's. There are various combinatorial interpretations for important orthogonal polynomials and their properties. Orthogonal polynomials in q -Askey scheme have q -factorials in their terms and coefficients. A nice combinatorial model to handle q -factorials has been introduced in *Lecture hall graphs and the Askey scheme*, by *S. Corteel, B. Jonnadula, J. Keating, J. Kim*, *arXiv:2311.12761v2*. This talk is a history of the combinatorics of orthogonal polynomials up to the above paper.