Zbl 624.26011

Erdős, Paul; Varma, A.K.

An extremum problem concerning algebraic polynomials. (In English) Acta Math. Hung. 47, 137-143 (1986). [0236-5294]

Sharp estimates of Markov type for derivatives of the polynomials $p_n(x) = \sum_{k=0}^{n} a_k (1+x)^k (1-x)^{n-k}$ with $a_k \ge 0$ in L^2 -norm on [-1,1] are given. This extends some earlier results by *G.G.Lorentz* and the second author.

W.Pleśniak

Classification:

26D05 Inequalities for trigonometric functions and polynomials 26C05 Polynomials: analytic properties (real variables)

Keywords: Markov's inequality for polynomials