Cyclicity in Dirichlet-type spaces and extremal polynomials

Daniel Seco

Daniel Seco (dseco@mat.uab.cat) Universitat Autònoma de Barcelona

Abstract.

For functions f in Dirichlet-type spaces we study how to determine constructively the optimal polynomials p_n of degree n, in terms of the norm of $p_n f - 1$, concentrating on the case when f is a cyclic function. We then give upper and lower bounds for the ratio of convergence of this norm to zero as n approaches ∞ .

References

[1] Bénéteau, C.; Condori, A.; Liaw, C.; Seco, D.; Sola, A. Cyclicity in Dirichlet-type spaces and extremal polynomials. To appear on *J. Anal. Math.*