

N. Levenberg, T. J. Ransford, J. Rostand and Z. Slodkowski, **Countability via capacity**, *Math. Z.*, 242 (2002), 399–406.

Abstract

Let K be a compact subset of \mathbf{C} , and let c denote logarithmic capacity. We prove that $(c(L) = 0 \Rightarrow c(K + L) = 0)$ if and only if K is countable. As an application, we obtain a short proof of the scarcity theorem for countable analytic multifunctions.