

957-26-315

Erik O Talvila* (etalvila@math.ualberta.ca), Department of Mathematical Sciences,
University of Alberta, Edmonton, Alberta T6G 2E2, Canada. *Nonabsolutely convergent Poisson
integrals*. Preliminary report.

It is well known that if $f \in L^p$ and $P[f](x) = u_r(\hat{x})$ is its Poisson integral on the ball with $r = \|x\|$ then the inequality $\|u_r\|_p \leq \|f\|_p$ holds for all $0 \leq r < 1$. When the Poisson integral converges conditionally it can have rather different growth behaviour. We look at the growth of Poisson integrals using various norms. (Received July 14, 2000)