

**Meeting:** 999, Nashville, Tennessee, AMS CP 1, Session for Contributed Papers

999-41-9                    **George A Anastassiou\*** (ganastss@memphis.edu), Department of Mathematical Sciences,  
University of Memphis, Memphis, TN 38152. *Representations and Estimates to Csiszar's  
f-Divergence.*

The Csiszar's discrimination is the most essential and general measure for the comparison between two probability measures. Here we provide probabilistic representation formulae for it on various very general settings. Then we derive tight estimates for their remainders involving a variety of norms of the engaged functions. Also are presented some direct general estimates for the Csiszar's f-divergence leading to very close probabilistic inequalities. We give also plenty of important applications. (Received May 09, 2004)