Matrix Transformation into a New Sequence Space Related to Invariant Means

Adnan Alhomaidan

Department of Mathematics, Faculty of Science,
King Abdulaziz University
P.O. Box 80081, Jeddah 21589, Saudi Arabia
alhomaidana@yahoo.com

Abstract. In this paper we define a sequence space V_∞ through the concept of invariant means and prove that this is a Banach space under certain norm. We further characterize the matrix classes (l_∞, V_∞) and (l_1, V_∞).