Plants under natural conditions are exposed to several environmental stresses which affect their metabolism. Among them, soil and irrigation water salinity is one of the most serious problems to irrigated agriculture. The aim of this work was to identify through morphologic characters, the genetic variability of 10 genotypes of rice cultivated in vitro, and classify these genotypes regarding salinity tolerance. The treatments were constituted by ten genotypes and four NaCl concentrations (0, 4, 8 and 12 mg L$^{-1}$). Several morphological characters were evaluated, to which percentage calculations of relative performance (increase or reduction) were made, considering the absolute value of the control treatment (0 mg L$^{-1}$) added to MS culture medium. After 21 days, all the measured characters had their development reduced in saline substrate. The most sensitive characters to NaCl concentration were mean biomass from the aerial parts and from the radicular system. Differences were observed among the genotypes studied regarding salinity tolerance. Three distinct groups were formed by the UPGMA hierarchical method and two groups by Tocher method, with BRS Bojuru genotype the most tolerant and BRS “7” Taim and BRS Ligeirinho the most sensitive to salinity.

Keywords
Genetic dissimilarity, in vitro cultivation, Oryza sativa L., salt stress.