

THE ACRIDIAN PLAGUES, A NEW HOLOCENE AND PLEISTOCENE PALAEOCLIMATIC INDICATOR

Meco, J.^a, Petit-Maire, N.^b, Ballester, J.^a, Betancort, J.F.^a, Ramos, A.J.G.^c

a Departamento de Biología, ULPGC, Campus Universitario de Tafira, E-35017, Las Palmas, Canary Islands, Spain

b MMSH-ESEP, BP 647, 13094 Aix-en-Provence Cedex 2, France

c Estación Espacial SEAS Canarias, ULPGC, Las Palmas, Canary Islands, Spain

Abstract

Five palaeosols, intercalated within the Quaternary dune beds of Fuerteventura and Lanzarote (Canary Islands), off the Moroccan coast, mark wetter climatic episodes. In all of them, billions of calcified insect ootheca testify to past occurrences of Acridian plagues, such as those reaching the western Sahara following heavy rainfall events over the Sahel. The most massive infestation is in the Holocene, and should coincide with the climax of Saharo-Sahelian humidity at the peak of the present interglacial.