

405 RIFT VALLEY FEVER VIRUS TRANSMISSION IN RURAL NORTHERN SENEGAL: HUMAN RISK FACTORS AND POTENTIAL VECTORS. Wilson ML*, Chapman LE, Hall DB, Dykstra EA, Ba K, Zeller HG, Traore-Lamizana M, Hervy JP, and Linthicum KJ. Institut Pasteur, Dakar, Senegal; Centers for Disease Control, Atlanta, GA; ORSTOM, Dakar, Senegal; Yale University School of Medicine, New Haven, CT; and U.S. Army Medical Research Institute for Infectious Diseases, Ft. Detrick, MD.

Rift Valley Fever (RVF) is an acute, severe, vector-borne, viral zoonosis endemic throughout much of Africa. Studies in eastern and southern Africa indicate that intense transmission occurs sporadically in time and space, due in part to changing mosquito densities. Less is known of RVF epidemiology in West Africa. We undertook a retrospective cohort study of the semi-nomadic Pulaar people living in a rural settlement in northern Senegal. A sample of 279 people were bled and given a standardized questionnaire concerning activities. Serologic studies of 375 sheep and population estimates of potential mosquito vectors were also made. About 22% of people exhibited anti-RVF virus IgG; none had IgM. Seropositivity was similar between the sexes, increased markedly with age, and was uneven among camps (0%-37.5%). Sheep IgG prevalence averaged 30.1% overall (0.8% IgM), also varied among camps (0%-66.7%), but was spatially unlike that in humans. The only human risk factor that emerged was treating sick animals, and this held true independent of age and for both sexes. Mosquito abundance (CDC traps) varied seasonally with rainfall (>90% in 4 mo); species diversity was large (24 spp), dominated by *Aedes* and *Culex*. Results suggest that RVF is endemic in northern Senegal and that people are at considerable risk of infection.

