VIII ENCONTRO DO INSTITUTO ADOLFO LUTZ

SPATIAL ANALYSIS OF HUMAN AND CANINE VISCERAL LEISHMANIASIS IN CAMPO GRANDE, MATO GROSSO DO SUL STATE, BRAZIL, 2002-2006*.

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In the last twenty years several new and old diseases has been described worldwide. Leishmaniasis has been reported as the third most important vector-borne disease, with an increased number of cases. Until ten years ago, in Mato Grosso do Sul State, Brazil, American visceral leishmaniasis (AVL) were restrict to the extreme western region near to frontier with Bolivia. Since 1999, it was spread coincidently at the same time and in the same route of construction of Bolivia-Brazil pipeline. Campo Grande city, in central region of Mato Grosso do Sul is one of the more endemic area with hundreds of cases notified in recent years. This study presents the spatial analysis of human and canine AVL between 2002 and 2006 in that city. For spatial analysis annual maps were obtained considering the number of cases in each neighborhood. Data of human cases were obtained from National Information System of Diseases (SINAN) and canine cases registers from Zoonosis Control Center. Spatial analysis has enabled the description of the evolution both in time and space of AVL in Campo Grande and allowed us to observe a similar pattern of occurrence of canine and human visceral leishmaniasis during the period. Using spatial analysis, the relationship between the disease and environmental processes that may influence its dissemination (such as an engineering project that demanded migration of thousands of workers) can be examined. The intensity of transmission among dogs was always higher than human.

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