

**STUDY OF TERRITORIAL DISTRIBUTION OF THE MANGROVE SPECIES
*RHIZOPHORA MANGLE, RHIZOPHORA RACEMOSA, AND PELLICIERA
RHIZOPHORAE, ON TÉRRABA-SIERPE NATIONAL WETLANDS, 2012.***

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ABSTRACT: Coastal marine ecosystems such as mangroves are influenced by the presence of salt and fresh water land, are distributed in the tropics and some cases in the subtropics. In Costa Rica mangroves are located in both the Pacific coast and the coast of the Caribbean Sea. In the last decade, anthropogenic actions such as forest clearing for planting rice, agrochemicals discharge to course of rivers, erosion and sedimentation because of infrastructure development, deteriorated have these ecosystems. The objective of this investigation was to identify and determine the distribution of species of *Rhizophora mangle* and *Rhizophora racemosa*, *Pelliciera rhizophorae* in Terraba-Sierpe National Wetland using remote sensors. The research was conducted in two stages: (a) use of GIS for processing and supervised classification of a 2012 Rapid Eye image with Spectral Angle Mapper classifier and (b) validation of the map with Global Positioning System filed control points. A land cover map was obtained, with an area of 3295ha distributed as follows: 1487ha occupied by *P. rhizophorae* equivalent to 47% of the area, 1033ha of *R. mangle* and *Pelliciera rhizophorae* an equivalent of 32% coverage, the remaining area 775 ha corresponds to other land cover. The study conclude that the species with the highest prevalence is *P. rhizophorae* research is recommended to follow up which anthropogenic actions are affecting other areas of the wetland.