

ASSESSMENT OF THE VULNERABILITY TO EROSION IN PORTO SEGURO AND SANTA CRUZ CABRÁLIA - BA

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his paper deals with the vulnerability to erosion in the municipalities of Porto Seguro and Santa Cruz Cabralia, in front of the land degradation process mainly caused by deforesting and pasture, aiming at subsidizing the environment planning. The Vulnerability to Erosion Map, at the scale 1:100.000 is related to the relief and its morphometrical and morphological parameters, physical properties of the soils, morphodynamical processes, climate, vegetation and land use. The integration of these attributes has allowed to classify the areas with different vulnerability to erosion degrees. The area comprises the Geomorphological units Coastal Tablelands supported by pliocenic sediments of the Barreiras Group, Inland Surface, in the domain of pre-cambrian rocks, and Fluvial-Marine Plains, constituted by Quaternary sediments. Tabular or convex dissection and accumulations forms represented by the Quaternary deposits occur. The soils are represented by Ultisols, Spodosols and Oxisols. The climate is hot and damp, with average monthly rain over 60mm. The remnant vegetation comprises the Mata Atlântica, rupestral fields and sand bank vegetation. High relief amplitude values, declivity and dissection degree propitiate a greater intensity of morphodynamic processes and an elevated degree of vulnerability to erosion. The areas of high and very high degrees are related to active cliffs and steep edges of the tablelands in the valleys where terracettes, erosive grooves, ravines and scars from landslides are to be found. The moderate degree comprises mild slopes areas, where there are rills and erosive grooves. The areas of low degree are located in the surface of the tablelands, where the Ultisols and Oxisols promote a great water infiltration, diminishing the laminar erosion.