

## Antropic influence in the Sepetiba Bay area, Rio de Janeiro State, by the palynological records

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The studied area is part of the Guaratiba – Sepetiba Coast Complex, located in the southwestern area of the Rio de Janeiro State, in the board of the Sepetiba bay. Extensive areas around the margins of the bay are colonized by mangroves. In order to detect environmental changes in the studied area, relative to antropic influence in the mangroves ecosystems, it was made palynological analyses of two cores collected, with a vibracore, in a mangrove facies of the lower tidal plain of Guaratiba – Sepetiba Bay. The cores, 5.30 m (core D) and 5.10 m (core E) long, were composed basically of mud, with a short interbedding of sand. The chemical treatment followed the standard palynological methodology, including the addition of exotic spores, *Lycopodium clavatum* spikes, to the samples to determine palynological concentrations. The ages obtained, to the core D, through pollen and <sup>14</sup>C analyses allowed, by linear interpolation, to establish the chronology of the studied samples. By the stratigraphic and biostratigraphic correlation were possible infer some ages to the core E. In the top of both cores, the antropic influence is remarkable through the abrupt decrease of forest vegetation record, possible due to deforestation, corresponding to the last 100 years.