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## **SENSIBLE HEAT FLUX HEIGHT VARIATION ABOVE THE REBIO JARU AMAZONIAN RAIN FOREST CANOPY DURING DIURNAL PERIODS**

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**Abstract:** In this work we verify if the vertical sensible heat fluxes change with height above the Amazonian rain forest canopy, under diurnal conditions. The data were measured in March 1999, during the wet-season of the Large Scale Biosphere Atmosphere Experiment in Amazonia (LBA), in southwestern part of Amazonia region. Measurements were made at three different heights in a 60 meters micrometeorological tower located in the Biological Reserve of Jaru (10° 04' S, 61° 56' W), Brazil. We used the fast response sonic data of wind velocity and temperature measured simultaneously at heights of 64m and 42m, during the 11 Hrs to 15 Hrs time interval (local time). The wind velocity components and temperature data were decomposed into various frequency bands using biorthogonal wavelets and the vertical heat fluxes were computed in each of the bands. Non-parametric statistical tests were then performed to examine the hypothesis that the fluxes in each of the bands are different at the two heights. Results show that the sensible heat fluxes measured at the 64m and 42m heights are statistically different during diurnal period.