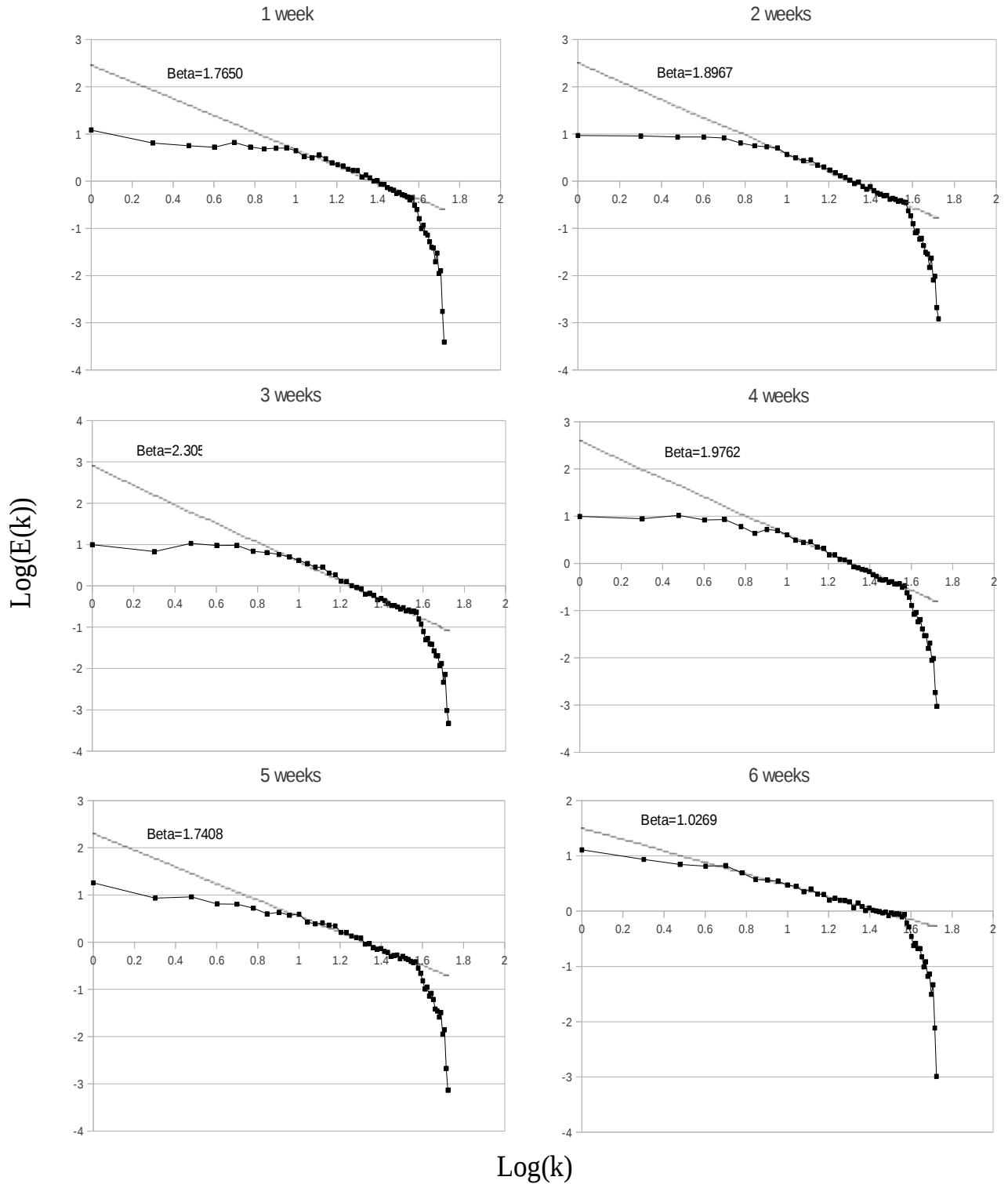Figure S1. Log-log plot of the Bidimentional power spectrum for the periphyton's biomass distribution. Where E(k) is the value of the spectrum often called energy spectrum an k is the frequency. The values of E(k) are averaged for each week. Beta is the slope of the lines estimated over a fixed range for all weeks, all slopes are greater than one, indicating non-stationarity in the data this justifies the application of a gradient to estimate the multifractal spectrum (Davis et al. 1996).

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