Spectrum Analysis Of Animal Natural Sound as An Alternative Source Of Audio Bio Harmonic For Holticultural Plant Productivity Enhancement

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ABSTRACT

This research aims to increase the productivity of horticulture crops of maize by applying the Audio Bioharmonic (ABH) system that works by applying the frequency of local animals sounds to the plants. From the analysis result, the frequency of sound of local animal that used is in between 3000 Hz – 5000 Hz. After synthesizing process, we got reults of peak frequency from the sound of natural animal which is at 3500 Hz and 4500 Hz. ABH was then applied to corn crops and compared to the control plots (without exposure to sound). From the results of observation and data analysis, we found that in the harvest time, plants exposed to the frequency of 3500 Hz gives the most results followed by control plants, while plants exposed to 4500 Hz frequency has the least yield.

Kata Kunci: Audio Bioharmonic, peak frequency, sound synthesis