REDUCTION OF GROWTH OF *Mimosa pudica* BY MULCHING TECHNIQUE

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ABSTRACT

REDUCTION OF GROWTH OF *Mimosa pudica* BY MULCHING TECHNIQUE

Mimosa pudica is a type of legume plant that is also known as weed. This kind of weed becomes a major problem in agriculture since its emergence affect the growth of crops in plantation. The aim of this study is to determine whether using mulches would reduce the growth of *Mimosa pudica* and to identify which types of mulch is the most effectives in greatly reduces the growth of *Mimosa pudica*. Different types of organic materials were used as mulches to cover *Mimosa pudica* plant in order to suppress its growth, which were dried leaves, dried coconut leaves and wood. The mulches were overspread on the plant at a layer of 5 to 7cm. The effect of all the mulches on weed suppression was evaluated. The results of this study showed that *Mimosa pudica* plot that was not covered by mulches had the highest weed density compared to the other plots covered with mulches. It was observed that all organic mulches reduced the growth of *Mimosa pudica* with different degree of effectiveness. Dried coconut leaves showed the highest degree of effectiveness (88.99%) in reducing the growth of this weed followed by leaves (78.71%) and wood (64.43%). A proper mulching technique and the best choice of mulch should be used in order to reduce the growth of weed. More research on the effectiveness of dried coconut leaves or coconut fronds as mulch to provide benefits in plantation and crops should be performed so that this biodegradable waste can be used for more potential benefits.