

**PENGARUH KONSENTRASI DAN LAMA PERENDAMAN ZAT
PENGATUR TUMBUH (ZPT) RHIZATTUN-F TERHADAP
PERTUMBUHAN STEK PUCUK JATI**

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INTISARI

Jati (*Tectona grandis*) mempunyai kelas awet dan kelas kuat II. Kebutuhan bahan baku kayu jati meningkat sehingga diperlukan pertanaman jati dengan bibit yang baik. Bibit jati yang baik diperoleh dengan cara perbanyakan vegetatif dengan pembuatan stek pucuk. Perbanyakan vegetatif mempunyai kelebihan yaitu akan diperoleh bibit yang seragam, identik dengan induk dan tumbuh lebih cepat. Untuk mendapatkan stek pucuk jati dengan perbanyakan yang baik perlu diberikan Zat Pengatur Tumbuh *Rhizattun-F*. Namun konsentrasi *Rhizattun-F* yang tepat dan lama perendaman untuk memperoleh keberhasilan hidup stek pucuk jati belum diketahui, sehingga perlu dilakukan penelitian tentang keberhasilan hidup stek pucuk jati dengan pemberian beberapa konsentrasi serta beberapa lama perendaman ZPT *Rhizattun-F*.

Penelitian ini menggunakan Rancangan Acak Lengkap dengan perlakuan pemberian ZPT *Rhizattun-F* konsentrasi (100 ppm, 200 ppm, dan 300 ppm) dan lama perendaman (5 menit, 10 menit, dan 15 menit). Masing-masing perlakuan terdiri dari 10 stek sehingga total terdapat 90 stek. Variabel yang diukur antara lain persen hidup, diameter akhir, tinggi akhir dan persen berakar yang kemudian dianalisis dengan analisis deskriptif kualitatif.

Hasil penelitian menunjukkan bahwa pada perlakuan C3 (konsentrasi 300 ppm, lama perendaman 15 menit) menghasilkan persen hidup tertinggi (80%). Pertumbuhan diameter terbaik yaitu pada perlakuan B2 (konsentrasi 200 ppm, lama perendaman 10 menit) 0,623 cm. Pertambahan tinggi paling baik pada perlakuan B3 (konsentrasi 200 ppm, lama perendaman 10 menit) 1,2 cm. Persen berakar 60% pada perlakuan C2 (konsentrasi 300 ppm, lama perendaman 10 menit).

Kata Kunci : Stek pucuk jati, *Rhizattun-F*, Konsentrasi, Perendaman

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THE EFFECT OF CONCENTRATION AND IMMERSION DURATION OF PLANT GROWTH REGULATOR RHIZATTUN-F ON THE GROWTH OF TEAK SHOOT CUTTINGS

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ABSTRACT

Teak (*Tectona grandis*) has durability and strong class II. The increasing demand of teak wood makes it important to plant teak with high quality seeds. Quality teak seeds are obtained through vegetative propagation by shoot cuttings. Vegetative propagation has advantages which are producing homogenous seeds, identical to the mother plant and growing more rapidly. To produce teak shoot cuttings with quality propagation, a plant growth regulator, *Rhizattun-F* is needed. However, the appropriate concentration and immersion time to reach high survival rate of the teak shoot cuttings is still unknown. Thus it is important to conduct a research on the survival rate of teak shoot cuttings by giving several concentrations and different immersion time of *Rhizattun-F*.

This research employed Completely Randomized Design by giving *Rhizattun-F* concentrations (100 ppm, 200 ppm, and 300 ppm) with different immersion time (5 minutes, 10 minutes, dan 15 minutes). Each treatment consisted of 10 cuttings so that there were 90 cuttings in total. The data measured which were life percentage, final diameter, final height, and rooting percentage were later analyzed using analysis of qualitative descriptive.

The findings showed that treatment C3 (concentration 300 ppm, immersion time 15 minutes) produced the highest life percentage (80%). The largest diameter growth (0,623 cm) occurred in treatment B2 (concentration 300 ppm, immersion time 10 minutes). The highest growth (1,2 cm) occurred in treatment B3 (concentration 200 ppm, immersion time 15 minutes). The highest rooting percentage (60%) was resulted from treatment C2 (concentration 300 ppm, immersion time 10 minutes).

Keywords : Teak shoot cuttings, *Rhizattun-F*, Concentration, Immersion

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