

**RESPONSE OF PATCHOULI CUTTINGS (*Pogostemon cablin* Benth.)  
ON NATURAL AND SYNTHETIC PLANT  
GROWTH REGULATOR**

By: Ghina Oktavia  
Supervised by: Ami Suryawati

**ABSTRACT**

Increased production of patchouli plants is practiced with cuttings. The use of PGR can increase the success of cuttings. The study aims to determine the best kind of natural and synthetic PGR on the growth of patchouli cuttings. The method used is a field experiment with polybags using a single factor RCBD. The natural and synthetic PGR used are coconut water concentrations of 25%, 50%, and 75%, shallot extract concentrations of 25%, 50%, and 75%, Rootone-F concentrations of 50 mg/L, 100 mg/L, and 150 mg/L. Observation results with 5% level of variance. Further test using Orthogonal Contrast at 5% level. The results showed that the treatment of coconut water, shallot extract, and Rotone-F was significantly better than the control in all observation parameters. The treatment of natural and synthetic PGR obtained the same results both in the parameters of the percentage of live cuttings, the number of shoots 2 and 6 WAP, leaf area, stem diameter 2, 4, and 6 WAP. The treatment of natural PGR shallot extract was significantly better than coconut water PGR in the parameters of time to appear shoots, number of shoots 4 WAP, number of leaves 2, 4, and 6 WAP, stem diameter 4 WAP, root length and root volume. The treatment of natural PGR shallot extract with a concentration of 25% and synthetic PGR Rootone-F with a concentration of 50 mg/L is best for the growth of patchouli cuttings.

Keyword: Patchouli, PGR, coconut water, shallot extract, Rootone-F