

## Multiple shoots formation of an important tropical medicinal plant, *Eurycoma longifolia* Jack

### ABSTRACT

*Eurycoma longifolia* Jack is well known among the communities in Southeast Asia because of its aphrodisiac properties and its effectiveness as the cytotoxic, anti-malarial, anti-ulcer, anti-tumor promoting and anti-parasitic agent. Micropropagation through direct plant regeneration from in vivo shoot tip explants was carried out. The highest regeneration percentage (90%) and multiple shoots formation were obtained with the basal Murashige and Skoog (MS) medium supplemented with 5.0 mg l<sup>-1</sup> kinetin. Roots were induced after 14 days of culture in the basal MS medium supplemented with 0.5 mg l<sup>-1</sup> of indole-3-butyric acid. Plantlets regenerated from shoot tip explants survived well with no morphological differences from parent plants after two months of transplantation to soil. Copyright © 2005 The Japanese Society for Plant Cell and Molecular Biology.

**Keyword:** *Eurycoma longifolia*; Micropropagation; Multiple shoots; Shoot tip