SUCCESSFUL ACCLIMATIZATION OF *IN-VITRO* ROOTED STEM CUTTINGS OF CINNAMON (*Cinnamomum verum* Presl)

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Hardening of regenerated plantlets for successful field transfer is considered to be a major obstacle in clonal micro-propagation of cinnamon. *In-vitro* induced roots are rarely functional, lack of root hairs, fragile and are generally damaged during transfer to the soil. Therefore, objectives of present experiments were to develop an appropriate acclimatization procedure and to select a suitable potting media for successful field establishment of Cinnamon plantlets.

In-vitro rooted stem cuttings were transferred in to four different potting media of Soil, Coir dust, Sand: Coir dust – (1:1) and Soil: Sand – (1:1) Sealed containers with sterilized potting media were used to maintain >80 % Relative humidity for 2 weeks and then gradually acclimatized to field conditions. Three different procedures (1) lid removed and kept in shade after 2 weeks of transplanting (2) lid removed only at nights after 2 weeks of transplanting, and (3) lid removed after 4 weeks of transplanting were used as treatments.

At the end of 4^{th} week, plantlets in coir dust medium showed the highest survival rate (87.5 %). Higher number of new leaf formation was observed in coir dust medium and overall appearance of the plantlets was very good. Most plantlets in soil medium were dead at the end of the 4^{th} week, and remaining plantlets were very weak. Acclimatization procedure did not significantly affect on growth or overall appearance of plantlets. Results revealed that coir dust medium provided with two weeks of humid conditions is the best for successful acclimatization of in-*vitro* Cinnamon plantlets.