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**B-60: A comparison of different methods of vegetative propagation for  
*Osbeckia octandra* (L.) DC**

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One important aspect of the floriculture sector today, is the introduction of new plants. Identification of naturally available, attractive plants such as *Osbeckia octandra* (L.) DC. from the wild and their domestication to suit consumer preference is one way of introducing new plants.

A comparison of 2 different methods of vegetative propagation i.e. propagation by stem cuttings, and by tissue culture was undertaken for the multiplication of plants. The main objective was rapid multiplication of plants in large numbers and in a uniform size; but at the same time causing least harm to plants growing in the wild.

Stem cuttings 10.1-12.7cm (4-5") in height were obtained from plants grown in the wild. Cuttings were dipped in an organic fertilizer solution and planted in sand potting media. Pots were covered with polythene to maintain high levels of humidity initially. Nodal segments of stems (1-1.5 cm segments with 2 leaves) were used as explants for the establishment of tissue cultures. Explants were cultured on a  $\frac{1}{2}$  strength basal Murashige and Skoog medium supplemented with 3% sucrose and 0.1 mg/l of benzyl amino purine.

Propagation through stem cuttings was cheaper and quicker; use of tissue culture was expensive. However within a given period of time a large number of plants of uniform size could be produced through tissue culture. At the same time harm caused to natural stocks is minimal, since only a small explant is needed initially to establish cultures.

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