

Original article

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Organogenesis of Kamchatka Bilberry (*Vaccinium praestans* Lamb.) in Clonal Micropropagation

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Abstract. The results of studies on the cultivation of the Kamchatka bilberry (*Vaccinium praestans* Lamb.) of Sakhalin and Kuril forms *in vitro* at the stages of “proper micropropagation” and “rooting of microshoots” using a WPM nutrient medium with various content of micro and macro salts. 6-BAP cytokinin at concentrations of 0.5–1.0 mg/l, IBA and IAA auxins at concentrations of 1.0 and 2.0 mg/l are used as growth-regulating substances; solutions of Zircon preparations at a concentration of 0.5 ml/l and HB-101 at a concentration of 0.1 ml/l are used as biostimulants. The number of microshoots and roots of regenerated Kamchatka bilberry plants on the WPM 1/2 nutrient medium are significantly higher than in the variants with WPM and WPM 1/4. The maximum total length of microshoots (4.5–5.0 cm) of Kamchatka Bilberry is observed in the WPM 1/2 nutrient medium with 6-BAP at a concentration of 0.5 mg/l and the addition of HB-101 at a concentration of 0.1 ml/l at the stage of “prorer micropropagation”. The maximum total length of roots (7.7–9.1 cm) of Kamchatka bilberry is observed on the WPM 1/2 nutrient medium with IBA at a concentration of 2.0 mg/l and the addition of HB-101 at a concentration of 0.1 ml/l at the stage of “rooting of microshoots”.

Key words: Kamchatka bilberry, forest berry plants, clonal micropropagation, *in vitro*, growth regulating substances, biostimulants.

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