

Distribution pattern, population density and conservation by vegetative propagation of *ULMUS VILLOSA* in temperate conductions of Kashmir

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Abstract: Propagation of *Ulmus villosa* was tested by treatments with different concentrations of indole-3-acetic acid (IAA) @ 1000, 2000 (ppm), indolebutyric acid (IBA) @ 1000, 2000 (ppm) and naphthylacetic acid (NAA) @ 1000, 2000 (ppm). The cuttings treated with IBA @ 2000 ppm and IBA @ 1000 ppm had a sprouting rate of 80 % and 95 %, followed by NAA @ 2000 ppm with 65 %, IAA @ 2000 ppm with 60 %, NAA @ 1000 ppm with 58 %, IAA @ 1000 ppm with 55 % which was higher than that of control. Highest percentage of roots was recorded in The cuttings treated with IBA @ 2000 ppm and IBA @ 1000 ppm had a Rooting rate of 95 % and 90 %, followed by NAA @ 2000 ppm with 75 %, IAA @ 2000 ppm with 72 % , NAA @1000 ppm with 68 %, IAA @ 1000 ppm with 65 % which was higher than that of control; Survival rate of all cuttings treated with different treatments was high but the highest survival percentage was recorded @IBA 2000 ppm and 1000 ppm which showed 100 % survival rate, followed by IAA @ 2000ppm 90 %, NAA @2000 ppm with 89 %, NAA @1000 ppm with 85 %, IAA @ 1000 ppm with 81 %. in control | 70% survival was observed. Among all of these plant growth regulators IBA @ 2000 ppm and @ 1000 shows the best result.

Key words: Ulmus Villosa Cuttings Vegetative Propagation