



Performance of indigeneous genotypes of tikhur (*Curcuma angustifolia* Roxb.) for growth, rhizome and starch yield

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Abstract : The investigation was undertaken during the year of *Kharif* seasons 2010-11 and 2011-12 at Shaheed Gundadhoor College of Agriculture and Research Station (IGKV) Kumhrawand, Jagdalpur, Bastar (C.G.). The experiment was laid out in Randomized Complete Block Design (RCBD) with 20 genotypes of tikhur with three replications. The genotypes were grown randomly in each replication/block in a total of 60 plots of 3.0 m × 2.4 m each containing 60 plants per plot. Observations were recorded from ten randomly selected sample plants in each treatment and observed mean value used for statistical analysis. The genotypes showed highest mean performance under growth characters *viz.*, IGDMT-10-1 for plant height, IGKOT-10-1 for number of leaved per plant. IGBLT-10-1 and IGSJT-10-1 for harvest index; under yield attributing characters genotypes IGSJT-10-2 and IGBT-10-2 for weight of mother rhizome per plant, IGSJT-10-3 and IGSJT-10-2 for weight of secondary rhizome per plant, IGBT-10-4 for number of mother rhizome per plant, IGSJT-10-1 and IGSJT-10-2 for thickness of mother rhizome per plant. The IGSJT-10-2 showed highest mean performance for total rhizome yield 30.32 t.ha⁻¹ followed by genotype IGSJT-10-1 (21.52 t.ha⁻¹) and IGJT-10-1 (21.18 t.ha⁻¹). The highest mean performance for starch recovery IGSJT-10-2 showed 16.57 per cent followed by genotype IGBT-10-4 starch recovery 15.80 per cent and IGBLT-10-1 starch recovery 15.52 per cent. Highest protein per cent in starch (0.95 %) was recorded in genotype IGSJT-10-4.

Key Words : Tikhur, *Curcuma angustifolia* Roxb., Starch recovery, Rhizome yield, Evaluation, Mean performance

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