

Dry Matter Production and Grain Yield in Rice Under SRI Cultivation

G Rama Rao and K Balakrishana Reddy

Department of Plant Physiology, S.V.Agricultural College, Tirupathi 517 502, A P

ABSTRACT

Two field experiments were conducted during *kharif* seasons of 2007 and 2008 at Wetland farm of S.V.Agricultural college Tirupathi to study the dry matter production and grain yield in rice under SRI cultivation .The results revealed that significant differences were observed among the cultivars and age of seedlings with regard to leaf ,stem ,root ,grain and , of total dry matter production at all stages of plant growth .Maximum leaf ,stem ,root ,grain and total dry matter and grain yield was produced by SRI-8 days followed by SRI-12 days and least was recorded in conventional method of 21 days .Among the cultivars tested ,BPT 5204 recorded higher dry matter production (133 g/plant) and grain yield (7.75 t/ha) followed by DRRH 2 (119.2 g/plant and 7.3 t/ha) ,NLR145(107 g/plant and 6.96 t/ha) and BPT 3291(96.2 g/plant and 6.72 t/ha).The interaction between cultivars and age of seedlings was significant .

Key words : Grain yield, Harvest index, System of rice intensification (SRI), Total dry matter production.