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RESEARCH PAPER

Physiological characterization of finger millet (*Eleusine coracana* L.) for drought tolerance

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Abstract : A field experiment was conducted to characterize finger millet recombinant inbred lines (RILs) for drought tolerance. A set of 150 RILs with two parents IE 2912 and IE 2885 used were used to characterize for drought tolerance traits such as total leaf area, root length, root volume, moisture retention capacity (MRC) and SPAD chlorophyll reading (SCMR). Parent line IE 2912 was superior to IE 2885 for all the traits and both parents differed significantly for all traits except MRC and SCMR. In mapping population, root traits, leaf traits, showed traits showed normal distribution around the mean and showed continuous variation indicating their quantitative nature. Since identified parental lines and mapping population developed are differing significantly they can be utilized in identifying markers linked to drought traits.

Key Words : Finger miller, RIL, Drought tolerance, SCMR

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