



## Response of Annual Ryegrass (*Lolium multiflorum* Lam) to Sowing Dates and Nitrogen Fertilization

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**Abstract:** The effect of planting time and nitrogen fertilization on growth and development, forage yield and economics of annual ryegrass was observed during *Rabi* 2015-16 and 2016-17. Significantly higher plant height, tillers per square metre and dry matter accumulation of annual ryegrass was observed under 2<sup>nd</sup> fortnight of October sown crop. The application of 160 kg N ha<sup>-1</sup> resulted in significantly better plant height, tillers per meter square and dry matter accumulation of annual ryegrass. Annual ryegrass produced significantly highest total green, dry forage yields *vis-a-vis* net returns (Rs. 98937.30 ha<sup>-1</sup>) and BC ratio of 2.97 were obtained under sowing time of 2<sup>nd</sup> fortnight of October. Application of nitrogen (160 kg N ha<sup>-1</sup>) resulted in significantly highest total green and dry forage yields, net returns and BC ratio.

**Keywords:** Ryegrass (annual), Forage yields, Net returns, BC ratio

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