STUDY OF ECONOMICS ON MAIZE (ZEA MAYS L.) INFLUENCED BY WEED MANAGEMENT

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Abstract: A field investigation was conducted at BAU experimental Farm, Ranchi during kharif season 2015 on sandy clay loam soil. The experiment was laid out in a RBD with 13 treatments: pretilachlor 1.0 kg ha\(^{-1}\) PE (T\(_1\)), atrazine 1.0 kg ha\(^{-1}\) PE (T\(_2\)), pendimethalin 1.0 kg ha\(^{-1}\) PE (T\(_3\)), metribuzin 0.35 kg ha\(^{-1}\) PE (T\(_4\)), pretilachlor 0.5 + metribuzin 0.175 kg ha\(^{-1}\) PE (T\(_5\)), atrazine 0.5 + pendimethalin 0.5 kg ha\(^{-1}\) PE (T\(_6\)), pretilachlor 1.0 kg ha\(^{-1}\) at 15 DAS (T\(_7\)), metribuzin 0.35 kg ha\(^{-1}\) at 15 DAS (T\(_8\)), atrazine 1.0 kg ha\(^{-1}\) at 15 DAS (T\(_9\)), green manuring by Sesbania @ 80 kg ha\(^{-1}\) fb 2,4-D 0.625 kg ha\(^{-1}\) at 30 DAS (T\(_{10}\)), two mechanical weeding at 20 and 40 DAS (T\(_{11}\)), two hand weeding at 20 and 40 DAS (T\(_{12}\)), and weedy Check (T\(_{13}\)), replicated thrice. Results revealed that gross return (70591 Rs ha\(^{-1}\)), net return (44623 Rs ha\(^{-1}\)) and B: C ratio (1.72) were observed maximum due to application of same treatment (atrazine 0.5 + pendimethalin 0.5 Rs ha\(^{-1}\) PE). The cost of treatment (atrazine 0.5 + pendimethalin 0.5 kg ha\(^{-1}\) PE) is much lower (1768 Rs ha\(^{-1}\)) against mechanical weedings (3749 Rs ha\(^{-1}\)) and hand weedings (9372 Kg ha\(^{-1}\)).

Keywords: Maize, Weed management, Economics, Investigation

REFERENCES


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