

Review of: "An Investigation of The Phytochemical Richness of Fresh Musa Paradisiaca L. (Plantain) Stem Juice and Its Anticonvulsant Potential on Pentylenetetrazole (Ptz)-Challenged Rats"

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Potential competing interests: No potential competing interests to declare.

The reproducible quality of phytochemical interventions is the primary issue pertaining to the concerned study. The study does not ensure independent replication. There are other concerns related to poor reporting and methodological quality issues, unclear risk of bias, optimized doses, and treatment regimens to rectify and observe the reproducible efficacy in various clinical studies (PMID: 37324491). Authors have not provided any evidence that a steady-state concentration of the active compound has been achieved during the treatment course. That is important to attain reproducible therapeutic efficacy since the concentration of active compounds in blood and organ tissues significantly varies over time after drug administration, from the baseline to the maximal. That might be crucial in some cases when dose-dependent reversal effects are needed to be observed. The sample size reported is too small to come to any conclusive inference. No biochemical and molecular studies have been done to support the anticonvulsant activity. May not be accepted for publication.