EVALUATION OF ANTIMICROBIAL POTENCY OF ARGEMONE MEXICANA AGAINST GASTRO INTESTINAL PATHOGENS

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Argemone mexicana extracts in different solvents showed high potency of antimicrobial activities against gastrointestinal pathogens. The growth of the bacteria Escherichia coli was found to be inhibited by all plant extracts. Staphylococcus aureus was found to be resistant to Hexane extract. While Ethanol extract inhibited the growth of Staphylococcus aureus. In the case of Pseudomonas aeruginosa, water extract showed resistance towards these bacteria. Salmonella typhimurium cultures were inhibited by all extract. Maximum inhibition was found in case of water extract. Cultures of Staphylococcus epidermidis showed that the water extracts were more effective than other extracts. Anova analysis of the results showed that the results were significant and reproducible every time.

Argemone mexicana Linn. belongs to the family Papaveraceae. It is an annual prickly herb containing yellow latex. Its leaves are simple, alternate, cauline, sessile, exstipulate prickly deep cut, with spiny teeth, unicostate reticulate venation. The plant is widely used in Sudanese traditional medicine for the treatment of Trypanosomiasis. Many chemical constituents of medicinal potential are reported in Argemone Mexicana such as Allocryptopine, berberine, chelerythrine, coptisine etc. In the present study the authors set forth the objective of evaluating the antimicrobial activities of Argemone mexicana on various skin and gastrointestinal pathogens.