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Sphaeranthus indicus as natural immunomodulator

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The present investigation is to evaluate the immunomodulatory activity for methanolic extract of *Sphaeranthus indicus* Linn at different doses as 100, 200 and 400 mg/kg body weight in healthy Wistar albino rats. The assessment of immunomodulatory activity was evaluated for humoral immunity (antibody titer, plaque forming cell assay and quantitative haemolysis of SRBC) and cellular immunity (delayed type hypersensitivity, T-cell population and drug induced myelosuppression) with antigen challenge by sheep RBCs. Methanolic extract of *Sphaeranthus indicus* along with the antigen (sheep red blood cells) showed significant increase in the circulating antibody titer and the number of plaque forming cells (PFC) in the spleen at the dose of 100 mg/kg body weight as compare to 200 and 400 mg/kg body weight. Methanolic extract of *Sphaeranthus indicus* also showed significant (p<0.01) increase in the DTH response, restoration of histological parameters, increase in lymphocytes and rosettes formation in T-cell population at dose of 400 mg/kg body weight as compare to 100 and 200 mg/kg body weight. The present investigation reveals that *Sphaeranthus indicus* can be used as immunomodulator for activation of specific and non-specific immune responses.

Biography

Sneha has completed her PhD from JNTU, Hyderabad in 2012 and she is having 10 years of teaching experience. She is working as an Associate Professor in Gokaraju Rangaraju College of Pharmacy, Hyderabad. She has pulished more than 25 research article in reputed journals.

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