

## Immunomodulatory Effects of Artemisiae Capillaris Herba Aqueous Extracts on Cyclophosphamide Induced Immunosuppress Mice

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**Purpose:** The object of this study was to observe the immunomodulatory effects of Artemisiae Capillaris Herba aqueous extracts(ACHe) as compared with  $\beta$ glucan one of well-known immune modulator, on the cyclophosphamide (CPA) induced immunosuppress mice.

**Materials and Methods:** To induce immunosuppress, 150 and 110mg/kg of CPA (Sigma, USA) were intraperitoneally injected at 3 or 1 day before start of test article administration, respectively.  $\beta$ glucan or all three different dosages(500, 250 and 125mg/kg) of ACHe were orally dosed, 4 times 12-hr intervals starting 24-hrs after last CPA-treatment.

**Results:** As results of twice intraperitoneal CPA treatment, decreases in the body weight and gains, thymus, popliteal lymph node and spleen weights, splenic TNF- $\alpha$  IL-1 $\beta$  and IL-10 contents, blood IFN- $\gamma$  were detected along with severe atrophic changes of thymus and spleen at histopathological observations. These CPA-induced immunosuppress changes were dramatically inhibited by treatment of all three different dosages of ACHe or 125mg/kg of  $\beta$ glucan.

**Conclusion:** The results obtained in this study suggest that ACHe has favorable immune stimulatory activities on the chemotherapy (CPA treatment).

**Key words:** artemisiae capillaries, CPA,  $\beta$ glucan.

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