



Immunomodulatory and clinical effects of the “tiaomian III decoction” in patients with blood blocking antibody deficiency and recurrent spontaneous abortion

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ABSTRACT. We studied the immunomodulatory and clinical effects of the empirical formula “tiaomian III decoction” on maternal blood blocking antibody deficiency and recurrent spontaneous abortion. Sixty-one patients with blocking antibody deficiency were divided in the experimental group (N = 31), who took tiaomian III decoction, and the control group (N = 30), who received active immunotherapy with paternal lymphocytes; both treatments lasted 3 months. Blocking antibodies, anti-idiotypic antibodies, interleukin, T-lymphocyte subsets, and macrophage colony-stimulating factor (M-CSF) were tested. After treatment, the positive conversion rate reached 87.1 and 86.7% in the experimental and control groups, respectively. After treatment, CD4 levels decreased while CD8 levels increased in both groups. The CD4/CD8 ratio was higher than normal and increased significantly from pre-treatment ($P < 0.05$). IL-10 and M-CSF levels increased

significantly in both groups ($P < 0.05$). The 1-year conception rates of the experimental and control groups were 58.1 and 46.7%, respectively ($P < 0.05$). The results show the tiaomian III decoction can increase the positive conversion rate of maternal blocking antibodies and promote the production of IL-10 and M-CSF. Thus, it strengthens the maternal body's protection of the fetus and maintenance of conception. The higher conception rate of the experimental group demonstrates the positive clinic efficacy of the tiaomian III decoction on maternal blood blocking antibody deficiency and recurrent spontaneous abortion.

Key words: Recurrent spontaneous abortion; Blocking antibody deficiency; Anti-idiotypic deficiency; Interleukin; T-lymphocyte subsets