Ginsenoside Rh1 is a triterpene saponin originally found in species of Panax (ginseng) that exhibits neuroprotective, cognition enhancing, anti-obesity, anti-inflammatory, antioxidative, anti-metastatic, and anti-allergic activities. Ginsenoside Rh1 enhances memory and learning, increasing neuronal survival in vivo. Ginsenoside Rh1 also decreases expression of PPARγ, fatty acid synthase, CEBP, and FABP, decreasing adipocyte differentiation, body weight, and triglyceride levels in vivo. This compound decreases expression of c-Jun and matrix metalloproteinase 1 (MMP1), inhibiting migration and invasion of hepatocellular carcinoma cells. Additionally, ginsenoside Rh1 increases expression of IL-10 and heme oxygenase 1 (HO-1) and decreases expression of iNOS, COX-2, and pro-inflammatory cytokines in LPS-stimulated microglia. In animal models, ginsenoside Rh1 inhibits mast cell degranulation and anaphylaxis as well.

References


