A clinical study was carried out to compare the efficacy and side effects between the 50 per cent ethanol extract of *Derris scandens* (Roxb.) Benth and a nonsteroidal anti-inflammatory drug Diclofenac for the treatment of two groups of patients with low back pain. A group of 37 patients received a 200 mg-capsule of D.scandens extract orally three times a day for seven days and the other group of 33 patients received the 25 mg Diclofenac tablet orally three times a day for seven days. The results show only the finding of a significant decrease in white blood cell count within the normal range on day 7 among patients in the D.scandens-treated group, while there was not even the slightest change in the Diclofenac-treated group; patients in both groups experienced no side effects from the treatment. With regard to the efficacy of treatment, the levels of pain, as measured by the Visual Analog Scale, in both groups were significantly lower on days 3 and 7 as compared with pretreatment baseline levels, and the results of pain alleviation were not different significantly between the two treatment groups. The study concluded that the benefit of treatment of patients with low back pain with the 50 per cent ethanol extract of D.scandens at a dose of 600 mg/day and with diclofenac at a dose of 75 mg/day for seven days were comparable.