Asma. Efeito antiasmático da Nigella sativa em pacientes

Antiasthmatic effect of Nigella sativa in airways of asthmatic patients.


Source

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Abstract

In the present study, the antiasthmatic (bronchodilatory) effect of the boiled extract of Nigella sativa in the airways of asthmatic patients was examined. The bronchodilatory effects of 50 and 100 mg/kg of boiled extract in comparison with 6 mg/kg theophylline were studied on 15 asthmatic patients. Pulmonary function tests (PFTs) including forced expiratory volume in one second (FEV(1)), peak expiratory flow (PEF), maximal mid expiratory flow (MMEF), maximal expiratory flow at 75, 50 and 25% of the FVC (MEF(75), MEF(50), and MEF(25) respectively) and specific airway conductance (sGaw) were measured before administration and repeated, 30, 60, 90 120, 150, and 180 min after administration of the oral extract and theophylline. The results showed that the extract caused significant increases in all measured pulmonary function tests (PFTs), in most time intervals, (p<0.05 to p<0.001). However, the increase in FEV(1), MMEF and MEF(50) due to both doses of boiled extract and increase in MEF(75) and MEF(25) due to its lower doses were significantly lower than those of theophylline (p<0.05 to p<0.001). The onset of brochodilatory effect of extract was similar to that of theophylline beginning 30 min, and the effect of extract decline after 150 min following administration similar to the effect of theophylline. The effect of both doses of the extract was also significantly less than that of salbutamol at 30 minutes post administration (p<0.001 for all cases). The results of the present study showed that Nigella sativa has a relatively potent antiasthmatic effect on asthmatic airways. However, the effects of boiled extract of this plant on most measured PFTs was less than those of theophylline at concentrations used.

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