

P-038: LYCIUM SPP.'S EFFECTS ON HYPERLIPIDEMIA AND HYPERTENSION IN RATS

Inhye Ham, Hyun-Sang Cho, Hoyoung Choi*

Oriental Medical School, Kyung Hee University, Seoul 130-701, Korea

The effects of fruit of *Lycium chinense* (LCF), root bark of *L. chinense* (LCR), and fruit of *L. barbarum* (LBF) were investigated on hyperlipidemia and hypertension in rats. The 70% MeOH extracts, H₂O fractions and CHCl₃ fractions from dried LCF, LBF and LCR were examined. The level of triglyceride (TG), total cholesterol (TC), high-density lipoprotein (HDL) cholesterol, low-density lipoprotein (LDL) cholesterol, AST (GOT), and ALT (GPT) were measured in triton WR-1339, high cholesterol diet, and alcohol induced hyperlipidemic rats, respectively. Also, blood pressure was measured using femoral artery in rats before and after treatments. In Triton WR-1339 induced hyperlipidemic rats, LCF, LBF and LCR significantly increased HDL cholesterol, otherwise significantly decreased TC, TG and LDL-cholesterol. In high cholesterol diet induced hyperlipidemia, LCF significantly reduced TC and LDL, and LCR significantly decreased LDL. LCF, LBF and LCR had a significant effect on reducing TC, TG and LDL in alcohol induced hyperlipidemia. The 70% MeOH extract of LCF had more significant antihypertensive effect in CHCl₃ fraction than in H₂O fraction. *Lycium* spp. showed significantly improving hyperlipidemia and antihypertensive effect in rats.