The Effects of Ginger Aqueous Extracts against Carbon Tetrachloride-Induced Hepatotoxicity in Rat

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Purpose: Ginger (Zinger officinale Roscoe) is one of the most commonly used herbal supplements, and traditionally ginger has been used to treat ailment including gastrointestinal disorder, abdominal pain, vomiting as well as in arthritis. But there is few reports concerning the hepato-therapeutic effects, present study was conducted to observe the therapeutic effect of ginger aqueous extracts on carbon tetrachloride-induced rats.

Materials and Methods: Rats were divided into three groups of twelve animals each. All groups were administered Carbon tetrachloride (4 ml/kg) to induce acute hepatic damage per oral. Experimental groups were treated with Ginger aqueous extracts (500 ml/kg) and Silymarin groups treated with silymarin (50 ml/kg) during 7 days.

Results: AST, ALT, Creatine of experimental groups were significantly (p $\langle 0.05\rangle$) lower than CCl⁴ groups. But BUN of experimental groups were not significantly (p $\langle 0.05\rangle$) lower than CCl⁴ groups. AST, BUN of experimental groups were significantly (p $\langle 0.05\rangle$) lower than silymarin groups. But ALT, Creatine of experimental groups were not significantly (p $\langle 0.05\rangle$) lower than silymarin groups.

Conclusion: The results obtained in this study showed that ginger aqueous extracts have hepatoprotective effect which induced with CCl₄ in rats.

Key words: ginger, hepatotoxicity, silymarin., rat.

This was supported by Kyungpook National University 2009.

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