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### **The evaluation of renoprotective effect of L-Carnitine against gentamicin nephrotoxicity**

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The protective effect of L-Carnitine on the gentamicin nephrotoxicity was investigated in experimental animal model. Male Wister 200-300 g rats were distributed randomly into four groups, control group, L-Carnitine treated group, Gentamicin treated group, and L-Carnitine + Gentamicin treated group. The result showed that gentamicin nephrotoxicity in rats is detected by significant plasma creatinine, urea and zinc changes in serum and renal tissue. L-Carnitine is able to ameliorate the renal functions and restore the zinc status. Zinc serum level in the gentamicin treated group is 115 µg/dl, while it is 129 µg/dl in the Gentamicin + L-Carnitine treated group, and Zinc tissue level in the Gentamicin treated group is 14.6 µg/dl, while it is 17.89 µg/dl in the Gentamicin + L-Carnitine treated group. The possibility of scavenging property of L-Carnitine against peroxy radical is via restoring zinc status implicated.

#### **Biography**

Sabah Akrawi, PhD, graduated from the College of Pharmacy/University of Kentucky/USA. He is an Assoc. Prof. of Clinical Pharmacokinetic and Biopharmaceutic and a faculty member at the College of Clinical Pharmacy/King Faisal University/KSA. He supervised 17 postgraduate pharmacy students, and has published more than 24 articles. He is a member of the scientific council of the KFU and chaired many defense committees for graduation of graduate students.

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