## **ORIGINAL ARTICLE**

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### Influence of dietary garlic supplementation on antioxidant status in broiler chickens exposed to benzo[a]pyrene

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#### Abstract

**Garlic** is a popular spice added to several edible

preparations and is a remedy for a variety of ailments. This experiment was performed to evaluate the effect of fresh garlic meal on the antioxidant status of broiler chickens exposed to an air pollutant benzo[a]pyrene (BaP). Ninety six 1-day-old broiler chicks were divided into 4 equal groups, including control, garlic, BaP, and BaP with garlic. Plasma malondialdehyde (MDA), glutathione (GSH) levels, glutathione peroxidase (GSH-Px), superoxide dismutase (SOD) and catalase (CAT) activities in RBCs hemolysate and liver tissue homogenate were determined. The results of this study revealed a significant alteration in comparison to other groups with respect to MDA, GSH, GSH-Px, SOD and CAT in the group receiving BaP alone demonstrated evidence of oxidative stress, and addition of fresh garlic was significantly reduces these change with potent effects seen after 21 to 35 days in treated group, these functions may be due to increased garlic's antioxidant activities.

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