Inhibitory effect of Chrysanthemum morifolium flower extract on the formation of heterocyclic amines in goat meat patties cooked by various cooking methods and temperatures

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Inhibitory effect of *Chrysanthemum morifolium* flower extract on the formation of heterocyclic amines in goat meat patties cooked by various cooking methods and temperatures.

Abbreviated running title: Formation and inhibition of heterocyclic amines in goat meat patties

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ABSTRACT: The effect of *Chrysanthemum morifolium* flower extract (CME) was investigated on the formation of heterocyclic amines (HCAs) in goat meat patties cooked at different temperatures by different cooking methods. In patties without CME, the level of total HCAs increased analogously with the increase in cooking temperature. The inhibitory effect of CME on HCAs ranged from 14% to 82%. The total HCAs content were reduced by 46%, 40% and 35% in pan fried, deep fat fried and oven roasted goat meat patties, respectively, at 175 ^{o}C. While, at 225 ^{o}C, the amount of total HCAs was decreased by 52%, 47% and 32% in deep fat