

MICROBIOLOGICAL STATUS OF KITCHEN SURFACES IN HOUSEHOLDS

Jelena Janjić^{1*}, Nina Dimovska², Jelena Ivanović¹, Marija Bošković¹, Vesna Đorđević³,
Tatjana Baltić³, Milan Baltić¹

¹Department of Food Hygiene and Technology, Faculty of Veterinary Medicine, Bulevar
Oslobođenja 18, 11000, Belgrade, Serbia

²Food and Veterinary Agency, Treta makedonska udarna brigade 20, 1000 Skopje, Macedonia

³ Institute of Meat Hygiene and Technology, Kacanskog 13, 11000 Belgrade, Serbia

*e-mail: jeckonbg@gmail.com

Abstract

Although food poisoning often happens in house condition, consumer' knowledge of about food household practices during food handling and storage are deemed insufficient.

Therefore, the aim of our study was to investigate the microbiological status (total number of mesophilic bacteria, *Enterobacteriaceae* and *Coagulase-positive staphylococcus* spp.) of kitchen surfaces in households (work surface, wooden board, plastic board, floor, and refrigerator). All microbiological examination were conduct according to ISO methods. This study included 100 households from the Belgrade area.

Results were interpreted according to the instruction from the Guidelines for application of microbiological criteria for food. There were significantly differences between the number of satisfactory and unsatisfactory total mesophilic bacteria. The unsatisfactory number of *Enterobacteriaceae* were significantly lower than satisfactory number of *Enterobacteriaceae* of exanimated samples in households. *Coagulase-positive staphylococcus* spp. were presented in 25% of examined households.

This survey has confirmed the effect of basic food hygiene knowledge on hygienic practice and identifies specific areas for emphasis in the development and delivery of effective food safety risk communication messages to consumers.

Key words: Kitchen surfaces, Mesophilic bacteria, *Enterobacteriaceae*, *Coagulase-positive staphylococcus* spp.