

NON-CONVENTIONAL HEATING EQUIPMENTS USED FOR LIQUID FOOD PASTEURIZATION WITH MICROWAVE ENERGY

Andreea-Manuela Constantin¹, Laurentiu Emanuel Zelenyak²

¹”Transilvania” University of Brasov- Romania , Department of Food and Tourism

²”Transilvania” University of Brasov- Romania , Department of Mechanics

Corresponding author: fiz. Andreea-Manuela Constantin, PhD student, andreea.constantin@unitbv.ro

Abstract This article is a review on the use of non-conventional methods for the microorganism inactivation in liquid food. First part of the article presents the background and also necessity of developing the new technologies and equipments for liquid food pasteurization. The second part presents a overview of the microwave heating equipment used for liquid food pasteurization, highlighting the microwave energy advantages compared to classical methods. Another issue of this chapter is to emphaze the necessity of proper design and corect dimensions of the microwave equipment used for liquid food pasteurization.

Key words: microwave equipment, pasteurization, sterilization, non-conventional heating, liquid food