INHIBITORY TEST OF UNBRANDED LIQUID DISH SOAP SOLD ONLINE AGAINST *Escherichia coli bacteria*

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ABSTRACT

Background: *Unbranded dish soap products have a huge chance of selling mainly because of their affordable price and simple manufacturing process. However, the quality and quality of the soap is not necessarily guaranteed, especially if the product does not have a distribution permit and is sold freely, because it can be a risk for consumers related to the safety and effectiveness of the product. Therefore, it is necessary to conduct research on unbranded and unstandardized dish soap products.* ***Objective:*** *The purpose of this study was to determine the area of the inhibition zone diameter and to describe the inhibition ability of unbranded liquid dish soap sold online against Escherichia Coli bacteria.* ***Research Method:*** *The inhibition test research of 5 samples of unbranded dish soap that has not been standardized and 1 branded dish soap that has been standardized as a positive control, was carried out using the sewage diffusion method against E coli bacteria.* ***Research Results:*** *The results of the study conducted showed that out of 5 samples of unbranded dish soap, there were 2 samples whose inhibition zones were almost in accordance with branded soaps or standardized ones, namely samples A and C. While samples B, D and E had the potential for microbial growth, this was likely due to inconsistencies in results or other variables such as formulation stability, pH, or a suboptimal concentration of active substances over a period of time.* ***Conclusion:*** *From the results of the study, it can be concluded that all samples of liquid dish soap (A–E) show the ability to inhibit the growth of bacteria with an inhibition zone diameter ranging from 15.5 mm to 19 mm and are classified as strong.*

Keywords: *Dish Soap, Diffusion Suction, Escherichia coli*