



## **ABSTRACT**

### ***ANTIMICROBIAL ACTIVITY WATER EXTRACT OF BLACK TEA (Camelia Sinensis ) AGAINST Salmonella typhi***

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*Typhoid fever is a major health problem in developing countries such as Indonesia, especially in urban areas, the disease causing many problems. Chloramfenicol is a common drug which used to cure typhoid fever. However, chloramfenicol possess undesirable adverse reactions, therefore we tried to find out the alternative medicine from herbal plant such as tea. The usage of tea as a herbal medicine had long been known by Indonesian people. Tea's leaves contains flavonoid substance that is catechin which has antimicrobial activities. The purpose of this research is to determine whether Water Extract of Black Tea has antimicrobial activities against Salmonella typhi.*

*Salmonella typhi were inoculated by spread plate method on Mueller Hinton agar, then sterile discs which had been immersed in Water Extract of Black Tea with concentrations of 2,5%, 5%, 10%, 20% were placed on that medium. Inhibition zone on Mueller Hinton plate were observed after 18 - 24 hours incubation in 37°C, then measured in millimeter and were compared with ampicilin and chloramfenicol.*

*The result of this research is that the inhibition zones were found only on 10% and 20% concentration of Water Extract of Black Tea, while no zones were found in concentration less than 10%.*

*The conclusion is that Water Extract of Black Tea has antimicrobial activities against Salmonella typhi.*

*Key word : Water Extract of Black Tea, Salmonella typhi inhibition zone.*

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