

**MICROBIOLOGICAL QUALITY OF SUSHI FROM SUSHI
RETAILERS IN NEGERI SEMBILAN**

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This Final Year Project Report entitled “**Microbiological Quality of Sushi from Sushi Retailers in Negeri Sembilan**” was submitted by Noramiza binti Abdul Wahab, in partial fulfillment of the requirements for the Degree of Bachelor of Science (Hons.) Biology, in the Faculty of Applied Science, and was approved by



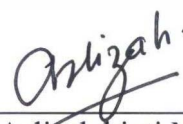
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ABSTRACT

MICROBIOLOGICAL QUALITY OF SUSHI FROM SUSHI RETAILERS IN NEGERI SEMBILAN

Seafood is an important source of protein in the human diet. Eating raw or undercooked seafood such as sushi may harbor the most common foodborne pathogenic bacteria if prepared inexpertly. The aim of this study was to detect the presence and susceptibility level of the pathogenic bacteria towards selected antibiotics. A total of five samples of sushi including rice, shrimp, egg, salmon and crab were randomly purchased from a local retailer in Negeri Sembilan. The bacteria were screen by using Eosin Methylene Bile salts agar (EMBA) and Mac Conkey agar (MCA) and were confirmed by Gram staining and an IMViC test. However, only three isolates were positive for *Klebsiella* spp. which exhibits a high resistance (100%) towards Penicillin (P10), Chloramphenicol (C30) and Novobiocin (NV30). In fact, none of the *Klebsiella* isolates were resistance towards Tetracycline (Te10) and Gentamicin (CN10). In addition, the multiple antibiotics resistance (MAR) indices were ranged from 0.5 to 0.6. The presence of *Klebsiella* in this study had revealed that there was a high probability of contamination occurred due to the inadequate hygiene condition performed by the food handlers while preparing sushi.