

Factors Influencing Repeated use of Palm Oil for Frying during the Shortage Crisis in Thailand.

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During 2010-2011, there was cooking palm oil shortage crisis in Thailand which resulted in price increase more than 50%. It was widely accepted that repeated use of oil for frying food caused changes in physical and chemical properties of oil leading to toxic compound occurrence and palm oil was frequently used for frying, the objective of this study was to determine the factors that probably influenced on repeated use of palm oil for frying by people living in Bangkok. The questionnaires were collected between November 1, 2011 to January 31, 2012 until there were 500 enrollments and the data were analyzed by descriptive cross-sectional statistics. The result revealed that 69.2% of subjects; 102 males and 244 females; customarily used palm oil for frying food. The top 5 reasons to choose palm oil for home cooking oil were easy purchase, lower price, no odor, light color and advertisement, respectively. There was no influential factor on choosing palm oil. During the shortage crisis, 16.2% subjects decided to use other vegetable oils in place of palm oil because of price increment (78.6%), shortage supply (75.0%), friend's suggestion (32.1%) and health information (60.7%). The socio-economic status of subjects was classified into low, medium and high class by education level, occupation, income and number of family member and there were 6.8, 83.2 and 10.0% of subjects in these 3 classes, respectively. By Pearson's chi-square test, it was found that palm oil was significantly reused by people in low socio-economic class ($p < .05$) and the number of times they reused was also significantly higher ($p < .05$). The main reason of repeated use palm oil for frying was marked increase of price (91.2%). Although most subjects (67.6%) knew that repeated use was not good to their health but during shortage crisis, they still did it inattentively. The statistic analysis demonstrated that price increase and health effect unconcern were significantly related to the number of times subjects reused oil ($p < .05$). It was concluded that during the shortage of cooking palm oil in Thailand, socio-economic status of people was the influential factor on the repeated use of palm oil for frying.