## THE EFFECT OF FEED WITH DIFFERENT NFE CONTENT ON THE RAT (Rattus norvegicus) BLOOD GLUCOSE LEVELS

## Zulkifli Abdul Latif

## **ABSTRACT**

The aim of this research was to observe the effect of complete feed with different nitrogen free extract (NFE) content on rat (*Rattus norvegicus*) blood glucose. Twenty eight rats were used in this study with the body weight 50-60 grams, and were randomly divided into four group with seven replication. Treatments were used chicken commercial feed as a control treatment, complete feed P1 (44% NFE content), complete feed P2 (37% NFE content), and complete feed P3 (28% NFE content) with different formula in four weeks. O'Toulidin method was used for blood glucose examination. The result showed that there was significant differences (p<0.05) among control feed to complete feed P1 (44% NFE content), complete feed P2 (37% NFE content), and complete feed P3 (28% NFE content), however no significantly different between P1 and P2 or P1 and P3. Blood glucose level on control feed (55% NFE content) was 124.71 mg/dl, higher than feed formula (P1, P2, P3). Complete feed P1 (44% NFE content) was 88.29 mg/dl, complete feed P2 (37% NFE content) was 98.78 mg/dl, and complete feed P3 (28% NFE content) was 81.28 mg/dl.

**Key words:** complete feed, NFE, blood glucose, *Rattus norvegicus*.