

1068-62-9

Godday Uwawunkonye Ebu (ablegod007@yahoo.com), Department of Statistics, Faculty of Physical Sciences, Nnamdi Azikiwe University, Awka, +23448, Nigeria, and **Chidinma Nwoke*** (ablegod007@yahoo.com), Department of Statistics, Faculty of Physical Sciences, Nnamdi Azikiwe University, Awka, +23448, Nigeria. *Statistical Modeling of Wastage Using the Beta Distribution.*

This work attempts to fit a set of observed industrial wastage to the beta distribution using the chi-square goodness of fit test and it was found to fit the Beta distribution at 1% significance level. The mean and the variance of the wastage proportion were found to be 0.429 and 0.0395 respectively. The parameters of the Beta distribution were $\alpha = 2$ and $\beta = 3$. The skewness of the Beta distribution is 0.286 confirming the claim that the distribution is skewed to the left whenever $\beta > \alpha$ and the distribution is a unimodal distribution since α and β is greater than 1. (Received October 22, 2010)