Lacunae
There is lack of direct evidence which links post prandial lipaemia to causation of type 2 diabetes. Most of the studies carried out so far have focused on lipid abnormalities only in the pathogenesis of macrovascular complications of type 2 diabetes. Indirect evidences about the possible role of post prandial hypertriglyceridemia in the pathogenesis of insulin resistance and type 2 diabetes have been in literature but only few studies have focused attention on this aspect of pathogenesis of T2DM. Results of these studies too have been inconclusive.

Post prandial lipaemia is also emerging as an important risk factor in the development of atherosclerosis particularly in patients with type 2 diabetes mellitus. However, there is no comprehensive study available on post prandial lipaemia in relation to its role in atherosclerosis and macrovascular disease. There is a need for further characterizing and defining the precise role of post prandial hypertriglyceridemia in the development of these complications.

The present study was therefore undertaken as a longitudinal study in male wistar rats to understand the role of post prandial lipaemia in the development of type 2 diabetes mellitus and related macrovascular disease. This was done by a comprehensive assessment of post prandial triglyceride levels and glucose intolerance estimated serially at fortnight intervals by the estimation of insulin resistance over the duration of follow up and by the estimation of inflammatory biomarkers of atherosclerosis and by histopathological studies.