## Special Issue: Proceedings Book, 7<sup>th</sup> International Scientific Conference on Small Ruminant, Hurghada, 9-13 October 2018

Utilization of using Atriplex leucociade Boiss or Noaea mucronata as additive in dairy goat diets.

## Fatma R. Abd Elaziz

## Camal Research Department, Animal Production Research Institute, ARC, Egypt.

Two species of desert plants, which are successfully consumed by goats, have been identified, selected and analyzed for their nutritional parameters. Aiming to study the effect of using desert plants Atriplex leucociade Boiss and Noaea mucronata for feeding goats, three diets (T1,T2 and T3) were formulated using concentrate feed mixture and rice straw as basal diet. The three diets differed in concentrate: roughage ( C: R ) ratios, being 25: 75, 50: 50 and 75:25 for T1,T2 and T3, respectively. Each experimental diet (T1, T2 and T3) was incubated using in vitro technique with adding either 2, 4, 6 or 8 g Noaea mucronata /kg DM or 2.5, 5, 7.5 or 10 g Atriplex leucociade Boiss/kg DM. To investigate the effect of supplementing dies with the different levels of those desert plants, rumen DM and OM disappearance (IVDMD and TVOMD) were measured. The results showed significant increase ( P <0.05) in both IVDMD and IVMD for adding each of the two desert plants to the diet. The level 10 g of Atriplex leucociade or 15g of noaea mucronate /kg dm diet had the superiority to improve both dry matter and organic matter disappearance in the rumen. These results indicate that such desert plants can be used successfully as additives in feeding ruminant to improve rumen Dm and OM disappearance.