Glycemic and insulin indices of tube feeding formulas in healthy adults

Determinación de los índices glicémicos y de insulina en fórmulas para

alimentación enteral en adultos sanos

Gattás Z, Vivien

Barrera, Gladys

Leiva, Laura

De La Maza, M. Pía

Bunout, Daniel

Steenhout, Philippe

Klassen, Petra

Voss, Theresa

Hirsch, Sandra

Background: In acute illnesses, plasma glucose levels are often increased and generally parallel the severity of stress. Hyperglycemia caused by reduced insulin sensitivity and reduced insulin secretion is associated with increased susceptibility to infections. Maintaining blood glucose levels at or below 110 mg/dl reduces morbidity and mortality in critically ill patients. Aim: To measure the glucose and insulin responses of four commercially available enteral formulas compared with a standard meal reference product. Material and Methods: The glycemic index (GI) and the insulin index (II) were determined in a randomized, cross over protocol in 38 healthy volunteers between 18 and 46 years of age. Each subject underwent five tests: three with the standard meal (bread) and two with the study products. The enteral formulas were Clinutren HPR (whole protein of high protein value), Crucial® (casein peptide based formula), Peptamen® , (whey peptide based formula), Glytrol® (formula for diab