

THE EFFECT OF CHEMICAL COMPOSITION OF PEA CONTAINING DIETS ON FEED PREFERENCES BY RATS

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Abstract. The present study was designed to determine the extent in which selected pea seeds constituents, including antinutritional factors, affect the free choice and diet intake by rats. In the experiment in which rats were fed free choice of pea containing diet (400 g/kg) the intake of diet depended on the cultivar inclusion. Diet intake was significantly affected by two variables: protein amount from pea seeds (negative relation) and sucrose content in diet (positive correlation). The other variables which significantly increased sensitivity of multiple regression equation were the content of phenolics, phytates or dietary fibre in diet. Activity of trypsin inhibitors or gross energy of pea seeds had no effect on diet intake.

Key words: Peas, rats, diets, digestible.