THE SUSTAINABLE INTEGRATION OF ANIMAL BY-PRODUCTS INTO THE CIRCULAR BIOECONOMY OF PET FOOD

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Abstract

Anthropogenic activities, particularly those associated with the rearing and slaughter of animals for human and animal consumption, generate a carbon footprint with a significant environmental impact. At European Union level, the food sector and the animal feed industry are recognised as being among the main contributors to global greenhouse gas emissions.

This study aims to explore the applicability of the concept of the circular bioeconomy in the pet food industry. The research analyses the need for and viability of utilising animal by-products not intended or unsuitable for human consumption as a sustainable alternative to 'human-grade' ingredients and assesses the current legislative framework (FEDIAF, AAFCO), the digestibility parameters of these by-products, as well as the barriers arising from perceptions and trends towards humanisation amongst pet owners.

Key words: *animal by-products, circular bioeconomy, pet owners, pet food industry*