SENSORY EVALUATION OF CHICKEN NUGGETS WITH VEGETABLE FIBER ADDED AS FAT SUBSTITUTE

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The high consumption of meat products discussed by some researchers, mainly due to the presence of saturated fat, is considered a risk factor associated with incidence of coronary heart disease and cancers. The use of fat substitutes, such as vegetable fibers, has become a viable alternative for obtaining a feature in meat products considered unhealthy, as restructured meat. The aim of this study was a sensory comparison between a control sample of chicken nuggets, made with chicken skin as a source of fat, and a test sample with the addition of a mix of vegetable fibers (0.4% bamboo fiber, 1.6% of wheat fiber and 1.6% pea fiber) as a total replacement of added fat. The ingredients were mixed, the nuggets were molded in a standard format and covered with an industrial coverage system (predust, batter and breading). A sensory evaluation was conducted with fifty panelists, who evaluated the attributes of appearance, smell, flavor, texture and overall acceptability of cooked products, using a 7-point hedonic scale. Both samples showed good sensory acceptance, with a mean score greater than 5.7 for all attributes. The sample with fibers showed the best performance for texture, indicating that the addition of these ingredients did not affect this attribute, which has direct relationship with the presence of fat. The evaluated application proved to be an interesting alternative in developing products with a more healthy appeal.