

Functional and Sensorial Properties of Chicken Sausage Supplemented with Banana Peel Flours of Different Varieties

ABSTRACT

Meat products are widely consumed worldwide and, as a result, they may be an exciting supplier of health benefits due to the need for better formulations, such as reduced fat and increased fibre in processed meats. This study was carried out to determine how the banana peel (BP) flour of Saba (*Musa balbisiana*) and Berangan (*Musa acuminata*) affect the functional properties and sensory acceptance of chicken sausage. Berangan BPs showed better water- and oil-holding capacity than Saba BP flour. Conversely, Saba BP flour exhibited better swelling power, but was less soluble than Berangan BP flour. Sausages containing high BPs, especially Saba banana, had a more rigid texture, a high storage modulus, and a darker colour. The ability to retain more water in Berangan peel positively affected the sausage's textural and rheological properties. With 2%, chicken sausage received the highest sensory score, with Saba BP-containing sausage following closely behind. However, adding >2% BP of both varieties negatively affected the sausage texture and colour, resulting in reduced sensory acceptance. Thus, the BP from Saba and Berangan bananas showed promise as a potential value-adding ingredient in the formulation of functional meat products. In addition, it has potential health benefits, such as increased dietary fibre.