

International Conference on

NUTRITION AND HEALTH CARE

November 17-18, 2022 | Paris, France

https://www.nutrition.scientexconference.com/

nutrition@scientexconferences.com

TITLE: Consumer Perception and Acceptability of Pro-vitamin A Biofortified Maize 'Ogi' Fortified with Orange Fleshed Sweet Potato and Edible Insect

Name: INYANG, Idara Enobong Affiliation: Research Assistant at National Biotechnology Development Agency. Country: Nigeria Email ID: idaraninmainyang@yahoo.com

ABSTRACT (upto 300 words)

Vitamin-A Deficiency (VAD) and Protein Malnutrition are significant public health issues in developing countries; they can be reduced with a food-based approach by consuming regional foods high in Vitamin-A and protein. The research aim was to evaluate consumer perception and sensory properties of gruel made from Provitamin-A (PVA) Biofortified Maize, Orange Fleshed Sweet Potato (OFSP) and locust powder to combat Protein Energy Malnutrition (PEM) and Vitamin-A Deficiency (VAD) in children less than 5 yrs of age. Composite flour was made by blending fermented PVA Biofortified Maize flour, OFSP flour and locust powder in varying ratios, while fermented PVA Biofortied Maize flour was the control. A 7-scale hedonic test was used to assess sensory evaluation in a study population of 50 parents and caregivers of children under the age of five; consumer perception was assessed by parents and caregivers of children under 5 years (n=300) using an online survey. The sensory analysis indicated that Ogi with high potato content were more appealing than those with low potato content. LEY (70% OFSP, 20% PVA maize and 10% locust) and CHI (90% PVA maize and 10% locust) had the highest rating while, AMR (30% OFSP, 60% PVA maize and 10% locust) and UDY (60% PVA maize, OFSP 30% and locust 10%) had the lowest ratings. The majority of composite gruel was rated neither like nor dislike; overall acceptability differed significantly from the control (100% PVA maize). The online

participants showed positive perceptions towards the consumption of Orange Fleshed Sweet Potato (88.67%) and Provitamin-A Biofortified Maize (68%). There was a negative perception about consuming edible insects (75.58%), yet consumers were willing (68.67%) to introduce edible insects with Ogi as a complementary food to their children. The high acceptability of the gruel containing 70% OFSP and 10% locust powder and willingness of participants to consume products made with OFSP and edible insects is promising to alleviate Protein Energy Malnutrition and Vitamin-A Deficiency.







International Conference on

NUTRITION AND HEALTH CARE

Nutrition 2022

+1 341-208-2801

November 17-18, 2022 | Paris, France

https://www.nutrition.scientexconference.com/

nutrition@scientexconferences.com

Idara Inyang completed her BSc in Food Science and Technology from Bowen University, Iwo, Nigeria. She is a research enthusiast and currently works as a research assistant at Fermentation and Bioprocessing department at National Biotechnology Development Agency, Nigeria. She is passionate about SDG 1 and 2 and aspires to help her country reach this goals. She hopes to start a Master's in Public Health this Fall.

Presenter Name: INYANG, Idara E. **Mode of Presentation:** Oral/Poster. **Contact number:** +2348173109923

