

Co-Creating Pulse-Based Snacks: A UK Innovation Journey

Rosie Tsikritzi, Rachel Smith, Lisa Methven, Jo Anderson, Lorna Zischka, Trisha Bennett, Sally Lloyd-Evans, Colette C. Fagan, Carol Wagstaff

Community's aspiration:

A healthier, convenient & more satiating alternative snack to potato crisps.

Co-creation approach



What we found

- ✓ Market Gap for fava bean snacks
- ✓ Developed an extruded prototype based on the product brief



- ✓ Claims : Fibre, Protein Gluten Free

Co-created Product Brief



Challenges

1. Need for twin innovation on supply chain and policy
2. Snack development trials are long. Optimisation is necessary.
3. Food industry & retailers need to get onboard

What Next ?

- Consumer study in Whitley Reading
- Optimisation trials
- IP/License
- Commercialisation (funding required)
- Assessment of social, environmental, financial and health impact, compared to fried potato crisps

Developing the Concept

- Evaluated potential of different pulse
- Developed snacks using fava bean, chickpea, lupin, yellow pea and green pea flours at bench scale
- Assessed baking, air frying, and extrusion technologies to create a range of textures



Funding: This research was funded through the Transforming the UK Food System for Healthy People and a Healthy Environment SPF Programme, delivered by UKRI, in partnership with the Global Food Security Programme, BBSRC, ESRC, MRC, NERC, Defra, DHSC, OHID, Innovate UK and FSA.

Acknowledgments: We would like to thank the Whitley Community Researchers, the Whitley Community Development Association (WCDA) and all the community participants.

Contact information

Department of Food and Nutritional Sciences, University of Reading, Whiteknights, RG6 6AH

r.tsikritzi@reading.ac.uk; <https://research.reading.ac.uk/food-systems-equality/rosie-tsikritzi/>