EDWIN YENBONO ALLAN

106 Grant Chamberlain Drive 1B, Bozeman, MT 59715 • C: 406-595-3998 • edwin.allan@student.montana.edu

My work experience involves food product development and processing both in the United States and in international settings. I seek internship opportunities to apply my experience and learn more about processing in the food industry.

EDUCATION:

MONTANA STATE UNIVERSITY-Bozeman, Montana

Individual Interdisciplinary PhD

2020-present

Relevant Coursework

Methods of Data Analysis I, Thermodynamics I

Master of Science in Sustainable Food Systems

2018-2020

Cumulative GPA: 3.85 **Relevant Coursework**

Experimental Foods, Applied Methods in Statistics, Global Food Perspectives

UNIVERSITY OF GHANA-Accra, Ghana

2013-2017

Bachelor of Science in Nutrition and Food Science

Cumulative GPA 3.38

Relevant Coursework: Unit Operations in Food Processing I, Unit Operations in Food Processing II, Sensory Evaluation, Food Processing Plant Operations and Sanitation, Food Chemistry

FOOD PROCESSING EXPERIENCE

PASTA MONTANA-Great Falls, MT

Intern

July 2021-August 2021

- Reduced water waste from processing and general usage by 40%
- Extruded semolina flour into short and long pasta
- Determined moisture content, ash content and cook loss of pasta products

MSU FOOD PRODUCT DEVELOPMENT LAB- Bozeman, MT

Graduate Research Assistant-Doctorate Level

June 2020- present

- Developing extruded snacks and pasta from Montana grown chickpeas and lentils
- Graduate researcher on a USDA SBIR project to develop meat alternatives
- Developing a shelf stable falafel recipe for contractor company in Egypt

BOZEMAN FISH TECHNOLOGY CENTER

Volunteer

May 2019 – July

2019

- Ground and sifted fish meal for June sucker fish restoration project in Utah
- Mixed, pulverized and extruded feed ingredients into nutrient dense sink fishmeal pellets for Chinook Salmon

MSU FOOD PRODUCT DEVELOPMENT LAB- Bozeman, MT

Graduate Research Assistant-Masters Level 2020

August 2018 - May

- Developed a culturally acceptable peanut nutrition bar for smallholder farmers in Senegal
- Developed 9 different formulations of the peanut nutrition bar using response surface methodology
- Determined texture profile (TA.XT.plusC) of the peanut nutrition bars
- Developed nutrition labels for the peanut nutrition bars with Food Processor nutrition label software
- Determined the sensory consumer acceptance of peanut nutrition bars with adults and school-age children
- Conducted sensory consumer acceptance tests on lentil crackers developed by the Food Product Development Lab

DEPARTMENT OF NUTRITION AND FOOD SCIENCE, UNIVERSITY OF GHANA

Undergraduate

September 2013 - May 2017

- Produced local hibiscus flower drink with vanilla and strawberry flavors
- Developed shelf-stable pre-mix for local plantain fritters

FOOD MICROBIOLOGY EXPERIENCE

MSU FOOD PRODUCT DEVELOPMENT LAB- Bozeman, MT

Graduate Research Assistant-Doctorate Level

June 2020- present

- Determined the shelf stability of developed peanut nutrition bars
- Conducted microbial analysis on pathogenic and non-pathogenic bacteria in developed falafel mix using 3M Petri films

DEPARTMENT OF NUTRITION AND FOOD SCIENCE, UNIVERSITY OF GHANA

Teaching/Research Assistant

August 2017 - July 2017

- Determined the total coliforms, fecal coliforms and S. aureus concentrations in fresh and smoked barracuda fish
- Determined the yeast and mold, Bacillus cereus and Clostridium perfringens concentrations in smoked barracuda
- Isolated and characterized of E. coli for PCR testing

FOOD ANALYSIS EXPERIENCE

MSU FOOD PRODUCT DEVELOPMENT LAB- Bozeman, MT

Graduate Research Assistant-Masters Level

August 2018 - May 2020

- Developed protocol for the determination of in vitro starch digestibility and estimated glycemic index
- Determined the in vitro starch digestibility and estimated glycemic index of Huckleberry gold potatoes
- Determined the microstructure of developed peanut nutrition bars with stereo microscope

LEADERSHIP EXPERIENCE

MONTANA STATE UNIVERSITY

August 2018-May 2020

- Led Montana State University team to win first place in the Developing Solutions for Developing Countries Competition (DSDC), Institute of Food Technologists 2020 conference
- Financial secretary of the African Society. Organized the first ever African Night at Montana State University
- Member of the Institute of Food Technologists 2019-2020 Non-Affiliated Members committee

SOFTWARE CAPABILITIES

Genesis R&D Nutrition Label, Exponent Connect (Texture Analysis), RStudio, xlstat, SPSS, and Microsoft Office Suite

NOTABLE AWARDS

- Outstanding Graduate Student in Sustainable Food Systems, Montana State University 2020 spring semester
- Montana State University's graduate award in Scholarship Excellence 2020 spring semester
- Judges' Choice Award in Montana State University \$50K venture competition
- First Place in the Developing Solutions for Developing Countries Competition (DSDC), Institute of Food Technologists 2020 conference

CERTIFICATES

- ServSafe Certification: 9/22/2018 9/22/2023
- Basic Meat Microbiology Training and HACCP Training: 6/5/2020
- FSPCA Preventive Controls for Human Food: 10/7/2020