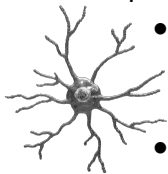


Offered Spring 2021, Penn State University, NUTR 497 (Synchronous, Zoom meetings)

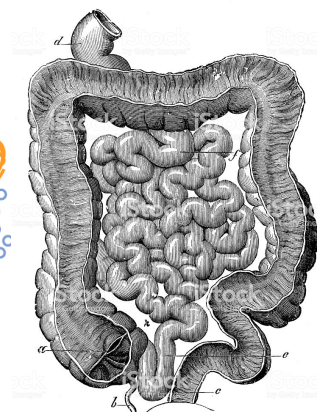
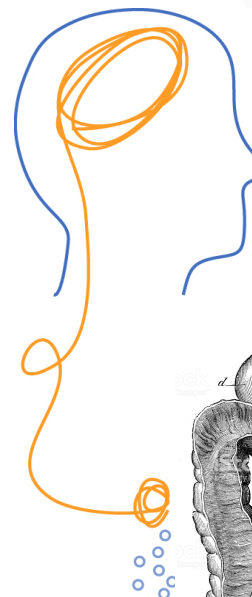
Nutritional Neuroscience; Gut-Brain Communication in Health and Disease.

Interdisciplinary course examining neurobiological mechanisms of nutrition.



- We will explore how food affects behavior and brain circuits, and *vice versa*: how neural circuits and gut hormones control eating and other behaviors.
- We will dissect the proverb “You are what you eat”, and examine the effect of diet and body weight on behavior and cognition. Links between pathology and dysfunction in the gut and neurological and psychiatric disease will also be explored.
- You will leave knowing: How food affects mental health? Why are gut hormones explored as a new line of treatment for alcohol and opioid addiction? Can diet affect epileptic seizures? Does gut-brain communication differ in men and women? How can food change your body temperature and why?

This course will cover current neuroscience findings from both animal models and human studies. We will also have opportunities for critical evaluation of media coverage of nutritional neuroscience topics.



Nutrition 497

Nutritional Neuroscience

Spring 2021 January 11th – April 30th

3 credits

Instructor:

Karolina Skibicka, Ph.D email: kps5783@psu.edu