Food for thought: The cognitive science of eating
H241 Honors Seminar (for freshmen)

Fall Semester 2013
Meeting times: 9:30-10:45 a.m. (3 credits)
Location: Hutton Honors College building, Room tba
Professor: Peter M. Todd
Office Hours: tba, in Psychology 369, phone 855-3914
Email: pmtodd (at) indiana.edu

Books:

Other readings will be distributed each week in class or online

Course description
People spend a lot of time thinking about food—by some estimates, we make dozens to hundreds of food-related decisions per day. But how do we think about food? What are the ways we make these decisions, and how are they influenced by what we’ve learned and remember and by what we’ve evolved to like or avoid? These are the types of questions that cognitive scientists, including psychologists, anthropologists, and behavioral biologists, ask about people’s thinking, and in this course we will apply the ideas and methods of cognitive science to the domain of eating behavior. We will look at how people learn about different foods and come to have particular preferences; how we remember what we’ve eaten and how that influences what we will eat in the future; how social influences affect our food choices; what factors make us eat more or less; and how we can influence our own decision making about food in healthy directions.

We will have a special emphasis this year on the campus-wide Themester topic of connectedness, looking at where networks are found in the context of eating. Cognitive science is full of networks, and many of these touch on food—we will explore external human networks, including how obesity may spread through the social network of friends and family, and how information and rumors about food may spread through media networks; we will study external biological networks created by evolution, such as the network of flavors linking different foods together, and the structure of food webs and what makes them stable or fragile; and we will look at internal networks, from the semantic networks of concepts that we search through in memory, to the neural networks that underlie much of our memory and cognition in the first place. We will cover the research of leading network science experts here at IU, including YY Ahn in Informatics and Complex Systems on flavor networks and Olaf Sporns in Psychology and Neuroscience on brain networks, along with guest lectures to discuss the connections in/between food and cognition.

The course will include weekly readings and discussions, participation in experiments related to food choice, writing short critical essays about these as well as a longer final research paper, and guest lectures and visits to local institutions related to thinking about food, showcasing the world-leading cognitive science program we have here at IU.