

# CONSUMER NEUROSCIENCE

# **Consumer Neuroscience**

# **Course Description:**

This course provides an introduction to consumer neuroscience, covering topics such as neuroimaging techniques, cognitive and affective neuroscience, and neuromarketing applications. Throughout the course, students will learn how to apply neuroscience concepts and methods to understand consumer behavior, marketing strategies, and decision-making processes.

## **Course Goals:**

- Understand the fundamentals of consumer neuroscience
- Learn how to apply neuroimaging techniques and cognitive neuroscience to consumer research
- Develop practical skills in neuromarketing applications and analysis
- Understand the ethical considerations in consumer neuroscience research

# **Course Policies:**

- Attendance is mandatory and will be factored into the final grade
- Late submissions will be penalized
- Plagiarism will not be tolerated and will result in a failing grade
- Classroom discussions should be respectful and constructive

# Course Schedule:

#### Week 1: Introduction to Consumer Neuroscience

- 1. Overview of consumer neuroscience
- 2. Historical perspectives on the field
- 3. Importance of consumer neuroscience
- 4. Major components of consumer neuroscience

#### Week 2: Neuroimaging Techniques in Consumer Research

- 1. Magnetic resonance imaging (MRI)
- 2. Electroencephalography (EEG)
- 3. Positron emission tomography (PET)
- 4. Functional near-infrared spectroscopy (fNIRS)

#### Week 3: Cognitive and Affective Neuroscience in Consumer Research

- 1. Attention and perception
- 2. Memory and learning
- 3. Emotion and motivation
- 4. Decision-making and reward

#### Week 4: Neuromarketing Applications

- 1. Advertising and branding
- 2. Product design and packaging
- 3. Pricing and promotions
- 4. Consumer experience and engagement

#### Week 5: Analysis of Neuroscientific Data

- 1. Data preprocessing and cleaning
- 2. Univariate and multivariate analyses
- 3. Machine learning and pattern recognition
- 4. Visualization and interpretation

#### Week 6: Ethics in Consumer Neuroscience Research

- 1. Informed consent and confidentiality
- 2. Privacy and data protection
- 3. Professional standards and codes of conduct
- 4. Social and cultural implications

## Grading and Assessment:

Attendance and participation (10%) Individual research paper on a topic related to consumer neuroscience (20%) Group project on neuromarketing application and analysis (20%) In-class presentations and discussions (20%) Mid-term exam (15%) Final exam (15%)

# **Required Readings:**

- 1. <u>Neuromarketing: Understanding the Buy Buttons in Your Customer's Brain by</u> <u>Patrick Renvoise and Christophe Morin</u>
- 2. <u>Neuroeconomics: Decision Making and the Brain by Paul W. Glimcher and Ernst</u> <u>Fehr</u>
- 3. <u>Brainfluence: 100 Ways to Persuade and Convince Consumers with</u> <u>Neuromarketing by Roger Dooley The Buying Brain: Secrets for Selling to the</u> <u>Subconscious Mind by A. K. Pradeep</u>
- 4. <u>Neuromarketing for Dummies by Stephen J. Genco, Andrew P. Pohlmann, and</u> <u>Peter Steidl</u>
- 5. The Psychology of Consumer Behavior by Richard P. Bagozzi and Ayalla Ruvio
- 6. <u>Decoding the Irrational Consumer: How to Commission, Run and Generate</u> <u>Insights from Neuromarketing Research by Darren Bridger</u>
- 7. <u>The Neurology of Consciousness: Cognitive Neuroscience and Neuropathology</u> by Steven Laureys