

# FLORIDA ATLANTIC UNIVERSITY™

## Graduate Programs—NEW COURSE PROPOSAL<sup>1</sup>

UGPC APPROVAL \_\_\_\_\_  
 UFS APPROVAL \_\_\_\_\_  
 SCNS SUBMITTAL \_\_\_\_\_  
 CONFIRMED \_\_\_\_\_  
 BANNER POSTED \_\_\_\_\_  
 CATALOG \_\_\_\_\_

DEPARTMENT: BIOMEDICAL SCIENCE

COLLEGE: CHARLES E. SCHMIDT COLLEGE OF MEDICINE

**RECOMMENDED COURSE IDENTIFICATION:**

PREFIX PCB COURSE NUMBER 5849 LAB CODE (L or C) No Lab

(TO OBTAIN A COURSE NUMBER, CONTACT [MJENNING@FAU.EDU](mailto:MJENNING@FAU.EDU))

COMPLETE COURSE TITLE: NEUROBIOLOGY OF ADDICTION

**EFFECTIVE DATE**

(first term course will be offered)

SPRING 2015

CREDITS<sup>2</sup>: 3

**TEXTBOOK INFORMATION:**

Drugs, Addiction, and the Brain

Authors: G.F. Koob, M.A. Arends, M. LeMoal (2014)

GRADING (SELECT ONLY ONE GRADING OPTION): REGULAR  SATISFACTORY/UNSATISFACTORY \_\_\_\_\_

**COURSE DESCRIPTION, NO MORE THAN THREE LINES:** This course is intended to provide graduate students with fundamental information on molecular, cellular, and neurocircuitry systems in the brain that are responsible for drug addiction. Common neurobiological elements are emphasized that provide novel insights into how the brain mediates the acute rewarding effects of drugs of abuse and how it changes during the transition from initial drug use to compulsive drug use and addiction.

PREREQUISITES \*: NONE

COREQUISITES\*: NONE

REGISTRATION CONTROLS (MAJOR, COLLEGE, LEVEL)\*:

GRADUATE LEVEL PROGRAM

INSTRUCTOR PERMISSION

\* PREREQUISITES, COREQUISITES AND REGISTRATION CONTROLS WILL BE ENFORCED FOR ALL COURSE SECTIONS.

MINIMUM QUALIFICATIONS NEEDED TO TEACH THIS COURSE: BIOMEDICAL OR COM FACULTY

Faculty contact, email and complete phone number:

Dr. Ceylan Isgor  
[cisgor@fau.edu](mailto:cisgor@fau.edu)  
 Tel. (561) 297-0712

Please consult and list departments that might be affected by the new course and attach comments.<sup>3</sup>

None

**Approved by:**

Department Chair: \_\_\_\_\_

College Curriculum Chair: \_\_\_\_\_

College Dean: \_\_\_\_\_

UGPC Chair: \_\_\_\_\_

Graduate College Dean: \_\_\_\_\_

UFS President: \_\_\_\_\_

Provost: \_\_\_\_\_

Date: 8/26/14

8/26/14

1. Syllabus must be attached; see guidelines for requirements: [www.fau.edu/provost/files/course\\_syllabus.2011.pdf](http://www.fau.edu/provost/files/course_syllabus.2011.pdf)

2. Review **Provost Memorandum: Definition of a Credit Hour** [www.fau.edu/provost/files/Definition\\_Credit\\_Hour\\_Memo\\_2012.pdf](http://www.fau.edu/provost/files/Definition_Credit_Hour_Memo_2012.pdf)

3. **Consent** from affected departments (attach if necessary)

Email this form and syllabus to [UGPC@fau.edu](mailto:UGPC@fau.edu) **one week before** the University Graduate Programs Committee meeting so that materials may be viewed on the UGPC website prior to the meeting.

## NEUROBIOLOGY OF ADDICTION- Spring 2015

**Course #** PCB (TBD) – 3 credits  
**Course Requisites:** Instructor Permission  
**Instructors:** Dr. C. Isgor - [cisgor@fau.edu](mailto:cisgor@fau.edu)  
**Course hour:** one a week- TBD  
**Place:** TBD  
**Office hour & place:** By appointment Rm 323

**Text:** Drugs, Addiction, and the Brain  
**Authors:** G.F. Koob, M.A. Arends, M. LeMoal (2014)

**Course Description:** This course is intended to provide graduate students with fundamental information on molecular, cellular, and neurocircuitry systems in the brain that are responsible for drug addiction. Common neurobiological elements are emphasized that provide novel insights into how the brain mediates the acute rewarding effects of drugs of abuse and how it changes during the transition from initial drug use to compulsive drug use and addiction. Students will be expected to attend all lectures and participate in in-class discussions, complete 2 in-class exams and give assigned journal article presentations in order to attain full marks. *Attendance will be taken every class.*

**Course Objective:** The course is aimed to provide a comprehensive review of drug use, abuse and addiction process from behavioral, neurophysiological and neuropharmacological points of view. The course will introduce common drugs of abuse, and the brain circuitry mediating their effects as well as cover neuroadaptive processes initiated with repeated exposure of each class of abused substances.

### Course Schedule:

Date	Topic
January 6	Fundamental Theories of Addiction An Overview
January 13	Neuropsychopharmacological Principles Pharmacokinetics
January 20	Animal Models of Addiction <b>(Topics will be distributed for Journal Presentations)</b>
January 27	Psychostimulants: Physiology, Behavioral Effects, Pharmacokinetics
February 3	<b>Journal Presentation Week # 1</b>

February 10	Opioids: Physiology, Behavioral Effects, Pharmacokinetics
February 17	<b>Midterm EXAM</b> <b>(35% of final grade; multiple choice and short essay format)</b>
February 24	Alcohol: Physiology, Behavioral Effects, Pharmacokinetics <b>(Topics will be distributed for Journal Presentations)</b>
<b>March 3</b>	<b>SPRING BREAK</b>
March 10	<b>Journal Presentation Week # 2</b>
March 17	Nicotine: Physiology, Behavioral Effects, Pharmacokinetics <b>(Topics will be distributed for Journal Presentations)</b>
March 24	Cannabinoids: Physiology, Behavioral Effects, Pharmacokinetics
March 31	<b>Journal Presentation Week # 3</b>
April 7	Drug Addiction: Transition from Neuroadaptation to Pathophysiology
April 14	Clinical Perspectives: Treatment of Addictions
April 23-29	<b>FINAL EXAM</b> <b>(35% of final grade)</b>

**Grading:**

EXAMS	70 pts
PRESENTATION	20 pts
ATTENDANCE	10 pts

**Course Policies:** Makeup tests and late work are not allowed unless an approved physical problem or schedule conflicting with University-approved activities

**Classroom etiquette:** Please refer to the FAU Catalog and Student Handbook. Compliance with university rules and regulations is expected of all students.

**Academic Honor Code:** Students at Florida Atlantic University are expected to maintain the highest ethical standards. Academic dishonesty is considered a serious breach of these ethical standards because it interferes with the University mission to provide a high quality education in which no student enjoys an unfair advantage over any other. Academic dishonesty is also destructive of the University community, which is grounded in a system of mutual trust and places high value on personal integrity and individual responsibility.

The FAU Honor Code requires a faculty member, student, or staff member to notify an instructor when there is reason to believe an academic irregularity is occurring in a course. The instructor must pursue any reasonable allegation, taking action where appropriate. The following constitute academic irregularities:

1. The use of notes, books or assistance from or to other students while taking an examination or working on other assignments, unless specifically authorized by the instructor, are defined as acts of cheating.
2. The presentation of words or ideas from any other source as one's own is an act defined as plagiarism.
3. Other activities that interfere with the educational mission of the University.

For full details of the FAU Honor Code, see University Regulation 4.001 at [www.fau.edu/regulations/chapter4/4.001\\_Honor\\_Code.pdf](http://www.fau.edu/regulations/chapter4/4.001_Honor_Code.pdf).

**Students With Disabilities:** In compliance with the American Disabilities Act (ADA), students who require special accommodations due to a disability to properly execute coursework must register with the Office for Students with Disabilities (OSD) – in Boca Raton, SU 133 ([561-297-3880](tel:561-297-3880)); in Davie, MOD 1 ([954-236-1222](tel:954-236-1222)); in Jupiter, SR 117 ([561-799-8585](tel:561-799-8585)); or at the Treasure Coast, CO 128 ([772-873-3305](tel:772-873-3305)) – and follow all OSD procedures.