# Childhood Obesity, Nutrition and Social Context HESC 470

# **COURSE DESCRIPTION FROM THE CATALOG**

A comprehensive and multidisciplinary approach to understanding childhood obesity in diverse/underserved populations, including basic biological processes, the role of nutrition, health consequences and cultural factors associated with childhood obesity incidence and prevention.

Pre-requisites: HESC 220 and HESC 350

This course cannot be taken for graduate credit.

#### **REQUIRED TEXTS**

The National Research Council. (2005). *Preventing childhood obesity: Health in the balance*. Washington, DC: The National Academies Press. (go to <a href="http://www.nap.edu/catalog.php?record\_id=11015">http://www.nap.edu/catalog.php?record\_id=11015</a> to download **free** copy as quest)

Course Reader (details to come)

# **COURSE OBJECTIVES**

- 1. Understand the biological mechanisms and chronic disease risk associated with childhood obesity
- 2. Evaluate the role of social context/social ecology, including structural factors (schools and the community), culture and economics on childhood obesity in underserved populations.
- 3. Synthesize how social contextual/social ecological factors in combination with individual psychosocial factors affect eating behaviors and childhood obesity in diverse populations.
- 4. Evaluate the role of physical activity and proper nutrition education in childhood obesity prevention.
- 5. Demonstrate the skills and knowledge necessary to identify social and cultural aspects of a childhood obesity prevention program, including evaluation for diverse communities.

#### **LEARNING GOALS**

By completing the course readings, assignments, attending lectures and taking exams, the student will be able to:

- 1. Demonstrate knowledge and comprehension of the extent and consequences of childhood obesity and poor nutrition
- 2. Identify how social context/social ecology including the role of schools, communities and the home impact childhood obesity
- 3. Demonstrate critical thinking in how cultural differences and cultural influences affect childhood obesity and eating behaviors
- 4. Evaluate the role of physical activity and physical activity interventions on childhood obesity
- 5. Evaluate and analyze the latest peer-reviewed research on childhood obesity and nutrition
- 6. Review an existing childhood obesity prevention program and critique the program based on social and cultural aspects.

# PLANNED ASSIGNMENTS

See specific due dates for all assignments on the course schedule on the last page of the syllabus.

The grading rubric and additional details for each assignment will be provided in a separate document.

### 1. Research and evidence-based learning assignment

During the course, you will familiarize yourself with the latest evidence-based research on childhood obesity and nutrition. To conduct the research and critically evaluate issues related to childhood obesity, you will attend the CSUF-UC Davis Symposium on evidence-based research related to childhood obesity and nutrition hosted at CSUF (symposium is scheduled for Sept.  $22^{nd} - 23^{rd}$ ). The topics covered at the symposium are listed below. After attending the symposium, you will conduct a review of the literature, find **three** peer-reviewed articles on childhood obesity and nutrition, and complete the following:

- A. Participate in a group discussion. After attending the research symposium, complete a discussion on TITANium. Briefly discuss what research topic you found interesting, any other impressions you had related to the topics discussed/presented and one question you have after attending the symposium. Also, respond to at least two posts, including attempting to answer the question. A one sentence response is not sufficient; rather, you should contribute a detailed response on the initial post.
- B. Create an annotated bibliography on the **three** articles you found in APA style (a handout will be provided on how to write an annotated bibliography). Also include how the article relates to the information presented at the symposium. Since we will be discussing the social and cultural influences related to childhood obesity, indicate if the article addresses these factors and if not, what could the researchers have done to include the social context/social ecology of the communities studied and how would this have impacted childhood obesity and nutrition in their communities. Please attach the articles to this assignment.

The symposium and article topics will include, but are not limited to, the following:

- Maternal and child nutrition issues in low-income populations and developing countries
- Behavioral interventions to decrease childhood obesity in the Women, Infants, and Children (WIC) population
- Acculturation, parental feeding strategies and childhood nutrition in the Hispanic bi-national (US Mexico) population
- Nutrition curricula and garden-based learning in the K-12 schools
- Fetal origins of chronic disease
- Biologic consequences of obesity and development of chronic disease in children and adults (Diabetes, Cardiovascular disease, and Metabolic syndrome)
- · Food insecurity, diet quality and body weight
- Fruits and vegetables, phytonutrients and health promotion
- Nutrition and agriculture

  relationship to public health in diverse populations
- Career pathways and opportunities in nutrition and community health

## 2. Physical Activity/Nutrition Lesson Plans

There will be 2 lesson plans during week 14-15 (see the schedule below for specific dates). The lesson plan format will consist of the content standards, objective for lesson, anticipatory set, direct instruction, engaged instruction and activity, assessment, and reflective closure. A template of the format will be provided via TITANium. Students will teach their lesson in class, in small groups and post their plans on TITANium. Begin to focus your interest area with regard to nutrition and physical activity. For example, are you interested in a specific age group, ethnic community, health condition, etc.

# 3. Program/Curriculum Critique

Towards the end of the semester, in groups of 4 or 5, you will find an existing childhood obesity and nutrition program/curriculum being implemented in the community. You will prepare a 4-5 page paper critique of the program based on what you have learned over the semester. A major focus of your critique should address cultural and social aspects (e.g. culture, family influences, economics, and the built environment). The format for the paper will be provided in a handout, mid-semester.

# **GRADING POLICY FOR THE COURSE**

Assignments	Points
Class participation and attendance	50
Research and evidence-based assignment	
Part A	100
Part B	100
Lesson Plans (2 at 75 points each)	150
Program critique	200
Midterm	200
Final Exam	200
Total	1000 points

# **Grading Criteria**

Plus/minus grading WILL be used in this course this semester.

A 100-93%	A- 92-90%	B+ 89-86%
B 85-83%	B- 82-80%	C+ 79-76%
C 75-73%	C- 72-70%	D+ 69-66%
D 65-63%	D- 62-60%	F 59 or lower

# **EXAMINATIONS**

There will be a midterm and a final exam, each covering material from the preceding lectures. Please see the course schedule below for exact dates/weeks. Unless prior arrangements are made, no make-up exams will be allowed.

# ATTENDANCE & PARTICIPATION

For every lecture attended, you will receive 2 points towards your grade (15X2=30points). In addition, there will be 20 discretionary points given based on your involvement in class discussions. Arriving late and leaving early will impact receipt of these points.

# LATE WORK POLICY

If an assignment is one day late, one grade will be deducted from the original grade earned. Assignments submitted after three days of the due date will not be accepted. No make-up exams will be allowed unless prior arrangements are made.

# **EXTRA CREDIT OPTIONS**

If any extra credit options are offered, they will be available to all students on an equitable basis.

#### **ACADEMIC DISHONESTY POLICY**

All work for this class is to be your own work. You are responsible for familiarizing yourself with the Academic Dishonesty section of the University Catalog (page 484). You can access this information online in the Student Handbook, under Student Discipline, Academic Dishonesty Procedures, Policy at <a href="http://www.fullerton.edu/handbook/policy">http://www.fullerton.edu/handbook/policy</a>. If you have any questions about what constitutes plagiarism or cheating, please ask the instructor. Further, academic dishonesty includes such things as cheating, inventing false information or citations, plagiarism, and helping someone else commit an act of academic dishonesty. Students found guilty of academic dishonesty will be assigned an appropriate academic penalty ranging from a reprimand to a grade of F and will be reported to the Judicial Officer on campus. **PLAGIARISM** is a specific form of academic dishonesty (cheating) which consists of handing in someone else's work, copying or purchasing a composition, using ideas, paragraphs, sentences, or phrases written by another, or using data and/or statistics

compiled by another without giving citation. Any acts of academic dishonesty will be dealt with in accordance to CSUF policies and will receive a 0 on assignments.

## **DISABLED STUDENT SERVICES**

The mission of our Disabled Students Services Office is "to make all of the university's educational, cultural, social, and physical facilities and programs accessible to students with orthopedic, functional, perceptual and/or learning disabilities." Please inform me during the first week of classes about any disability or special needs that you have that may require specific arrangements related to attending class sessions, carrying out class assignments, or writing papers or exams; I will be most happy to make appropriate accommodations. According to the California State University Policy, students with disabilities need to document their disabilities at the Disabled Student Services Office. The office is located in UH 101; the phone number is (657) 278-3117. See www.fullerton.edu/disabledservices.

# **CLASS ETIQUETTE/COMMUNICATIONS**

The classroom is a wonderful place to learn, exchange ideas and experience both academic and personal growth. Therefore, to protect and respect this collegial environment, it is very important to actively listen and not be disruptive when your peers or the professor is speaking. Please refrain from using cell phones and pagers during class. Also, coming to class well-rested, eating prior to class (not in class), and being involved with discussions in class will contribute significantly to your efforts in furthering your knowledge of the material covered in this class. All these measures will preserve the integrity of the educational experience.

# OTHER INSTRUCTIONAL MATERIALS AND ACTIVITIES

#### **Guest Speakers:**

A series of guest speakers will give presentations on various topics throughout the semester.

#### Dates and Time for the CSUF-UC Davis Symposium:

The symposium will be held during week 5, **Sept. 22-23, 2012**. Please make arrangements with your schedules to attend both days. Absence from these symposiums will affect your points for assignment 1.

#### Additional Readings:

A majority of the readings are publicly available. Either a link or the article will be posted on TITANium.

- Centers for Disease Control and Prevention. (2008). Making physical activity a part of a child's life. Retrieved from: http://www.cdc.gov/physicalactivity/everyone/getactive/children.html
- Crawford, P. B., & Webb, K. L. (2011). Unraveling the paradox of concurrent food insecurity and obesity. *American Journal of Preventive Medicine*, 40, 274 275.
- Dave, J. M., Evans, A. E., Saunders, R. P., Watkins, K. W., & Pfeiffer, K. A (2009). Associations among food insecurity, acculturation, demographic factors, and fruit and vegetable intake at home in Hispanic children. *Journal of American Dietetic Association*, 109, 697-701.
- Drewnowski, A. (2009). Obesity, diets, and social inequalities. *Nutrition Reviews*, 67, S36-39.
- Gidding, S. S., Lichtenstein, A. H., Faith, M. S., Karpyn, A., Mennella, J. A., Popkin, B.... Whitsel, L. (2009). Implementing American Heart Association Pediatric and Adult Nutrition Guidelines. *Circulation, 119,* 1161-1175.
- Heim, S., Stang, J., & Ireland, M. (2009). A garden pilot project enhances fruit and vegetable consumption among children. *Journal of Dietetic Association*, 109, 1220-1226.
- Hughes, C. K. (1998). Culturally appropriate health intervention programs for Native Hawaiians. *Journal of Asian American Pacific Islander Healt, h* 6, 174-179.

Kovar, S., Combs, C., Campbell, K., Napper-Owen, G., & Worrell, V. (Eds.). (2012). *Elementary classroom teachers as movement educators* (4<sup>th</sup> Edition). McGraw-Hill: New York, NY.

Physical Education Framework for California Public Schools: Kindergarten through GradeTwelve (2009). California Department of Education: Sacramento, CA. <a href="https://www.cde.ca.gov/be/st/ss/documents/pestandards.pdf">www.cde.ca.gov/be/st/ss/documents/pestandards.pdf</a>

# **EMERGENCY PREPAREDNESS**

Please familiarize yourself with campus emergency procedures: <a href="http://prepare.fullerton.edu/ep\_students.html">http://prepare.fullerton.edu/ep\_students.html</a> Consult our TITANium course site for updates and announcements if we are unable to attend class due to an emergency situation and/or campus closure (e.g., earthquake).

A link to the campus evacuation areas is at: http://prepare.fullerton.edu/Evacuations.htm

On the first day of class we will review:

- Evacuation routes out of the classroom.
- A meeting place to ensure all students have safely evacuated from the building.
- Student concerns about evacuation procedures.

# 16-WEEK SCHEDULE (15 weeks of instruction plus 1 exam week)

WEEK	TOPIC(S)	ACTIVITIES	READING ASSIGNMENTS
Week 1	Introduction to Childhood Obesity Photo/Video Release Due	- Lecture and Class Discussion	NAP text, Chapter 1
Week 2	Holiday - NO CLASS MEETING		
Week 3	Extent and Consequences of Childhood Obesity	- Lecture and Class Discussion	NAP text, Chapter 2
Week 4	Developing an Action Plan	- Lecture and Class Participation	NAP text, Chapter 3
Week 5	National Public Health Priority	- Attend Symposium Sept 22-23 - Lecture and Class Participation	NAP text, Chapter 4
Week 6	Social Context/social ecology with Regard Childhood Obesity and Nutrition in Underserved Populations	<ul><li>Lecture and Class Participation</li><li>Assignment 1A (Titanium Discussion) Due</li></ul>	NAP text, Chapter 7 And Assigned readings
Week 7	Cultural Issues Related to Obesity and Nutrition for Underserved Populations	<ul><li>Lecture and Class Participation</li><li>Assignment 1B Due (Annot. Bibliography)</li></ul>	NAP text, Chapter 8 Assigned readings
Week 8	Meaning of Food and Emotional eating Food decisions: Knowledge ⇒ Intentions ⇒ Behaviors ⇒ Maintenance in Underserved Populations	- Lecture and Class Participation	Assigned readings
Week 9	Childhood Obesity & Nutrition research in Southeast Asian populations. Part 1	Lecture and Class Participation     MIDTERM	Assigned readings
Week 10	Childhood Obesity & Nutrition research in Southeast Asian populations, Part 2	- Lecture and Class Participation	Assigned readings
Week 11	Childhood Obesity & Nutrition research in Pacific Islander populations	- Lecture and Class Participation	NAP text, Chapter 6 Assigned readings
Week 12	Holiday - NO CLASS MEETING		
Week 13	Holiday - NO CLASS MEETING		
Week 14	Fundamental Movements and Skill Development, Integrating Nutrition, Lesson Planning	- Lecture and Class Participation	Ch. 3 Kovar; Physical Education Framework
Week 15	Exercise Concepts, Fitness Education, Nutrition for Underserved Populations, Lesson Planning	- Lecture and Class Participation - Assignment 2, Lesson Plan 1 presentations Due	Ch. 4 Kovar; Physical Education Framework
Week 16	Physical Activity and Nutrition, Motivation Final Wrap-up and Summary	- Lecture and Class Participation - Lesson Plan 2 presentations Due - Assignment 3: Program Critique Due	Ch. 9 & 10 Kovar; Healthy People 2020 NAP text, Chapter 9
Week 17	Exam Week	- Final Exam 5:00pm	