COURSE OUTLINE HH/KINE 4518.03 THE MOLECULAR LINK BETWEEN OBESITY AND CANCER Fall 2018

Course Director:	Michael Connor Ph.D. Office: 423B Life Sciences Building Phone: (416) 736-2100 ext. 77206 E-mail: mconnor@yorku.ca
Lecture times:	Tuesday/Thursday 11:30 AM-1:00 PM Ross North Rm 145
	Important Dates:

October 6-12: Fall Reading Week, No Classes Tuesday October 16: Mid-term 1 Friday November 9: <u>LAST DAY TO DROP COURSE (NO GRADE)</u> Tuesday November 13: Mid-term Exam 2 Thursday December 5: Last class Tuesday December 4: Classes end; Paper due; LAST DAY TO DROP COURSE (GRADE OF W)

COURSE LEARNING OBJECTIVES:

A) Breadth and Depth of Knowledge

1. Demonstrate a broad interdisciplinary knowledge of the importance of physical activity to health throughout the life cycle.

2 Generalize practical physical activity experiences to enhance further opportunities.3. Critically evaluate and discuss current issues relating to Kinesiology and Health Science.

4. Demonstrate a breadth and depth of knowledge in Kinesiology and Health Science in one or more specialized areas.

B) <u>Knowledge of Methodologies for Inquiry</u>

1. Prepare, interpret and present data using appropriate qualitative and quantitative methods.

2. Describe the process of research that is used to develop knowledge in the field of Kinesiology and Health Science.

3. Apply research methods to kinesiology and human health topics and solve problems using their knowledge of research methods in the discipline.

4. Evaluate information about physical activity and human health that is disseminated via popular media and discipline related research journals.

5. Describe the ethical issues faced by investigators in the Kinesiology and Health Science field.

C) <u>Application of Knowledge</u>

1. Use knowledge and skills to advocate for the fundamentals of physical activity and health from general to specific situations.

2. Apply subject-based theories, concepts or principles to solve problems.

D) <u>Communication Skills</u>

Access Kinesiology and Health Science information from a variety of sources.
Use appropriate academic terminology and notation when preparing and presenting information.

3. Present ideas and arguments in a well-structured and coherent manner using appropriate communications formats.

E) Awareness of Limits of Knowledge

1. Understand and appreciate the dynamic nature of information in Kinesiology and Health Science.

2. Be aware of the limits in knowledge and methodologies when analyzing, evaluating, interpreting and disseminating information.

- F) <u>Autonomy and Professional Capacity</u>
 - 1. Be able to evaluate new information in Kinesiology and Health Science.

2. Have developed strategies to maintain or enhance knowledge in the Kinesiology and Health Science field.

3. Be able to think independently, problem solve and set tasks.

COURSE DESIGN/GOALS:

This is a **molecular biology course** and although some basics will be covered, students will be responsible for "catching up" on background information that is expected to be in place. This course is designed to explore the molecular mechanisms behind Cancer and explore the link between obesity and certain types of cancer. We will discuss some of the therapies used to treat Cancer and how knowing the links between obesity and cancer can lead to new and hopefully successful therapies. Much of the material will represent current work either recently published or currently being undertaken.

One of the goals of this course is to convey the background information on the underlying mechanisms responsible for disease development and progression. In addition, it is expected that students develop the ability to critically evaluate the existing literature in order to be able to analyze published data and begin to formulate their own **UNIQUE** opinions/ideas. Furthermore, upon completion of the course it is hoped that students will be able to better understand how diseases progress and visualize how novel treatments may be developed/implemented in an attempt to eliminate the burden of cancer on society at a social and economical level.

Breakdown of Grades

Mid-term exam 1:	20% (Tuesday October 16)
Mid-term exam 2:	20% (Tuesday November 13)
Paper:	25 % Total
	- Topic Rationale – 2.5% (Mon Oct 1 11:59 PM)
	- Annotated bibliography- 2.5% (Mon Nov 3 11:59 PM)
	- Paper: 20% (Tuesday December 4 11:59 PM)
Opinion Paper 1:	5% (Friday December 21, 11:59 PM)
Opinion Paper 2:	5% (Friday December 21, 11:59 PM)
Final exam:	25% TBD in the Final Exam Period

Exam relevant material will consist of all the material covered in lectures and power point slides. It is strongly advised that you attend all lectures. Exams will consist of short answer and essaytype questions. If you miss a midterm exam for a documented medical or other reason, the weighting of the missed exam will be split between the other 2 exams. There will be no make-up for mid-term exams. If you miss the final exam, with appropriate documentation, you will be required to write a make-up exam sometime early in the Winter term. Proper documentation must be delivered to the course director NO LATER THAN 1 WEEK FOLLOWING <u>ANY</u> EXAM. IF YOU FAIL TO DO SO A GRADE OF ZERO WILL BE ASSIGNED. If you miss both mid-terms you will be required to write a cumulative make-up exam following the exam period. Do not ask to have your grade increased. <u>THE ANSWER IS NO!!</u> Any grade adjustments will be applied to EVERYONE, no special circumstances will be granted. No "extra assignments" will be available for anyone to write. You have 3 exams and 3 other graded assignments to "prove what kind of student you are". Take advantage of that fact right from the start of the course.

Students that do the best in this course (A+) are the ones that stay engaged/involved. Not only will your grade be much better but you'll take so much more away from the course.

Academic Honesty

Breaches of academic honesty will not be tolerated and punished to the fullest extent of the University regulations. You can view the University policy on academic honesty at http://www.yorku.ca/academicintegrity/students/index.htm

Familiarize yourself with proper citation procedures to avoid any issues of plagiarism arising on your paper. You will be required to submit it to Turnitin.com. If you have any questions, ASK just to be sure.