FACULTY OF HEALTH SCHOOL OF KINESIOLOGY AND HEALTH SCIENCE

<u>Course</u>: HH/KINE 3400 3.0 – Fitness Consulting and Personal Fitness Training – for Health Related Physical plus Physiological Fitness

Term: Winter Term 2018-2019

<u>Course Director & Cometency Laboratory Director</u>: Roni (Veronica) Jamnik, PhD (<u>ronij@yorku.ca</u>, Room 358 Norman Bethune College)

Location: Lecture:Room 1152A Vari Hall

Competency Laboratories: Room 120 Norman Bethune College

Course Web Page: Not currently available

<u>Course Description</u>: This course provides detailed theoretical and applied instruction on physical activity/exercise assessment, prescription, interventions, management, and supervision with strategies that focus on *health-related physical and physiological fitness outcomes* for apparently healthy individuals who are stratified as "low or intermediated risk" for unrestricted progressive physical activity participation.

Overview of Course Content:

I FITNESS CONSULTING:

- A. Scientific Basis of the Physical Activity and Lifestyle "R" Medicine
 - health benefits of acute and chronic physical activity participation
 - dose-response relationship for health benefits and volume of physical activity
 - implications of recent research on existing health-related physical plus physiological fitness guidelines & practices
 - physical activity habits and attitudes Canadian profile
 - factors affecting participation in physical activity
 - understanding behavior changes stages and processes of changing behaviors
 - the process of lifestyle and physical activity counseling within the context of Physical Activity and Lifestyle "R" Medicine related exercise physiology, anatomy and analysis of movement patterns
 - maximizing physical activity participation
 - healthy lifestyle practices and their impact on health-related physical plus physiological fitness
 - acute versus chronic responses to physical activity participation

B. Fitness Assessment and Fitness Counseling

Overview and Screening

- the fitness components; physiological rationale for Physical Activity and Lifestyle :R:
 Medicine
- screening: 2018 PAR-Q+ and ePARmed-X+ (www.eparmedx.com), clinical versus pre-physical activity blood pressure cut-points and heart rate
- The importance of Risk Stratification: Low, Intermediate & High
- safety considerations; contraindications; emergency procedures; resuscitation

Conducting the Health-Related Physical and Physiological Fitness Evaluations

- non-exercise and exercise protocols; sequence; limitations
- NIH Waist Circumference, skinfolds, percent body fat, aerobic fitness: submaximal single stage test (eg Ebbeling), submaximal multi-stage test (eg YMCA, etc) submaximal field test (eg Rockport), vigorous to maximal field test (eg Leger 20 m

Shuttle Run), hand grip, push-ups, curl-ups, trunk flexion, vertical jump, back extension

- Pre, during and post exercise heart rate and blood pressure measurements
- calibration and maintenance of equipment

Interpretation of Health-Related Fitness Appraisal Outcomes

- standardized comparisons
- availability and use of norms
- the efficacy of the composite scoring approach
- the physical fitness profile: identifying strengths & weaknesses

Generate and Evaluate Alternatives, Develop an Action Plan, Follow-up

- communication techniques; pros and cons of various approaches
- guidelines for self-administered physical activity/exercise programs
- matching preferences and appraisal results
- general considerations/contraindications
- training the motor fitness factors
- healthy body composition
- healthy aerobic fitness
- · healthy musculoskeletal and back fitness

II PERSONAL FITNESS TRAINING

A. Counseling

- · stages of readiness for behavioral change
- B. Motivational Techniques for Client Adherence
 - · intrinsic and extrinsic motivation
 - strategies for overcoming barriers to compliance
 - SMART (Specific, Measurable, Attainable, Realistic, Timely) goal setting

C. Building on the Fitness Appraisal Results

- understanding the fitness components and interpreting the client's results in terms of their knowledge, fitness comprehension and lifestyle
- D. Exercise Prescription and Program Design
 - build on the client data (age, stage of growth, health status, physical constraints, lifestyle habits, etc)
 - designing aerobic fitness, musculoskeletal fitness and healthy weight management programs in line with the client data
 - intensity (% HHR, % VO₂R%, HRmax, METs, MET minutes per week, Steps, RPE, % 1 RM, sets, repetition, dynamic versus static exercise etc)
 - prescribing/monitoring appropriate intensity and progression
 - selection of appropriate exercise equipment

E. Demonstrating Proper Exercise Techniques and Modifying Client Performance

- · knowledge of proper and improper exercises
- select, modify the equipment and training to match the client

F. Safety, Emergency and Injury Prevention

- supervision, intervention and spotting techniques
- identifying appropriate and inappropriate joint stress
- guidance for the prevention and recovery from musculoskeletal problems

G. Documentation, Administration and Professionalism

- emergency action plan; procedures/response
- ethical business practices
- plan for ongoing professional development

Course Materials:

> Text: Physical Activity and Lifestyle "R" Medicine (updated 2018)

The following resources will be posted on Moodle

- ➤ Global Physical Activity guidelines
- > Selected Position Statements and Journal readings
- Related Hand-outs
- Select Lecture Notes
- ➤ PALM Tools

Format: Common Lecture 1 hour and 50 minutes per week; Tuesday 2:30 – 4:20 pm.

Questions regarding lecture content will not be addressed by email.

Evaluation:

Method of evaluation for academic credit:

<u>Laboratory</u> (5 X 3 % = 15%): Attend & fully participate in five 2 hour labs plus submit the associated assignment before leaving the laboratory. Each lab is worth 3 %, if you show uo late, do not participate you will only receive .0.5% for that lab. The 3% grade includes active hands-on participation, being able to properly execute the required competencies and submission of the associated assignment. You must attend the laboratory to submit the assignment and be progressively evaluated on the related competencies. For this year, the laboratories will be held in Room 120 Norman Bethune College. If a student shows up to the laboratory and does not fully participate they will only receive .5% for that laboratory.

You were assigned a Laboratory at the time of your enrollment into HH/KINE 3400 – you must attend the assigned Laboratory. **The laboratories are capped at 10 students so that students are able to master the required competencies.** You <u>cannot</u> switch lab times. There will be no make-up laboratories. **Refer to the laboratory schedule.**

Note: If a student does not attend the laboratories and does not satisfy the minimum practical competencies the 15% grade will not be added onto the final exam.

Assignment One: (5 %) Assigned during the first 2 weeks of class. Due February 12th 2019. Assignments received later than the due date will not be accepted and you will lose the 5%, the 5 % grade **will not** be added onto the final exam

Assignment Two: (10 %) Assigned the week of February 11th 2019. Due April 2nd 2019. Assignments received later than the due date will be penalized 2 grade points per day that assignment is late). Exceptions to the lateness penalty for valid reasons such as illness, compassionate grounds, etc., may be entertained by the Course Instructor but will require supporting documentation (e.g., a doctor's letter). If a student does not complete the assignment by the due date, the 10 % grade will not be added onto the final exam

Mid-Term Examination Is Not Optional (24%) (In Class on Tuesday February 26th 2019). Note: There will be no make-up for the Mid-Term examination. If a student does not write the mid term exam the value of the mid term examination will be added to the final exam.

Final Exam (46%, cumulative)

Written <u>during</u> the December Exam Period (date to be announced by the university). **DO NOT BOOK ANY FLIGHTS UNTIL THE EXAM DATES ARE FINALIZED.**

Other: Any derogatory emails are regarded as harassment and will be directed to the Office of Student Conduct. No cell phones, ipods, ipads, earphones, etc are permitted during the exams.

Grading and Missed Exams:

Grading: The grading scheme for the course conforms to the 9-point grading system used in undergraduate programs at York (e.g., A + = 9, A = 8, B + = 7, C + = 5, etc.). (For a full description of York grading system see the York University Undergraduate Calendar)

Note: Final course grades may be adjusted to conform to program or faculty grades distribution profiles

Missed Final Exam: Students with a documented reason for missing the final examination, such as illness, compassionate grounds, etc., which is confirmed by supporting documentation (e.g., doctor's letter) must formally request accommodation from the Course Director.

Important Course Information:

All students are expected to familiarize themselves with the following information, available on the Senate Committee on Curriculum & Academic Standards webpage (see Reports, Initiatives, Documents) - Senate policy at http://secretariat-policies.info.yorku.ca/policies/academic-honesty-senate-policy-on/

- York's Academic Honesty Policy and Procedures/Academic Integrity Website
- Ethics Review Process for research involving human participants
- Course requirement accommodation for students with disabilities, including physical, medical, systemic, learning and psychiatric disabilities
- Student Conduct Standards
- Religious Observance Accommodation