Introduction to Logic (PHI 2100)

University of Florida Summer B 2014

Section 4A54 MTWRF 9:30-10:45 am LEI 142

Instructor: Cara Cummings   Office: FLO 311

Email: cararc1mmings@ufl.edu   Office Hours: T/R 11 am-12 pm

Course Description

Recognizing good reasoning is important for every field of study. It is also important in everyday life. We ought to be aware when someone is trying to dupe us with a fallacious argument. We should also be aware when someone with an opposing viewpoint has made a good argument against us. In this course, we will be studying arguments. Rather than employing arguments for or against philosophical positions, we will be concerned with the following questions: What constitutes and argument? What distinguishes a good argument from a bad one? How do we refute certain forms of arguments? What fallacies of reasoning should be avoided when constructing arguments? What does it mean for an argument to be valid or sound? What role does truth play in constructing arguments? We will answer these questions by studying logic both at an informal level and, to some degree, a formal level as well.

Course Objectives

Students will learn how to recognize, construct, and assess various forms of arguments. In order to do so, students will learn how to paraphrase and diagram arguments. This will be done by taking a passage of text, extracting the argument from it, and organizing it according to how the premises relate to the conclusion. Students will also learn how to symbolize deductive arguments and construct proofs. Students will meet these goals by completing homework assignments and two exams.

Course Policies

Accessibility

I will be available by appointment if you schedule conflicts with my office hours. Simply e-mail me, or see me after class, to set up an appointment. If you have questions about assignments, please contact me as soon as possible. It is vital to your success that we clear up any confusion before heavily weighted assignments are due.

Behavior

Do not talk outside the flow of the course. There will be plenty of times when you will be encouraged to speak. It is inappropriate to do so when I am speaking, or one of your fellow classmates is speaking. Please set your cell phone to silent during class. If you access the textbook on your laptop or tablet, do not go online and look at anything unrelated to this course. If you behave in any way that disrupts the course, then I will ask you to leave the classroom.

Late Work/Makeup Exams

I will not accept late homework. If you have a legitimate conflict with an exam date, then you should notify me prior to that date to see if we can make arrangements. All excuses must be documented.

<u>Assessment</u>

Your grade will be determined by your performance on two in-class exams and homework assignments. Attendance- 10% Homework- 20% Exam 1- 30% Exam 2- 40%

Grade Scale:

A: 93-100   A-: 90-92   B+: 87-89   B: 83-86   B-: 80-82   C+:77-79   C: 73-76

C-: 70-72   D+: 67-69   D: 63-66   D-: 60-62   E: 0-59

UF's grading policies may be found here:

Catalog.uf.edu/ugrad/current/regulations/info/grades.aspx

<u>Academic Honesty</u>

Students must conform to UF's academic honesty policy regarding plagiarism and other forms of cheating. UF students are bound by the Honor Pledge, which states "We, the members of the University of Florida community, pledge to hold ourselves and our peers to the highest standards of honor and integrity by abiding by the Honor Code." On all work submitted for credit by students at the University of Florida, the following pledge is either required or implied: "On my honor, I have neither given nor received unauthorized aid in doing this assignment." The Honor Code (www.dso.ufl.edu/sccr/process/student-conduct-honor-code) specifies a number of behaviors that are in violation of this code and the possible sanctions. **<u>You should expect the minimum penalty for academic dishonesty to be a grade of E for the course.</u>**

<u>Students with Disabilities</u>

Students with disabilities requesting accommodations should first register with the Disability Resource Center (352-392-8565, www.dso.ufl.edu/drc) by providing appropriate documentation. Once registered, students will receive an accommodation letter which must be presented to the instructor when requesting accommodation. Students with disabilities should follow this procedure as early as possible in the semester.

<u>Course Evaluations</u>

I value your feedback in helping to improve future courses. Students are expected to provide feedback on the quality of instruction in this course by completing online evaluations at www.evaluations.ufl.edu. Evaluations are typically open during the last two or three weeks of the semester, but students will be given specific times when they are open. Summary results of these assessments are available to students at www.evaluations.ufl.edu/results.

<u>Required Text</u>

Copi, Irving M., Carl Cohen and Kenneth McMahon. *Introduction to Logic* 14th ed. (Boston: Prentice Hall, 2011). ISBN 0205820379.

Schedule

Listed below are the sections that we will be covering in lecture, as well as important dates. Read the assigned sections before class. I reserve the right to adjust the schedule as necessary. You should check the course website regularly for changes in the schedule.

Week 1

Monday, June 30: Course Introduction, No Reading

Tuesday, July 1: 1.1-1.3 What Logic Is, Propositions, & Recognizing Arguments

Wednesday, July 2: 1.4-1.6 Explanations, Deductive/Inductive Arguments, & Validity and Truth

Thursday, July 3: 2.1 Paraphrasing Arguments (HW 1 due)

Friday, July 4: NO CLASS

Week 2

Monday, July 7: 2.2 Diagramming Arguments (HW 2 due)

Tuesday, July 8: 2.3 Complex Argumentative Passages

Wednesday, July 9: 2.4, 3,1-3.2 Problems in reasoning & Language Functions (HW 3 due)

Thursday, July 10: 3.3-3.4 Disputes, Ambiguity, & Definitions

Friday, July 11: 3.5-3.6 Extensional/Intensional Definitions, Definitions by Genus & Difference

Week 3

Monday, July 14: 4.1-4.3 Classification of Fallacies & Fallacies of Relevance (HW 4 due)

Tuesday, July 15: 4.4-4.6 Fallacies of Defective Induction, Presumption, & Ambiguity

Wednesday, July 16: 5.1-5.3 Categorical Propositions (HW 5 due)

Thursday, July 17: Review

Friday, July 18: EXAM 1 (Chapters 1-4 only)

Week 4

Monday, July 21: 5.4-5.5 Distribution of Terms & The Square of Opposition (HW 6 due)

Tuesday, July 22: 8.1-8.2 Symbolic Logic: Language and Symbols

Wednesday, July 23: 8.3-8.4 Conditional Statement, Argument Forms, & Refutation by Analogy

Thursday, July 24: 8.5-8.7 Validity & Truth Tables (HW 7 due)

Friday, July 25: 8.8-8.10 Statement Forms, Logical Equivalence, & Laws of Thought

Week 5

Monday, July 28: 9.1-9.2 Formal Proof of Validity & Valid Argument Forms (HW 8 due)

Tuesday, July 29: 9.2-9.3 Valid Argument Forms & Formal Proofs Exhibited

Wednesday, July 30: 9.4 Constructing Proofs

Thursday, July 31: 9.5 More Extended Proofs (HW 9 due)

Friday, August 1: 9.9-9.10 Invalidity & Inconsistency

<u>Week 6</u>

Monday, August 4: 11.1-11.2 Induction/Deduction Revisited & Argument by Analogy (HW 10 due)

Tuesday, August 5: 11.3-11.4 Appraising Analogical Arguments & Refutation by Analogy

Wednesday, August 6:12.1-12.3 Cause & Effect, Causal Laws, & Induction by Sample Enumeration (HW 11 due)

Thursday, August 7: Review

Friday, August 8: EXAM 2 (Chapters 8, 9, and 11 only)