

INSTRUCTOR	OFFICE	E-MAIL	OFFICE HOURS
Joel Velasco	Eng/Phil 265G	joel.velasco@ttu.edu	MW 11:00-12:00

Class meets Wednesdays, 6:00-8:50 in English and Philosophy 264

Course description:

Many different organisms regularly engage in various kinds of pro-social behaviors that appear to be biologically altruistic (or spiteful) - that is, they appear to have a negative effect on the organism's survival and reproduction. This leads to an evolutionary puzzle - how did such behaviors evolve in the first place? In this class we will learn some techniques for thinking about these kinds of questions and critically examine some answers and debates in the literature. Several possibilities have been suggested for how selection could favor apparently altruistic traits: first, we will look at the problem via the lens of evolutionary game theory - perhaps these behaviors are actually in the long-run best interest of the organisms involved. Second, we will look at other ways in which selection might select for such behaviors - perhaps they are selfish from the gene's eye view. Perhaps inclusive fitness theory tells us they can evolve via kin selection or through some other means. Perhaps we should be looking to group selection or more generally, multi-level selection theory. Whether these are really versions of the same answer or whether they are competing answers is also itself an important philosophical question.

Course Webpage: All information about the course (such as this syllabus) as well as the reading assignments and links to papers can be found on the course website at <http://joelvelasco.net/teaching/5330>

Office hours: My office hours are Mon and Wed, 11:00-12:00, or by appointment, in 265G Philosophy.

Required Books: There is one required book - Brian Skyrms Evolution of the Social Contract. There is a recent 2nd edition which is slightly better if you have a choice (some updating discussion and references) but you can get by with the 1st edition. The remainder of the readings will be articles that I will provide for you online. All class assignments and any other readings will be found on this website. You should check this website regularly for updates and bring copies of the assigned readings to class.

Evaluation: Your grade in the class will be based on five assignments. First, you must come to class prepared and participate throughout the term (described below). Second, there will be a in-class presentation. For some weeks, we will start the class with a 20 to 30 minute presentation from a group of two students. A handout describing the main arguments of the reading and pointing to questions for discussion is expected. Each student will be part of one presentation at some point in the term. Third, there will be three assignments (roughly due weeks 6, 11, and 16) which are some combination of problems, short essays, and longer papers. There is some flexibility in what is expected

for these assignments. For example, a longer term paper might replace the final two assignments.

Class Participation: Philosophy is a communal enterprise: the ability to make valuable oral contributions to philosophical discussions can be as important as the ability to write well. Moreover, since the written assignments will force the students to think carefully about very specific topics, participation in class discussion is an important way for students to demonstrate a broader competence with the material than is possible in the papers alone. Evaluation will be based upon the quality, not the quantity, of comments made during class. Students are encouraged to continue class discussions after the class is over, by meeting with me in person, or continuing the discussion over e-mail with me. Of course discussion with each other outside of class is strongly encouraged as well. Students who for any reason have difficulty speaking up in class are especially encouraged to (and must!) pursue these options. It should go without saying that attendance is an absolutely essential component of class participation. **Electronic Devices:** Students may have laptop computers, or other portable electronic devices, for the purpose of taking notes, and occasionally looking up material relevant to class discussion. However, there will be no internet-surfing, texting, tweeting, instant messaging, e-mailing, gaming, or other use of electronic devices not directly related to class. Also, please silence all phones before class starts. **Special Accommodations:** If you have a disability or personal circumstance that will require special accommodation, please do not hesitate to contact me.

Other Matters:

Academic Integrity: Cheating and plagiarism are, of course, prohibited in this class just as they are in all university classes. They will be taken particularly seriously in this class, and any cases that may arise will be treated in a manner consistent with University policy. These two violations of academic integrity are each defined in the section of the Texas Tech online official publications titled “Academic Integrity.” Plagiarism is there described as follows:

“‘Plagiarism’ includes, but is not limited to, the appropriation of, buying, receiving as a gift, or obtaining by any means material that is attributable in whole or in part to another source, including words, ideas, illustrations, structure, computer code, other expression and media, and presenting that material as one’s own academic work being offered for credit.” <http://www.depts.ttu.edu/studentconduct/academicinteg.php>

You can find excellent explanations of what specifically constitutes plagiarism as opposed to proper citation, and also tutorials on how to avoid plagiarism at the following websites: <http://www.dartmouth.edu/~writing/sources/>

<http://www.indiana.edu/~wts/pamphlets/plagiarism.shtml>

Note: If, at any time, you are at all unclear about what counts as plagiarism, or about whether you are properly citing sources in any of your written work, please just come by and ask me about it. You do not want to be confused or careless about this serious matter.

Classroom Civility: It should go without saying that disruptive behavior is not considered acceptable in the classroom. In addition, the study of philosophy, like any other substantial subject, requires a certain level of concentration. And everyone’s attention and concentration is facilitated by an absence of unnecessary distractions within classroom. You do not need a laptop in class, though you may use them to view your

textbook if you prefer an electronic version. Though note that this leads to temptation not to pay attention as well as you should in class and it is easy to distract yourself and others. All you really need in class is paper, something to write with, your textbook, and your brain.

Students with Disabilities: Any student who, because of a disability, may require special arrangements in order to meet the course requirements should contact the instructor as soon as possible to make any necessary arrangements. Students should present appropriate verification from Student Disability Services during the instructor's office hours. Please note instructors are not allowed to provide classroom accommodations to a student until appropriate verification from Student Disability Services has been provided. For additional information, you may contact the Student Disability Services office in 335 West Hall or 806-742-2405.

Religious holy days: a student who intends to observe a religious holy day should make that intention known in writing to the instructor prior to the absence. A student who is absent for the observance of a religious holy day shall be allowed to take an exam or complete an assignment scheduled for that day within a reasonable time after the absence.

Rough course schedule:

Week 1: Game Theory

Week 2: Evolutionary Game Theory

Weeks 3+4: Evolution of the Social Contract

Week 5: Signaling games and the Evolution of Meaning

Week 6: Responses to Skyrms

Week 7: Evolutionary Altruism

Week 8: The Units of Selection

Weeks 9-11: Inclusive Fitness Theory

Weeks 12-15: Multi-Level Selection Theory, Major Transitions in Evolution, Human Evolution