ANTHROPOLOGY 102: BIOLOGY & EVOLUTION OF THE HUMAN SPECIES

Formerly: Introduction to Human Evolution

MONDAYS & WEDNESDAYS, 10:45AM – 12PM; KIELY HALL 150

FALL 2025; 3 credit hours; Course code: 49791

TOPHAT JOIN CODE: 525745

Hi! My name is Dr. Felicia Madimenos. Welcome to the course! My pronouns are she/her/hers.

If you have any questions, you may send me an email at fmadimenos@qc.cuny.edu. I actively check emails during the week from 9am – 7pm and less frequently on the weekends. Please be patient regarding a response if you email on the weekends.

Feel free to skip email messages and visit me in my office during office hours. This is an open window of time when you can pass by and say hi and/or clarify course material.

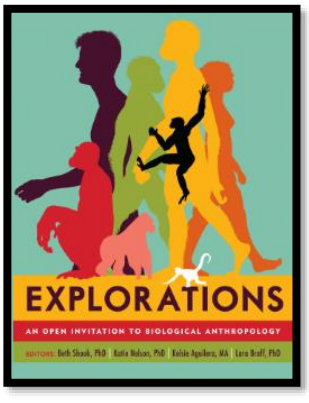
My office is at 312 Powdermaker Hall and I hold office hours on Mondays & Wednesdays 1:40 – 2:40pm. You may also schedule an appointment to meet with me by sending me an email.

COURSE DESCRIPTION: *How did our ancestors go from small, quadrupedal creatures to large brained, tool-using bipeds across millions of years of evolutionary history? What is evolution and what process drive these extraordinary changes? Are humans still evolving today?*

This course explores these questions and more, providing a comprehensive introduction to the principles of evolution and its role in shaping life on Earth. We will define evolution and highlight the contributions of key figures who developed this unifying theory of biology. Together, we will explore our closest living relatives, other primates and apply our understanding of their biology and behavior to the earliest bipedal ancestors, the first hominins. Our journey in this course will end with an investigation of other hominins including Neandertals and modern humans *Homo sapiens* (us!). By the end of the course, you'll gain a deeper appreciation for the dynamic processes that have shaped the human lineage and a greater understanding of our place in the tapestry of life.

REQUIRED READINGS:

Explorations: An Open Invitation to Biological Anthropology. This text is an open educational resource; that is, there is no cost to using/accessing this text. The text is available here: https://pressbooks-dev.oer.hawaii.edu/explorationsbioanth/ and on Brightspace and Tophat.



REQUIRED TOOLS: TOPHAT (join code: 525745) We will be using Top Hat (www.tophat.com) for class participation. You can submit answers to in-class questions using Apple or Android smartphones and tablets, laptops, or through text message**. I ask that *if you do not have any of these devices available to you, please come speak to me as soon as the semester begins*.** Keep in mind that outside of class, assignments and course information will be available through Brightspace.

There is a cost associated with downloading TopHat. I apologize for this. The cheapest option is $33 (plus tax) for a 4-month semester of unlimited access. For a full breakdown of all subscription options, visit: www.tophat.com/pricing. If you think that you will be using TopHat in other courses this or next semester, it's worth looking into additional pricing deals.

How to create a Tophat account: Before the first day of classes, Dr. Madimenos sent an email invitation to your email address that is registered with QC. You may follow the instructions there or below for course access. The most important thing you need is the join code listed throughout the syllabus. You can also check out Top Hat's Getting Started Guide here: https://support.tophat.com/article/Student-Top-Hat-Overview-and-Getting-Started-Guide

If you already have a Top Hat account, go to https://app.tophat.com/e/525745 to be taken directly to our course. If you are new to Top Hat, follow the link in the email invitation you received or:

- Go to https://app.tophat.com/register/student
- Click "Search by school" and input the name of our school: ***Queens College***
- Search for our course with the following join code: **525745**
- Set up an account and include your full FIRST and LAST name, STUDENT ID, and **mobile phone number** (if you plan to use a smartphone for your Tophat submissions)

Important: Should you require assistance with Top Hat at any time please contact their Support Team directly by way of email (support@tophat.com), the in-app support button, or by calling 1-888-663-5491.



OTHER REQUIRED TOOLS: BRIGHTSPACE. We will use Brightspace for all activities outside of class. You can also find copies of course materials and relevant course links here. Be sure that you can access Brightspace within the first few days of class.

QC GENERAL EDUCATION STATEMENT:
ANTH 102 fulfills either the "Scientific World" (SW) requirement of the Pathways General Education Flexible Core (FC) OR the College Option "Science" of the Pathways General Education Program.



COURSE SCHEDULE (can change across the semester depending on pace of instructor)

DATE	TOPICS	READINGS	ASSIGNMENTS DUE
WEEK 1 **8/27**	**Lecture 1:** Introduction to Course Requirements and Anthropology	*Chapter 1*	
WEEK 2 **9/1** **9/3**	**LABOR DAY – NO CLASSES** **Lecture 2:** Scientific Method; Evolution: History of an Idea	*Chapter 2 (up to Mechanism of Natural Selection)*	**ACTIVITY 1:** What Darwin Never Knew film questions (due by Sunday, 9/14 by 11:59pm)
WEEK 3 **9/8** **9/10**	**Lecture 3:** Darwin & Historical Context; Natural Selection **Lecture 4:** Natural Selection (cont'd); Darwin's Evidence	*Chapter 2 (continue until What Darwin was Missing)* *Chapter 2 (from What was Darwin Missing to end); Werth (2022): March of Progress*	
WEEK 4 **9/15** **9/17**	**Lecture 5:** Basic Genetics **Lecture 6:** DNA Structure and Function; Protein Synthesis	*Explore Learn.Genetics; and Chapter 3 (up to Mitotic Cell Division)* *Chapter 3 (from Mitotic Division to Mendelian Genetics); Explore Learn.Genetics*	**ACTIVITY 2:** DNA and Protein Synthesis (due by Sunday, 9/28 by 11:59pm)
WEEK 5 **9/22** **9/24**	**NO CLASSES HELD THIS WEEK**		
WEEK 6 **9/29** **10/1**	**Lecture 7:** Genes & Genome **NO CLASSES**	*Chapter 3 (from Mendelian Genetics to Epigenetics)*	

WEEK 7 **10/6** **10/8**	**Lecture 8:** Principles of Inheritance **Lecture 9:** Forces of Evolution	*Chapter 4 (to directional…selection); and Explore Biology Simulations* *Chapter 4 (Sexual selection section, and Micro-to Macro-evolution to end) and Explore Biology Simulations*	**ACTIVITY 3:** Principles of Inheritance (due by Sunday, 10/19 by 11:59pm)
WEEK 8 **10/13** **10/14 (TUESDAY)** **10/15**	**NO CLASSES** **Classes follow a Monday Schedule** **Lecture 10:** Macroevolution vs. Microevolution **LECTURE 11:** Speciation	*Macroevolution: primate examples*; *What is a species, anyway? (NYT)* *Mutant Crayfish is taking over (NYT)*	
WEEK 9 **10/20** **10/22** **10/24 (FRIDAY)**	**NO CLASSES** **EXAM 1 (in-class)** **Classes follow a Monday Schedule** **Lecture 12:** Introduction to Primates	*Chapter 5 (up to Key Traits Distinguishing Primate Taxa)*	**ACTIVITY 4:** Primate film questions (due by Sunday, 11/2 by 11:59pm)
WEEK 10 **10/27** **10/29**	**Lecture 13:** Primate Biology **Lecture 14:** Primate Classification, Part 1	*Chapter 5 (from Key Traits Distinguishing Primate Taxa to Suborder Strepsirrhini)* *Chapter 5 (from Suborder Strepsirrhini to Infraorder Platyrrhini)*	
WEEK 11 **11/3** **11/5**	**Lecture 15:** Primate Classification, Part 2 **Lecture 16:** Primate Classification, Part 3	*Chapter 5 (from Infraorder Platyrrhini to Superfamily Hominoidea)* *Chapter 5 (from Hominoidea to end)*	**ACTIVITY 5:** Primate identification and taxonomy (due by Sunday, 11/9 by 11:59pm)

WEEK 12 **11/10** **11/12**	**Lecture 17:** Primate Sociality & Behavior, Part 1 **Lecture 18:** Primate Sociality & Behavior, Part 2	*Chapter 6 (from Ecology to Primate Societies)* *Chapter 6 (from Primate Societies to end)*	
WEEK 13 **11/17** **11/19**	**EXAM 2 (in-class)** **Lecture 19:** Introduction to Paleoanthropology	*Chapter 7 (to Dating Methods)*	**ACTIVITY 6:** A Beginner's Guide to Osteology (due by Sunday, 11/30 by 11:59pm)
WEEK 14 **11/24** **11/26**	**Lecture 20:** Evolution of Bipedalism; Earliest Hominins **Lecture 21:** *Australopithecus*	*Chapter 9 (from Paleoenvironment & Hominin Evolution to Early Hominins;* Appendix A: Osteology *Chapter 9 (from Early Hominins to end)*	
WEEK 15 **12/1** **12/3**	**Lecture 22:** Paranthropus; Rise of the Genus *Homo* **Lecture 23:** *Homo erectus*	*Chapter 10 (to Homo erectus)* *Chapter 10 (from Homo erectus to end)*	
WEEK 16 **12/8** **12/10**	**Lecture 24:** Middle Pleistocene Hominins **Lecture 25:** Neandertals	*Overview of Human Evolution* *Chapter 11; Hendry: Who were the Neandertals*	**ACTIVITY 7:** The Human Odyssey film questions (due Wednesday*, 12/17 by 11:59pm) *note difference in due date
WEEK 17 **12/15**	**Lecture 26:** Emergence of *Homo sapiens;* Conclusions	*Chapter 12*	
Final Exam (EXAM 3) – MONDAY, December 22nd 11:00am – 1:00pm (IN PERSON) in Kiely 150			

COURSE EXPECTATIONS AND GRADING.

GRADING CRITERIA.
Your grades are based on the following criteria:

IN-CLASS EXAMS:
3 TOTAL @ 18% each on 10/22, 11/17, 12/22): 54%

BRIGHTSPACE ACTIVITIES:
7 TOTAL (@ 5% each): 35%

TOPHAT QUESTIONS & PARTICIPATION: 11%

EXAMS. There will be three exams throughout the semester. Exams are based on lectures, handouts, readings, and videos. The first exam covers material from the first third of the semester, the second exam covers material from the second third of the semester, and the final exam covers material from the end of the course. Exams include multiple choice and matching column questions. **YOU MUST ARRIVE ON TIME TO THE CLASS ON EXAM DATES. ARRIVING MORE THAN ½ HOUR LATE IS NOT ACCEPTABLE AND YOU WILL BE ASKED TO TAKE A MAKEUP IN ANOTHER EXAM FORMAT (I.E., SHORT ANSWER).**

If there are scheduling conflicts that you are aware of early in the semester, you MUST contact me as soon as possible before the exam date to organize an alternative exam time. Only legitimate excuses will be accommodated.

MAKEUPS. Material in lecture may be different than that presented in the textbook. You are advised to arrange to get course notes if you miss a class as exams will cover the lecture materials. If you know in advance that you will be unable to attend an exam for a very important but non-emergency reason, then you must speak to me at least one week in advance of the scheduled exam date and I will give you a make-up exam prior to the scheduled exam. ***Any make-ups that are granted, providing the appropriate documentation is presented, may be a different version and include a short-answer/ essay based questions. Requests for an unanticipated make-up must be made within two days of the missed exam.***

ACTIVITIES. Seven (7) activities are assigned throughout the semester. Activities are completed and submitted (usually) no later than select Sundays before our class meeting at 11:59pm (*note one exception is the last activity, Activity 7). If there are issues meeting some of the deadlines, **you MUST EMAIL ME for an extension *on up to two activities*,** no questions asked - just be sure to email me before the due date or within two days after the due date fmadimenos@qc.cuny.edu. **Extensions are not granted on any activity that has been already covered in a course exam.**

Activity due dates:
Activity 1: Film "What Darwin Never Knew" and questions - due Sunday, 9/14 by 11:59pm
Activity 2: DNA and Protein Synthesis - due Sunday, 9/28 by 11:59pm
Activity 3: Principles of Inheritance - due Sunday, 10/19 by 11:59pm
Activity 4: Primate film "Life in the Trees" and questions - due Sunday, 11/2 by 11:59pm
Activity 5: Primate identification and taxonomy - due Sunday, 11/9 by 11:59pm
Activity 6: A Beginner's Guide to the Human Skeleton - due Sunday, 11/30 by 11:59pm
Activity 7: Film "Human Odyssey" and questions - due Wednesday*, 12/17 by 11:59pm

IN-CLASS TOPHAT QUESTIONS. Your participation is based on vocal participation in class as well as in-class question submissions. During each class, a series of 4-6 questions will be presented on material from readings, and previous and current lectures. Questions are to be taken seriously and answered to the best of your

knowledge. Your answers will be submitted via TopHat and will be automatically graded. Keep in mind that exam questions may be drawn from these questions, so they are important for multiple reasons. If you walk in late and miss questions, you will not have the opportunity to submit those questions. **It is your responsibility to arrive on time for class and to stay until the end of class time.**

LECTURES. During lectures, **YOU MUST TAKE NOTES.** These will be your primary source of information for studying. If you miss a class, it is your responsibility to make-up the material you missed by 1) reviewing lecture slides available on Tophat; 2) borrowing lecture notes from a classmate and, 3) checking Brightspace for any handouts or other supplementary material that you may have missed. Attendance will be recorded using the TopHat system (see above). If you WALK IN LATE OR LEAVE EARLY, you will not be granted the same attendance points as other students. Punctuality is highly valued in this course.

ADDITIONAL RELEVANT INFORMATION:

CUNY POLICY ON ACADEMIC INTEGRITY. Academic dishonesty of any form will not be tolerated. This sentiment applies to group assignments as well; you must produce individual work even in a working group format. Penalties for cheating can range from a failing grade for an assignment, failing grade in the course, suspension, and expulsion in extenuating circumstances. Please consult the CUNY policy on academic integrity for additional information: https://tinyurl.com/34n74unu

THE OFFICE OF SPECIAL SERVICES. The Office of Special Services (SPSV) is committed to supporting students with qualifying disabilities under the Americans with Disabilities Act (ADA) by providing reasonable accommodations to ensure equal access. If you have previously received accommodations due to a disability, believe you may have a disability, or have a temporary disability, please visit the office's website (https://www.qc.cuny.edu/sp/) for further information on the assistance they can offer you. Accommodations are not retroactive, so you are encouraged to get registered sooner rather than later. You may also contact their office at qc.spsv@qc.cuny.edu or call 718-997-5870 during office hours for assistance as well.

This course fulfills the following Flexible Core (FC) outcomes:	FC 1: Gather, interpret, and assess information from a variety of sources and points of view.
	FC 2: Evaluate evidence and arguments critically or analytically.
	FC 3: Produce well-reasoned written or oral arguments using evidence to support conclusions.
This course fulfills the following Scientific World (SW) outcomes:	SW 1: Identify and apply the fundamental concepts and methods of a discipline or interdisciplinary field exploring the scientific world, including, but not limited to: computer science, history of science, life and physical sciences, linguistics, logic, mathematics, psychology, statistics, and technology-related studies.
	SW 2: Demonstrate how tools of science, mathematics, technology, or formal analysis can be used to analyze problems and develop solutions.
	SW 3: Articulate and evaluate the empirical evidence supporting a scientific or formal theory.
This course satisfies the following two QC General Education learning outcomes:	QC 1: Address how, in the discipline (or disciplines) of the course, data and evidence are construed and knowledge is acquired; that is, how questions are asked and answered.
	QC 2: Position the discipline(s) in the liberal arts curriculum and the larger society
This QC College Option SCI course satisfies the following three learning outcomes:	SCI 1: Familiarity with a body of knowledge in the physical or biological sciences.
	SCI 2: Successful study of the methods of science, including the use of observation, the information of hypotheses and the testing of models.
	SCI 3: Experience and awareness of the impact of science on modern society.