

**Stony Brook University**  
Mathematics Department  
Alena Erchenko

**Logic, Language and Proof**  
MAT 200, LEC 03  
FALL 2019

## Syllabus

**Course description:** A basic course in the logic of mathematics, the construction of proofs and the writing of proofs. The mathematical content is primarily logic and proofs, set theory, combinatorics, functions and relations. There is considerable focus on writing.

**Credits:** 3.

**Prerequisite:** Level 4 on the mathematics placement examination or equivalent course or permission of the instructor.

**SBC:** STEM+. For more information go to the following website:

[https://www.stonybrook.edu/sb/bulletin/current/policiesandregulations/degree\\_requirements/STEMplus.php](https://www.stonybrook.edu/sb/bulletin/current/policiesandregulations/degree_requirements/STEMplus.php)

**Class time and location:** MWF 9:00am- 9:53am in Physics P112.

**Instructor:** Alena Erchenko.

**E-mail:** [alena.erchenko@stonybrook.edu](mailto:alena.erchenko@stonybrook.edu)

**Office:** Simons Center for Geometry and Physics 508

**Website:** [you.stonybrook.edu/aerchenko](http://you.stonybrook.edu/aerchenko)

**Office hours (in SCGP 508):** M 10am-11am, F 10am-11am, or by appointment

**Math Learning Center hours (in Math Tower S-235):** M 12pm-1pm

**Grader:** El Mehdi Ainasse

**E-mail:** [elmehdi.ainasse@stonybrook.edu](mailto:elmehdi.ainasse@stonybrook.edu)

**Office:** Math Tower 2-109

**Office hours (in Math Tower 2-109):** W 2:30pm-3:30pm

**Math Learning Center hours (in Math Tower S-235):** M 2pm-3pm, W 6pm-7pm

**Textbook:** Peter J. Eccles, An Introduction to Mathematical Reasoning, Cambridge University Press.

**Attendance:** Attendance is strongly encouraged but not required. If you miss a class, you are still responsible for the material due, for learning all concepts covered, and turning in assignments given. Class participation (answering and asking questions during class) is encouraged.

**Blackboard:** Most of the material for this course will appear on Blackboard. It is important that you have access to this page.

## Grading

Homework	10%
Quizzes	10%
Midterm I	20%
Midterm II	20%
Final exam	40%

**Homework:** Homework will be assigned on a weekly basis and collected in class on Wednesdays. Homework will be posted on Blackboard. By the choice of the lecturer, some homework problems will be graded and some not. It is in your best interest to complete all assigned problems since you will not know which problems will be graded in advance. Homework is considered due at the end of the class period. Any homework turned in after class will be considered late. No late homework will be accepted. If you cannot make it to class, then make sure to send an email to your instructor, Alena Erchenko, with scans/photos of your homework before the end of the class that homework is due. One lowest score for homework will be dropped. You may work with other students on the homework, but you must hand in your own write-ups. When you write up your homework, use complete sentences and please try to write legibly. Your goal in writing should not just be to make me believe that you understand. You should write so that someone who is not already familiar with what you are writing about could read what you have written and learn from it.

**Quizzes:** There will be weekly 10-15min quizzes on Fridays. There will be no makeup quizzes. One lowest score will be dropped.

**Examinations:** Two 53-minute examination will be given during the semester and a 2 hours and 30 minutes comprehensive final examination will be given during the final examination period. No books, notes, calculators, or other electronic devices may be used on the examinations. You must bring your University ID card to all exams. We have the following schedule for the exams:

Exam	Date	Time	Location
<b>Midterm I</b>	October 2 (Wednesday)	9:00 am – 9:53 am	Physics P112
<b>Midterm II</b>	November 25 (Monday)	9:00 am – 9:53 am	Physics P112
<b>Final Exam</b>	December 12 (Thursday)	8:30 pm-11:00 pm	Physics P112

Students should not make plans to leave before Thursday, December 13, 2019.

**Makeup Examinations:** No alternative date will be given for the midterms or the final exam. If a student has a valid documented reason, such as illness or religious holidays, during examination times and informs the instructor Alena Erchenko beforehand, then he/she is permitted to schedule a makeup examination with no penalty. A missed midterm must be made up within 7 days of the midterm. Students must be prepared to verify the reason for requesting

the makeup by providing the proper document(s) upon request. Conflicts with other exams, personal business such as travel, employment, weddings, graduations, or attendance at public events such as concerts and sporting events are not valid excuses. Transportation trouble – missing a bus or having a car breakdown on the way to exam is not a valid excuse either. Nor is forgetting the date, time or room of an examination a valid excuse. If a student misses an exam, does not have a valid documented excuse, and does not inform the instructor, Alena Erchenko, then he/she gets 0 points for the exam.

**Questions, Problems, or Comments:** If you have questions or concerns about the course, please consult your instructor, Alena Erchenko.

**Student Accessibility Support Center (SASC) statement:** If you have a physical, psychological, medical or learning disability that may impact your course work, please contact Student Accessibility Support Center, ECC (Educational Communications Center) Building, Room 128, (631)632-6748. They will determine with you what accommodations, if any, are necessary and appropriate. All information and documentation is confidential. Students who require assistance during emergency evacuation are encouraged to discuss their needs with their professors and Student Accessibility Support Center. For procedures and information go to the following website: <http://www.stonybrook.edu/ehs/fire/disabilities>.

**Academic integrity statement:** Each student must pursue his or her academic goals honestly and be personally accountable for all submitted work. Representing another person's work as your own is always wrong. Faculty is required to report any suspected instances of academic dishonesty to the Academic Judiciary. Faculty in the Health Sciences Center (School of Health Technology & Management, Nursing, Social Welfare, Dental Medicine) and School of Medicine are required to follow their school-specific procedures. For more comprehensive information on academic integrity, including categories of academic dishonesty please refer to the academic judiciary website at [http://www.stonybrook.edu/commcms/academic\\_integrity/index.html](http://www.stonybrook.edu/commcms/academic_integrity/index.html)

**Critical incident management:** Stony Brook University expects students to respect the rights, privileges, and property of other people. Faculty are required to report to the Office of University Community Standards any disruptive behavior that interrupts their ability to teach, compromises the safety of the learning environment, or inhibits students' ability to learn. Faculty in the HSC Schools and the School of Medicine are required to follow their school-specific procedures. Further information about most academic matters can be found in the Undergraduate Bulletin, the Undergraduate Class Schedule, and the Faculty-Employee Handbook.