



Kate Scott takes all-University teaching award.

## About the Department

The Department of Mathematics at the University of South Carolina has evolved into one of the premier centers in the Southeast for Mathematics research and education. The internationally-renowned faculty carries out research across a broad spectrum of pure and applied fields. The Industrial Mathematics Institute facilitates interdisciplinary collaboration.

USC Math provides a stimulating and supportive environment. Faculty-student seminars offer non-threatening opportunities for students to practice presentation skills. Weekly teas and episodic social events allow graduate students and faculty members to interact outside of the strictly academic setting.

We share a building called LeConte College with the Department of Statistics, surrounded by majestic hardwood trees and flowering shrubs. Our facilities include an in-house library, a desktop computer for each graduate student, access to MathSciNet, and wireless internet access. Graduate student offices are limited to no more than four students.

USC is the state's flagship university, with over 27,000 students. Its athletic teams compete in the SEC. Columbia offers the cultural advantages of a medium-sized city, with a convenient airport, museums, concerts, theaters, craft and food festivals, and Riverbanks Zoo. The nearby Congaree Swamp National Park is famous for its many ancient and national-record trees. Three rivers and Lake Murray offer recreational opportunities. Within a two to three-hour drive are beaches, mountains, and historic Charleston. Housing is affordable, rush "hour" is short, and winters are mild.

## Why Choose USC?

Here is what some current graduate students have to say about why they love it here:

*"The faculty seem to care very much about us - beyond just mathematics and coursework."*

*"The graduate student community is very close here -like family."*

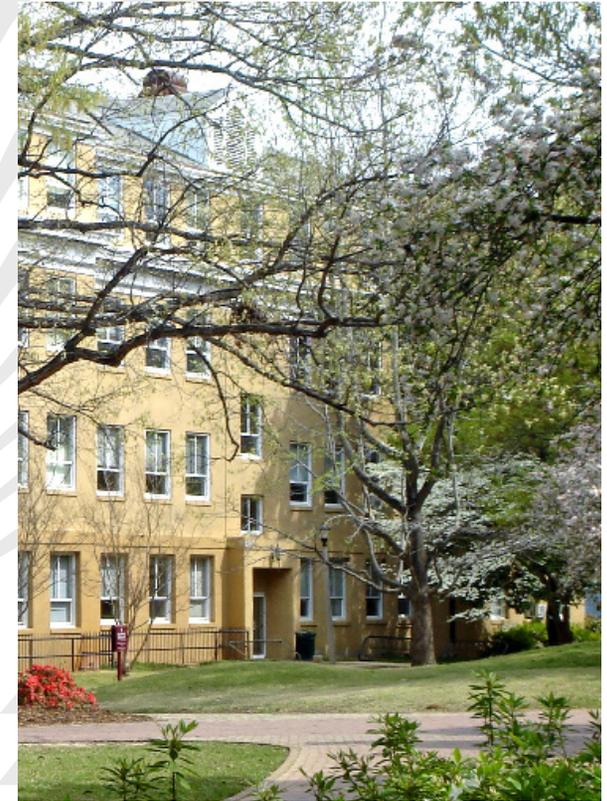
*"Even after we've been awake for 72 hours, I love it here and wouldn't want to be anywhere else because we are all in this together."*

*"We have a very beautiful campus here that really creates a tranquil learning environment. It is nice to just take a walk in the gardens outside and clear my head."*

*"The graduate students and professors can interact so casually it makes everyone long for an unending discussion on our passions."*



Department picnic, Fall, 2007.



LeConte College

## Graduate Programs in **Mathematics**

For more information, please visit <http://www.math.sc.edu/grad> or write to [graddir@math.sc.edu](mailto:graddir@math.sc.edu). Campus visits can be arranged. Observe a few classes, meet faculty, and socialize with graduate students.

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UNIVERSITY OF  
**SOUTH CAROLINA**

# Graduate Mathematics at the University of South Carolina

## Degrees Offered

The Department of Mathematics offers programs of study leading to the MS, MA, and Ph.D. degrees in pure and applied areas of mathematics. Research strengths build upon traditional roots with contemporary approaches. There are two teaching-oriented non-thesis degrees--the Master of Mathematics (MM) and the Master of Arts in Teaching (MAT), an interdisciplinary program offered in conjunction with the College of Education.

## Industrial Mathematics Institute

Research in modern applied mathematics is done through the Industrial Mathematics Institute. The IMI exists within the Department of Mathematics for the purpose of fostering advanced research in areas of mathematics having potential for industrial application. Interested students often receive supplemental stipends.

## Research

We have active research groups in the following areas:

- Algebra (commutative, algebraic geometry, universal, lattice theory)
- Applied ("classical") analysis (approximation theory, Fourier analysis, theoretical differential equations )
- Theoretical ("modern") analysis (complex, functional, harmonic, operator theory)
- Computational mathematics (numerical methods for linear algebra and differential equations, scientific computing)
- Discrete mathematics
- Foundations (logic, set theory, general topology, model theory)
- Geometry (differential, algebraic, convex)
- Number theory

Specialites in bioinformatics and financial mathematics are being developed.

## Learning Environment

The average class size for graduate courses is 5-15. There are currently 47 graduate students and 35 faculty members. Weekly seminars are held on most research areas listed here and are open to all graduate students, as are teas and access to our newly remodeled lounge.

## Financial Aid

The Department expects to award 12 to 15 assistantships for Fall 2009 with nine-month stipends (academic year) of **\$16,300** or more. Summer stipends are available for some students and begin at **\$3,200**. Outstanding applicants receive consideration for a range of fellowships, including the **renewable \$8,000** Graduate School Fellowship. Those applicants receiving an assistantship also receive tuition reductions of 85% or more (in 2008, this was \$7,150 out of \$8,400). In addition, the Graduate School underwrites some of the cost of student health insurance.

