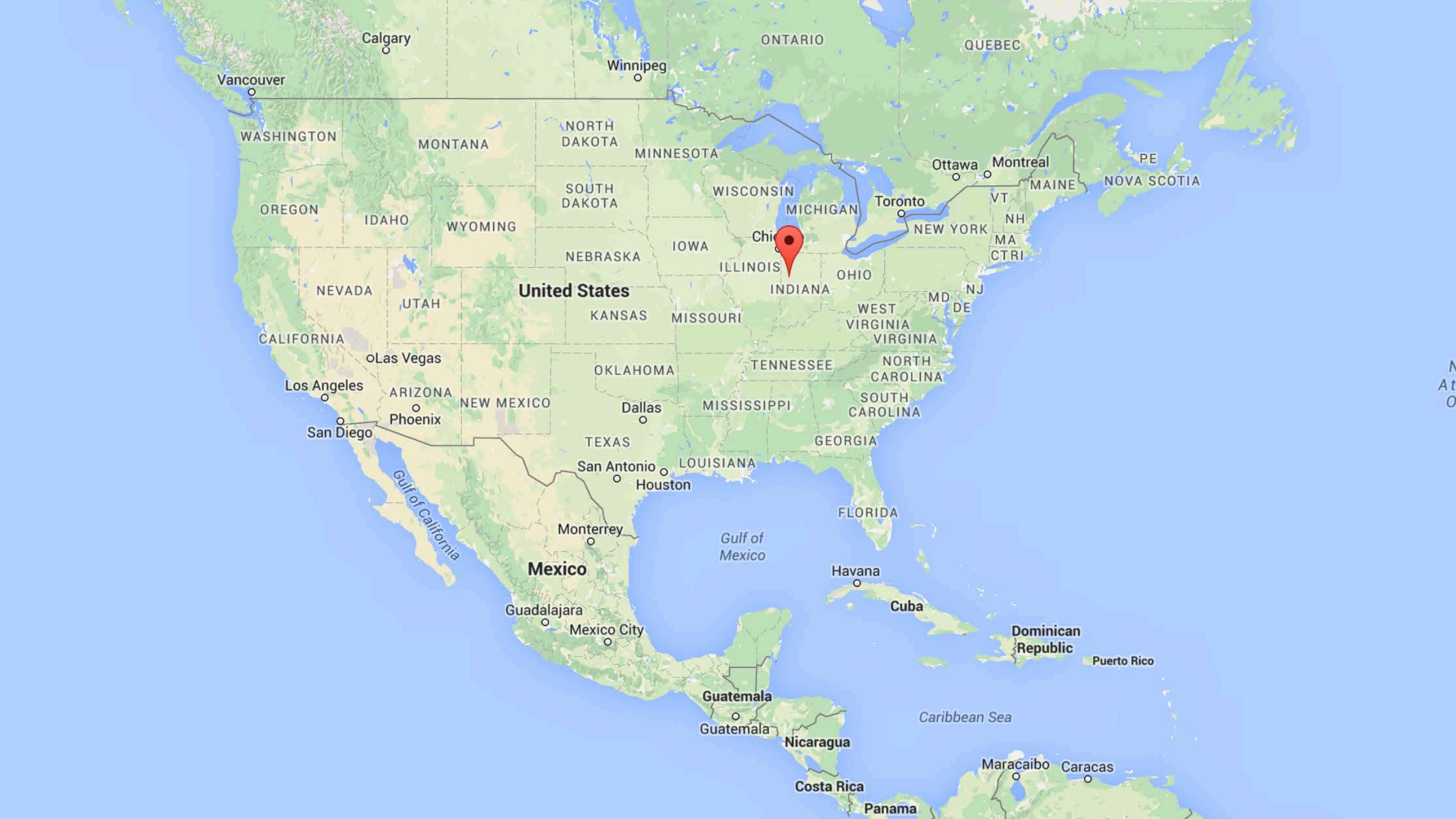
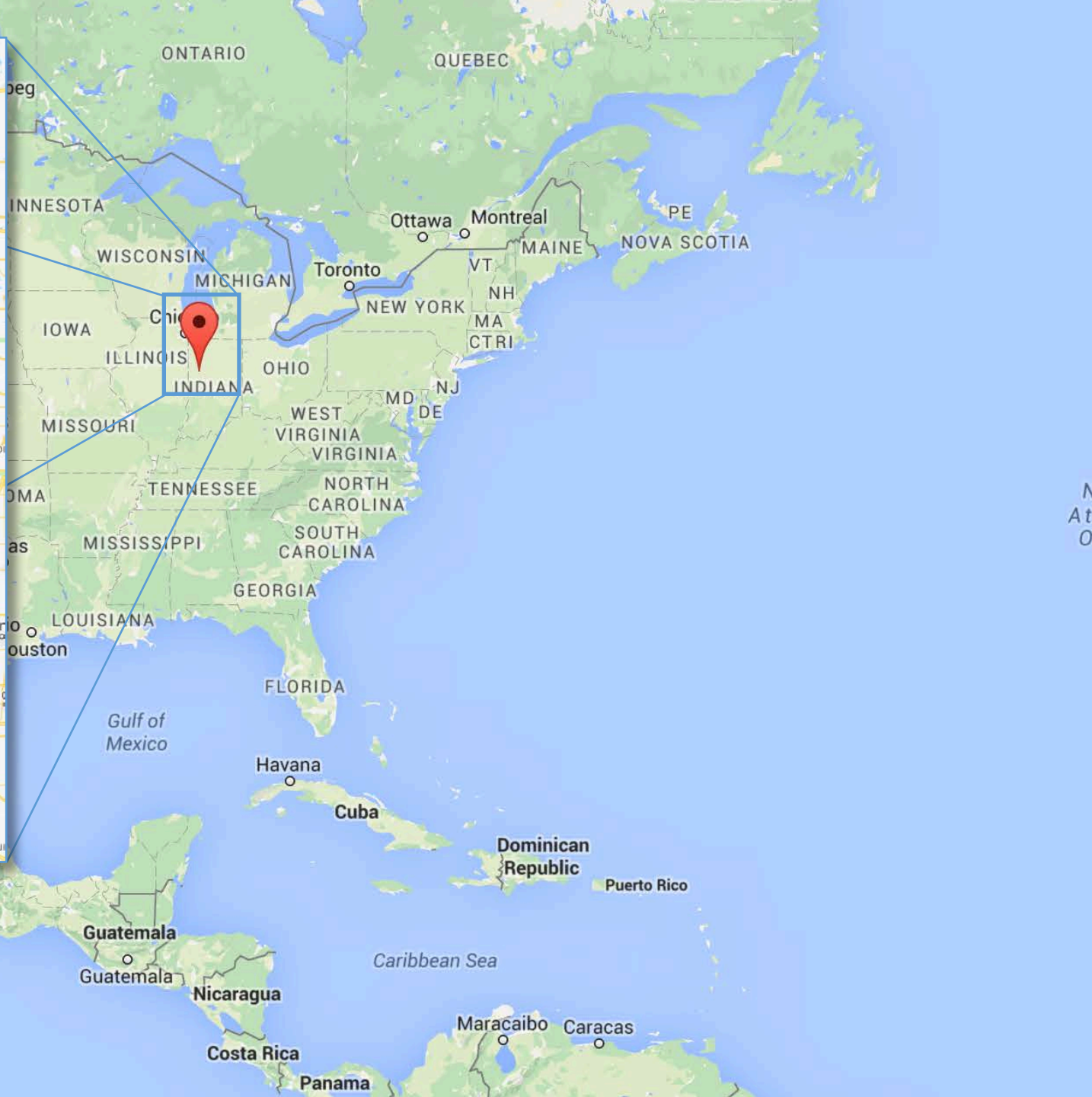


COMPUTER SCIENCE

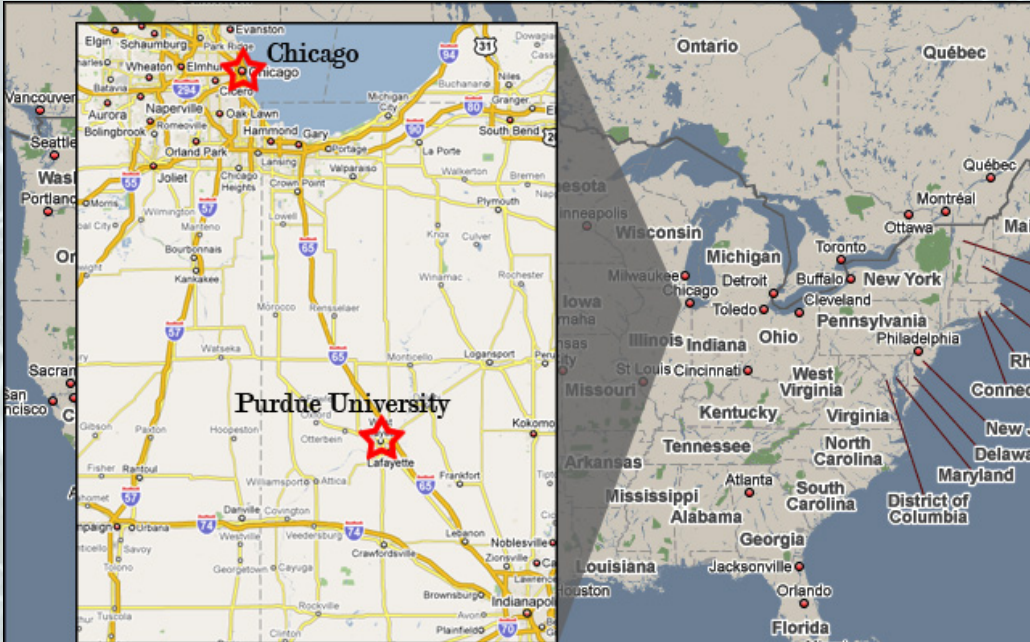
PURDUE
UNIVERSITY®





LOCATION

- in West Lafayette, Indiana
- 122 miles southeast of Chicago
- 65 miles northwest of Indianapolis











FACTS ABOUT PURDUE

- Public, doctoral-granting research university
- Purdue has the fourth-largest number of international students among U.S. public institutions
- **1,820** tenured/tenure-track faculty
- **30,043** undergraduate students
- **9,461** graduate students
- **40.4%** graduate women
- **40%** international graduate students
- **123** countries (entire student body)



PURDUE UNIVERSITY
FOUNDED 1869

PURDUE

BOILERMAKER *Special*

P













PURDUE: "CRADLE OF ASTRONAUTS"



- 24 Purdue grads have been selected for space travel
- Purdue alumni astronauts include the first and most recent astronauts to walk on the moon
- Purdue's Armstrong Building is named after Neil Armstrong (statue at left)

CULTURAL LIFE

- Purdue Convocations
- Purdue Repertory Dance Company
- Purdue Symphony Orchestra
- Black Cultural Center performing ensembles
- Purdue Theatre
- Purdue University Bands









DEPARTMENT HISTORY

sponsored research projects. There are essentially no restrictions on the usage of these facilities by members of the staff of the University and students formally enrolled in the University.

An order was issued in 1962, requiring that all disk file and tape data be stored in the Computer Center to meet the requirements of the time and to avoid and/or data processing which have been the source of research activities.

The Computer Sciences Center staff has the responsibility of operating equipment in the Computer

- Founded in 1962, Purdue's Department of Computer Science is the world's oldest existing computer science department

III. THE COMPUTER SCIENCES DEPARTMENT

In September 1962, Purdue University announced the formation of a Computer Sciences Department in the Division of Mathematical Sciences. The Department has the following responsibilities:

1. To provide instruction leading to the M.S. and Ph.D. degrees in selected areas of the computer sciences. A major in computer sciences at the undergraduate level is also available as an option in the Division of Mathematical Sciences.
2. To carry on research in selected areas of computing including numerical analysis, information and programming systems, artificial intelligence, logic and theory of automata.
3. To make available instruction in programming and in the use of computers to all students in the engineering, physical, and social sciences.

Students are currently being accepted for enrollment in this program. The staff of the Department at the present time consists of seven professors.

Two new appointments were made in 1963:

Prof. J. R. Buchi, formerly with the University of Michigan, whose interests are in logic and theory of automata, and Prof. W. Gautschi, formerly with the Applied Mathematics Group, Oak Ridge National Laboratory, whose interests are in numerical analysis.

The Academic Staff:

S. D. Conte, Ph.D., Professor of Mathematics
R. Kenyon, Ph.D., Assistant Professor of Mathematics and Computer Sciences

R. Kenyon, Ph.D., Assistant Professor of Mathematics and Computer Sciences

K. S. Fu, Ph.D., Assistant Professor of Electrical Engineering

M. Golomb, Ph.D., Professor of Mathematics

I. Marx, Ph.D., Associate Professor of Mathematics

J. S. Maybee, Ph.D., Assistant Professor of Mathematics

IV. THE EDUCATIONAL PROGRAM

An integrated educational program has been established in two major areas: numerical analysis; information and programming systems. A program in a third major area, logic and automata theory, is in the final stages of formalization. Courses which are currently being offered or will be offered during the coming year include:

Undergraduate

CS 200 Laboratory on Programming for Digital Computers

CS 210 Laboratory on Data Processing

CS 400 Introduction to Programming for Digital Computers

CS 414 Introduction to Numerical Analysis

Graduate

CS 514 Numerical Analysis

CS 515 Numerical Analysis of Linear Systems

CS 520 Mathematical Programming

CS 614 Numerical Solution of Ordinary Differential Equations

CS 615 Numerical Solution of Partial Differential Equations

CS 616 The Theory of Information

CS 617 Computer and Programming Systems

CS 580 Introduction to Data Processing

CS 600 Advanced Programming Systems I

CS 601 Advanced Programming Systems II

CS 581 Elements of Mathematical Logic and Turing Machines

CS 582 Mathematical Theory of Finite Automata

CS 584 Recursive Functions I

CS 585 Mathematical Logic I

CS 681 Artificial Intelligence

CS 684 Recursive Functions II

CS 685 Mathematical Logic II

V. SEMINARS AND COLLOQUIA

Regular seminars are held during the year in selected topics in numerical analysis, programming systems, algorithmic languages, logic and automata theory. The colloquium series features invited speakers who report on recent advances in various areas of the computer sciences.

VI. GRADUATE RESEARCH ASSISTANTSHIPS AND FELLOWSHIPS

A number of graduate research assistantships are available to properly qualified students who plan to enroll in the Computer Sciences Program. These positions carry a minimum stipend of \$220 monthly with partial remission of tuition fees. Recipients of graduate research assistantships will participate in various ways in the educational and research activities of the Center. Other financial assistance is available through a limited number of fellowships.

Inquiries concerning applications and assistance should be directed to:

Office of the Director
Computer Sciences Center, ENAD
Purdue University, Lafayette, Indiana

All applications for the 1963-64 academic year should be submitted by March 15, 1964.

The
PURDUE
Alumnus
MAY 1955



PURDUE
UNIVERSITY

COMPUTER SCIENCE



LAWSON COMPUTER SCIENCE BUILDING

PURDUE
UNIVERSITY

COMPUTER SCIENCE

LAWSON COMMONS



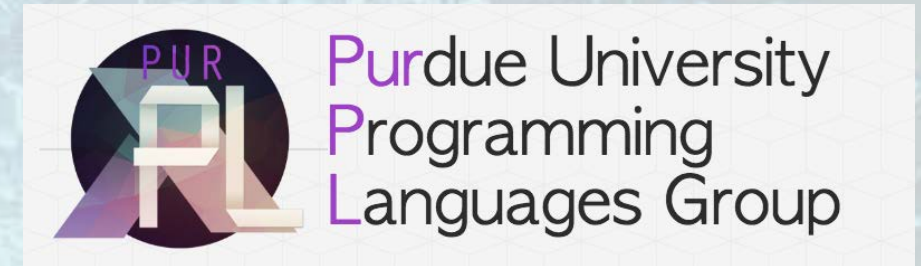
PURDUE
UNIVERSITY

COMPUTER SCIENCE

MAJOR RESEARCH GROUPS



www.cerias.purdue.edu



purduepl.github.io



theory.cs.purdue.edu



minds.cs.purdue.edu

FACULTY MEMBERS

55 graduate faculty

- 24 full professors
- 10 associate professors
- 21 assistant professors



DESTINATIONS

Students graduating with a Ph.D. or an M.S. have accepted positions at:

- University of Illinois Urbana-Champaign
- Georgia Tech
- Northeastern University
- Google
- Microsoft
- Apple
- Facebook
- Amazon
- MIT Media Lab
- Intel
- IBM Research



2017-2018

CS GRADUATE ENROLLMENT

327 GRAD STUDENTS
from **41** COUNTRIES

74 women (**23%**)
267 international
students (**82%**)

92 research assistants
82 teaching assistants
11 fellowship recipients

CS Female Faculty & Grad Students Meetup

TOPIC: ACADEMIA AS A CAREER PATH





2016-2017 CS GRADUATE STATISTICS

28

Ph.D.s awarded
in 2016-2017

72

master's degrees
awarded
in 2016-2017

1,393

applications for 2017

30%

increase in CS
grad students
since 2013

FINANCIAL ASSISTANCE

- All of our grad students are funded
- Grad assistant salary starts at \$1,988
- Cost of living in Lafayette is low compared to larger cities
- Summer internships
- Medical insurance is highly subsidized
- Tuition is remitted for grad assistants and fellows

FACILITIES

For example:

- New data science large memory cluster:
2 nodes, 192 cores, 6TB RAM
- New GPU cluster:
8 nodes, 32 GPUs



CS GRADUATE CURRICULUM

- Doctoral Program
- Master's Program
- Professional MS in Information Security
- Multi-departmental Programs
 - Computational Science and Engineering
 - Computational Life Sciences
 - Statistics-Computer Science Joint Masters

CS GRADUATE CURRICULUM

Master's program

10 three-credit
courses or

8 three-credit courses
and a thesis

Doctoral program

3 research courses

6 three-credit courses

Core course requirement and research

Preliminary examination

Thesis



ADMISSION CRITERIA

- CS course background
- Recommendation (or nomination) by your university
- GPA (transcript)
- TOEFL score (required by Purdue's Graduate School)

RESEARCH AREAS

- Bioinformatics and computational biology
- Computational science and engineering
- Databases and data mining
- Distributed systems
- Graphics and visualization
- Information security and assurance
- Machine learning and artificial intelligence
- Networking and operating systems
- Programming languages and compilers
- Software engineering
- Theory of computing and algorithms