



DATA SCIENCE

Data science major • Data science minor

Data science, one of today's fastest growing fields, combines the insight of mathematics and the power of computing with an area of application, allowing you to apply your skills to topics that interest you.

100%

of our students complete an internship and undergraduate research.

THE CLASSROOM EXPERIENCE

Going beyond the technical to the professional

The Data Science Program at Franklin College was created in close consultation with business and community leaders in the field. Our innovative program will help you develop the technical skills needed for data science, along with self-awareness and a professional disposition that will help you excel in your chosen career.

Right from the outset, you will start building your skills and completing a full data science project using a dataset of your choice. You will learn how to code in the popular programming language of Python while being introduced to key data science concepts such as machine learning.

As you progress through the program, you will complete larger projects designed to expand your capabilities. In the course Big Data and the Professional Workplace, you will partner with a team of students and a Franklin College alumnus who works with big data for a semester-long project. Through your participation in the project, you will gain valuable experience as well as a connection within the data science field.

SCAN

to learn more



IN ADDITION TO COURSEWORK, DATA SCIENCE STUDENTS DESIGN AND EXECUTE PROJECTS FROM START TO FINISH, WORKING WITH FACULTY, ALUMNI AND NON-PROFIT PARTNERS TO APPLY DATA RESEARCH IN SOLVING REAL-WORLD PROBLEMS.

Moving beyond the pure technical skills of data science, in Data Equity and Bias you will gain awareness about the strengths and limitations of the tools used by data scientists. Through a series of case studies, you will learn:

- How discriminatory bias can infiltrate algorithmic systems, compounding problems for society's most vulnerable groups
- How to use data for good by approaching data science projects from an equity perspective

Finally, the Data Science Capstone grants you the opportunity to take the lead on a major project related to your chosen field of application. You guide the process from start to finish: choosing a topic, defining the problem, collecting and exploring data, building a model, and analyzing results.

OUTSIDE THE CLASSROOM

Internships and real-world application

Every data science major will complete at least one internship. Often these internships lead to full-time jobs after graduation. Past data science students have interned at businesses such as:

- Beckman-Coulter Life Sciences
- B2S Life Sciences
- Cummins

In addition, all data science majors will complete a statistical consulting project. Here, your team is paired with a non-profit organization from the greater Indianapolis area to assist them in answering a data-based question relevant to their mission. Past project partners have included:

- Junior Achievement of Central Indiana
- Johnson County Public Library
- Indiana Youth Institute

POST-GRADUATION

In demand and making a difference

As Forbes noted in 2018, "Over the last two years alone 90 percent of the data in the world was generated," and the pace of data creation has only sped up from there. With so much data available, data scientists are in demand and well-compensated, with median salaries upwards of \$100,000. Data scientists find rewarding careers in a variety of exciting fields and help make decisions that shape the future.

DEPARTMENT OVERVIEW

- **Nationally recognized program:** The Franklin College Department of Mathematics and Computing has been recognized by EDUCOM, a national educational computing organization, as one of its success stories of Information Technology in Higher Education, and was selected by the American Mathematical Society as the recipient of the 2019 Award for an Exemplary Program or Achievement in a Mathematics Department.
- **Department contact information:** Read more about the program at [FranklinCollege.edu/data-science](https://franklincollege.edu/data-science) or contact Paul Fonstad, math and computing department chair, at 317.738.8268 or pfonstad@FranklinCollege.edu.