



Data science in practice

Student work and projects for organizations

Michael Fabry-Perez

Prize Papers Archive

Michael used machine learning to read historical handwriting and organize references to people, ships, ports and companies. He built an application for searching the records and exploring connections between them.



Find information in your documents

A collection of reports, procedures or scanned records can become easier to search. A project could organize the files, extract useful details and help staff find an answer with a link to the original document.

Leonardo Schneider

Street Risk

Leonardo combined public crash and traffic records with street imagery to examine road risk in Sarasota, Tampa and Orlando. His application lets a user select a city and inspect a location.

Plan services around where people use them

Combine service records with locations and travel distances to see which areas you reach and where demand is changing. The result could help with opening hours, delivery routes or the location of a service.

Use the inquiry form to tell us about your organization and work you would like to discuss.

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Analysis and reporting

Avery Bishop

MLB Career Longevity Predictor

Avery assembled historical player performance and injury records, then built a model to estimate career duration. The project brought data preparation, prediction and an application for reviewing player estimates into one piece of work.

Prepare for changes in demand

Past sales, appointments or service requests can help you plan for the next week or month. A project could examine seasonal patterns and test how well a forecast performs before you use it for staffing or purchasing.

Yu-Hsin (Peter) Yeh and Maria T Lara

Exercise and molecular measurements

Peter and Maria studied public exercise research data to examine how molecular measurements relate to changes in fitness. Their analysis compared responses by sex and accounted for the number of measurements being tested.

Figure 1: Universal Energy Adaptation at Week 4

Top biomarkers exhibit main effects. A single trend line illustrates the shared adaptation.

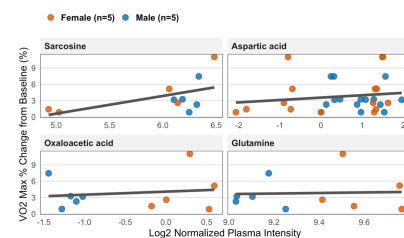


Figure 1: Universal adaptation at Week 4. Partial trend lines demonstrate a shared upregulation of early energy metabolism across both sexes.

Prepare the same report each month

If staff copy information between spreadsheets each month, a project could combine the exports, check for missing records and produce a repeatable report. Documented calculations make it easier to update the report and explain the numbers.

Discuss a project

Tell us about your organization and the work you would like to improve. We can discuss a faculty-led practicum or an internship with your team.

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Discuss a project

We begin by learning about your organization, how its work is done and what you would like to improve or understand.

What is the time requirement for a practicum?

The student and faculty team provides about 4–8 hours of project time per week over a 10–12 week semester. The organization provides a contact for a kickoff meeting and weekly check-ins to answer questions, review progress and arrange access to information.

What is the time requirement for an internship?

Students work at least part time. Full-time internships during the summer or spring semester are preferred. The organization provides a supervisor for onboarding, regular guidance and feedback throughout the placement.

Does our data need to be ready?

No. We review the records and systems needed for the work being considered. Together, we establish what is available, what is missing and what preparation, collection or access would be needed before the work could proceed.

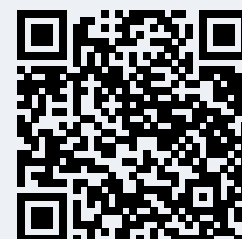
How does a discussion become a project?

Once we have developed proposed work together, faculty review its educational value, timing, supervision and feasibility. The organization and program then agree on the scope, deliverables and responsibilities.

Contact the program

Use the form to tell us about your organization and what you would like to discuss. You do not need a defined project.

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Scan to open the form

We will contact you to learn about the work you would like to discuss. You can also email gsalu@ncf.edu.