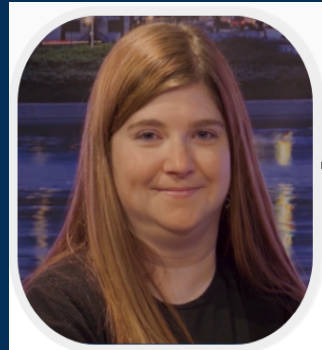# Presenters

Florence Hudson
Executive Director
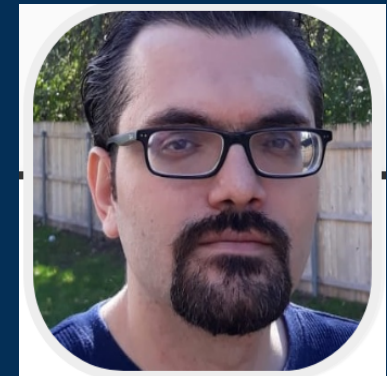Northeast Big Data
Innovation Hub
Columbia University

Jennifer Oxenford
Director of Research and
Community Engagement
KINBER

Leslie LaBarte,
Seneca District Libraries
Pennsylvania

Yusuf Danisman
Assistant Professor
Queensborough Community
College

Northeast Student Data Corps
nebigdatahub.org/nsdc

The Northeast Student Data Corps (NSDC) is a community-developed initiative that will teach data science fundamentals to students across the northeastern United States, with a special focus on underserved institutions and students.

NORTHEAST BIG DATA INNOVATION HUB

- An NSDC Founding Committee of 21 industry, faculty, student and not-for-profit leaders works in partnership with the Northeast Big Data Hub to develop Content & Pedagogy, Peer Instruction, and Outreach to increase data science literacy across the Northeast.

- Learn more about us and how to get connected at nebigdatahub.org/nsdc

The NSDC Founding Committee is planning, designing, and launching Northeast Student Data Corps activities in partnership with the leadership of the Northeast Big Data Hub.

This is an opportunity to contribute to the creation of a groundbreaking and inclusive new program in data science.

There are three teams from the NSDC Founding Committee leading the effort.

Content and Pedagogy Team	Peer Instruction Team	Outreach Team

NSDC Projected Aspirational Outcomes

1. Content and Pedagogy Team
- Curriculum of respected data science materials and video/audio enabling data science literacy
- Hundreds of students of all ages, beginning with higher ed, with new data science skills

2. Peer Instructors Team
- Peer Instructor Teams teaching and coaching data science students across the Northeast
- Underserved institutions and students learning data science fundamentals and applications

3. Outreach Team
- Industry, academia and not for profits enabling data science literacy together
- Student internships for translational data science experiences with real world use cases

Overarching Vision
A culture of inclusivity, with students teaching and supporting students, across digital divides

The Northeast Student Data Corps Next Steps

Content and Pedagogy Team

- Gather content - e.g., IBM OpenDS4All on Github (16 data science modules)
- Build Curriculum
- Attract presenters to record audio with the core modules
- Build content & pedagogy

Peer Instruction Team

- Coordinate with C&P team re: type of mentoring and peer instructors needed based on curriculum
- Attract students to develop virtual study hall hours and mentoring

Outreach Team

- Reach out to minority serving institutions to attract learners
- Reach out to Data Science faculty & students for PIT
- Reach out to industry to plan student internships to use data science skills

DATA SCIENCE TRAINING AND RESEARCH PROGRAM

Queensborough Community College

CUNY Bayside NY

Dr. Yusuf Danisman

Mathematics and Computer Science

Queensborough Community College

QCC is one of the most diverse campuses nation-wide.

- Hispanic students represent the largest group (32 %)

- Black students (25 %)

- Asian students (22 %)

- White students (15 %)

- Non-resident alien (5 %)

Overview

- This fully online program is aimed at enhancing the coding and data science skills of community college students.

- 10-15 students will be recruited for the Spring Semester of 2021.

- This program is supported by a seed fund grant from the Northeast Big Data Innovation Hub.

Content

- Module 1: Python as a Programming Language

- Module 2: Data Science & Machine Learning

- Module 3: Capstone Group Project

* Talks by professionals in industry and academia

Eligibility

- Open to all students.

- Members of groups traditionally underrepresented in STEM are

  especially encouraged to apply.

What the project is seeding?

- Serve as the backbone of a Data Science Lab at Queensborough Community College (Proposal has been submitted.)

- Develop an AS or AAS degree in Data Science

- Students who get this training will be motivated, knowledgeable and confident to continue their education and find more qualified jobs in the future. Therefore, they will be inspiring role models in their community.

- Contribute to increasing and diversifying the workforce that enters the tech sectors and other Data Science - related industries.

Support from Northeast Big Data Innovation Hub & Northeast Student Data Corps

- Northeast Big Data Hub Seed Fund Award
  - Data Science Training and Research Program support
  - Workshop materials
  - Student support
- NEBDHub Northeast Student Data Corps
  - Content & Pedagogy - Curriculum & Course Materials
  - Peer Instructors Team – Mentors
  - Outreach – Speakers and Internships

Engagement with Libraries

Through efforts such as the Toward Gigabit Libraries in Pennsylvania project and other regional and statewide efforts in the northeast to build awareness and capacity among library personnel, we are considering novel ways to engage public libraries around data science education and training for patrons and communities.

Libraries are perceived by residents and communities as a "safe place" to connect with resources. How can we build data science capacity and awareness into public libraries as they interact with job seekers, teens, youth, homeschoolers, etc. especially in unserved and underserved communities?

Consider and build on the role of academic libraries, public libraries, and school libraries to develop data science literacies and skills.

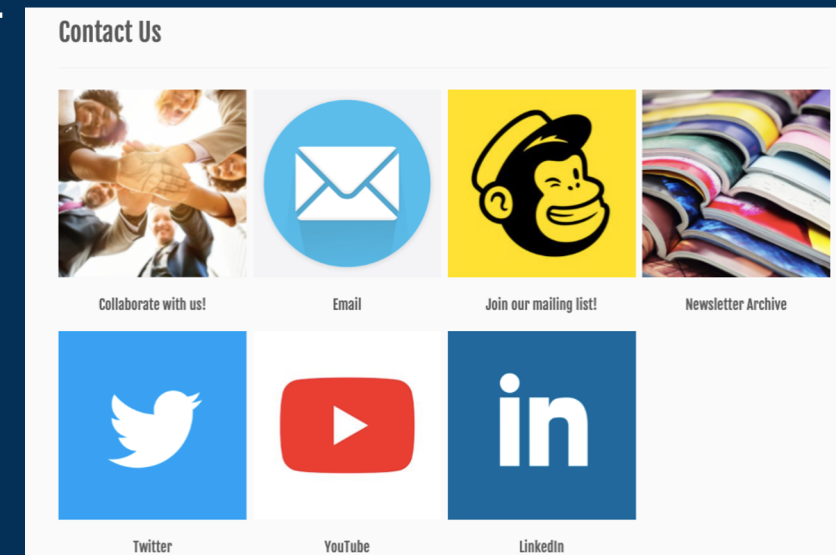Libraries are well poised to be hubs and conveners!

Get Involved in the Northeast Student Data Corps

- Do you have data science innovation/curriculum assets and resources at your organization that you want to reach more audiences? We can include these in the Northeast Big Data Innovation Hub data science curated resource portal.

- Do you know of teachers or learners who would want to participate?

- Are you or do you know faculty/researchers/students/industry experts that would want to participate? We are seeking peers and mentors in the field.

- Are you working with MSIs, HBCUs, inclusivity efforts in your campus/library organization that could benefit from this data science curriculum?

NEBigDataHub.org | @NEBigDataHub #BDHubs #NEBigData

Connect with the Northeast Big Data Innovation Hub

- Reach out to us at contact@nebigdatahub.org
- Keep track of our progress at nebigdatahub.org/nsdc

- Join an event: http://nebigdatahub.org/events-calendar/
- Share a success story: nebigdatahub.org/category/success-stories/
- Join us as a collaborator: http://nebigdatahub.org/connect/
- Sign up for our mailing list: tinyurl.com/NEBDHubList
- Follow us on twitter @NEbigdatahub
- Watch our videos on YouTube

All available through http://nebigdatahub.org/

Contact Us

Collaborate with us!   Email   Join our mailing list!   Newsletter Archive

Twitter   YouTube   LinkedIn

Northeast Student Data Corps
nebigdatahub.org/nsdc

Q&A