



New Jersey Geospatial Forum General Meeting

Date	Thursday, October 12, 2023
Time	10:00am to 12:00pm
Location	<u>In-person</u> NJ Office of Information Technology ITC Room 300 Riverview Plaza Trenton, NJ 08611 (directions) <u>Virtually</u> Microsoft Teams

Agenda

Welcome

Constituency Group Updates & Task Force Reports

Open Discussion & Announcements

All members are encouraged to bring a GIS issue or topic of discussion to the Forum at this time. Anyone making an announcement at the meeting must provide a written summary of their comments to the [NJGF Executive Committee Secretary](#) so that they can be included in the meeting minutes. Members with a GIS issue or topic can also contact their [Executive Committee constituency group representative](#) between Forum meetings.

Scheduled Speakers & Presentations

Release of 1-meter land cover products from 2020/2021 for NJ through the Coastal Change Analysis Program

Supriya Khadke, Mid-Atlantic Geospatial Coordinator, NOAA Office for Coastal Management (OCM)

OCM will be releasing 2020/2021 high resolution (1-meter) land cover products for NJ in the fall through the Coastal Change Analysis Program, which is NOAA's nationally standardized land cover monitoring program for the coastal region of the US.

Analyzing microbial community composition in coastal lakes of New Jersey using eDNA and GIS

Diederik Boonman Morales, Monmouth University Class of '25, Marine and Environmental Biology & Policy (MEBP) Major

This project involved using eDNA (environmental DNA) data sequenced through metabarcoding and then analyzed using clustering techniques to demonstrate similarities in composition based on the time and location of the samples taken. The process used in this project can be used to analyze samples, either in the same locations or in new lakes, to analyze their microbial composition in the future.

UAS Multi-spectral Plot-trial Analysis @ ½ cm Resolution

Chris Kahn, Alpha RTK, and Dr. James Murphy, Rutgers University, Department of Plant Biology

The Rutgers University Center for Turfgrass Research creates tens of thousands of genetic variations, combining them with a variety of treatment applications to find the most effective profiles resistant to heat, foot traffic, and disease. Plot trials are small (3' x 5') and variations in color & health are quite subtle. Comparing plot trial health via imaging at the resolution and precision required for reliable research results was previously a roadblock. This summer, RU combined its access to AlphaRTK's cm level precision with a DJI Multispectral drone, ArcGIS Field Maps, and Pix4D photogrammetry to produce bi-weekly multi-spectral statistical analytics of over 800 plot-trials at 5mm resolution. Rutgers hopes that this scalable, innovative use of geospatial data will accelerate statistical insights into turfgrass responses to stressors such as heat.

Future General Meeting Dates

Held in-person at NJOIT ITC Room, 300 Riverview Plaza in Trenton ([directions](#)), as well as virtually via Microsoft Teams, 10:00am to 12:00pm

Thursday, December 7, 2023

Thursday, March 7, 2024

Future Executive Committee Meeting Dates

Held virtually via Microsoft Teams, 1:00pm to 2:30pm

Thursday, November 2, 2023

Thursday, January 4, 2024

Thursday, March 7, 2024