Types Of Data Collected At Terrestrial And Aquatic Field Sites

1. A flux tower collects atmospheric data at terrestrial sites.
2. Sampling plots are located within and outside of the tower footprint.
3. Field scientists collect soil data at terrestrial sites.
4. Automated instruments collect soil data at terrestrial sites.
5. Soil sensor arrays are typically spaced up to 40 m apart. Sensors at these plots measure physical and chemical properties of soil at various depths and soil heat flux at the soil surface.
6. Soil moisture & salinity are 1 Hz and 1 Hz.
7. CO2 and H2O concentrations are 1 Hz and 20 Hz.
8. Precipitation is measured using a Double Fence Intercomparison Reference.
9. Barometric pressure, temperature, and sonic temperature are collected at tower top.
10. Met Station (seven sites) collects data including 1 Hz 1 Hz 1 Hz 1 Hz 1 Hz 1 Hz 1 Hz.

NEON installs an array of five soil plots within or near the flux tower’s footprint and sensors at these plots measure physical and chemical properties of soil at various depths and soil heat flux at the soil surface.

NEON has 34 freshwater aquatic field sites, including 24 wadeable streams, seven lakes, and three non-wadeable rivers. Locations are representative of aquatic features and habitats typical of regions across the United States within each NEON Domain (excluding D20: Pacific Tropical) and near to NEON terrestrial field sites whenever feasible.

TERRESTRIAL SITES

NEON installs an array of five soil plots within or near the flux tower’s footprint and in the locally dominant (1 km² scale) soil type of each terrestrial field site. Soil plots are typically spaced up to 40 m apart. Sensors at these plots measure physical and chemical properties of soil at various depths and soil heat flux at the soil surface.

Aquatic Field Sites

NEON has 24 freshwater aquatic field sites, including 24 wadeable streams, seven lakes, and three non-wadeable rivers. Locations are representative of aquatic features and habitats typical of regions across the United States within each NEON Domain (excluding D20: Pacific Tropical) and near to NEON terrestrial field sites whenever feasible.