ENVIRONMENTAL
Fact Sheet

NEW HAMPSHIRE DEPARTMENT OF Environmental Services

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New Hampshire's Air Monitoring Network

New Hampshire has monitored ambient (outdoor) air quality since the early 1960s through a statewide network of air monitoring stations. Over the past four decades, the New Hampshire Department of Environmental Services (NHDES) has continually improved this network to comply with federal requirements and to track air quality throughout the state. The current ambient air monitoring network includes multiple site locations across New Hampshire that measure and track numerous air pollutants. NHDES and other organizations use air monitoring data to determine the status of New Hampshire's air quality, predict air pollution episodes, enact protective measures and warnings, protect public health, and protect the natural environment.

New Hampshire's Air Monitoring Network Locations

What air pollutants are measured by the air monitoring network?

New Hampshire's air monitoring network measures levels of pollutants identified as "criteria pollutants" by the U.S. Environmental Protection Agency (EPA). They include ozone, sulfur dioxide, nitrogen dioxide, carbon monoxide, particulate matter and lead. Criteria pollutants, at certain levels, have adverse effects on public health and the environment. For each criteria pollutant, EPA sets a health-based, or "primary" standard to protect public health and a welfare-based, or "secondary," standard to protect the environment, e.g., crops, vegetation, wildlife, visibility. NHDES and EPA evaluate the information from the air monitoring network to determine whether areas in New Hampshire are meeting or exceeding the air quality standards and take corrective actions, as necessary.

In addition to the criteria pollutants, NHDES also measures ozone precursors (nitrogen oxides and volatile organic compounds) and meteorological parameters such as wind speed, wind direction, and external temperature at some of their sites. The following table lists the NHDES air monitoring network site locations and the pollutants measured at each site.

For information on NHDES's current air monitoring network, contact the Air Resources Division at (603) 271-1370, or visit www.airquality.nh.gov. Additional information about the University of New Hampshire monitoring sites can be found at www.airmap.unh.edu.

NEW HAMPSHIRE AIR MONITORING NETWORK		
Location	**Air Monitoring Station***	**Parameters Measured***
Concord	Hazen Drive	Met, O_3, SO_2
Keene	Water Street	Met, O_3, $PM_{2.5}$
Laconia	Green Street	Met, O_3 , $PM_{2.5,}$ RF
Lebanon	Lebanon Airport	Met , O_3, $PM_{2.5,}$
Londonderry	Moose Hill School	NCore: BP, CO Trace, IMPROVE, Met, NO_y, O_3, $PM_{2.5}$, PM_{10}, PM Coarse, RH, RF, SO_2 Trace, Lead
Mt. Washington Area	Greens Grant [AMC/USFS], Camp Dodge	IMPROVE, O_3
	Sargents Purchase, Summit	O_3
Nashua	Crown Street	$PM_{2.5}$
	Gilson Road	Met, NO_2, O_3, PAMS
Pembroke	Exchange Street	Met, $PM_{2.5}$ (co-location), SO_2,
Peterborough	Miller State Park Pack Monadnock	NCore: BP, CO, IMPROVE, Met, NO_y, O_3, PAMS, $PM_{2.5}$, PM_{10}, PM Coarse, RH, RF, SO_2, Solrad, UVRad
Portsmouth	Pierce Island	Met, O_3, $PM_{2.5,}$ PM_{10} (co-location), SO_2
Rye	Seacoast Science Center	Met, O_3
Woodstock	Hubbard Brook	CASTNET, ETP, $O_{3,}$

*Abbreviations:

AMC	Appalachian Mountain Club
BP	Barometric Pressure
CASTNET	Clean Air Status and Trends Network (EPA & National Park Service)
CO	Carbon Monoxide
ETP	External Temperature
O_3	Ozone
IMPROVE	Interagency Monitoring of Protected Visual Environments
Met	Meteorological Data (e.g., external temperature; wind speed and direction)
NADP	National Atmospheric Deposition Program
NCore	NCore Multipollutant Monitoring Network
NO_y	Nitrogen Oxides, including Nitrogen Dioxide (NO_2)
NO_2	Nitrogen Dioxide
PAMS	Photochemical Assessment Monitoring Station
$PM_{2.5}$	Particulate Matter ($\leq$ 2.5 microns in diameter) – filter-based and/or continuous monitoring
PM_{10}	Particulate Matter ($\leq$ 10 microns in diameter) – all filter-based monitoring
RH	Relative Humidity
RF	Rainfall
SO_2	Sulfur Dioxide
Solrad	Solar Radiation
USFS	United States Forest Service
UVRad	Ultraviolet Radiation