

AirNow API

The Environmental Protection Agency's AirNow API (AirNowAPI.org) is for software developers, researchers, the media, and the public to retrieve air quality forecasts and data in real time. The AirNow API suite of tools includes web services, data feeds, and other file products. This fact sheet outlines these data services and the additional information available through the AirNow API.

An AirNow API account is required to access these services and feeds. Sign up for an account on the Log In page to get started.

Home

Find information about the AirNow API website and partner agencies on the Home page. Any important information regarding AirNow web services or data feeds is posted here.

Web Services

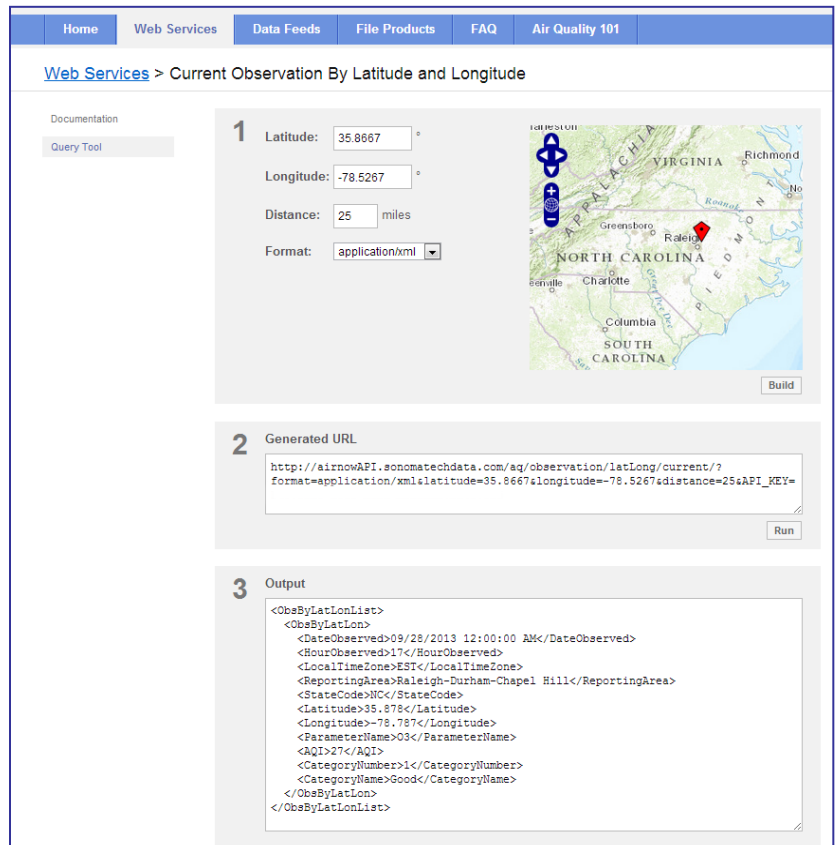
Obtain the latest U.S. air quality data and forecasts. Data are available for a specific zip code or geographic coordinates (latitude and longitude).

Available web services include

- Air quality forecasts and action days issued by air quality agencies.
- Real-time air quality observations by reporting areas – cities or areas defined by air quality agencies.
- Historical air quality observations by reporting areas.

Use the Query Tool to generate a URL and return output (see example at right). Specify a distance range, and the web service will return information for the nearest reporting area. Data formats can be returned in CSV, JSON, or XML formats.

The Documentation page defines all of the input and output parameters.



The screenshot shows the 'Web Services' section of the AirNow API website. The breadcrumb trail is 'Web Services > Current Observation By Latitude and Longitude'. On the left, there are links for 'Documentation' and 'Query Tool'. The main area contains a form with the following fields:

- 1** Latitude:
- Longitude:
- Distance: miles
- Format:

To the right of the form is a map of the Southeastern United States with a red pin over Raleigh, North Carolina. A 'Build' button is located at the bottom right of the form area.

2 Generated URL

```
http://airnowAPI.sonomatechdata.com/airnow/observation/latLong/current/?format=application/xml&latitude=35.8667&longitude=-78.5267&distance=25&API_KEY=
```

A 'Run' button is located at the bottom right of the URL area.

3 Output

```
<ObsByLatLonList>
  <ObsByLatLon>
    <DateObserved>09/28/2013 12:00:00 AM</DateObserved>
    <HourObserved>17</HourObserved>
    <LocalTimeZone>EST</LocalTimeZone>
    <ReportingArea>Raleigh-Durham-Chapel Hill</ReportingArea>
    <StateCode>NC</StateCode>
    <Latitude>35.878</Latitude>
    <Longitude>-78.787</Longitude>
    <ParameterName>O3</ParameterName>
    <AQI>27</AQI>
    <CategoryNumber>1</CategoryNumber>
    <CategoryName>Good</CategoryName>
  </ObsByLatLon>
</ObsByLatLonList>
```

Data Feeds

Access data using RSS feeds. Data options include air quality forecasts, action days, or current conditions for a reporting area.

City	Forecast RSS	Action Day RSS	Current Conditions RSS
Hancock County			
Harrison County			
Jackson County			
Mississippi Gulf Coast			
Hernando			
Jackson			

File Products

Access several types of air quality data products and formats are available via file transfer protocol (FTP) at <ftp://AirNowAPI.org>.

FAQ

Find answers, definitions of common AirNow terminology, and recommendations in the Frequently Asked Questions (FAQ) section. Contact us at AirNowDMC@sonomatech.com if you have a question that is not answered.

Air Quality 101

Learn the basics in the Air Quality 101 section, including information on the Air Quality Index (AQI) categories and colors.

AQI Numbers	AQI Category (Descriptor)	AQI Color	Hexadecimal Color Value
0 - 50	Good	Green	(00e400)
51 - 100	Moderate	Yellow	(ffff00)
101 - 150	Unhealthy for Sensitive Groups	Orange	(ff7e00)
151 - 200	Unhealthy	Red	(ff0000)
201 - 300	Very Unhealthy	Purple	(99004c)
301 - 500	Hazardous	Maroon	(7e0023)

Contact

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