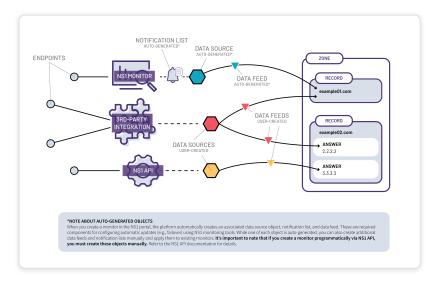


# Understanding NS1 data sources & feeds

Data sources and their associated feeds are essential components of NS1 DNS resource management and traffic routing decisions. Data feeds connect data sources to records and answers — sending uptime data and other metrics to the DNS edge in real-time. NS1's DNS servers make routing decisions based on information sent through data feeds.



### **Data sources**

A data source is an object within the NS1 platform associated with a monitor, third-party integration, or integration via NS1 API. Each monitor or integration observes an endpoint in your network and communicates status changes to the relevant data source object configured in the NS1 platform. Once notified of a change, the data source engages its associated data feeds to update the relevant DNS resources. DNS servers use this real-time data to inform traffic routing decisions.

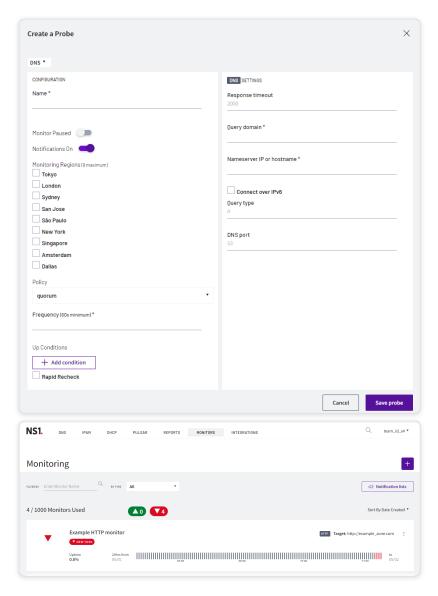
#### NOTE

Each data source has a unique source ID, which is a critical identifier required when using the NS1 API to manage data sources and their associated feeds.

It is important to note there are slight differences in the configuration and steps involved for data sources associated with *monitors* versus data sources associated with *integrations* (third-party or native NS1 API).

### **NS1 monitors**

NS1 monitors send periodic health checks to a specific endpoint to observe the up/down status. Supported monitor types include HTTP/S, PING, TCP, and DNS monitors.



When you create a new monitor in the NS1 portal, the following objects auto-generate:

- a data source object with a unique ID,
- a data feed associated with the data source, and
- a **notification list** to communicate between the monitor and data source. Notification lists include one or more channels to send updates when the monitor detects changes in endpoint conditions.

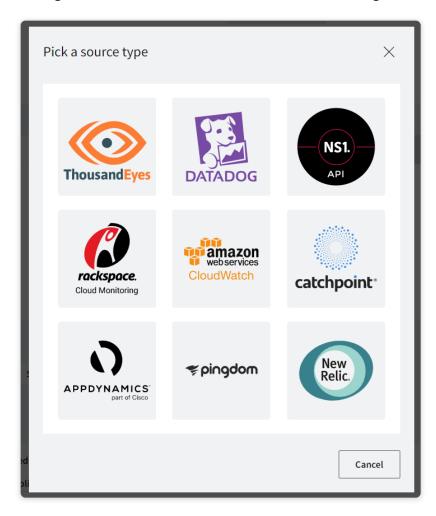
#### NOTE

When you create a monitor, the NS1 platform creates a new notification list, data source, and data feed to apply to record or answer metadata. It's important to note if you use the NS1 API to create a new monitor, these objects will **not** be auto-generated. Instead, you must manually create the notification list, data source, and data feed using individual API commands. Each NS1 monitor has an associated job ID. This is a unique identifier to manage data sources and feeds via NS1 API. Refer to the NS1 API documentation for details.

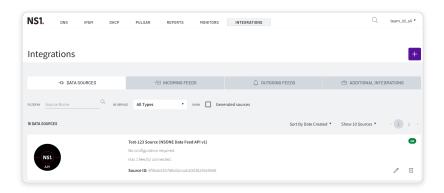
By default, auto-generated data sources associated with monitors will not appear in the list of data sources in the NS1 portal. To view auto-generated data sources, enable the checkbox next to "Show Generated Sources." If using the NS1 API, all data sources will appear in response to a GET command to https://api.nsone.net/v1/data/sources.

### **Integrations**

Supported monitoring integrations include the native NS1 API and several third-party tools which allow you to monitor your applications, databases, and infrastructure — such as active connections, load average, and more. The screenshot below shows the integrations currently available in the NS1 portal.

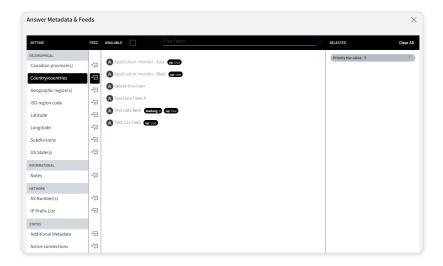


You will configure the data source and an associated data feed during the setup process. Once complete, these integration-based data sources appear under the **Data Sources** tab. Each data source has an associated source ID, an essential identifier for API users.

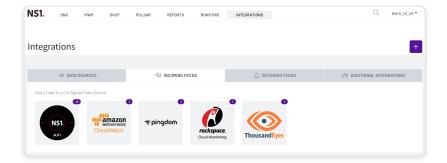


## **Data feeds**

A data feed connects a data source (API, monitoring, or third-party integration) with a DNS record or answer metadata. Record or answer metadata can include various metrics associated with the endpoint represented by the record or answer. Users can input metadata manually or connect a data feed to a specific metadata field to update the metadata automatically as conditions change.



The **Incoming Feeds** tab (within the **Integrations** page) lists all active data sources and feeds and displays the associated feed URL. Again, note that you must enable the checkbox next to "Show Generated Sources" to view auto-generated objects if you created a new monitor via the portal.



Each data feed has a unique feed URL in the following format: https://api.nsone.net/v1/feed/{sourceID}. Many data sources connect directly to this URL to feed data to NS1. The request sent to this URL depends on the type of data source. Typically, each data source has its own request protocol.

## **Notifiers & notification lists**

Notification lists specify which notifiers to use when sending monitoring-related notifications. NS1's monitoring solution lets you create monitors (i.e., probes) to track the up/down status of an endpoint, as well as notification lists that indicate where to send monitoring alerts. When that monitor detects an endpoint is down, it pushes alerts to all the notifiers specified in the attached notification list. For more information, refer to Setting up notification lists.