# API User Guide

## CDC Environmental Health

## Tracking Network

### API User Guide

## Overview

The Data Application Program Interface (API) is an additional way to query data stored by the Environmental Public Health Tracking Network. The API provides a standard URL interface with a JSON formatted response. An empty data set is return for either no data or an invalid entry.

An optional API token for the CDC Environmental Public Health Tracking Network API can be obtained by contacting nephtrackingsupport@cdc.gov.  An API token allows greater access to the Environmental Public Health Tracking Network data.

## Table of Contents

(1) deprecated (may not be in future versions)

Glossary

## contentareas

**Definition:** Return Content Areas

**Usage:**

ephtracking.cdc.gov/apigateway/api/{version}/contentareas/{returnType}[?apiToken]

**Parameters:**

- **version**
  - Only "v1" is valid for this version
- **returnType**
  - Only "json" is accepted for this version
- **apiToken (optional)**
  - Called via "apiToken=TOKEN" where TOKEN is the unique identifier supplied by the Environmental Public Health Tracking Network

**Output:**

```
{
  "type": "array",
  "items": {
    "type": "object",
    "properties": {
      "ContentAreaId": {
        "type": "string"
      },
      "ContentAreaName": {
        "type": "string"
      },
      "ContentAreaShortName": {
        "type": "string"
      }
    }
  }
}
```

**Example:**

"ephtracking.cdc.gov/apigateway/api/v1/contentareas/json" provides a list of content areas. The return values (partial output) are:

```
[{"id":"11","name":"Air Quality","shortName":"AQ"},{"id":"3","name":"
Asthma","shortName":"AS"},
{"id":"9","name":"Cancer","shortName":"CR"},{"id":"2","name":"Carbon
Monoxide Poisoning","shortName":"CO"},
{"id":"10","name":"Childhood Cancers","shortName":"CHCR"},{"id":"6","
name":"Childhood Lead Poisoning",
"shortName":"CLP"},{"id":"15","name":"Climate  ... ]
```

# indicators

**Definition:** Return Indicators for a Content Area

**Usage:**

ephtracking.cdc.gov/apigateway/api/{version}/indicators/{contentarea}[?apiToken]

**Parameters:**

- **version**
  - Only "v1" is valid for this version
- **contentAreaId**
  - Valid Content Area Id - Invalid entry will return an empty data set
- **apiToken (optional)**
  - Called via "apiToken=TOKEN" where TOKEN is the unique identifier supplied by the Environmental Public Health Tracking Network

**Output:**

```
{
  "type": "array",
  "items": {
    "type": "object",
    "properties": {
      "IndicatorId": {
        "type": "string"
      },
      "IndicatorName": {
        "type": "string"
      },
      "IndicatorShortName": {
        "type": "string"
      },
      "externalURL": {
        "type": "null"
      },
      "externalURLText": {
        "type": "null"
      }
    }
  }
}
```

**Example:**

"ephtracking.cdc.gov/apigateway/api/v1/indicators/9" provides a list of indicators for contentAreaId = 9 (Cancer). The return values (partial output) are:

```
[{"id":"21","name":"Incidence of Acute Myeloid Leukemia","shortName":"
Myeloid Leuk","externalURL":null,
"externalURLText":null},{"id":"18","name":"Incidence of Bladder
Cancer","shortName":"Bladder Cancer",
"externalURL":null,"externalURLText":null},{"id":"47","name":"
Incidence of Brain and Other Nervous
System Cancer","shortName":"Brain & Other ","externalURL":null,"
externalURLText":null}, ...]
```

## measures

**Definition:** Return Measures for an Indicator

**Usage:**

ephtracking.cdc.gov/apigateway/api/{version}/measures/{indicatorID}?apiToken]

**Parameters:**

- **version**
  - Only "v1" is valid for this version
  - **indicatorId**
    - Valid Indicator Id - Invalid entry will return an empty data set
- **apiToken (optional)**
  - Called via "apiToken=TOKEN" where TOKEN is the unique identifier supplied by the Environmental Public Health Tracking Network

**Output:**

```
{
  "type": "array",
  "items": {
    "type": "object",
    "properties": {
      "MeasureId": {
        "type": "string"
      },
      "MeasureName": {
        "type": "string"
      },
      "MeasureShortName": {
        "type": "string"
      },
      "externalURLText": {
        "type": "null"
      },
      "externalURLText": {
        "type": "null"
      }
    }
  }
}
```

**Example:**

"ephtracking.cdc.gov/apigateway/api/v1/measures/25" provides a list of content areas for indicatorId = 25  (Incidence of Thyroid Cancers). The return values (partial output) are:

```
[{"id":"66","name":"Age-adjusted incidence rate of Thyroid Cancer per
100,000 population  - M66",
"shortName":"Age-adjusted rate per 100,000 population - M66","
externalURL":null,"externalURLText":null},
{"id":"226","name":"Age-adjusted incidence rate of Thyroid Cancer per
100,000 population over a five
year period - M226","shortName":"Age-adjusted rate per 100,000
population over a 5 year period - M226",
"externalURL":null,"externalURLText":null}, ...]
```

## measurestratification

**Definition:** Listing of stratifications for a measure and geography type

**Usage:**

ephtracking.cdc.gov/apigateway/api/{version}/measurestratification/{measureId}/{geographicTypeId}/{isSmoothed}[?apiToken]

**Parameters:**

- **version**
    - Only "v1" is valid for this version
- **measureId**
    - Requires a valid measureID
- **geographicTypeId**
    - Requires a valid geographicTypeID
- **isSmoothed**
    - Requires either a one or zero (true or false) for having data that is geographically smoothed:
    - NOTE: the majority of measures *do not* have smoothing value
- **apiToken (optional)**
    - Called via "apiToken=TOKEN" where TOKEN is the unique identifier supplied by the Environmental Public Health Tracking Network

**Output:**

```
{
   "type": "array",
   "items": {
     "type": "object",
     "properties": {
       "displayName": {
         "type": "string"
       },
       "isDisplayed": {
         "type": "boolean"
       },
       "isRequired": {
         "type": "boolean"
       },
       "isGrouped": {
         "type": "boolean"
       },
       "IsStratificationSelectable": {
         "type": "boolean"
       },
       "stratificationItem": {
         "type": "array",
         "items": {
           "type": "object",
           "properties": {
             "name": {
               "type": "string"
             },
             "longName": {
               "type": "string"
             },
             "isDefault": {
               "type": "boolean"
             },
             "useLongName": {
               "type": "boolean"
             },
             "localId": {
               "type": "integer"
             }
           }
         }
       },
       "columnName": {
         "type": "string"
       },
       "stratificationTypeId": {
         "type": "integer"
       }
     }
   }
}
```

**Example:**

"ephtracking.cdc.gov/apigateway/api/v1/measurestratification/66/1/0" provides a list of stratifications for measureId = 66 (Age-adjusted incidence rate of Thyroid Cancer per 100,000 population) and isSmotthed = 0 (false). The return values (partial output) are:

```
[{"displayName":"Gender","isDisplayed":true,"isRequired":false,"
isGrouped":false,"isStratificationSelectable":
false,"stratificationItem":[{"name":"Male","longName":"Male","
isDefault":false,"useLongName":false,"localId":1},
{"name":"Female","longName":"Female","isDefault":false,"useLongName":
false,"localId":2}],"columnName":"GenderId",
"stratificationTypeId":4},{"displayName":"Race Ethnicity","
isDisplayed":true,"isRequired":false,"isGrouped":false,
"isStratificationSelectable":false,"stratificationItem":[{"name":"
Asian/Pacific Islander (includes Hispanic)",
"longName":"Asian/Pacific Islander (includes Hispanic)","isDefault":
false,"useLongName":false,"localId":1},
{"name":"Black (includes Hispanic)","longName":"Black (includes
Hispanic)","isDefault":false, ...]
```

## geographiclevels

**Definition:** Listing of geographic levels for a measure

**Usage:**

ephtracking.cdc.gov/apigateway/api/{version}/geographiclevels/{measureID}[?apiToken]

**Parameters:**

- **version**
  - Only "v1" is valid for this version
- **measureId**
  - Requires a valid measureID
- **apiToken (optional)**
  - Called via "apiToken=TOKEN" where TOKEN is the unique identifier supplied by the Environmental Public Health Tracking Network

**Output:**

```
{
  "type": "array",
  "items": {
    "type": "object",
    "properties": {
      "id": {
        "type": "integer"
      },
      "GeographicTypeId": {
        "type": "integer"
      },
      " GeographicType": {
        "type": "string"
      },
      " SelectOptionsTypeId": {
        "type": "integer"
      },
      "SelectOptionsType": {
        "type": "string"
      },
      "SmoothingLevelId": {
        "type": "integer"
      },
      "Smoothing Level": {
        "type": "string"
      }
    }
  }
}
```

**Example:**

"ephtracking.cdc.gov/apigateway/api/v1/geographiclevels/66" provides a list of geographic levels for measureId = 66 (Age-adjusted incidence rate of Thyroid Cancer per 100,000 population). The return values are:

```
[{"id":506,"geographicTypeId":1,"geographicType":"State","
selectOptionsTypeId":1,
"selectOptionsType":"No Restrictions","smoothingLevelId":1,"
smoothingLevel":"No Smoothing Available"}]
```

Back to top

## geography

**Definition:** Return Geographies for a Measure ID, Geographic Type and Geographic Rollup

**Usage:**

ephtracking.cdc.gov/apigateway/api/{version}/geography/{measureID}/{geographicTypeId}/{geographicRollup}[?apiToken]

**Parameters:**

- **version**
  - Only "v1" is valid for this version
- **measureId**
  - Requires a valid measureID
- **geographicTypeId**
  - Requires a valid geographicTypeID
- **geographicRollup**
  - Requires either a one or zero (true or false) to include geographicRollup
- **apiToken (optional)**
  - Called via "apitoken=TOKEN" where TOKEN is the unique identifier supplied by the Environmental Public Health Tracking Network

**Output:**

```
{
"type": "array",
 "items": {
   "type": "object",
   "properties": {
    "parentGeographicId": {
     "type": "integer"
    },
    "parentName": {
     "type": "string"
    },
    "parentAbbrevation": {
     "type": "string"
    },
    "childGeographicId": {
     "type": "integer"
    },
    "childName": {
     "type": "null"
    },
    "childAbbreviation": {
     "type": "null"
    },
    "id": {
     "type": "integer"
    }
   }
  }
}
```

**Example**:

"ephtracking.cdc.gov/apigateway/api/v1/geography/66/1/0" provides a list of geographies for  measureId  = 66 (Age-adjusted incidence rate of Thyroid Cancer per 100,000 population), geographicTypeId = 1 (state) and geographicRollup = 0 (false). The return values (partial output) are:

```
[{"parentGeographicId":1,"parentName":"Alabama","parentAbbreviation":"
AL","childGeographicId":0,
"childName":null,"childAbbreviation":null,"id":1},
{"parentGeographicId":2,"parentName":"Alaska",
"parentAbbreviation":"AK","childGeographicId":0,"childName":null,"
childAbbreviation":null,"id":2},
{"parentGeographicId":4,"parentName":"Arizona","parentAbbreviation":"
AZ","childGeographicId":0,
"childName":null,"childAbbreviation":null,"id":4},
{"parentGeographicId":5,"parentName":"Arkansas"
,"parentAbbreviation":"AR","childGeographicId":0,"childName":null,"
childAbbreviation":null,"id":5} ...]
```

## temporal

# Return Temporals for a Measure and Filtered Geographies

**Definition:** Listing of temporals for a measure and filtered geographies

**Usage:**

ephtracking.cdc.gov/apigateway/api/{version}/temporal/{measureID}/{geographicTypeId}/{geographicTypeIdFilter}/
{geographicItemsFilter}[?apiToken]

**Parameters:**

- **version**
  - Only "v1" is valid for this version
- **measureId**
  - Requires a valid measureID
- **geographicTypeId**
  - Requires a valid geographicTypeID
- **geographicTypeIdFilter**
  - Filter to retreive only filtered geographicTypeId's
- **geographicItemsFilter**
  - Filter to retreive only certain geographicItems
- **apiToken (optional)**
  - Called via "apiToken=TOKEN" where TOKEN is the unique identifier supplied by the Environmental Public Health Tracking Network

**Output:**

```
{

  "type": "array",
  "items": {
   "type": "object",
   "properties": {
    "id": {
      "type": "integer"
    },
    "parentTemporalId": {
      "type": "integer"
    },
    "parentMinimunTemporalId": {
      "type": "null"
    },
    "parentTemporalTypeId": {
      "type": "integer"
    },
    "parentTemporalType": {
      "type": "string"
    },
    "childTemporalId: {
      "type": "null"
    },
    "childTemporalTypeId": {
      "type": "null"
    },
    "childTemporalType": {
      "type": "null"
    },
    "parentTemporalDisplay": {
      "type": "string"
    }
   }
  }
}
```

**Example:**

provides a list of temporals for  measureId  = 66 (Age-adjusted incidence rate of Thyroid Cancer per 100,000 population), geographicTypeId = 1 (state), geographicTypeIdFilter = 1 (state only), geographicItemsFilter = 13,26,48 (StateFIPS for Georgia, Michigan and Texas). The return values (partial output) are:

```
[{"id":2001,"parentTemporalId":2001,"parentMinimumTemporalId":null,"
parentTemporalTypeId":1,
"parentTemporalType":"Year","childTemporalId":null,"
childTemporalTypeId":null,"childTemporalType":null,
"parentTemporalDisplay":"2001"},{"id":2002,"parentTemporalId":2002,"
parentMinimumTemporalId":null,
"parentTemporalTypeId":1,"parentTemporalType":"Year","
childTemporalId":null,"childTemporalTypeId":null,
"childTemporalType":null,"parentTemporalDisplay":"2002"},{"id":2003,"
parentTemporalId":2003, ... ]
```

Back to top

---

# stratificationlevel

**Definition:** Listing levels of stratification for a measure and geography type

**Usage:**

ephtracking.cdc.gov/apigateway/api/{version}/stratificationlevel/{measureId}/{geographicTypeId}/{isSmoothed}[?apiToken]

**Parameters:**

- **version**
  - Only "v1" is valid for this version
- **measureId**
  - Requires a valid measureID
- **geographicTypeId**
  - Requires a valid geographicTypeID
- **isSmoothed**
  - Requires either a one or zero (true or false) for having data that is geographically smoothed:
  - NOTE: the majority of measures *do not* have smoothing value
- **apiToken (optional)**
  - Called via "apiToken=TOKEN" where TOKEN is the unique identifier supplied by the Environmental Public Health Tracking Network

**Output:**

{

```
     "type": "array",
     "items": {
       "type": "object",
       "properties": {
         "Id": {
           "type": "integer"
         },
         "name": {
           "type": "string"
         },
         "abbreviation": {
           "type": "string"
         },
         "geographicTypeId": {
           "type": "integer"
         },
         "sratificiationType": {
           "type": "array",
           "items": {
             "type": "object",
             "properties": {
               "id": {
                 "type": "integer"
               },
               "name": {
                 "type": "string"
               },
               "abbreviation": {
                 "type": "string"
               },
               "columnName": {
                 "type": "string"
               }
             }
           }
         }
       }
     }
   }
}
```

**Example:**

"ephtracking.cdc.gov/apigateway/api/v1/stratificationlevel/66/1/0" provides a list of levels of stratification for measureId = 66 (Age-adjusted incidence rate of Thyroid Cancer per 100,000 population) and isSmotthed = 0 (false). The return values (partial output) are:

```
[{"id":1,"name":"State","abbreviation":"ST","geographicTypeId":1,"
stratificationType":[]},
{"id":4,"name":"State x Gender","abbreviation":"ST_GN","
geographicTypeId":1,
"stratificationType":[{"id":4,"name":"Gender","abbreviation":"GN","
columnName":"GenderId"}]},
{"id":8,"name":"State x Race/Ethnicity","abbreviation":"ST_RE","
geographicTypeId":1,
"stratificationType":[{"id":2,"name":"Race/Ethnicity","abbreviation":"
RE","columnName":"RaceEthnicityId"}] ...]
```

## getCoreHolder

**Definition:** Listing of Values for a Measure

**Usage:**

ephtracking.cdc.gov/apigateway/api/{version}/getCoreHolder/{measureId}/{stratificationLevelId}/
{geographicTypeIdFilter}/{geographicItemsFilter}/{temporal}/{isSmoothed}/0?[?apiToken]

**Parameters:**

- **version**
  - Only "v1" is valid for this version
- **measureId**
  - Requires a valid measureID
- **stratificationLevelId**
  - Requires a valid stratificationLevelId
- **geographicTypeIdFilter**
  - Requires a valid geographicTypeID or ALL
- **geographicItemsFilter**
  - Filter to retreive only certain geographicItems
- **temporal**
  - Requires a valid temporal entry (e.g. years) seperated by comma
- **isSmoothed**
  - Requires either a one or zero (true or false) for having data that is geographically smoothed:
  - NOTE: the majority of measures *do not* have smoothing value
- **apiToken (optional)**
  - Called via "apiToken=TOKEN" where TOKEN is the unique identifier supplied by the Environmental Public Health Tracking Network

**Output: Core Holder Schema**

**Example:**

"ephtracking.cdc.gov/apigateway/api/v1/getCoreHolder/66/1/ALL/ALL/2011,2012/0/0" provides the basic core holder for measureId = 66 (Age-adjusted incidence rate of Thyroid Cancer per 100,000 population), stratificationLevelId = 1 (state), geographicTypeIdFilter = ALL (All geographic types), geographicItemsFilter = ALL (All geographic items), temporal = 2011,2012, smoothed = 0 (false), getFullCoreHolder = 0 (False - get only basic core holder values). The return values (partial output) are:

```
{"legendResult":[],"tableResult":[{"id":"166895","dataValue":"9.3","
displayValue":"9.3","year":"2011",
"groupById":"1","geographicTypeId":1,"calculationType":"Age Adjusted
Rate","noDataId":-1,
"noDataBreakGroup":0,"stabilityFlag":"1","suppressionFlag":"0","
title":"Alabama","rollover":
["Age Adjusted Rate: 9.3"],"parentGeoAbbreviation":null,"
geoAbbreviation":"AL","geoId":"01","geo":"Alabama",
"parentGeoId":null,"parentGeo":null},{"id":"169733","dataValue":"
8.6","displayValue":"8.6","year":"2012",
"groupById":"1","geographicTypeId":1,"calculationType":"Age Adjusted
Rate","noDataId":-1,"noDataBreakGroup":0,
"stabilityFlag":"1","suppressionFlag":"0","title":"Alabama","
rollover":["Age Adjusted Rate: 8.6"],
"parentGeoAbbreviation":null,"geoAbbreviation":"AL","geoId":"01","
geo":"Alabama","parentGeoId":null,
"parentGeo":null},{"id":"172076","dataValue":"11.7","displayValue":"
11.7","year":"2011","groupById":"1",
"geographicTypeId":1,"calculationType":"Age Adjusted Rate","noDataId":
-1,"noDataBreakGroup":0,    ...]
```

## getMeasures

**Definition:** Listing of Measures – Deprecated (may not be in future versions)

**Usage:**

ephtracking.cdc.gov/apigateway/api/{version}/getMeasures[?apiToken]

**Parameters:**

- **version**
  - Only "v1" is valid for this version
- **apiToken (optional)**
  - Called via "apiToken=TOKEN" where TOKEN is the unique identifier supplied by the Environmental Public Health Tracking Network

**Output:**

```
{
    "type": "array",
    "items": {
     "type": "object",
     "properties": {
      "contentAreaName": {
       "type": "string"
      },
      "indicatorName": {
       "type": "string"
      },
      "measureId": {
       "type": "integer"
      },
      "measureName": {
       "type": "string"
      }
     }
    }
}
```

**Example:**

"ephtracking.cdc.gov/apigateway/api/v1/getMeasures?apiToken=J60D5D74-47B0-42Q2-A8C5-CBFA9E2E0BC7" (not a valid token) provides a listing of measures and returns (partial output):

```
[{"contentAreaName":"Air Quality","indicatorName":"Annual PM2.5 Level
(Monitor only)",
"measureId":87,"measureName":"Annual average ambient concentrations
of PM2.5 in micrograms
per cubic meter (based on seasonal averages and daily measurement)"},
{"contentAreaName":
"Air Quality","indicatorName":"Ozone - Days Above Regulatory Standard
(Monitor only)",
"measureId":83,"measureName":"Number of days with maximum 8-hour
average ozone concentration
 over the National Ambient Air Quality Standard"},   ...]
```

## getGeographicLevels

# Return Geographic Levels for a Measure

**Definition:** Listing of the geographic levels for a measure – Deprecated (may not be in future versions)

**Usage:**

ephtracking.cdc.gov/apigateway/api/{version}/getGeographicLevels/{measureId}[?apiToken]

**Parameters:**

- **version**
  - Only "v1" is valid for this version
- **measureId**
  - Requires a valid measureID
- **apiToken**
  - Called via "apiToken=TOKEN" where TOKEN is the unique identifier supplied by the Environmental Public Health Tracking Network

**Output:**

```
{
"type": "array",
"items": {
 "type": "object",
 "properties": {
  "measureId": {
   "type": "integer"
  },
  "geographicLevelId": { Note: 1 - State,2 - County, 6 - National, 7 - Census Tract
   "type": "integer"
  },
  "SmoothingAvailability": {
   "type": "string"
  }
 }
}
}
```

**Example:**

"ephtracking.cdc.gov/apigateway/api/v1/getGeographicLevels/66"  provides a listing of geographic levels for measureId  = 66 (Age-adjusted incidence rate of Thyroid Cancer per 100,000 population)  and returns:

```
[{"measureId":66,"geographicLevelId":1,"smoothingAvailability":"Not
Smoothed"}]
```

Back to top

# Return State FIPS Code for a Measure

**Definition:** Listing of the state FIPS code for a measure – Deprecated (may not be in future versions)

**Usage:**

ephtracking.cdc.gov/apigateway/api/{version}/getStates/{measureId}[?apiToken]

**Parameters:**

- **version**
  - Only "v1" is valid for this version
- **measureId**
  - Requires a valid measureID
- **apiToken**
  - Called via "apiToken=TOKEN" where TOKEN is the unique identifier supplied by the Environmental Public Health Tracking Network

**Output:**

```
{
"title":State FIPS",
"type": "array",
"items": {
 "type": "string"
}
}
```

**Example:**

"ephtracking.cdc.gov/apigateway/api/v1/getStates/66" provides a listing of state FIPS for measureId = 66 (Age-adjusted incidence rate of Thyroid Cancer per 100,000 population) and returns:

```
["01","02","04","05","06","08","09","10","11","12","13","15","16","
17","18","19","20","21","22","23","24","25",
"26","28","29","30","31","32","33","34","35","36","37","38","39","
40","41","42","44","45","46","47","48","49",
"50","51","53","54","55","56"]
```

Back to top

## Return Years with Data for a Measure

**Definition:** Listing of years with data for a measure – Deprecated (may not be in future versions)

**Usage:**

ephtracking.cdc.gov/apigateway/api/{version}/getYears/{measureId}[?apiToken]

**Parameters:**

- **version**
  - Only "v1" is valid for this version
- **measureId**
  - Requires a valid measureID
- **apiToken (optional)**
  - Called via "apiToken=TOKEN" where TOKEN is the unique identifier supplied by the Environmental Public Health Tracking Network

**Output:**

```
{
"title":Years with Data",
"type": "array",
"items": {
  "type": "string"
}
}
```

**Example:**

"ephtracking.cdc.gov/apigateway/api/v1/getYears/66" provides a listing of years with data for measureId = 66 (Age-adjusted incidence rate of Thyroid Cancer per 100,000 population) and returns:

```
["2001","2002","2003","2004","2005","2006","2007","2008","2009","
2010","2011","2012"]
```

Back to top

## Return Data Values for a Measure

**Definition:** Listing of data values for a measure

**Note: deprecated (may not be in future versions) - replaced by getCoreHolder**

**Usage:**

ephtracking.cdc.gov/apigateway/api/{version}/getData/{measureId}/{state}/{includeCounty}/{temporal}/{isSmoothed}/{returnType}[?apiToken]

**Parameters:**

- **version**
  - Only "v1" is valid for this version
- **measureId**
  - Requires a valid Measure ID
- **state**
  - state input requires: "All" or one-to-many valid state FIPS Code(s) input, separated by commas *without* spaces
  - A valid state FIPS code is between 1 and 56 (exclude 03, 07, 14, 43, 52) or
  - "ALL", which will include states that have data for this measure
  - Not all states have data for every measure. If a state does not have data for the selected measure, the query will return an empty data set. States with their available measures are listed in the Data API Discovery Guide.
  - Example: "06,26,45" are FIPS code for CA, MI and SC
  - Possible Error Conditions that may occur, if not using "All" (not case sensitive), that are returned as Not Integer message include:

    1. Double commas - "06,,26,45
    2. Not numeric or comma - "CA,ID"
    3. Length greater than 2 - "045"
    4. Not a valid FIPS Code (returns Not Valid FIPS code message) -"03,07,14,43,52" (Not valid state FIPS code)
- **includeCounty**

  - Requires either a one or zero (true or false) for including data at the county level
  - Only year is valid for this version
  - Year input requires: "All" or only one valid 4 digit year input
  - Valid year to query are between 1900 and 2100
  - An empty data set will be returned if a selected measure, state(s) and year(s) does not have data
- **isSmoothed**
  - Requires either a one or zero (true or false) for having data that is geographically smoothed:
  - NOTE: the majority of measures *do not* have smoothing value
- **returnType**
  - Only "json" is accepted for this version
- **apiToken (optional)**
  - Called via "apiToken=TOKEN" where TOKEN is the unique identifier supplied by the Environmental Public Health Tracking Network

**Output: Core Holder Schema**

**Example:**

"ephtracking.cdc.gov/apigateway/api/v1/getData/66/36/0/2012/0/json" provides a listing of values for measureId = 66 (Age-adjusted incidence rate of Thyroid Cancer per 100,000 population), state FIPS = 36 (New York), includeCounty = 0 (false), temporal = 2012 (year), includeSmoothing = 0 (false) and returnType = json. The return values (partial output) are:

```
{"legendResult":[],"tableResult":[{"id":"171910","dataValue":"19.2","
displayValue":"19.2","year":"2012",
"groupById":"1","geographicTypeId":1,"calculationType":"Age Adjusted
Rate","noDataId":-1,"noDataBreakGroup":0,
"stabilityFlag":"1","suppressionFlag":"0","title":"New York","
rollover":["Age Adjusted Rate: 19.2"],
"parentGeoAbbreviation":null,"geoAbbreviation":"NY","geoId":"36","
geo":"New York","parentGeoId":null,
"parentGeo":null}],"tableResultWithCI":[],"
devDisabilitiesTableResult":[],"modeledTableResult":[],
"healthImpactTableResult":[],"airToxicTableResult":[],"
climateChangeTableResult":[],"tableResultWithMonth":[],
"tableResultWithQuarter":[],"dailyEstimatesTableResult":[],"
heatEpisodesTableResult":[],"cutPointTableResult":[],
"pwsTableResult":[],"biomonitoringTableResult":[],"
benchmarkInformation":{"id":27,"measureId":66,"benchmarkId":9,
"measureGeographicTypeId":1,"units":null,"geographicDisplay":"
National","benchmarkName":" Rate per 100,000
 population","benchmarkShortName":" Rate per 100,000 population","
multipleSelectionActionId":1,
"multipleSelectionAction":"Continue","active":null,"
geographicTypeDisplay":"National Benchmark","benchmarkFullName":
"National  Rate per 100,000 population",  ...}
```

Back to top

# Glossary

**Data are presented as measures and organized by indicator and content area.**

**Back to top**

| Term | Definition |
|---|---|
| apiToken | The unique identifier supplied by the Environmental Public Health Tracking Network for additional access to Environmental Public Health Tracking data. Register to receive a token for the Environmental Public Health Tracking Network API by contacting trackingsupport@cdc.gov. |
| Benchmark | A standard against which a measure can be compared. |
| childMeasure | A measure  that is specific to children |
| Content Area | A content area is a topic within environmental public health. Examples are "asthma", "Drinking Water","Homes".  A content area may have more than one indicator. |
| ContentAreaId | Integer id for each content area |
| ContentAreaName | Name used to describe each content area |
| ContentAreaShortName | Label used to describe each content area |
| ExternalURL | References a URL  external to the Environmental Public Health Tracking Network |

| | |
|---|---|
| ExternalURLText | Display text for the external URL |
| FIPS | Federal Information Processing Specification - FIPS state codes and county codes are numeric codes defined in U.S. Federal Information Processing Standard Publications. |
| GeographicLevel | Level or Type of geography level for a measure e.g. State , County |
| GeographicLevelAbbreviation | Abbreviation of the geographic type or level |
| GeographicLevelId | Integer Id of geographic level 1 - State,2 - County, 6 - National, 7 - Census Tract |
| GeographicItem | Geographic name or location for this measure |
| GeographicItemAbbreviation | Abbreviation of the geographic name of location |
| GeographicItemId | Geographic Id - State and Counties uses FIPs codes - numeric codes defined to identify U.S. states and counties. |
| Indicator | One or more items, characteristics or other things that will be assessed.  It is assessed through direct and indirect measures.  A content area may have more than one indicator. |
| IndicatorId | Integer Id for each indicator |
| IndicatorName | Name used to describe each indicator |
| IndicatorShortName | Label used to describe each indicator |
| LegendResult | Array of bracketed  values  used to display a map's legend |
| Measure | A summary characteristic or statistic, such as a sum, percentage, or rate. There may be several measures of a specific indicator which when considered in conjunction fully describe the indicator. |
| MeasureId | Integer Id for each measure |
| MeasureName | Name used to describe each measure |
| MeasureShortName | Label used to describe  each measure |
| SelectOptionsType | Selection options type available for each measure |
| SelectOptionsTypeId | Integer Id for each select options type  1 - No Restrictions, 3 - Single Child, Single Parent if Applicable, 4 - No Geographic Selection, 5 -  Single Parent, All Children |
| Smoothing Level Availability | Level or type of smoothing available for a measure - Smoothed measures are geographically based averages. Geographic smoothing algorithms borrow information from neighboring areas to stabilize results from sparsely populated areas.  Most measures are not smoothed. |
| SmoothingType | Integer Id for each smoothing level or type 1 - Not Smoothed, 2 - Smoothing Only, 3 - Both |
| Stability | Any rate or measure with a relative standard error (RSE) greater than or equal to 30% is flagged as unstable or, in the case of cancer data, suppressed. |
| State FIPS | FIPS state codes are numeric codes defined by Federal Information Processing Specification. |
| StratificationDisplayName | Display Name of stratification |

| StratificationIsDisplayed | Stratification Displayed 0 - False, 1- True |
|---|---|
| StratificationIsGrouped | Stratification Grouped 0 - False, 1- True |
| StratificationIsRequired | Stratification Required 0 - False, 1- True |
| StratificationIsStratificationSelectable | Stratification Selectable 0 - False, 1- True |
| StratificationItemIsDefault | Default Selection for stratification items |
| StratificationItemLocalId | Local Id for sorting items |
| StratificationItemLongName | Long name of stratification item |
| StratificationItemName | Short Name of stratification item |
| StratificationItemUseLongName | Use long name of stratification item for display |
| StratificationLevelAbbreviation | Stratification level abbreviation |
| StratificationLevel | Stratification level |
| StratificationLevelId | Stratification level Id |
| StratificiationType | Stratification type |
| StratificationTypeAbbreviation | Stratification type Abbreviation |
| StratificationTypeColumnName | Column heading for stratification type |
| StratificationTypeId | Id for stratification type |
| TableResult | An array of values returned from a query to displayed as a table |
| Temporal | A sequence of time such as year or month |
| TemporalId | Integer id for each temporal item |
| TemporalTypeId | Integer id for each temporal type 1 - Year, 2 - MultiYear, 3 - Quarter, 4 - Month, 5 - None |
| TemporalTypeName | Name for each temporal type |
| Version | Version of this api program.  Only "v1" is valid. |
| Years | Time assigned to a measure |

# Core Holder Schema

## Core Holder

The core holder is a complete query result that returns the values required to display a map, table and chart.

This is an overview schema for the core holder.

```
{
  "type": "object",
  "properties": {
```

```
"legendResult":{
        "type": "array",
        "items": {}
    },
  "tableResult":{
        "type": "array",
        "items": {
          "type": "object",
          "properties": {
            "id": {
              "type": "string"
            },
            "dataValue": {
              "type": "string"
            },
            "displayValue": {
              "type": "string"
            },
            "year": {
              "type": "string"
            },
            "groupById": {
              "type": "string"
            },
            "geographicTypeId": {
              "type": "integer"
            },
            "calculationType": {
              "type": "string"
            },
            "noDataId": {
              "type": "integer"
            },
            "noDataBreakGroup": {
              "type": "integer"
            },
            "stabilityFlag": {
              "type": "string"
            },
            "suppressionFlag": {
              "type": "string"
            },
```

```json
          "title": {
            "type": "string"
          },
          "rollover": {
            "type": "array",
            "items": {
              "type": "string"
            }
          },
          "geo": {
            "type": "string"
          },
          "geoId": {
            "type": "string"
          },
          "parentGeoId": {
            "type": "null"
          },
          "parentGeo": {
            "type": "null"
          },
          "parentGeoAbbreviation": {
            "type": "null"
          },
          "geoAbbreviation": {
            "type": "string"
          }
        }
      }
    }
  },
  "tableResultWithCI": {
    "type": "array",
    "items": {}
  },
  "devDisabilitiesTableResult": {
    "type": "array",
    "items": {}
  },
  "modeledTableResult": {
    "type": "array",
    "items": {}
  },
```

```json
      "healthImpactTableResult": {
        "type": "array",
        "items": {}
      },
      "airToxicTableResult": {
        "type": "array",
        "items": {}
      },
      "climateChangeTableResult": {
        "type": "array",
        "items": {}
      },
      "tableResultWithMonth": {
        "type": "array",
        "items": {}
      },
      "tableResultWithQuarter": {
        "type": "array",
        "items": {}
      },
      "dailyEstimatesTableResult": {
        "type": "array",
        "items": {}
      },
      "heatEpisodesTableResult": {
        "type": "array",
        "items": {}
      },
      "cutPointTableResult": {
        "type": "array",
        "items": {}
      },
      "pwsTableResult": {
        "type": "array",
        "items": {}
      },
      "biomonitoringTableResult": {
        "type": "array",
        "items": {}
      }
    },
    "benchmarkInformation": {
        "type": "object",
```

```
"properties": {
  "id": {
    "type": "integer"
  },
  "measureId": {
    "type": "integer"
  },
  "benchmarkId": {
    "type": "integer"
  },
  "measureGeographicTypeId": {
    "type": "integer"
  },
  "units": {
    "type": "null"
  },
  "geographicDisplay": {
    "type": "string"
  },
  "benchmarkName": {
    "type": "string"
  },
  "benchmarkShortName": {
    "type": "string"
  },
  "multipleSelectionActionId": {
    "type": "integer"
  },
  "multipleSelectionAction": {
    "type": "string"
  },
  "active": {
    "type": "null"
  },
  "hasMap": {
    "type": "boolean"
  },
  "hasTable": {
    "type": "boolean"
  },
  "hasChart": {
    "type": "boolean"
```

```
        },
        "geographicTypeDisplay": {
          "type": "string"
        },
        "benchmarkFullName": {
          "type": "string"
        }
      }
    }
  },
  "benchmarkResult": {
      "type": "array",
      "items": {
        "type": "object",
        "properties": {
          "id": {
            "type": "string"
          },
          "dataValue": {
            "type": "string"
          },
          "displayValue": {
            "type": "string"
          },
          "year": {
            "type": "string"
          },
          "groupById": {
            "type": "string"
          },
          "geographicTypeId": {
            "type": "integer"
          },
          "calculationType": {
            "type": "null"
          },
          "geo": {
            "type": "null"
          },
          "geoId": {
            "type": "null"
          },
          "parentGeoId": {
```

```
            "type": "null"
          },
          "parentGeo": {
            "type": "null"
          },
          "parentGeoAbbreviation": {
            "type": "null"
          },
          "geoAbbreviation": {
            "type": "null"
          }
        }
      }
    },
    "measureStratificationLevel": {
      "type": "object",
      "properties": {
        "id": {
          "type": "integer"
        },
        "measureId": {
          "type": "integer"
        },
        "stratificationLevelId": {
          "type": "integer"
        },
        "smoothingTypeId": {
          "type": "integer"
        },
        "suppressionTypeId": {
          "type": "integer"
        }
      }
    },
    "lookupList": {
      "type": "object",
      "properties": {}
    },
    "measureInformationDTO": {
      "type": "object",
      "properties": {
        "measureInformation": {
```

```json
      "type": "object",
      "properties": {
        "calculationId": {
          "type": "integer"
        },
        "calculation": {
          "type": "null"
        },
        "calculationType": {
          "type": "null"
        },
        "calculationColumnName": {
          "type": "null"
        },
        "parentTemporalType": {
          "type": "null"
        },
        "temporalType": {
          "type": "null"
        },
        "temporalColumnName": {
          "type": "null"
        },
        "temporalCount": {
          "type": "integer"
        },
        "hasStability": {
          "type": "null"
        },
        "smoothingType": {
          "type": "null"
        },
        "precision": {
          "type": "integer"
        },
        "hasConfidenceInterval": {
          "type": "null"
        },
        "confidenceIntervalName": {
          "type": "null"
        },
        "hasMultiMeasure": {
```

```
        "type": "null"
      },
      "colorCount": {
        "type": "integer"
      }
    }
  }
},
"tableDisplayDTO": {
  "type": "array",
  "items": {}
},
"chartDisplayDTO": {
  "type": "array",
  "items": {}
},
"mapDisplayDTO": {
  "type": "array",
  "items": {}
},
"chartAxisExceptionDTO": {
  "type": "array",
  "items": {}
},
"measureCalculationExceptionDTO": {
  "type": "array",
  "items": {}
},
"measureDisplayException": {
  "type": "array",
  "items": {}
}
    }
  }
},
"tableResultClass": {
  "type": "string"
},
"tableReturnType": {
  "type": "string"
},
"publicAPIUrl": {
  "type": "string"
},
```

```
    "publicAPIServerUrl": {

      "type": "string"

    },

    "fullPublicAPIUrl": {

      "type": "string"

    }

  }

}
```

**Back to top**


# Glossary - Core Holder


Core Holder is a complete query result needed to display a map, table and chart.  This glossary only contains the essential items that will be of value to our API user.

| Core Holder | Complete query result needed to display a map, table and chart. | |
|---|---|---|
| | lengendResult | **Array of values used to populate a map's legend with break groups that show the stratification for a query** |
| | breakGroup | Unique integer Id of break group |
| | minBreak | Minimum value of break group |
| | maxBreak | Maximum value of break group |
| | **tableResult** | **Array of values used to populate a table for a query** |
| | id | Unique integer Id of table result |
| | dataValue | Value |
| | displayValue | Formatted Value |
| | year | Year |
| | groupById | Id of group by |
| | geographicTypeId | Integer Id of geographic type 1 - State,2 - County, 6 - National, 7 - Census Tract |
| | calculation type | Calculation Type |
| | noDataId | Id from no data table |
| | noDataBreakGroup | Id of no data breaks |
| | stabilityFlag | Stable  value 0 - False, 1- True |
| | suppressionFlag | Suppressed 0 - False, 1- True |
| | title | Tile of column |
| | rollover | Display of Roll over |
| | geo | geography code |
| | geo ID | Id of geography Code |

| | benchmarkInformation | Values to define the benchmark used in this query |
|---|---|---|
| | id | benchmark information id |
| | measureId | measure Id |
| | benchmarkId | benchmark Id |
| | measureGeographicTypeId | Geographic Type Id for this measure |
| | units | display units |
| | geographicDisplay | Display Value for this geography |
| | benchmarkName | Display Name for this benchmark |
| | benchmarkResult | Array of values used to populate the benchmarks for a query |
| | id | Unique integer Id of benchmark result |
| | dataValue | Value |
| | displayValue | Formatted Value |
| | year | Year |
| | groupById | Id of group by |
| | geographicTypeId | Integer Id of geographic type 1 - State,2 - County, 6 - National, 7 - Census Tract |
| | calculation type | Calculation Type |