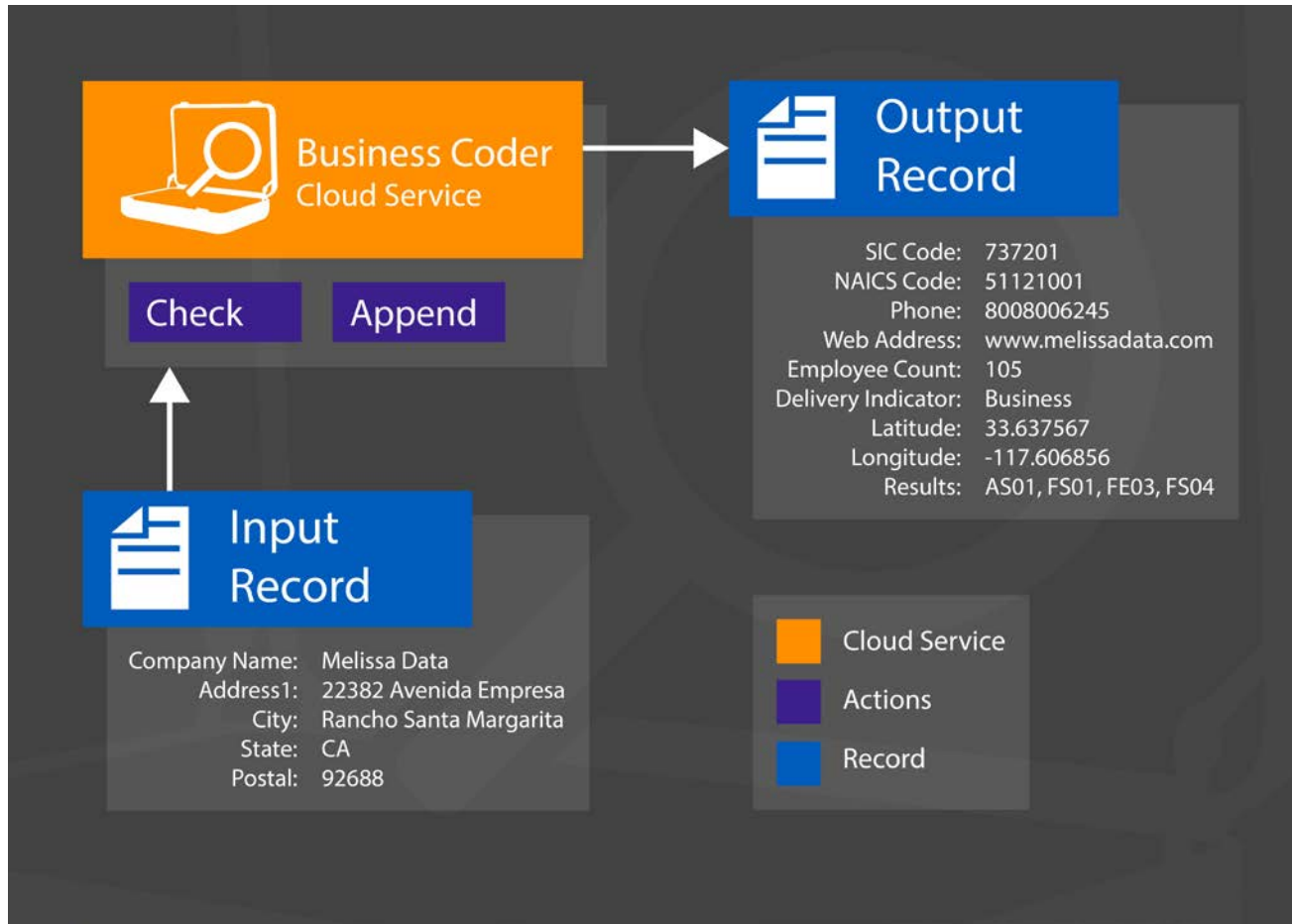


## Business Coder Cloud Service: Programmer's Quick Start

### Overview

The Business Coder Web Service searches for Business Demographics data based on the address and company name.



### You can use Business Coder to:

- Search for businesses using the phone number, stock ticker, and web address.
- Discover business SIC codes, sales volumes, employee sizes, phone numbers, etc.

### FIELDS INPUT AND OUTPUT FROM THE SERVICE

INPUTS	Description
Transmission Reference	A unique string value identifying the request
License	License String from Melissa Data
Column	Columns to be output
Options	Options to include
Company Name	Business name
Phone Number	Business phone number
Address1	First address line

Address2	Second address line (suite)
City	City name
State	State name
Postal	Postal code
Country	Country name
Melissa Address Key (MAK)	Proprietary unique key identifier
Stock Ticker	Unique stock exchange symbol/abbreviation
Web Address	Web address/domain

<b>OUTPUTs</b>	<b>Description</b>
Transmission Results	Results of the transmission (success/fail)
Transmission Reference	A unique string value identifying the request
Version	The version number of the service
Total Records	Total number of records returned
Records	Returned array of records
Results	Result codes indicating the business information
Record ID	Unique ID if processing multiple records
Company Name	Business name
AddressLine1	Address line 1 of the business
Suite	Business suite
City	City of the business
State	State of the business
Postal Code	ZIP/Postal Code of the business
Location Type	Code denoting business location type
Phone	10-digit business phone number
Employees Estimate	Number of employess working at this business location
Sales Estimate	Sales volume and/or assets in thousands
Stock Ticker	Assigned stock exchange symbol
Web Address	Web address/domain of the business
Plus4	Plus4 of the business address
Delivery Indicator	RBDI indicator based on the address
Melissa Address Key	Unique key assigned to an address record
Melissa Address Key Base	Unique key assigned to the base address of a complex with apartments or suites
SIC Code 1	6-digit SIC code for the primary line of business
SIC Code 2	Second SIC code
SIC Code 3	Third SIC code
NAICS Code 1	North American Industry Classification System code, related to SIC Code 1
NAICS Code 2	Second NAICS code, related to SIC Code 2
NAICS Code 3	Third NAICS code, related to SIC Code 3
SIC Description 1	First SIC Code description
SIC Description 2	Second SIC Code description
SIC Description 3	Third SIC Code description
NAICS Description1	First NAICS Code description

NAICS Description 2	Second NAICS Code description
NAICS Description 3	Third NAICS Code description
Latitude	Geographic coordinate
Longitude	Geographic coordinate
County Name	County name
County FIPS	FIPS code of the county
Census Tract	Census tract number for the address
Census Block	Census block number for the address
Place Code	Census Bureau place code
Place Name	Census Bureau place name

## License String

You should have been provided an encrypted and unique license string or Customer ID from Melissa Data. This is necessary for including with each request to the Business Coder Cloud Service. This value should be put into the CustomerID element in each Web service request.

If you do not have a license string, please contact your Melissa Data sales representative at 1-800-MELISSA (1-800-635-4772).

## Sample REST Request

### Using Address as Input

<https://businesscoder.melissadata.net/WEB/BusinessCoder/doBusinessCoderUS?lic={License}&cols={Columns}&opt={Options}&rec={Record ID}&comp={Company}&a1={Address1}&a2={Address2}&city={City}&state={State}&postal={Postal Code}&ctry={Country}>

### Using Melissa Address Key (MAK) and Company as Input

<https://businesscoder.melissadata.net/WEB/BusinessCoder/doBusinessCoderUS?lic={License}&cols={Columns}&opt={Options}&rec={Record ID}&comp={Company}&mkey={Melissa Address Key}>

### Using StockTicker as Input

<https://businesscoder.melissadata.net/WEB/BusinessCoder/doBusinessCoderUS?lic={License}&cols={Columns}&opt={Options}&rec={Record ID}&stock={Stock Ticker}>

### Using Web Address as Input

<https://businesscoder.melissadata.net/WEB/BusinessCoder/doBusinessCoderUS?lic={License}&cols={Columns}&opt={Options}&rec={Record ID}&web={Web Address}>

### Using Phone as Input

<https://businesscoder.melissadata.net/WEB/BusinessCoder/doBusinessCoderUS?lic={License}&cols={Columns}&opt={Options}&rec={Record ID}&phone={Phone}>

## Sample JSON Request

## Single Record Request

```
{
  "t": "{Transmission Reference}",
  "lic": "{License}",
  "cols": "{Columns}",
  "opt": "{Options}",
  "Records": [
    {
      "rec": "{Record ID}",
      "comp": "{Company}",
      "a1": "{Address1}",
      "a2": "{Address2}",
      "city": "{City}",
      "state": "{State}",
      "postal": "{Postal Code}",
      "ctry": "{Country}",
      "phone": "{Phone}",
      "mkey": "{Melissa Address Key}",
      "stock": "{Stock Ticker}",
      "web": "{Web Address}"
    }
  ]
}
```

## Multiple Record Request

```
{
  "t": "{Transmission Reference}",
  "lic": "{License}",
  "cols": "{Columns}",
  "opt": "{Options}",
  "Records": [
    {
      "rec": "{Record ID}",
      "comp": "{Company}",
      "a1": "{Address1}",
      "a2": "{Address2}",
      "city": "{City}",
      "state": "{State}",
      "postal": "{Postal Code}",
      "ctry": "{Country}",
      "phone": "{Phone}",
      "mkey": "{Melissa Address Key}",
      "stock": "{Stock Ticker}",
      "web": "{Web Address}"
    },
    {
      "rec": "{Record ID}",
      "comp": "{Company}",
      "a1": "{Address1}",
      "a2": "{Address2}",
      "city": "{City}",
      "state": "{State}",
      "postal": "{Postal Code}",
      "ctry": "{Country}",
      "phone": "{Phone}",
      "mkey": "{Melissa Address Key}",
    }
  ]
}
```

```
    "stock": "{Stock Ticker}",
    "web": "{Web Address}"
  }
]
}
```

---

## Single vs. Batch

Melissa Data cloud services are capable of both single record real-time processing and batch processing. The difference is simply in the number of records sent in each request. Melissa Data cloud services take an array of records. This array can contain anything from one to one hundred records. For a real-time process like a web form entry or a call center application, send in a request with one record. For a batch processing scenario like a database, send requests of up to 100 records until all the records are processed. Note: Make sure each record in the request has a unique Record ID.

## Sample JSON Response

```
{
  "TransmissionResults": "string",
  "TransmissionReference": "string",
  "Version": "string",
  "TotalRecords": "string",
  "Records": [
    {
      "Results": "string",
      "RecordID": "string",
      "CompanyName": "string",
      "AddressLine1": "string",
      "Suite": "string",
      "City": "string",
      "State": "string",
      "PostalCode": "string",
      "Plus4": "string",
      "DeliveryIndicator": "string",
      "MelissaAddressKey": "string",
      "MelissaAddressKeyBase": "string",
      "LocationType": "string",
      "Phone": "string",
      "EmployeesEstimate": "string",
      "EmployeesDerivation": "string",
      "SalesEstimate": "string",
      "StockTicker": "string",
      "WebAddress": "string",
      "SICCode1": "string",
      "SICCode2": "string",
      "SICCode3": "string",
      "SICDescription1": "string",
      "SICDescription2": "string",
      "SICDescription3": "string",
      "NAICSCode1": "string",
```

```
"NAICSCode2": "string",
"NAICSCode3": "string",
"NAICSDescription1": "string",
"NAICSDescription2": "string",
"NAICSDescription3": "string",
"Latitude": "string",
"Longitude": "string",
"CountyName": "string",
"CountyFIPS": "string",
"CensusTract": "string",
"CensusBlock": "string",
"PlaceCode": "string",
"PlaceName": "string"
}
]
}
```

---

## Business Coder Cloud Service URLs [Business Coder Cloud Service Endpoint URLs](#)

### Choosing a Cloud Service Protocol

The Melissa Data Business Coder Cloud Service supports REST and JSON. For the undecided, here are some Pros and Cons of one Cloud Service protocol over the other.

#### **REST**

**Pros:** REST is lightweight and relies upon HTTP to do its work. If you don't need a strict API definition, this is the way to go. REST is also format-agnostic so you can use XML or JSON as responses.

**Cons:** REST can only be used for sending of single records and doesn't support strict contracts or more involved security. The Response is a JSON document.

#### **JSON**

**Pros:** JSON relies on simple object serialization based on JavaScript's object initialization. It is very simple to use with JavaScript and easily parsed and understood by developers.

**Cons:** No support for formal definitions. No namespace support. Not much support in Web Service clients with some platforms.

### Basic Order of Operations (Pseudo Code)

1. Choose JSON or REST service.
  2. Create an instance of the request object.
  3. Populate the request element CustomerID with your product license.
  4. Add input business info to the "Records" array with anywhere from 1 to 100 records.
  5. Call the method and pass in the request to the service using the WEB endpoint for JSON requests.
  6. Examine and parse the response from the reply object back from the service.
  7. Interpret the results.
-

## Interpreting Results

Melissa Data's Business Coder Cloud service uses Result codes to determine the status of the business. The Business Coder Cloud Service uses the following Results conventions:

1. CLOUD SERVICE ERRORS: SExx
2. CLOUD TRANSMISSION ERRORS: GExx
3. ADDRESS STATUS CODES: ASxx
4. ADDRESS ERROR CODES: AExx
5. PHONE STATUS CODES: PSxx
6. PHONE ERROR CODES: PExx
7. GEOCODE STATUS CODES: GSxx
8. GEOCODE ERROR CODES: GExx
9. BUSINESS STATUS CODES: FSxx
10. BUSINESS ERROR CODES: FExx

For Example: An FS01 Result Code means that a match was found in the data. An FS05 code indicates that match was for the input phone number.

Please check the documentation for any additional information on Results.

## Results Codes

The service returns a series of result codes to tell you of the status of the business coder matches and any errors found.

For a full list of the Results Codes returned by the Business Coder Cloud Service, see [Business Coder Result Codes](#).

## Sample Code

Fully working examples are available on the wiki pages:

[Click here to go to the Business Coder Cloud Service Wiki Page](#)

## Wiki Page

A product support Wiki is available for your convenience. In the Wiki, you will find documentation about the service in more detail.

[Click here to go to the Business Coder Cloud Service Wiki Page](#)

## Misc. Considerations

### Firewall

If you are behind a firewall, you may need to allow specific IP addresses access in order to communicate with the service. For a full list of IP Addresses, see [IP Address Information](#).