

J.D. POWER
CHROMEDATA

ChromeData VIN Descriptions
Integration Guide

October 2024



CONTENTS

DOCUMENT OVERVIEW.....	3
Related Documentation.....	3
CONTACTING CLIENT SUPPORT.....	4
PRODUCT OVERVIEW.....	4
Product Licensing.....	4
USING THE DEVELOPER PORTAL TO MAKE REQUESTS.....	5
Executing a GET Request.....	5
Executing a PUT Request.....	7
GETVINDESCRIPTION REQUEST OBJECT.....	11
PUTVINDESCRIPTION REQUEST OBJECT.....	12
RESPONSE OBJECT.....	16
RESPONSE STATUS CODES.....	28
VIN Validation Handling.....	28
INTEGRATING WITH THE SERVICE.....	29
APPENDIX.....	29

DOCUMENT OVERVIEW

Recognizing that you may be new to the Developer Portal, this guide provides step-by-step instructions on how to make requests using the Test Client within the Portal.

The Request Object section provides examples that you can use to make requests in the Developer Portal so that you can jump start your understanding of the CVD product.

The Response Object section provides a brief description of the CVD response object and informs you about where you can go to get more information about the response.

The final section directs you to where you can get more integration information once you are ready to start developing your own application.

Related Documentation

Document	Description
API Reference	The CVD API reference is available in a Swagger UI format within the Portal. It describes the service, each endpoint, each input attribute and each output attribute.
Portal Guide	The Portal Orientation guide provides step-by-step instructions on how to navigate and use the Portal. For example, it explains how you can make requests using the Portal's Test Client. Once you understand how to find and use the Test Client, you can use the example requests in this guide within the Test Client to send requests.
Security Guide	The Shared Secret Security Protocol document describes how to build and integrate a security token protocol into the Authorization header of the request to the service. You would need this information after you have finished testing a service in the Portal and are ready to begin your development work.

CONTACTING CLIENT SUPPORT

Client Support is available by phone toll-free at (800) 937-3661, Monday through Friday, from 6:00 a.m. to 5:00 p.m. Pacific Time, or you can reach Client Support by email at support@chromedata.com. Our dedicated support team can help you with any product-related support or questions.

PRODUCT OVERVIEW

The CVD product is built as a RESTful service that takes a VIN as a request input and returns vehicle description information.

This API has 2 endpoints:

GET /vindescription - Returns vehicle content for the requested vehicle.

PUT /vindescription – Returns vehicle content for the requested vehicle and provides additional request attributes to narrow the return to specific styles.

Product Licensing

The following table describes the three CVD licenses.

License Type	Description
Standard package	Comprises ChromeData VIN Descriptions with limited information derived from core catalog vehicle data for a basic description.
Premium package	Comprises ChromeData VIN Descriptions with verified records from core catalog vehicle data or with verified records from our proprietary Engineered VIN data (when available).
Premium Plus package	Comprises ChromeData VIN Descriptions with records verified with OEM Build Data.

Note: Please refer to your Welcome Letter (from FulfillmentWelcomeTeam@autodata.net) that will describe your licensing, and contains information about your profiles such as profile names, profile keys, default profile, and billing type for each of your profiles. Your profile key is a unique identifier that distinguishes each of your profiles when making CVD calls. It is very important to review and understand your setup to avoid incurring higher transaction rates for Build Data when that is not desired. For more information regarding Profiles please see 'Using The Developer Portal To Make Request' section of this document.

USING THE DEVELOPER PORTAL TO MAKE REQUESTS

You access and use the two CVD operations using Autodata’s Developer Portal. There are two ways to make requests using the Portal. You can access the swagger documentation and make a request from there or preferably you can use the Test Client. This section describes how to use the Test Client.

Executing a GET Request

The following provides step-by-step instructions on how to make a GET request.

To execute a GET request:

1. Log in to the J.D. Power API Portal at. The APIs page opens.

Customer API Portal

Welcome to API Portal!

You'll notice our API Portal has a redesigned interface. An updated Portal Orientation guide is included within the Technical Docs section providing step-by-step instructions on how to navigate and use the new portal as some of the steps have changed. All product documentation can still be found here, updated where necessary.

A password reset email was sent to all active customers as a password reset is required upon your first login to this new portal.

You won't need to make any changes to your existing integrations and security protocols. Everything will continue to function seamlessly.

You will need an active account to access this API Portal. If you have an account, please log in with your username and password. If you need an account to be set up for you or help activating your current account, please email support@chromedata.com or call 1-800-937-3661, Monday through Friday, 8:00 am to 8:00 pm EST.


Username:

Password:

Remember Me


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1.800.937.3661

Monday - Friday (Excluding
Holidays)
8:00 AM - 8:00 PM EST




SUPPORT@CHROMEDATA.COM

Our team will reply to your inquiry within one business day.

2. Find the ChromeData VIN Descriptions API and click the eye icon associated with it (under the Details column).

APIs

chromeData vin descriptions		
Name	Description	Details
ChromeData VIN Descriptions		

3. In the left navigation menu, click Test Client.

4. On the Test Client page, select the API Version, company name, and API Key.

API : ChromeData VIN Descriptions

5. Click the getVinDescription dropdown to expand the options.

Servers
https://f-api-tyk-stg.api.chromedata.com/CVD/v1.0

getVinDescription

GET /vin/{vin}/ Returns vehicle content for the requested vehicle.

Name	Description
language_Locale string (query)	Specifies the response language locale. Valid values are en_US (United States, English), es_US (United States, Spanish), en_CA (Canada, English), fr_CA (Canada, French).
profileKey string (query)	An optional attribute that identifies a specific application profile definition. For example, you may have two profiles, one that includes technical specifications and one that includes packages. If not specified, the default profile is used.
vinWithAllContent string (query)	An optional attribute that when set to true, will return all installed and not installed content.
vin * required string (path)	Identifies a vehicle. This is a required parameter.

6. Click Try it out. The text fields are now editable.
7. Enter the relevant information into the text fields. Note: Refer to the various Operation sections later in this guide for details on the parameters for each operation.
8. Click Execute.
9. The request is sent, and response details are returned below on the page.

Executing a PUT Request

1. Log in to the J.D. Power API Portal. The APIs page opens.

Customer API Portal

Welcome to API Portal!

You'll notice our API Portal has a redesigned interface. An updated Portal Orientation guide is included within the Technical Docs section providing step-by-step instructions on how to navigate and use the new portal as some of the steps have changed. All product documentation can still be found here, updated where necessary.

A password reset email was sent to all active customers as a password reset is required upon your first login to this new portal.

You won't need to make any changes to your existing integrations and security protocols. Everything will continue to function seamlessly.

You will need an active account to access this API Portal. If you have an account, please log in with your username and password. If you need an account to be set up for you or help activating your current account, please email support@chromedata.com or call 1-800-937-3661, Monday through Friday, 8:00 am to 8:00 pm EST.


Username:

Password:

Remember Me


Login

[✉ Forgot Password](#)



1.800.937.3661

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Holidays)
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SUPPORT@CHROMEDATA.COM

Our team will reply to your inquiry within one business day.

- Find the ChromeData VIN Descriptions API and click the eye icon associated with it (under the Details column).

APIs

chromeData vin descriptions		
Name	Description	Details
ChromeData VIN Descriptions		

- In the left navigation menu, click Test Client.
- On the Test Client page, select the API Version and API Key.

API : ChromeData VIN Descriptions

5. Click the putVinDescription dropdown to expand the options.

putVinDescription

PUT /vin
Returns vehicle content for the requested VIN. It also provides a way to filter results so that more specific vehicle descriptions are returned.
⬆️ 🔒

Try it out

Name	Description
profileKey string <i>(query)</i>	An optional attribute that identifies a specific application profile definition. For example, you may have two profiles, one that includes technical specifications and one that includes packages. If not specified, the default profile is used.
<input style="width: 80%; border: 1px solid #ccc;" type="text" value="profileKey"/>	
vinWithAllContent string <i>(query)</i>	An optional attribute that when set to true, will return all installed and not installed content.
<input style="width: 80%; border: 1px solid #ccc;" type="text" value="vinWithAllContent"/>	

Request body required

application/json ▼

Example Value | Schema

```

{
  "vin": "1FD8W3H69LEC38010",
  "language_locale": "en_US",
  "pass-thruId": "1A11A",
  "locationId": "12345",
  "manufacturerCode": "F1C",
  "trim": "XL",
  "onlyDecodeUsing": "C",
  "boxLength": "6.5",
  "driveType": "4X4",
  "wheelbase": "158",
  "engine": "5.0",
  "transmission": "6 speed",
  "additionalVehiclesDetails": [
    "string"
  ],
  "optionCodes": [
    "string"
  ],
  "exteriorColorDescription": "White",
  "interiorColorDescription": "Jet Black"
}
                    
```

6. Click Try it out. The text fields are now editable.
7. Enter the relevant information into the text fields. Note: Refer to the various Operation sections later in this guide for details on the parameters for each operation. Note: For this operation, the specified optional parameters act as a filter on the response data.

8. Click Execute.
9. The request is sent, and response details are returned below on the page.

GETVINDESCRIPTION REQUEST OBJECT

Returns vehicle content for the requested VIN.

Section	Required	Datatype	Description
language_Locale	No	String (Path)	Specifies the response language locale. Valid values are en_US (United States, English), es_US (United States, Spanish), en_CA (Canada, English), fr_CA (Canada, French)
vin	Yes	String (Path)	Identifies a vehicle. This is a required parameter.
profileKey	No	String (Query)	An optional attribute that identifies a specific application profile definition. When a user has more than one profile, one is designated the default and used for requests when a profile key is not sent in the request. For example, you may have two profiles, one that includes catalog data and one that includes Build Data.
vinWithAllContent	No	Boolean	If true, the response will include all features, tech specs, interiorColors, exteriorColors, OptionCodeContent and Packages. Please note that vinWithAllContent is a URL parameter and is not to be included in the request body of the GET/PUT requests.
IncludeRegionalVehicles	No	Boolean	If true (IncludeRegionalVehicles=true), when making a call, the service will return regional vehicle data if available.
useBuildDataOverride	No	Boolean	If false (useBuildDataOverride=false) when making a Build data call, the service will not override OEM catalog data with OEM build data. This parameter is set to true by default. Please note that for any data point not available in OEM Build data, catalog data will be returned instead. For more details regarding the override data points, please refer to the Appendix.
passThruAdditionalBuildData	No	Boolean	If true (passThruAdditionalBuildData=true) when making a Build data call, the service will return additional data points coming directly from OEMs. Please note that for any data point not available in OEM Build data, catalog data will be returned

Section	Required	Datatype	Description
			instead. For more details regarding the pass-thru data points, please refer to the Appendix.

Note: If the requested VIN is for a locale that differs from the default language_Locale value (for example, a Canadian VIN is requested for the United States locale), the features, tech specs, packages, options and pricing data returned will match the VIN and, in this example, will return with Canadian values. Also, an error is returned with a message as shown below.

```
"error": true,
"message": "No Match Found in request Locale. Returning result for alternate Locale",
```

PUTVINDESCRIPTION REQUEST OBJECT

Returns vehicle content for the requested VIN. It also provides a way to filter results so that more specific vehicle descriptions are returned.

Section	Required	Datatype	Description
profileKey	No	String (Query)	An optional attribute that identifies a specific application profile definition. When a user has more than one profile, one is designated the default and used for requests when a profile key is not sent in the request. For example, you may have two profiles, one that includes catalog data and one that includes Build Data.
body	Yes	Schema Object	
vin	Yes	String	Identifies a vehicle. This is a required parameter. Example: 1FD8W3H69LEC38010
language_Locale	No	String	Specifies the response language locale. Valid values are en_US (United States, English), es_US (United States, Spanish), en_CA (Canada, English), fr_CA (Canada, French). Note: If the requested VIN is for a locale that differs from the language_Locale value (for example, a Canadian VIN is requested for the United States locale), the features, tech specs, packages, options and pricing data returned will match the VIN and, in this example, will return with Canadian

Section	Required	Datatype	Description
			<p>values. Also, an error is returned with a message as shown below.</p> <pre>"error": true, "message": "No Match Found in request Locale. Returning result for alternate Locale",</pre>
pass-thruId	No	String	<p>A unique dealer identifier, such as Stock Number, for callers use only. This is returned in response and does not impact vin description.</p> <p>Example: 1A11A</p>
locationId	No	String	<p>Location identifier, such as Store Number, for callers use only. This is returned in response and does not impact vin description. This identifier will be reflected in monthly billing reports if provided.</p> <p>example: '12345'</p>
manufacturerCode	No	String	<p>Identifies the manufacturers body code, sometimes referred to as car code or mmc (manufacturers model code).</p> <p>example: F1C</p>
trim	No	String	<p>Identifies the vehicle trim description.</p> <p>example: XL</p>
onlyDecodeUsing	No	Array	<p>Identifies the data source used to decode the VIN. Valid values are B (Build Data), V (Verified), E (Engineered), C (Catalog) and S (Sparse).</p> <p>Ability to specify multiple "only decode using" sources. The list of onlyDecodeUsing will be used to indicate only decode if one of the sources is found. The priority order is B,V,E,C,S based on if the user is licensed for the source.</p>
boxLength	No	String	<p>Identifies the box length in feet and is represented in this format: 6' or 5.5'.</p> <p>example: '6.5'</p>

Section	Required	Datatype	Description
driveType	No	String	Identifies the vehicle's drive type. Example: 4WD or AWD. example: 4X4
wheelbase	No	String	Identifies the vehicle wheelbase in inches. Example: 148" or 157". example: '158'
engine	No	String	Identifies the engine description and can contain multiple attributes. Example: 5.7L Hemi or 3.5L V6 VVT-i.
transmission	No	String	Identifies the vehicle transmission. Example: 6 speed Automatic or 5 speed manual.
additionalVehiclesDetails	No	Array	Identifies additional vehicle attributes that are installed on the vehicle. Example: ["Power Sunroof","Leather Seats","Navigation"].
optionCodes	No	Array	Identifies the option codes installed on the vehicle. Example: ["CF","GMS","GSJ"].
exteriorColorDescription	No	String	Identifies the exterior color of the vehicle. Example: "Red" or "Candy Apple Red".
interiorColorDescription	No	String	Identifies the interior color of the vehicle. Example: Black and Tan or Grey.
vinWithAllContent	No	Boolean	If true, the response will include all features, tech specs, interiorColors, exteriorColors, OptionCodeContent and Packages. Please note that vinWithAllContent is a URL parameter and is not to be included in the request body of the GET/PUT requests.
IncludeRegionalVehicles	No	Boolean	If true (IncludeRegionalVehicles=true), the service will return regional* vehicle data if available. *Vehicles that are sold only in specific regions.

Section	Required	Datatype	Description
useBuildDataOverride	No	Boolean	<p>If false (useBuildDataOverride=false) when making a Build data call, the service will not override OEM catalog data with OEM build data. This parameter is set to true by default.</p> <p>Please note that for any data point not available in OEM Build data, catalog data will be returned instead.</p>
passThruAdditionalBuildData	No	Boolean	<p>If true (passThruAdditionalBuildData=true) when making a Build data call, the service will return additional data points coming directly from OEMs.</p> <p>Please note that for any data point not available in OEM Build data, catalog data will be returned instead.</p>

RESPONSE OBJECT

The following table provides the attributes returned in the response.

** The response attributes are represented with dotted notation to represent levelling.

Level	Attribute	Data Type	Description	Standard License Package?
1	.message	String	Contains the error description.	
1	.error	Boolean	Contains a flag that when set to true indicates that an error occurred with the request.	
1	.executionTimeMS	Integer	Contains the execution time, in milliseconds, to process the request.	
1	.copyright	String	Contains the copyright information.	
1	.result	Object	Displays the web service results.	
2	..vinSubmitted	String	Contains the VIN submitted to the service. Example: 1FD8W3H69LEC38010	
2	..vinProcessed	String	Contains the decoded VIN that is used by the service. This may be different than the submitted VIN because the service was able to identify an error in the VIN provided and fix it. For example, a bad check digit. Example: 1FD8W3H69LEC38010	
2	..validVin	Boolean	Contains a flag that when set to true indicates the submitted VIN is valid. Example: true	
2	..source	String	Contains the data source used to decode the VIN. Possible values are B (Build data), V (Verified), E (Engineered), C (Catalog), S (Sparse).	
2	..statusCode	String	Contains a response status code reflecting the service response returned. Example: 200 is success, 206 represents a sparse response.	
2	..validationErrorMessage	String	Contains the message associated to the statusCode.	

Level	Attribute	Data Type	Description	Standard License Package?
2	..language	String	Contains the language of the response. example: en_US	
2	..year	String	Contains the model year. example: '2020'	
2	..make	String	Contains the make. example: Ford	
2	..model	String	Contains the model. example: F-150	
2	..modelID	Integer	Contains the Chrome YMMID. example: 29275	
2	..buildMSRP	Number	Contains the MSRP pricing at the time of the vehicle's build when supplied by the manufacturer in build record. example: 47290	
2	..estimatedMSRP	Number	Contains the estimated MSRP pricing when build MSRP is not available in build data. This will always be calculated for an Engineered Record. Calculated with Base MSRP, destination and MSRP from known installed options. example: 47290	
2	..buildDate	String	Contains the build date when provided by the manufacturer in build record. example: ""2020-06-01"	
2	..wmiCountry	String	Contains the WMI country value. example: United States	
2	..wmiManufacturer	String	Contains the WMI manufacturer.	
2	..buildSource	String	Contains the source of the build record.	

Level	Attribute	Data Type	Description	Standard License Package?
2	..vehicles	Object	Contains information about the vehicle.	
3	...styleId	String	Contains the Chrome StyleId of the vehicle.	YES
3	...styleDescription	String	Contains the description for the Chrome StyleId.	YES
3	...trim	String	Contains the vehicle's trim description.	YES
3	...baseMSRP	Number	Contains the MSRP of the base vehicle price before adding options.	YES
3	...destinationCharge	Number	Contains the destination charge (Freight) for the vehicle.	YES
3	...driveType	String	Contains the vehicle's drive type.	
3	...bodyType	String	Contains the classification of the vehicle's body style. Example: Crew Cab for trucks, Sedan for cars.	YES
3	...standardCurbWeight	Integer	Contains the standard curb weight. This does not include the installed options.	YES
3	...standardPayload	Integer	Contains the standard payload capacity. This does not include the installed options.	YES
3	...standardTowingCapacity	Integer	Contains the standard conventional towing capacity. This does not include the installed options.	YES
3	...country	String	Contains the target country of sale for the vehicle. This country could be different than WMI country.	YES
3	...standardGVWR	Integer	Contains the standard gross vehicle weight rating. This does not include the installed options.	YES
3	...mfrModelCode	String	Contains a unique identifier assigned by the manufacturer to identify a vehicle (MMC).	YES
3	...doors	Integer	Contains the number of doors.	YES
3	...boxStyle	String	Contains the box style of a truck.	YES

Level	Attribute	Data Type	Description	Standard License Package?
3	...segment	Array	Contains the vehicle type classification(s).	YES
3	...wheelbase	String	Contains the vehicle wheelbase.	YES
3	...baseInvoice	Number	Contains the vehicle base invoice.	YES
3	...modelDesignChangeDetails	Object	Contains the vehicle model design change details. (only available in English)	
4	....designChange	Boolean	If true, this indicates that the vehicle had design change.	
4	....designChangeReason	String	Example: New trim, Exterior appearance change, New model name, or New model design	
2	..exteriorColors	Object	Contains exterior color information. Note: When the exact installed color cannot be determined, all available colors will be returned.	YES
3	...genericDesc	String	Contains a generic description. Example: Red.	YES
3	...description	String	Contains the manufacturer's description.	YES
3	...colorCode	String	Contains the manufacturer option code.	YES
3	...installCause	String	Contains an identifier for the data source used to install. Valid values are (B = Build, E = Engineered, V = Vin Pattern, R = Standard but changeable, S = Standard, I = User Input)	YES
3	...styles	Array	Contains the Chrome StyleId(s) of the vehicle.	YES
3	...rgbValue	String	Contains the RGB values.	YES
3	...rgbHexValue	String	Contains the hexadecimal value	YES
3	...type	Integer	Contains an identifier that indicates the categorization of the exterior color. Possible values: 1 for body, 2 for rooftop or 3 for stripe(s).	YES
3	...primary	Boolean	Indicates if primary or not.	YES
2	..interiorColors	Object	Contains interior color information.	YES

Level	Attribute	Data Type	Description	Standard License Package?
			Note: When the exact installed color cannot be determined, all available colors will be returned.	
3	...genericDesc	String	Contains a generic description. Example: Black.	YES
3	...colorCode	String	Contains the manufacturer option code.	YES
3	...description	String	Contains the manufacturer's description.	YES
3	...installCause	String	Contains an identifier for the data source used to install. Valid values are (B = Build, E = Engineered, V = Vin Pattern, R = Standard but changeable, S = Standard, I = User Input)	YES
3	...styles	String	Contains the Chrome StyleId(s) of the vehicle.	YES
2	..features	Object	Contains features information.	Limited
3	...id	String	Contains a unique classification for the vehicle content.	
3	...key	String	Contains the key identifier for the vehicle content.	
3	...sectionId	String	Contains a unique identifier for the feature section.	
3	...subSectionId	Integer	Contains a unique identifier for the feature sub-section.	
3	...sectionName	String	Contains a user-friendly description of the feature section.	
3	...name	String	Contains a user-friendly branded description of the feature.	
3	...nameNoBrand	String	Contains a user-friendly non-branded description of the feature.	
3	...description	String	Contains a category description of the feature.	
3	...rankingValue	Integer	Contains a numerical value that represents the relevance of the feature. Note: Higher numerical value = More importance. These values are assigned by our automotive experts with lower values representing equipment or features/tech specs/packages that are commonly found on most vehicles. Higher	

Level	Attribute	Data Type	Description	Standard License Package?
			values are assigned to equipment and features considered advanced or of a higher price point. Leverage the rankings to display relevancy of key features on vehicle details pages for shopper convenience.	
3	...featureKeyAnswers	Array	Contains internal code identifiers for the feature.	
3	...styles	Array	Contains style information for the feature.	
4	....styleIds	Array	Contains the Chrome StyleId(s) of the vehicle.	
4	....installCause	String	Contains an identifier for the data source used to install. Valid values are (B = Build, E = Engineered, V = Vin Pattern, R = Standard but changeable, S = Standard, I = User Input)	
4	....isStandard	Boolean	If true, this indicates that it is standard.	
3	...isHybridFeature	Boolean	If true, this indicates that it is Hybrid feature.	
3	...isEVFeature	Boolean	If true, this indicates that it is EV feature.	
3	...benefitStatement	Array	Contains benefit statement information.	
4	....title	String	Contains the title for the benefit statement.	
4	....definition	String	Contains the definition for the benefit statement.	
4	....statement	String	Contains the statement.	
3	...adsCategoryIds	String	Contains the ADS Category ID. Can be used by migrated ADS clients.	
3	...adsCategoryIdDescriptions	String	Contains the ADS Category ID Description. Can be used by migrated ADS clients.	
3	...adsTypeIds	String	Contains the ADS Type ID. Can be used by migrated ADS clients.	
3	...adsTypeIdDescriptions	String	Contains the ADS Type ID Description. Can be used by migrated ADS clients.	

Level	Attribute	Data Type	Description	Standard License Package?
2	..techSpecs	Object	Contains technical specification information.	
3	...id	String	Contains a categorization Id for the tech spec. Example: id=17570, description=GVWR.	
3	...key	String	Contains the unique key identifier that defines the name attributes value.	
3	...sectionId	String	Contains a unique identifier for the tech spec section.	
3	...subSectionId	Integer	Contains a unique identifier for the tech spec sub-section.	
3	...sectionName	String	Contains a user-friendly description of the tech spec section.	
3	...name	String	Contains a user-friendly branded description of the tech spec.	
3	...nameNoBrand	String	Contains a user-friendly non-branded description of the tech spec.	
3	...description	String	Contains a category description of the tech spec.	
3	...rankingValue	Integer	<p>Contains a numerical value that represents the relevance of the feature. Note: Higher numerical value = More importance. These values are assigned by our automotive experts with lower values representing equipment or features/tech specs/packages that are commonly found on most vehicles. Higher values are assigned to equipment and features considered advanced or of a higher price point.</p> <p>Leverage the rankings to display relevancy of key features on vehicle details pages for shopper convenience.</p>	
3	...featureKeyAnswers	Array	Contains internal code identifiers for the tech spec.	
3	...styles	Array	Contains style information for the tech spec.	
4	....styleIds	Array	Contains the Chrome StyleId(s) of the vehicle.	

Level	Attribute	Data Type	Description	Standard License Package?
4	...installCause	String	Contains an identifier for the data source used to install. Valid values are (B = Build, E = Engineered, V = Vin Pattern, R = Standard but changeable, S = Standard, I = User Input)	
4	...isStandard	Boolean	If true, this indicates that it is standard.	
3	...unitsOfMeasureAndValues	Object	Contains unit of measure and values.	
4	...unitOfMeasure	String	Contains the unit of measure.	
4	...Value	String	Contains the value or the unit of measure.	
3	...isHybridFeature	Boolean	If true, this indicates that it is Hybrid tech spec.	
3	...isEVFeature	Boolean	If true, this indicates that it is EV tech spec.	
3	...benefitStatement	Object	Contains benefit statement information.	
4	...title	String	Contains the title for the benefit statement.	
4	...definition	String	Contains the definition for the benefit statement.	
4	...statement	String	Contains the statement.	
3	...adsCategoryIds	String	Contains the ADS Category ID. Can be used by migrated ADS clients.	
3	...adsCategoryIdDescriptions	String	Contains the ADS Category ID Description. Can be used by migrated ADS clients.	
3	...adsTypeIds	String	Contains the ADS Type ID. Can be used by migrated ADS clients.	
3	...adsTypeIdDescriptions	String	Contains the ADS Type ID Description. Can be used by migrated ADS clients.	
2	..packages	Object	Contains package information.	
3	...id	String	Contains a categorization Id for the Package. Example: id=102910, description=Prestige.	
3	...key	String	Contains the unique key identifier that defines the name attributes value.	

Level	Attribute	Data Type	Description	Standard License Package?
3	...sectionId	String	Contains a unique identifier for the package section.	
3	...subSectionId	Integer	Contains a unique identifier for the package sub-section.	
3	...sectionName	String	Contains a user-friendly description of the package section.	
3	...name	String	Contains a user-friendly branded description of the package.	
3	...nameNoBrand	String	Contains a user-friendly non-branded description of the package.	
3	...description	String	Contains a category description of the package.	
3	...rankingValue	Integer	<p>Contains a numerical value that represents the relevance of the feature. Note: Higher numerical value = More importance. These values are assigned by our automotive experts with lower values representing equipment or features/tech specs/packages that are commonly found on most vehicles. Higher values are assigned to equipment and features considered advanced or of a higher price point.</p> <p>Leverage the rankings to display relevancy of key features on vehicle details pages for shopper convenience.</p>	
3	...styles	Array	Contains style information for the package	
4	....styleIds	Array	Contains the Chrome StyleId(s) of the vehicle.	
4	....installCause	String	Contains an identifier for the data source used to install. Valid values are B (Build Data), E (Engineered/Verified Data), I (User Input), V (VIN), S (Standard), R (Standard Replaceable).	
4	....isStandard	Boolean	If true, this indicates that it is standard.	
3	...benefitStatement	Object	Contains benefit statement information.	
4	....title	String	Contains the title for the benefit statement.	

Level	Attribute	Data Type	Description	Standard License Package?
4	....definition	String	Contains the definition for the benefit statement.	
4	....statement	String	Contains the statement.	
3	...optionDetails	Object	Contains detailed information about the Package. Example: Option code, content option codes, msrp.	
4	....featureKeys	Array	Contains the list of feature keys	
4	....optionCode	String	Contain the associated option code.	
4	....altOptionCode	String	Contains separate code for the option.	
4	....group	String	Contains the group name for the option code. Valid values are: Additional Options, Suspension, Exterior, Emissions, Engine, Entertainment, Fuel, Interior, Mechanical, Paint, Safety, Seating, Tires & Wheels, Trailing, Transmission, Warranty	
4	....isChromeCode	Boolean	If true, it indicates that the code returned is Chrome code if not, it is an OEM code	
4	....collectionCode	Integer	A code that can be used to group like packages and option codes	
4	....msrp	Integer	Contains the base MSRP from the manufacturer's order guide.	
4	....invoice	Number	Contains the invoice from the manufacturer's order guide.	
4	....content	Array	Contains a list of option codes that are content.	
3	...adsCategoryIds	String	Contains the ADS Category ID. Can be used by migrated ADS clients.	
3	...adsCategoryIdDescriptions	String	Contains the ADS Category ID Description. Can be used by migrated ADS clients.	
3	...adsTypeIds	String	Contains the ADS Type ID. Can be used by migrated ADS clients.	

Level	Attribute	Data Type	Description	Standard License Package?
3	...adsTypeIdDescriptions	String	Contains the ADS Type ID Description. Can be used by migrated ADS clients.	
2	..safetyInfo	Object	Contains safety information (only available in English)	
3	...source	String	Contains the safety info source Example: NHTSA Crash Data	
3	...value	String	Contains the safety info value Example: 5 Star	
3	...description	String	Contains the safety info description	
3	...note	String	Contains the safety info note	
3	...condition	String	Contains safety info condition Example: Female	
3	...styles	Array	Contains style information for the safety info	
2	..recallInfo	Object	Contains recall information (only available in English)	
3	...recallId	String	Contains a unique identifier for the recall info	
3	...campaignNo	String	Contains recall campaign number	
3	...mfgCampaignNo	String	Contains recall manufacturing recall info	
3	...component	String	Contains recall component Example: Electrical System: Instrument Cluster/panel	
3	...recallType	String	Contains recall type V= Vehicle T=Tire E=Equipment	
3	...reportedDate	String	Contains recall reported date	
3	...styles	Array	Contains style information for the recall info	
3	...summaryDescription	String	Contains recall summary description	
3	...consequenceDescription	String	Contains recall consequence description	
3	...correctiveDescription	String	Contains recall corrective description	
2	..optionCodes	Array	Contains a list of options codes known to be installed on vehicle.	
2	..optionCodeContent	Array	Contains a list of OptionDetails	

Level	Attribute	Data Type	Description	Standard License Package?
3	...featureKeys	Array	Contains the list of feature keys	
3	...optionCode	String	Contain the associated option code	
3	...altOptionCode	String	Contains separate code for the option	
3	...group	String	Contains the group name for the option code. Valid values are: Additional Options, Suspension, Exterior, Emissions, Engine, Entertainment, Fuel, Interior, Mechanical, Paint, Safety, Seating, Tires & Wheels, Trailing, Transmission, Warranty	
3	...isChromeCode	Boolean	If true, it indicates that the code returned is Chrome code if not, it is an OEM code	
3	...collectionCode	Integer	A code that can be used to group like packages and option codes	
3	...isStandard	Boolean	If true, it indicates that the option is Standard	
3	...msrp	Integer	Contains the MSRP	
3	...invoice	Number	Contains the invoice	
3	...optionDescription	String	Contains the description of the option code.	
3	...installCause	String	Contains an identifier for the data source used to install (B = Build, E = Engineered, V = Vin Pattern, R = Standard but changeable, S =Standard, I = User Input).	
2	..additionalBuildData		Contains additional Build Data	
3	...label	String	Contains the label name	
3	...description	String	Contains the additional Build Data description	
3	...value	String	Contains the additional Build Data value	
3	...msrp	Integer	Contains the MSRP	
3	...invoice	Integer	Contains the Invoice	

RESPONSE STATUS CODES

The following table describes response status codes returned by the ChromeData VIN Description service.

Code	Description
200	OK [Success]
206	The request was successfully processed, and a partial response is returned.
400	The request is improperly formed. The server cannot process the request due to something that is perceived to be a client error (e.g., malformed request syntax, invalid request message framing, or deceptive request routing).
401	The request has not been applied because it lacks valid authentication credentials for the target resource.
404	The requested vehicle (VIN/STYLEID) cannot be found.
406	Missing required field (VIN)
440	Invalid product key or Chrome app ID
500	Internal Server Error - The server encountered an unexpected condition that prevented it from fulfilling the request.
503	Service Unavailable

VIN Validation Handling

If an invalid VIN is passed in a request, an attempt to reconcile the issue is made so that a valid VIN is used in the request. For example, if the VIN is passed with an O, Q, q or o those characters are replaced with a zero (0). If the VIN is passed with an I or i those characters are replaced with a one (1). Also, if the VIN is passed with a special characters like \$, !, they are removed in an attempt to create a valid VIN. In this case, the id response attribute contains the invalid VIN and the vinDecoded response attribute contains the corrected VIN and the response contains a full response for the decoded VIN.

If an invalid VIN is passed in a request that cannot be corrected, the result is a 404 response. An example is shown below.

```
{
  "error": true,
  "message": "Invalid vin submitted: 1FTEABCDI cannot be decoded",
  "executionTimeMS": 0,
  "copyright": "Copyright 2019 Autodata Solutions, Inc.",
  "result": {
    "id": "1FTEABCDI",
    "idType": "VIN",
    "isBuildData": false,
    "vehicles": [],
    "vehicleFeatures": [],
    "status": 404
  }
}
```

INTEGRATING WITH THE SERVICE

Once you are ready to start developing your application, you must properly secure your usage of services by integrating a security token protocol into the Authorization header of the request to the service. The Shared Secret Security Protocol guide describes how to do this.

To access the Shared Secret Security Protocol guide:

1. Once you have registered, as described in the next section, sign into the portal.
2. On the Dashboard, click the **APIs** button.
3. On the APIs page, click the hyperlink name for an API.
4. On the web service page, in the left navigation menu, click **Documentation**.
5. On the Documentation page, click the **Shared Secret Security Protocol.pdf** link to open the guide.

APPENDIX

To clarify all possible returns for the body type, fuel type, drive type, and warranty see below:

1- Segmentation

Please note that CVD returns EPA Segmentation by default. Only one segmentation type can be returned in the response. Please contact support if you wish to change to another segmentation type.

	All possible returns	Example VIN 2022 Lincoln Corsair 5LMCJ1C98NUL29127
EPA Segmentation (Default):	Two Seaters Minicompact Cars Standard Pickup Trucks 2WD	"Small SUV 2WD"

<p>Environmental Protection Agency car classification method.</p>	<p>Small Pickup Trucks 4WD Standard Pickup Trucks 4WD Cargo Van Passenger Van Special Purpose Vehicle 2WD Minivans 2WD Minivans 4WD Small SUV 2WD Small SUV 4WD Small Pickup Trucks 2WD Special Purpose Vehicle 4WD Unclassified* Standard SUV 2WD Standard SUV 4WD Sport Utility Vehicle 2WD Sport Utility Vehicle 4WD Compact Cars Midsize Cars Large Cars Small Station Wagons Midsize Station Wagons Small Pickup Trucks 2WD</p>	
<p>Marketing Segmentation:</p> <p>Multiple segments can be assigned to each vehicle. In this method, a vehicle with multiple segmentation would appear in multiple search results. As an example, 2022 Lincoln Corsair, 5LMCJ1C98NUL29127 is classified as both SUV and Crossover.</p>	<p>Sedan Coupe Convertible Truck SUV Minivan Wagon Hatchback Crossover Van</p>	<p>"SUV", "Crossover"</p>
<p>Single Marketing Segmentation:</p> <p>Only one segment is assigned to each vehicle.</p>	<p>Sedan Coupe Convertible Pickup Sport Utility Vehicle Minivan Full size van Wagon Hatchback Chassis</p>	<p>"Sport Utility Vehicle"</p>

*EPA does not classify vehicles with GVWR higher than certain limits. As a result, for those VINs, CVD returns "unclassified". Please see <https://www.fueleconomy.gov/feg/findacarhelp.shtml#epaSizeClass> for more details.

2- Fuel Type

	All possible returns
<p>Fuel Type (Feature ID: 10030)</p>	<p>Regular Unleaded Premium Unleaded Diesel Natural Gas Propane Gaseous Electric</p>

	Ethanol Methanol Flex Fuel Gas Hybrid Gas/CNG Gas/Propane
--	--

3- Drive Type

Please note that "Drive Type" appears in both feature ID 10750 and the vehicle object section and these two come from different data. But we recommend using feature ID 10750.

	All possible returns
Drive Type (Feature ID: 10750)- Recommended	Front-wheel drive Rear-wheel drive Four-wheel drive All-wheel drive 6x4 drive 6x6 drive 8x6 drive 8x8 drive
Drive Type (Vehicle Object)	4x2 4x4 AWD RWD FWD 4WD

4- Warranty

FeatureID	featureIDName
19010	Basic warranty
19020	Powertrain warranty
19030	Corrosion perforation warranty
19040	Roadside warranty
19050	Maintenance warranty
22290	Hybrid/electric components warranty
22310	Traction battery warranty
22730	Transmission Warranty

5- Install cause

To clarify what each installCause value means see below:

- B = Build

- E = Engineered
- V = Vin Pattern
- R = Standard but changeable
- S = Standard
- I = User Input

6- Data Sources

- B = Build Data: This record was derived from the manufacturer’s option build string
 - V = Verified engineered data: This record was verified with a window sticker
 - E = Engineered: This record is derived from a listing and our configuration logic
 - C = Catalog: This record is derived from the manufacturer’s ordering catalog
 - S = Sparse: This record is returned when only WMI information is available.
- The priority order is B, V, E, and C based on if you are licensed for the source.

7- List of Collection Codes with descriptions

<u>Collection Code</u>	<u>Collection Description</u>
0002	Marketing Option Package
0004	Marketing Option Package Discount
0036	Powertrain Discount
0044	Convenience Group
0066	Security Package
0091	Fleet Credit
0094	Power Convenience
0096	Vehicle Invoice Credit
0097	Marketing Regional Discount
0105	Ship-Thru Code
0125	x - Vehicle Application
0135	x - Pusher/Tag
0157	Mobility
0179	Ordering Note
0006	Option Group
0034	Cold Climate Package
0025	Emissions
0026	Emissions Override
0027	Engine
0031	Cooling Systems
0032	Engine Equipment
0120	x - Air Cleaner
0123	x - Exhaust System
0124	x - Alternator

0153	x - Radiator
0154	x - Starting Motor
0174	x - Engine CARB Compliance Code
0057	Radio Equipment
0058	Radio Type
0138	DIO - Radio Type
0151	SET - Radio Type
0090	Color Appearance Package
0007	Body
0068	Bumpers
0070	Exterior Mirrors
0071	Exterior Ornamentation
0072	Glass Equipment
0073	Exterior Miscellaneous
0074	Exterior Moldings
0075	Antenna
0076	Rear Bumpers
0077	Rear Window Equipment
0079	Window Arrangements
0080	Window Equipment
0081	Exterior Lamps
0087	Roof Type
0092	Sun/Moon Roof
0099	Doors
0139	x - Front Bumper
0142	x - Exterior Mirror Type

0163	x - Tow Hooks
0164	Exterior Accent
0028	Alternative Fuel Conversions
0003	Decor
0043	Air Conditioning/Heating
0045	Cruise Control
0046	Door Locks
0047	Electronic Instrumentation
0049	Headliner
0050	Heater
0051	Instrumentation
0052	Interior Mirrors
0053	Interior Lighting
0054	Interior Miscellaneous
0069	Cargo/Luggage Equipment
0083	Interior Trim Colour
0093	Power Window Controls
0100	Electronic Equipment
0152	Interior Trim Material
0018	Steering
0067	Steering Wheel
0048	Floor Covering
0008	Brakes
0009	Chassis Equipment
0010	Fuel Tank & Equipment
0011	GVWR/Payload
0119	x - Brake System
0121	x - Fuel Tank
0122	x - Battery
0146	x - Clutch
0156	x - Steering System
0161	x - Transmission Vocation Code
0060	Security/Safety Options
0095	Traction Control
0141	x - Air Bags
0155	x - Parking Brake
0063	Seat Trim
0132	x - Front Passenger Seat Trim
0150	SET - Seat Trim

0159	DIO - Seat Trim
0055	Passenger Seat
0056	Power Seat
0059	Rear Seat
0061	Seat Adjuster
0062	Seat Equipment
0064	Seat Arrangements
0065	Seat Type
0103	Seat Delete
0131	x - Passenger Seat
0140	x - Driver Seat
0143	x - Rear Seat
0149	SET - Seat Type
0012	Limited Slip Differential
0013	Rear Suspension Equipment
0014	Suspension Type
0016	Shocks/Springs
0017	Skid Plates
0019	Suspension Equipment
0020	Torsion Bars
0024	Underbody Shield Package
0030	Axle Ratios
0033	Locking Differential
0035	Wide Track Rear Axle
0108	x - Front Axle
0109	x - Rear Axle
0110	x - Front Wheel
0111	x - Front Tire
0112	x - Fifth Wheel
0114	x - Front Suspension
0115	x - Rear Suspension
0116	x - Frame
0117	x - Rear Frame Overhang
0118	x - Front Axle Ratio
0133	x - Rear Tire
0134	x - Rear Wheel
0167	x - Rear Axle Ratio
0173	x - Rear Brake System
0042	Tire Equipment

0078	Spare Tire Carrier
0126	x - Front Tire Tread
0128	x - Front Tire Brand
0129	x - Rear Tire Brand
0130	x - Rear Tire Tread
0137	DIO - Tire Type
0148	SET - Tire Type
0015	Rear Wheels
0037	Wheel Type
0038	Tire Type
0039	Rear Tires
0040	Spare Tire
0041	Wheel Equipment
0107	Spare Wheel
0136	DIO - Wheel Type
0147	SET - Wheel Type
0021	Tow Hooks
0022	Trailer Equipment
0023	Transfer Case
0029	Transmissions
0101	Transmission Extras

0113	x - Warranty
0158	Warranty
0165	Warranty Usage
0166	Warranty Surcharge
0168	Warranty - Additional Comp. Coverage
0169	Warranty - Major Component
0170	Warranty - Additional Major Coverage
7026	Additional Warranty Plans
7027	REQ - Exterior Ornamentation
7029	REQ - Additional Fee
7030	REQ - All Wheel Drive
7031	REQ - Option Group
7032	REQ - Interior Trim Material
7033	REQ - Floor Covering
7034	REQ - Option Group 2
7035	REQ - Required Option
7036	REQ - Exterior Mirror
7037	REQ - Credit
7039	REQ - Cargo/Luggage Equipment
7040	REQ - Interior Trim Material 2
7041	REQ - Steering Wheel

X= Medium Duty Truck Option
DIO= Dealer Installed Option
SET= Southeast Toyota Option
REQ= Internal Special Enforcer

8- OEM Build Data Override and OEM Build Data Pass-thru Coverage

	Data Point	Ford	Toyota	BMW	Subaru	Kia	Hyundai	GM	Chrysler	Nissan	Mazda	Volvo
Additional Build Data PassThru	Make	Yes	Yes	Yes	Yes	Yes	Yes	Yes	Yes	No	Yes	Yes
	Model	Yes	Yes	Yes	Yes	Yes	Yes	Yes	No	Yes	No	No
	Trim	Yes	Yes	Yes	Yes	Yes	Yes	No	No	No	No	Yes
	Discounts	Yes	No	No	No	No	No	No	No	No	No	No
	Options not carried in CVD	Yes	Yes	Yes	No	No	MY 2024 - Current	No	No	No	No	Yes
Build Data Override	Base MSRP*	Yes	Yes	Yes	Yes	No	Yes	Yes	No	No	No	No
	Destination Charge*	Yes	Yes	Yes	Yes	No	Yes	Yes	Yes	Yes	No	No
	Option Description**	Yes	Yes	Yes	No	No	MY 2024 - Current	No	No	No	No	Yes
	Option Price	Yes	Yes	Yes	No	No	MY 2024 - Current	No	No	No	No	Yes
	Exterior Color Price	Yes	Yes	No	No	No	Yes	No	No	No	No	No
	Interior Color Price	Yes	Yes	No	No	No	Yes	No	No	No	No	No
	Invoice*	No	No	No	No	No	Yes	No	No	No	No	No

*Override condition: must be greater than 0

** Override condition: must not be empty