

# Hortonworks DataPlane Service

## Data Steward Studio Administration

(October 31, 2017)

## Hortonworks DataPlane Service: Data Steward Studio Administration

Copyright © 2016-2017 Hortonworks, Inc. All rights reserved.

Please visit the [Hortonworks Data Platform](#) page for more information on Hortonworks technology. For more information on Hortonworks services, please visit either the [Support](#) or [Training](#) page. Feel free to [contact us](#) directly to discuss your specific needs.

Hortonworks reserves the right to change any products described herein at any time, and without notice. Hortonworks assumes no responsibility or liability arising from the use of products described herein, except as expressly agreed to in writing by Hortonworks.

Trademark: Hortonworks DataPlane Service and DPS are trademarks of Hortonworks, Inc. in the United States and other countries. All other trademarks are the property of their respective owners.

Disclaimer: EXCEPT AS EXPRESSLY PROVIDED IN A WRITTEN AGREEMENT WITH HORTONWORKS, HORTONWORKS DOES NOT MAKE OR GIVE ANY REPRESENTATION, WARRANTY, OR COVENANT OF ANY KIND, WHETHER EXPRESS OR IMPLIED, IN CONNECTION WITH HORTONWORKS TECHNOLOGY OR RELATED SUPPORT PROVIDED IN CONNECTION THEREWITH. HORTONWORKS DOES NOT WARRANT THAT DPS WILL OPERATE UNINTERRUPTED OR THAT IT WILL BE FREE FROM DEFECTS OR ERRORS, THAT IT WILL PROTECT YOUR DATA FROM LOSS, CORRUPTION OR UNAVAILABILITY, OR THAT DPS WILL MEET ALL OF CUSTOMER'S BUSINESS REQUIREMENTS. WITHOUT LIMITING THE FOREGOING, AND TO THE MAXIMUM EXTENT PERMITTED BY APPLICABLE LAW, HORTONWORKS EXPRESSLY DISCLAIMS ANY AND ALL IMPLIED WARRANTIES, INCLUDING, BUT NOT LIMITED TO IMPLIED WARRANTIES OF MERCHANTABILITY, QUALITY, NON-INFRINGEMENT, TITLE, AND FITNESS FOR A PARTICULAR PURPOSE AND ANY REPRESENTATION, WARRANTY, OR COVENANT BASED ON COURSE OF DEALING OR USAGE IN TRADE.

Open Source: Open source software licensing information for third party software used in connection with or included in the DataPlane Services software may be found in documentation accompanying the delivery of Hortonworks DataPlane Services software.

HORTONWORKS PROVIDES SEPARATELY LICENSED CODE, INCLUDING ALL OPEN SOURCE SOFTWARE, TO CUSTOMER WITHOUT WARRANTIES OF ANY KIND. HORTONWORKS DISCLAIMS ANY AND ALL EXPRESS AND IMPLIED WARRANTIES WITH RESPECT TO SEPARATELY LICENSED CODE, INCLUDING BUT NOT LIMITED TO IMPLIED WARRANTIES OF TITLE, NON-INFRINGEMENT, MERCHANTABILITY AND FITNESS FOR A PARTICULAR PURPOSE.

## Table of Contents

1. About This Guide .....	1
2. Overview .....	2
2.1. Data Steward Studio Overview .....	2
2.2. Evaluation Software Features .....	4
2.3. Understanding Asset Collections .....	4
2.4. Asset 360 View: Understanding Data Assets .....	5
2.5. Understanding the DSS Profiler .....	5
2.6. DSS Terminology .....	6
2.7. Supported Configurations .....	7
3. DSS Data Management .....	8
3.1. Managing Asset Collections .....	8
3.1.1. Create Asset Collections .....	8
3.1.2. Delete Asset Collections .....	10
3.2. Viewing Data Assets (Asset 360) .....	11
3.2.1. View Data Asset Properties .....	12
3.2.2. View Data Asset Tags .....	14
3.2.3. View Data Asset Schema .....	15
3.2.4. View Data Asset Lineage .....	17
3.2.5. View Authorization Policies on a Data Asset .....	19
3.2.6. View Data Asset Audit Logs .....	21
4. Troubleshooting .....	23
4.1. No datalake available when creating an Asset Collection .....	23
4.2. Data Asset is greyed out .....	24
4.3. Edit an Asset Collection .....	24

# 1. About This Guide

The goal of this guide is to provide information and steps required for administering, configuring, using, and troubleshooting Hortonworks DataPlane Service Data Steward Studio, a service that enables users to understand and govern data across enterprise data lakes.

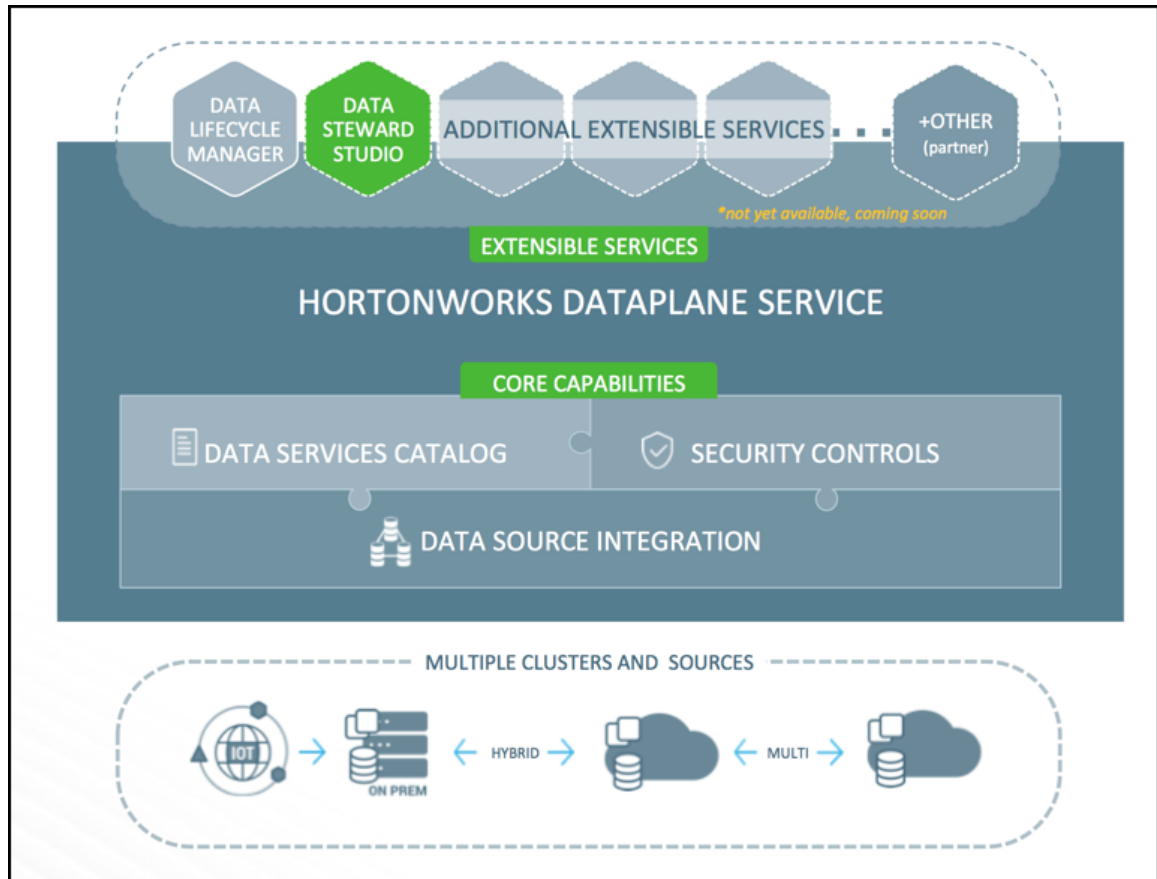
The primary audience of this guide are the administrators and users of Data Steward Studio (DSS).

What's in this guide:

- [Overview of DSS features, functionality, and concepts](#)
- [Data Management: Data Assets and Asset Collections](#)
- [Troubleshooting help](#)

## 2. Overview

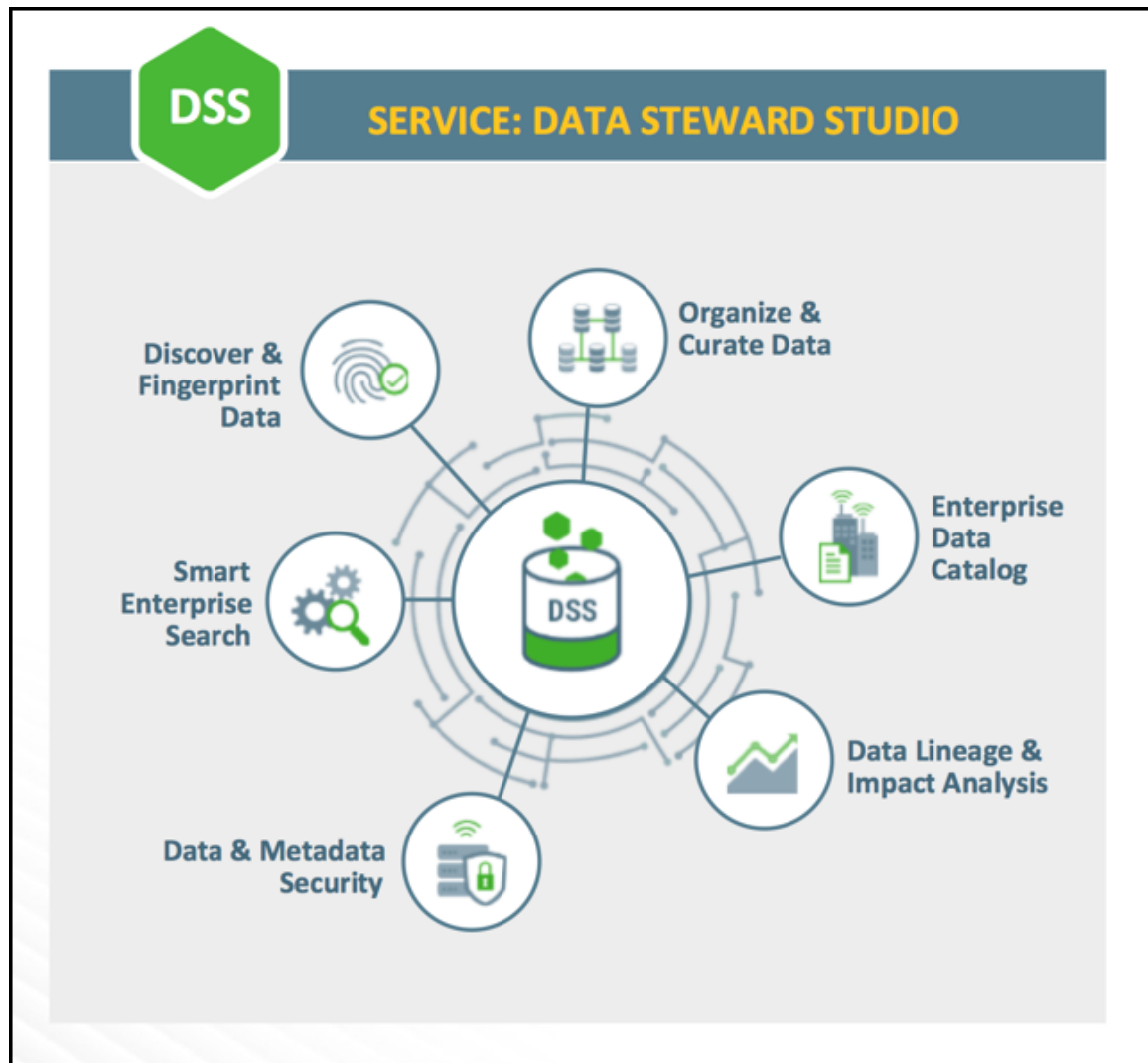
Hortonworks DataPlane Service (DPS™) is a common set of services to manage, secure, and govern data assets across multiple tiers and types. It does this for data at rest and in multiple clusters and tiers (on-premises, cloud, and to the point of origin (IOT)).



Data Steward Studio (DSS) is one of several services available for Hortonworks DataPlane Service; it provides a suite of capabilities that allows users to understand and govern data across enterprise data lakes.

### 2.1. Data Steward Studio Overview

Data Steward Studio (DSS) is one of several services available for Hortonworks DataPlane Service; it provides a suite of capabilities that allows users to understand and govern data across enterprise data lakes.



The goal of the Data Steward Studio is to help data stewards across the enterprise to:

- Organize and curate data globally
  - Organize data based on business classifications, purpose, protections needed, etc.
  - Promote responsible collaboration across enterprise data workers
- Understand where relevant data is located
  - Cataloging and searching to locate relevant data of interest (sensitive data, commonly used, high risk data, etc.)
- Understand how data is interpreted for use
  - Basic descriptions: Schema, classifications (business cataloging), encodings
  - Statistical models and parameters
  - User annotations, wrangling scripts, view definitions etc.

- Understand how data is created and modified
  - Visualize upstream lineage and downstream impact
  - Understand how schema or data evolve
  - View and understand data supply chain (pipelines, versioning, evolution)
- Understand how data access is secured/protected and audit usage
  - Understand who can see which data and metadata (e.g. based on business classifications) under what conditions (security policies, data protection, anonymization)
  - View who has accessed what data from a forensic audit/compliance perspective
  - Visualize access patterns and identify anomalies

For a list of features that are available in this release, see [Evaluation Software Features \[4\]](#).

## 2.2. Evaluation Software Features

The following capabilities are available in this Tech Preview:

The technical preview of Data Steward Studio will provide organization and curation capabilities for creating Data Asset Collections based on Hive Tables. Additionally, Data Steward Studio provides an Asset 360 View which has a comprehensive picture of various types of metadata for Hive tables (E.G., technical properties, lineage, security policies, classifications or tags, schema or structure.) Additionally, users can drill down into a view that shows statistical summaries of data in the columns contained within the Hive tables as well as summarized views of the usage of a Hive table from access and audit logs.

Data Steward Studio 1.0 is a Hortonworks Evaluation Software. Data Steward Studio is available within DataPlane, but is not ready for production deployment. Hortonworks encourages you to explore this technical preview release in non-production environments and provide feedback on the technical preview via your Hortonworks support channels or [Hortonworks Community Forums](#).

## 2.3. Understanding Asset Collections

An asset collection is a list of assets that have been grouped and assigned unique search criteria by a data steward for purposes of management and administration.

With Asset Collections, you can:

- **Organize:** Group data assets into asset collections based on business classifications, purpose, protections, relevance, etc.
- **Search:** Find tags or assets in your data lake using Hive assets, attribute facets, or free text.

- **Summarize:** View personalized dashboards with an overview of data assets within an asset collection.
- **Understand:** Audit data asset security and use for anomaly detection, forensic audit/ compliance & proper control mechanisms

Asset Collections are immutable once created. Once an Asset Collection has been created by running a query filter, the assets contained within it are not updated when subsequent changes (such as additional assets being added or deleted) that pass the filtering criteria will not be updated in the Asset Collection.

The screenshot shows the 'Data Steward / Asset Collections' page. On the left, there is a 'Tags' sidebar with a search icon and a list of tags: ALL (6), SE (1), customer (1), finance (1), geo (1), insurance (2), marketing (1), pii (2), reference (2), sales (1), and shared (2). The main area displays a table of asset collections under the 'ALL' filter. The table has columns for NAME, DESCRIPTION, DATALAKE, CREATED BY, and HIVE TABLES. A green 'ADD ASSET COLLECTION' button is visible in the top right.

NAME	DESCRIPTION	DATALAKE	CREATED BY	HIVE TABLES
Customer Profiles	Customer Profiles	dss_bbsh_clust3	dssadmin	2
Employee Assets	Employee Assets	dss_bbsh_clust3	dssadmin	1
Sales Assets	Sales Assets	dss_bbsh_clust2	dssadmin	1
Shared Data	Shared Data	dss_bbsh_clust2	dssadmin	1
Financials	Financials	dss_bbsh_clust2	dssadmin	1
SE Review	SE Review	dss_bbsh_clust4	dssadmin	2

## 2.4. Asset 360 View: Understanding Data Assets

A data asset is a specific instance of a data type, including the related attributes and metadata. A data asset is a physical asset located in the Hadoop ecosystem such as a Hive table which contains business or technical data. A data asset is a specific instance of a given type and includes relevant attributes and metadata. An asset can belong to only one asset collection. Data assets are also known as "entities" in Apache Atlas.

The screenshot shows the 'Data Steward / Asset Collections / Details' page for 'CUSTOMER PROFILES'. It displays the datalake 'dss\_bbsh\_clust3' and creator 'dssadmin'. A green 'DELETE' button is in the top right. Below is a table with columns for SOURCE, NAME, DATABASE NAME, DESCRIPTION, and OWNER.

SOURCE	NAME	DATABASE NAME	DESCRIPTION	OWNER
HIVE	us_customers	hortoniabank	-	insurance_admin
HIVE	ww_customers	hortoniabank	-	insurance_admin

## 2.5. Understanding the DSS Profiler

DSS includes a profiler engine that can run various data profiling operations as a pipeline on data located in multiple data lakes. The profiler agent is installed in a data lake and can be set up on a specific schedule to generate various types of data profiles that create metadata annotations that summarizes the content and shape characteristics for data assets.

The technical preview version of DSS will include two built-in profilers: a Hive column univariate statistical profiler and a Ranger audit log summarizer. Both of these profiler agents are included as part of DSS and must be installed on the cluster.



When an Asset Collection is created, all data assets in that collection are added to a scheduler in the profiler backend. You cannot manually trigger the Profiler to run; the schedule is hardcoded to run once every hour.

## 2.6. DSS Terminology

For a complete list of DataPlane terminology, see: [Hortonworks DataPlane Service Terminology](#).

Hortonworks DataPlane Service (HDS)	The family of components that include the Core service platform and all services that plug into it.
Data Center	The facility that contains the computer, server, and storage systems and associated infrastructure, such as routers, switches, and so forth. Corporate data is stored, managed, and distributed from the data center. In an on-premise environment, a data center hosts one or more Hadoop clusters.
Profiler	Enables the data steward to gather and view information about different relevant characteristics of data such as shape, distribution, quality, and sensitivity which is important to understand and use the data effectively. For example, view the distribution between males and females in column "Gender", or min/max/mean/null values in a column named "avg_income". Profiled data is generated on a periodic basis from the profilers, which run at regularly scheduled intervals. Works with data sourced from Apache Ranger Audit Logs, Apache Atlas Metadata Store, and Hive.
Data Lake	A trusted and governed data repository that stores, processes, and access to many kinds of enterprise data to support data discovery, data preparation, analytics, insights, and predictive analytics. In the context of Hortonworks DPS, a data lake can be realized in practice with an Apache Ambari managed Hadoop cluster that runs Apache Atlas for metadata and governance services, and Apache Knox and Apache Ranger for security services.
Data Asset	A data asset is a physical asset located in the Hadoop ecosystem such as a Hive table which contains business or technical data. A data asset could include a specific instance of an Apache Hive database, table, or column. An asset can belong to only one asset collection. Data assets are equivalent to "entities" in Apache Atlas.
Asset Collection	Asset collections allow users of DSS to manage and govern various kinds of data objects as a single unit through a unified interface. Asset collections help organize and curate information about many assets

based on many facets including data content and metadata, such as size/schema/tags/alterations, lineage, and impact on processes and downstream objects in addition to the display of security and governance policies.

The content of an asset collection is a static list that can only be modified by a user. So, adding new assets to a collection must be done manually.

## 2.7. Supported Configurations

See the [DataPlane Service Support Matrices](#).

## 3. DSS Data Management

You can create and delete Asset Collections ([Managing Asset Collections \[8\]](#)) and view information about Data Assets contained in an Asset Collection ([Viewing Data Assets \(Asset 360\) \[11\]](#)).

### 3.1. Managing Asset Collections

You can [Create Asset Collections \[8\]](#) and [Delete Asset Collections \[10\]](#).

You cannot edit Asset Collections after you have created them. You would delete the Asset Collection, and create it again.

#### 3.1.1. Create Asset Collections

##### About this task

You can group data assets into Asset Collections. This enables you to organize data based on business classifications, purpose, protections needed, etc.



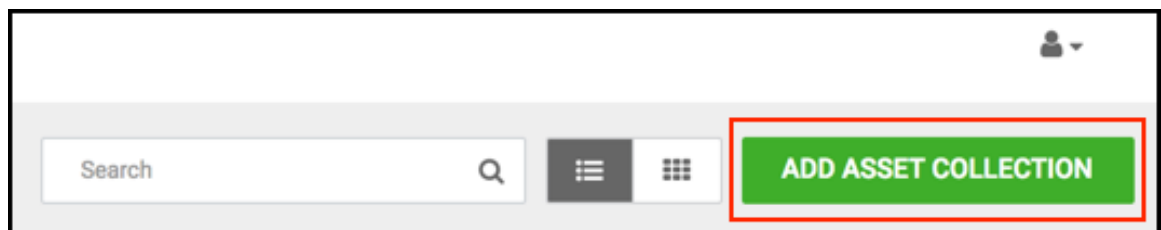
##### Note

You cannot edit Asset Collections after you have created them. You would delete the Asset Collection, and create it again.

##### Steps

From the Asset Collection page:

1. Click the **Add Asset Collection** button.



The **Add** page opens.

2. Fill in the following information:

Field Name	Description	Example Value
Name	Enter an appropriate Asset Collection name. This name cannot be duplicated across the system. (Mandatory)	Customer Profiles, Sales Assets, Financials
Description	Describe the purpose or intent of the Asset Collection. (Mandatory)	Contains customer profiles: data assets for US and WW.
Datalake	Assign the Asset Collection to one Datalake. Choose from a list of available Datalakes. (Mandatory)	dss_bbsh_clust3

Field Name	Description	Example Value
Tags	Add tags to your asset collection for context and subsequent lookup. Tags enable your to quickly catalog, search and retrieve asset collections as well as share such information with others in the future. (Optional)	se, pii, geo, finance

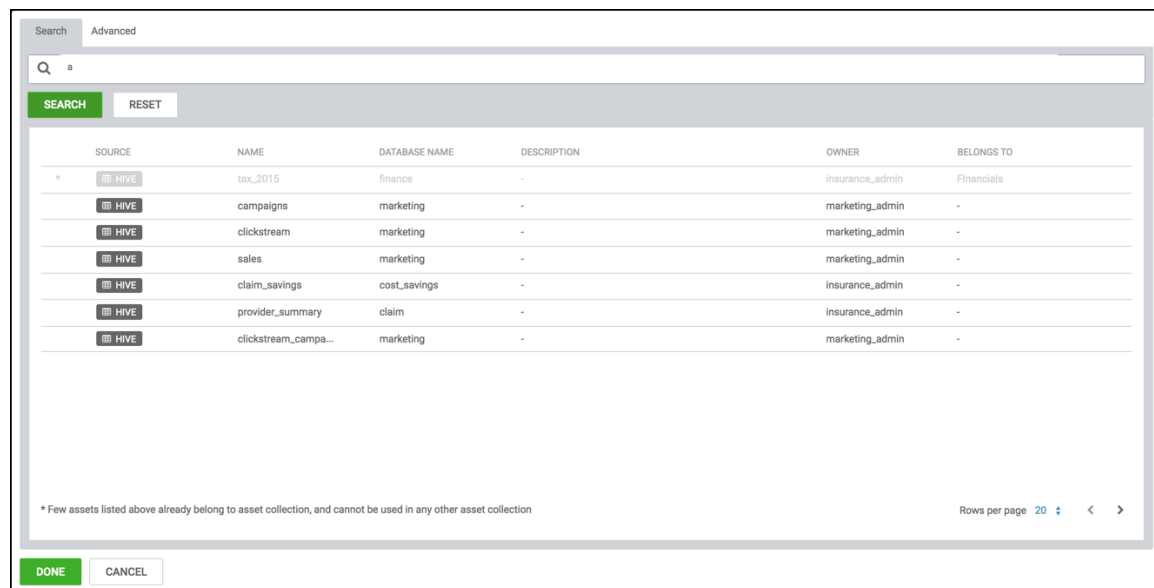
3. Add assets to the Asset Collection:

- a. Click **Add Assets**.

The **Asset Search** window opens.

- b. Search for assets using Basic or Advanced search.

**Basic Search**



**Advanced Search**

Advanced search uses facets of technical and business metadata about the assets, such as those captured in Apache Atlas, to help users define and build collections of interest. Advanced search conditions are a subset of [attributes for the Apache Atlas type hive\\_table](#).

Search Advanced

owner = admin

name Contains customers

SEARCH RESET

SOURCE	NAME	DATABASE NAME	DESCRIPTION	OWNER	BELONGS TO
HIVE	ww_customers	hortonlabank	-	insurance_admin	Customer Profiles
HIVE	us_customers	hortonlabank	-	insurance_admin	Customer Profiles

\* Few assets listed above already belong to asset collection, and cannot be used in any other asset collection

Rows per page 20 < >

DONE CANCEL

c. Click **Done**.

All assets that display from the search result will be selected, with the exception of greyed out assets; assets can only belong to one Asset Collection at a time.

d. Click **Next**.

The **Summary** page opens.

4. Click **Save**.

You are returned to the **Asset Collections** home page.

## 3.1.2. Delete Asset Collections

### About this task

You can delete Asset Collections at any time. Deleting an Asset Collection does not delete the assets contained therein, it only disassembles the collection of assets. You can re-create Asset Collections or reassign assets to new Asset Collections.

You might want to delete an Asset Collection if you no longer need to track that Asset Collection, or if you wish to reassign assets to another Asset Collection.

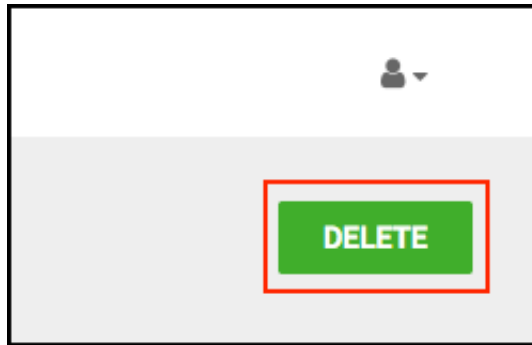
### Steps

From the **Data Steward > Asset Collections** page:

1. Click on the name of the Asset Collection you wish to delete.

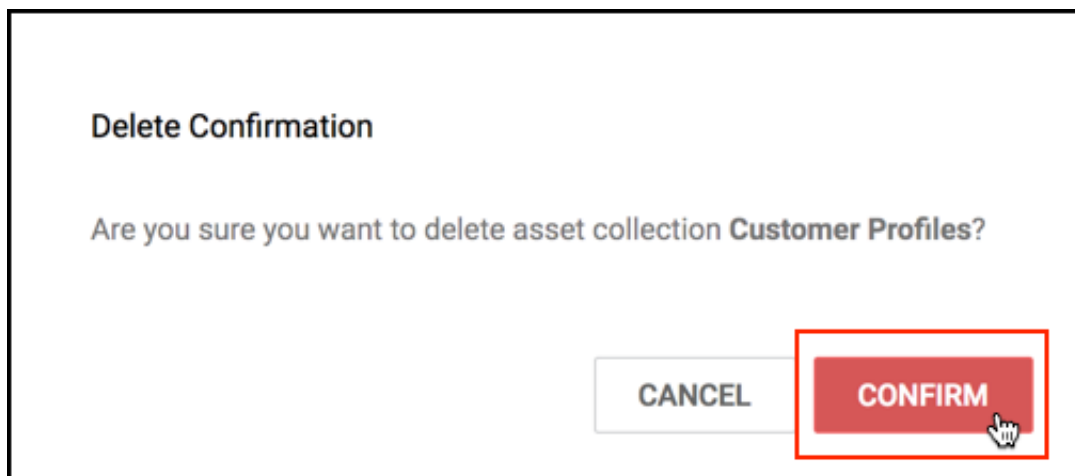
The **Asset Collection Details** page opens.

2. Click the **Delete** button.



A confirmation window opens.

3. Click **Confirm**.



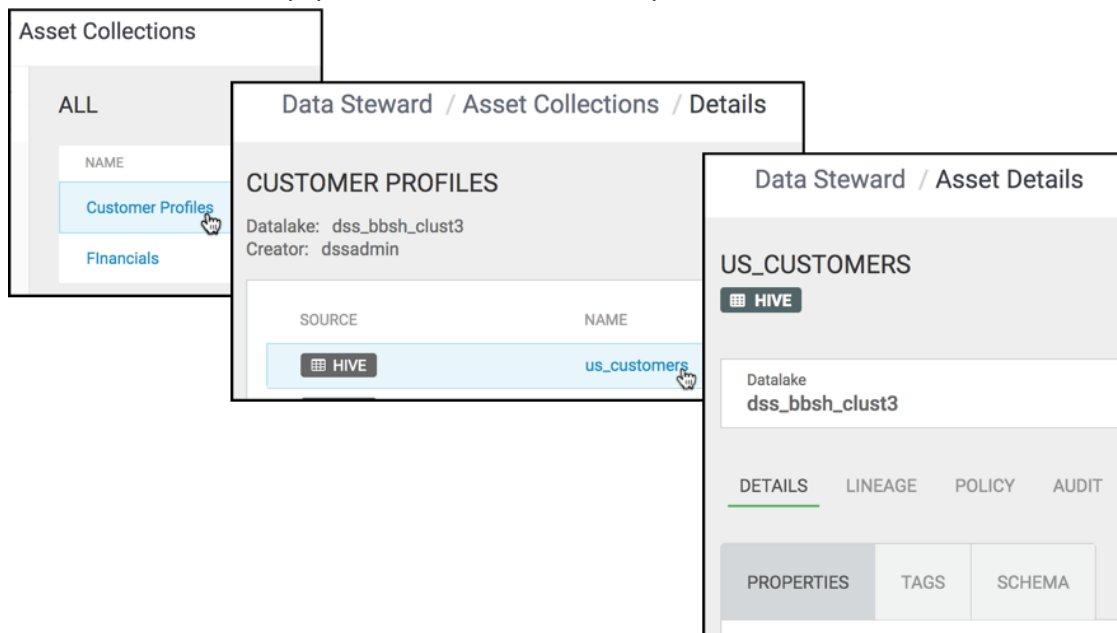
You are returned to the **Asset Collections** home page.

## 3.2. Viewing Data Assets (Asset 360)

The Asset 360 page is a centralized hub providing the following information related to an asset:

- **Data Asset Details:** table properties ([View Data Asset Properties \[12\]](#)), tags from Apache Atlas ([View Data Asset Tags \[14\]](#)), and schema details ([View Data Asset Schema \[15\]](#)).
- **View Data Asset Lineage [17]:** The lineage view shows the chain of custody for the data from relevant metadata repositories such as Apache Atlas. Lineage shows both upstream paths (lineage) into and downstream paths (impact) out of a given asset.
- **View Authorization Policies on a Data Asset [19]:** The policy view shows security (authorization) policies defined on assets such as those present in Apache Ranger. It includes both resource (physical asset based) as well as classification based policies
- **View Data Asset Audit Logs [21]:** Audit View shows both most recent access audits from Apache Ranger and also summarized views of audits by type, user, and time window based on profiling of audit data.

The Asset 360 page can be accessed from Data Steward>Asset Collections>(click the name of one Asset Collection)>(click the name of one asset).



### 3.2.1. View Data Asset Properties

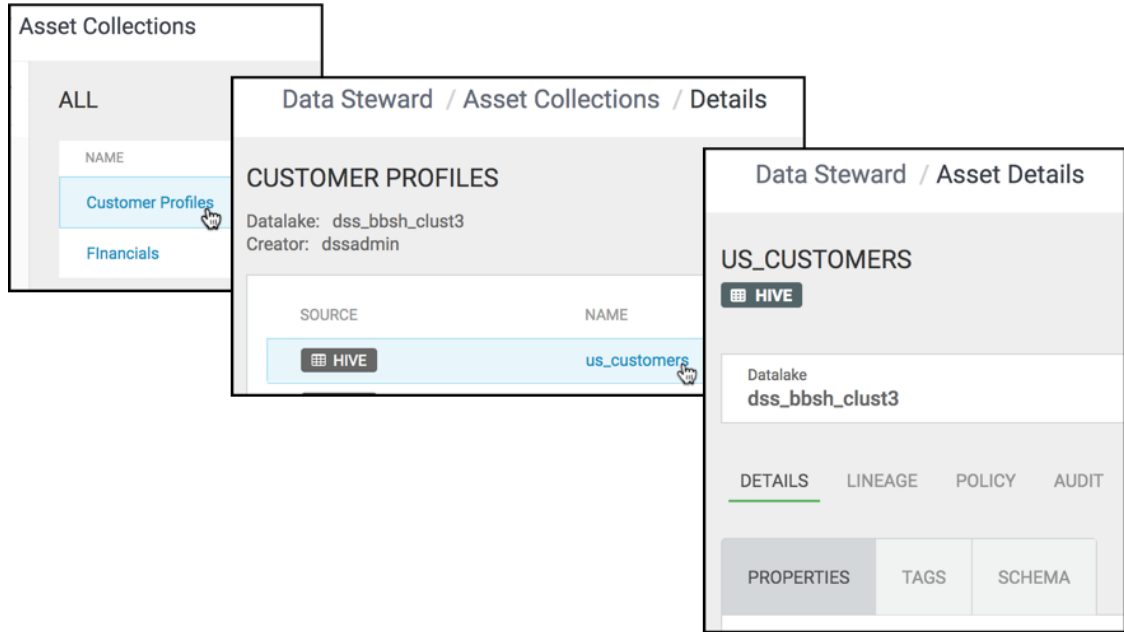
#### About this task

The Asset 360 page contains a personalized dashboard with an overview of data assets within an asset collection. You can view all the Apache Atlas metadata associated with a particular data asset on the Asset 360 page>Properties page.

#### Steps

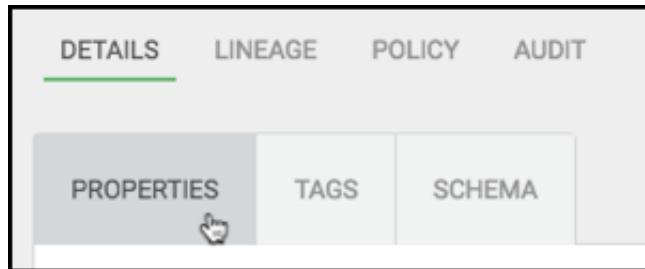
To view data asset properties:

1. From Data Steward>Asset Collections, select one Asset Collection, then select one data asset.



The **Asset 360** window opens.

2. Under the **Details** tab, click **Properties**.



The **Properties** table shows the data asset metadata properties as retrieved from Apache Atlas.



PROPERTIES	TAGS	SCHEMA
KEY	VALUE	
owner	insurance_admin	
temporary	false	
lastAccessTime	08 Sep 2017 02:40:25 AM	
aliases		
qualifiedName	hortoniabank.us_customers@dss_bbsh_clust3	
description		
viewExpandedText		
tableType	EXTERNAL_TABLE	
createTime	08 Sep 2017 02:40:25 AM	
name	us_customers	
comment		
partitionKeys		
profileData	typeName: hive_table_profile_data, samplePercent: 100, rowCount: 50000, sampleTime: 1508867778060	
db	hortoniabank	
retention	0	
viewOriginalText		

### 3.2.2. View Data Asset Tags

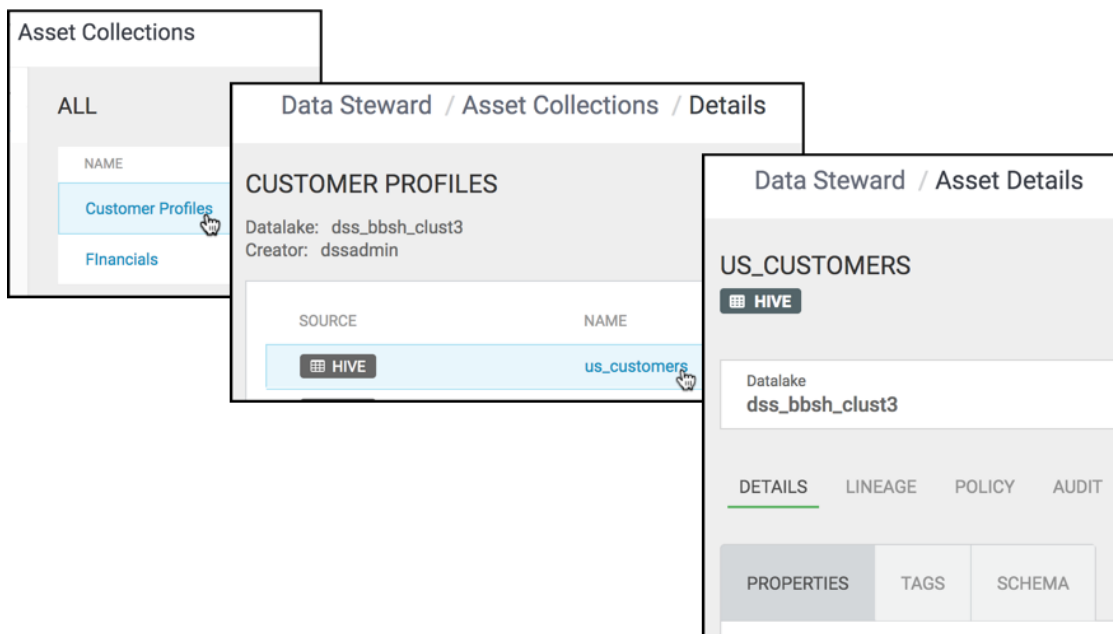
#### About this task

The Asset 360 page contains a personalized dashboard with an overview of data assets within an asset collection. You can view all the classifications associated with the asset via Apache Atlas on the Asset 360 page>Tags page.

#### Steps

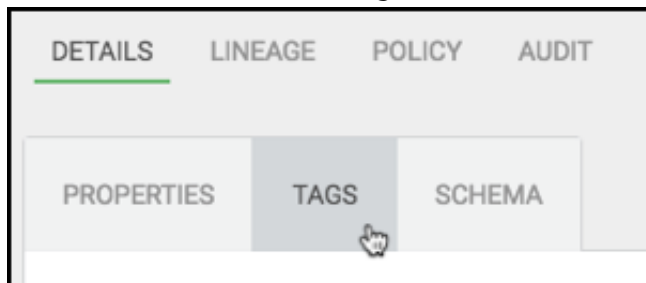
To view data asset tags details:

1. From Data Steward>Asset Collections, select one Asset Collection, then select one data asset.

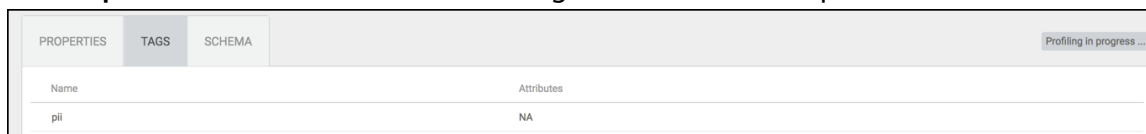


The **Asset 360** window opens.

2. Under the **Details** tab, click **Tags**.



The **Properties** table shows the data asset tags as retrieved from Apache Atlas.



PROPERTIES	TAGS	SCHEMA	Profiling in progress ...
Name	Attributes		
pli	NA		

### 3.2.3. View Data Asset Schema

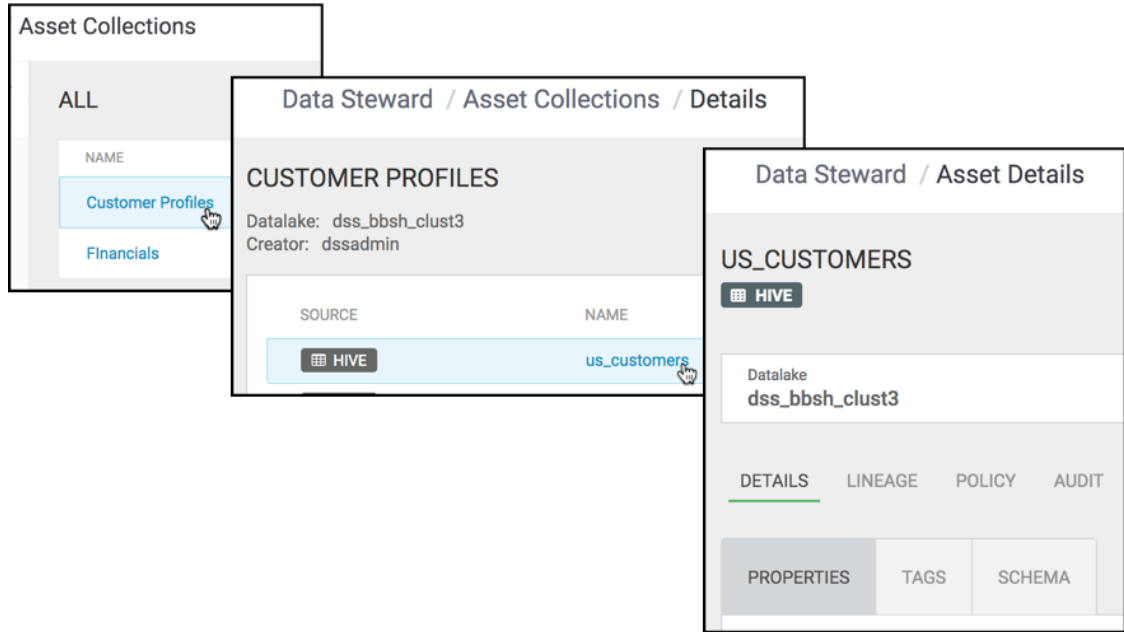
#### About this task

The Asset 360 page contains a personalized dashboard with an overview of data assets within an asset collection. From the Asset 360 page>Schema page, you can view the schema of the data asset for structured data (such as Hive tables) from the relevant metadata repositories (such as Atlas). You can also view the shape or distribution characteristics of the columnar data within a schema based on the Hive column profiler. By providing statistical models and parameters, this helps you understand how data is interpreted for use.

#### Steps

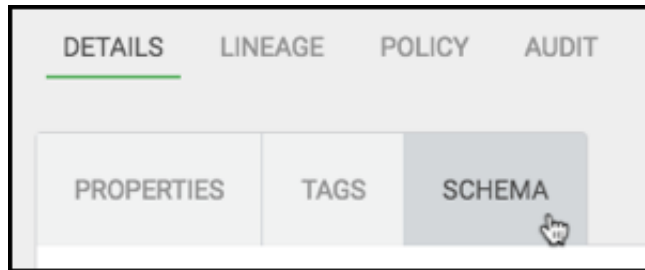
To view data asset schema details:

1. From Data Steward>Asset Collections, select one Asset Collection, then select one data asset.



The **Asset 360** window opens.

2. Under the **Details** tab, click **Schema**.

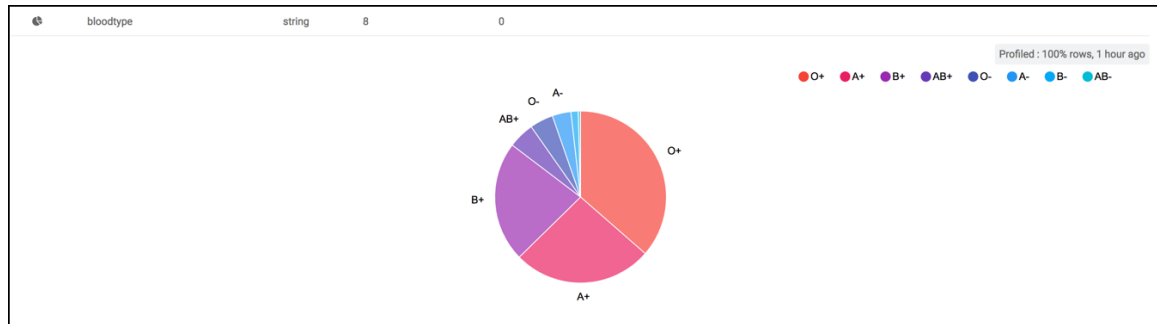


The **Schema** table shows the data asset schema as retrieved from Apache Atlas.

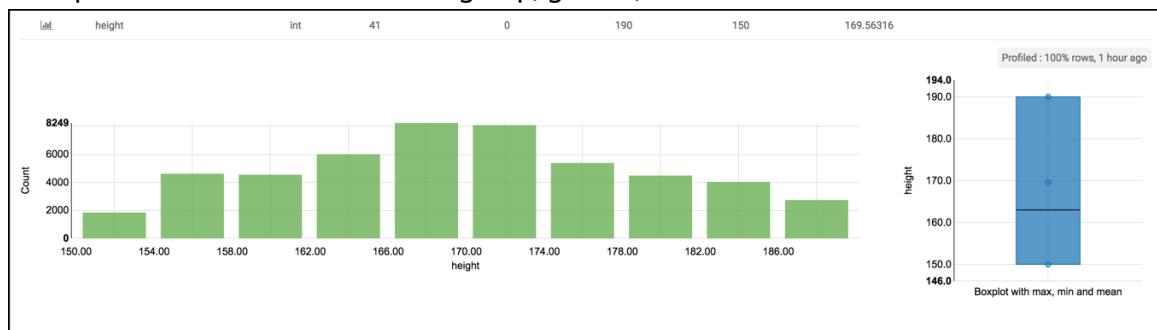
PROPERTIES	TAGS	SCHEMA	Profiling in progress ...					
Name	Type	Unique Values	Null Values	Max	Min	Mean	Comment	
lcl: cvv2	string	999	0					
lcl: username	string	35266	0					
lcl: height	int	41	0	190	150	169.56316		
lcl: emailaddress	string	49970	0					
lcl: number	string	50000	0					
lcl: age	int	67	0	85	19	52.17764		
lcl: middleinitial	string	26	0					
lcl: birthday	string	21302	0					
lcl: occnumber	string	50000	0					
lcl: givenname	string	3343	0					
lcl: insurancecid	string	49987	0					
lcl: longitude	double	49962	0	174.044919	-174.19958	-91.5087503445006		
lcl: domain	string	30100	0					
lcl: streetaddress	string	49790	0					
lcl: title	string	4	0					
lcl: tropicalzodiac	string	12	0					
lcl: cctype	string	2	0					

### 3.2.3.1. Graph Types, Uses, and Examples

The Asset 360 page contains a personalized dashboard with an overview of data assets within an asset collection. You can view all the Apache Atlas schema details associated with a particular data asset on the Asset 360 page>Schema page. There are different charts available to help visualize the shape and distribution of the data within the column as well as summary statistics (such as means, null count, cardinality of the data) contained within a column.



Pie charts are presented for categorical data with limited number of categories or classes. Examples include data such as blood group, gender, and titles.



When the data within columns is numeric, a histogram of the distribution of values binned into 10 groups (decile frequency histogram) and a box plot with a 5-number summary (mean, median, quartiles, max, and min values).

### 3.2.4. View Data Asset Lineage

#### About this task

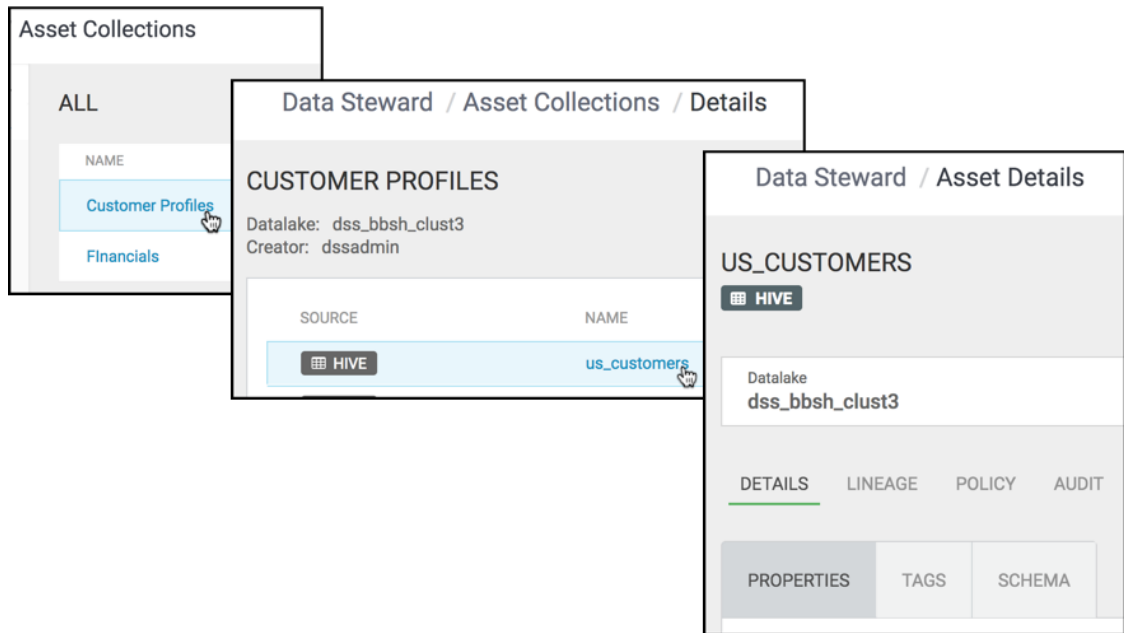
The Asset 360 page contains a personalized dashboard with an overview of data assets within an asset collection. The Asset 360 page>Lineage page shows the chain of custody for the data from relevant metadata repositories such as Apache Atlas. This helps you understand how data is created, modified, and evolves. It also helps you view and understand data supply chain (pipelines, versioning, evolution)

The lineage view shows the chain of custody for the data from relevant metadata repositories such as Apache Atlas. Lineage shows both upstream paths (lineage) into and downstream paths (impact) out of a given asset.

#### Steps

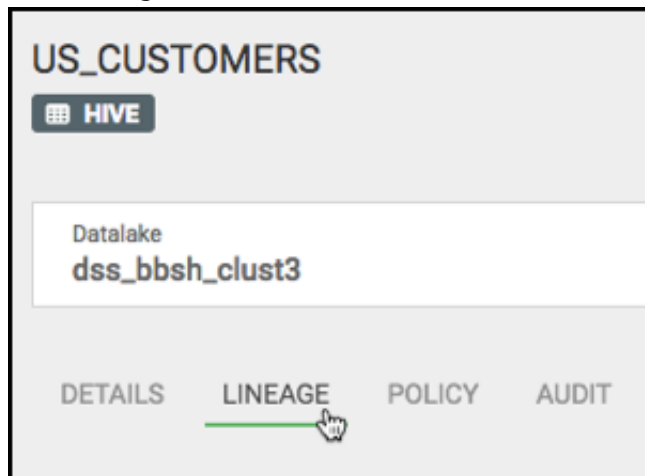
To view data asset lineage:

1. From Data Steward>Asset Collections, select one Asset Collection, then select one data asset.

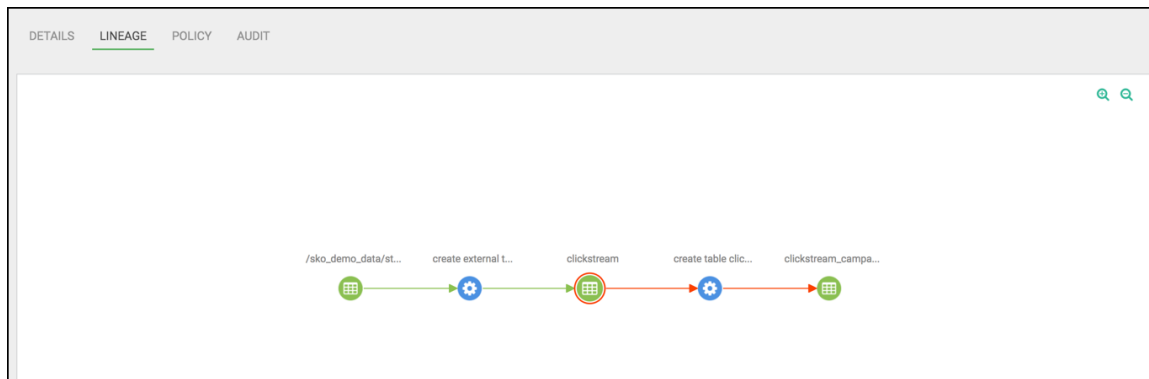


The **Asset 360** window opens.

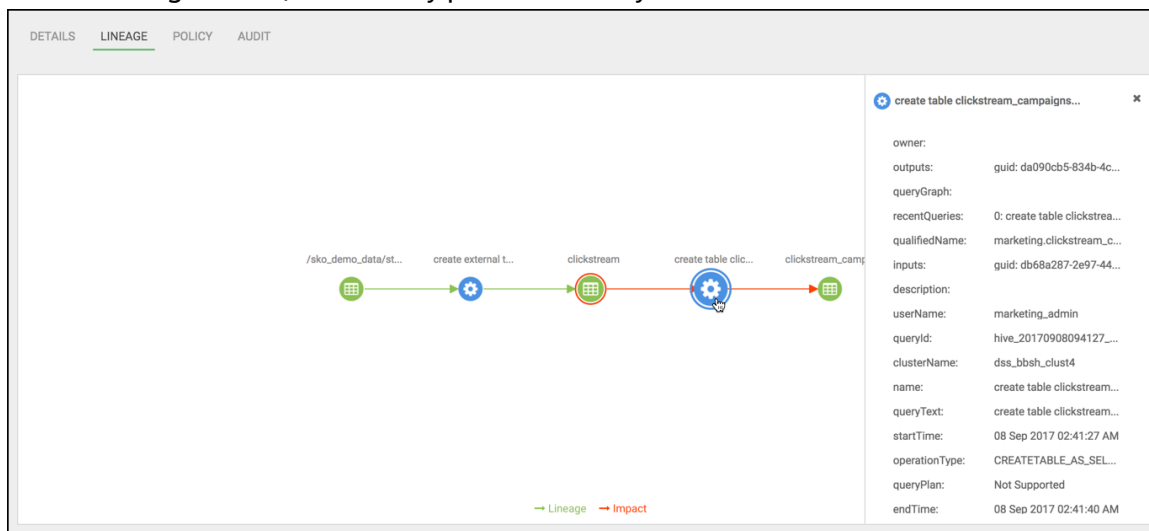
2. Click **Lineage**.



The **Lineage** table shows the data asset lineage as retrieved from Apache Atlas.



3. To view lineage details, click on any process or entity node.



### 3.2.5. View Authorization Policies on a Data Asset

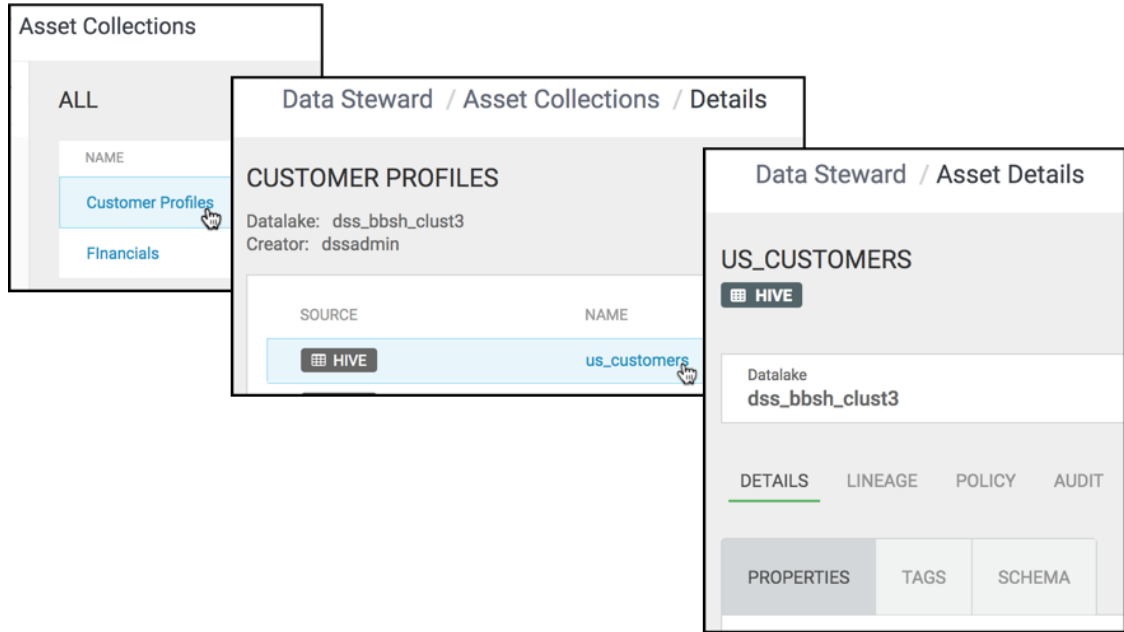
#### About this task

The Asset 360 page contains a personalized dashboard with an overview of data assets within an asset collection. You can view all the Apache Ranger policy details associated with a particular data asset on the Asset 360 page>Policy page. This helps you understand how data access is secured and protected: what users can see what data (or metadata) under what conditions (security policies, data protection, and anonymization).

#### Steps

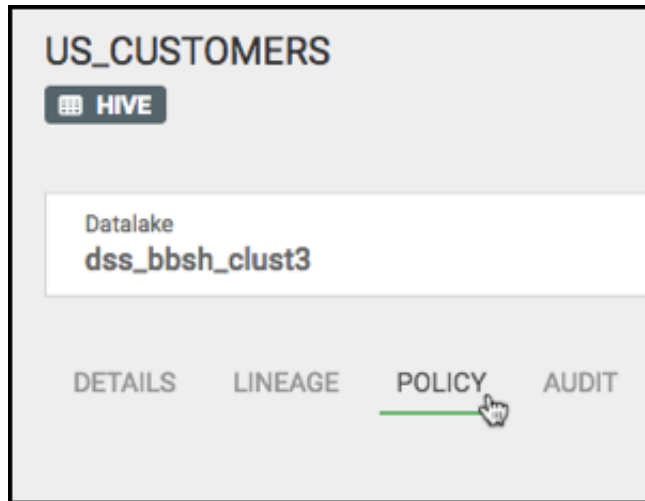
To view data asset lineage:

1. From Data Steward>Asset Collections, select one Asset Collection, then select one data asset.



The **Asset 360** window opens.

2. Click **Policy**.



The **Policy** table shows the data asset policies as retrieved from Apache Ranger.

Resource Based Policies						
Policy ID	Policy Name	Status	Audit Logging	Group	Users	
2	all - database, table, column	ENABLED	ENABLED	-	hive, ambari-qa, admin, beacon	
4	p1	ENABLED	ENABLED	users	hive, yam	

Tag Based Policies						
Policy ID	Policy Name	Tags	Status	Audit Logging	Group	Users
16	PII Policy	pii	ENABLED	ENABLED	-	admin

## 3.2.6. View Data Asset Audit Logs

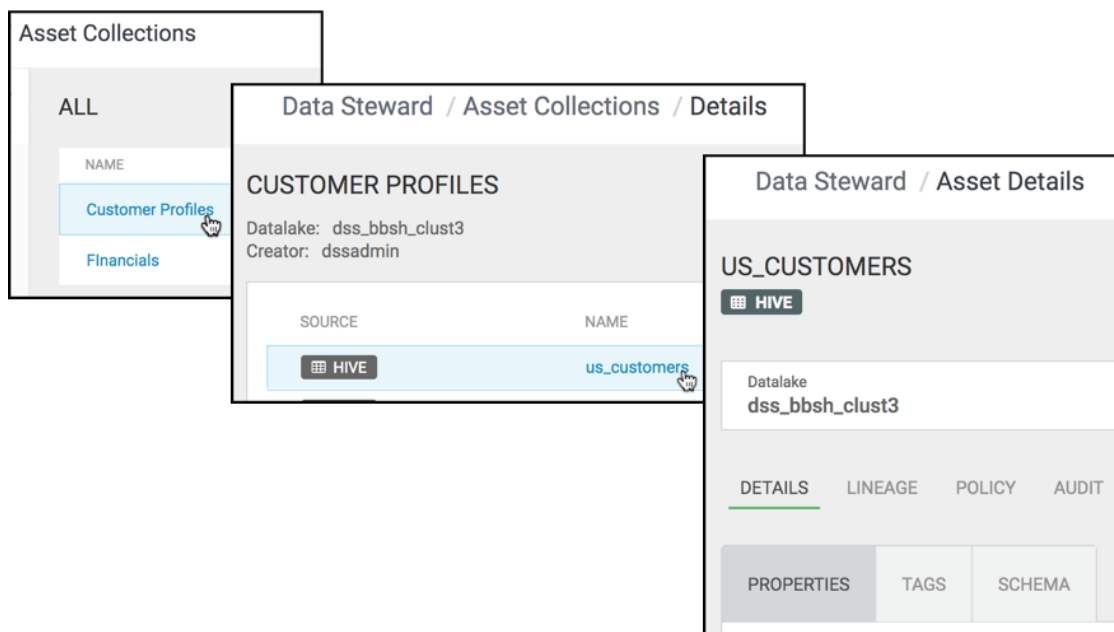
### About this task

The Asset 360 page contains a personalized dashboard with an overview of data assets within an asset collection. You can view all the Apache Ranger audit events associated with a particular data asset on the Asset 360 page>Audit page. This helps you view who has accessed what data from a forensic audit/compliance perspective, and visualize access patterns and identify anomalies.

### Steps

To view data asset audit logs:

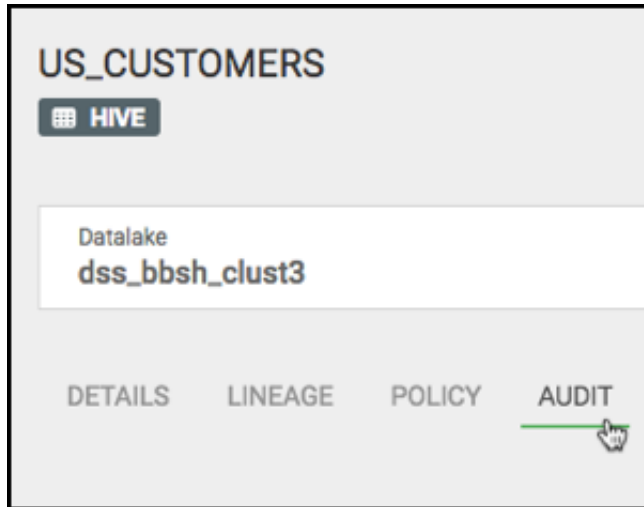
1. From Data Steward>Asset Collections, select one Asset Collection, then select one data asset.



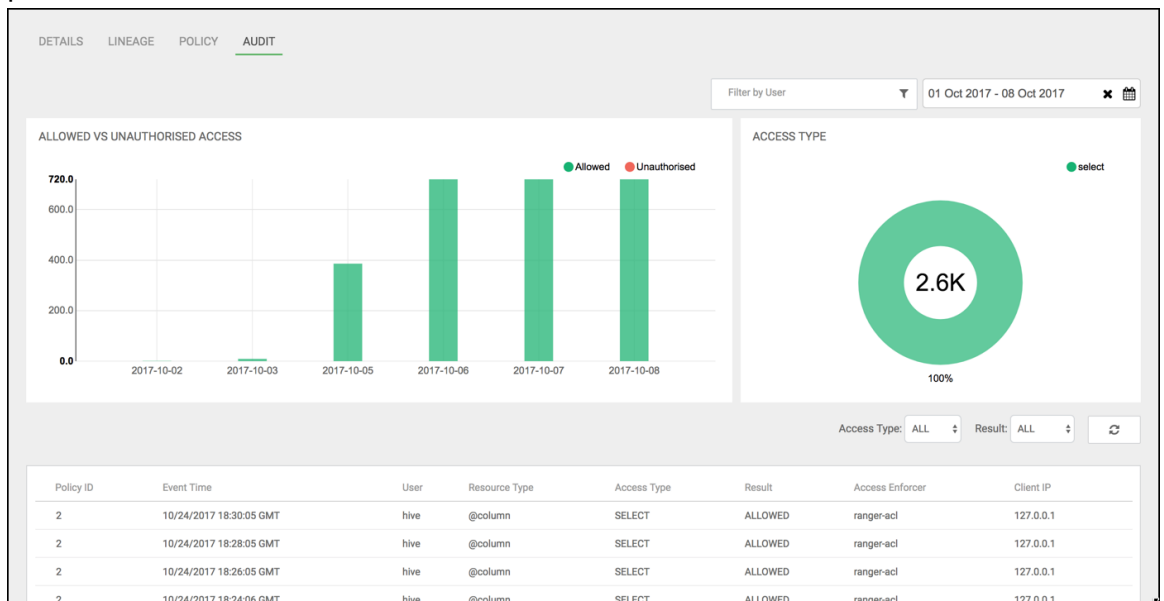
The **Asset 360** window opens.

2. Click **Audit**.





The Audit table shows the most recent raw audit event data as well as summarized views of audits by type of access and access outcome (authorized/unauthorized). Such summarized views are obtained by profiling audit records in the data lake with the audit profiler.



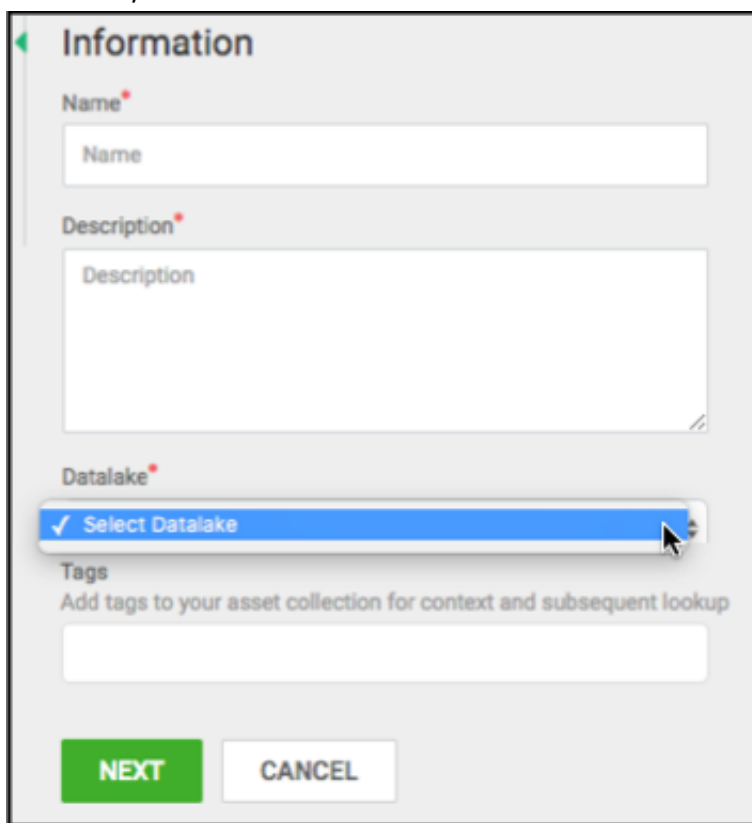
## 4. Troubleshooting

This chapter contains common issues (with workarounds) and error message help.

### 4.1. No datalake available when creating an Asset Collection

**Issue:** When creating an Asset Collection, no datalake displays in the drop-down menu.

**Description:** A datalake is a cluster that has Apache Atlas and Apache Ranger installed. If registered clusters do not have Apache Atlas installed, or there are no clusters registered to DataPlane, no datalakes will be available.



The screenshot shows a web form titled "Information" for creating an Asset Collection. It contains the following elements:

- Name:** A text input field with a red asterisk indicating it is required.
- Description:** A larger text area with a red asterisk indicating it is required.
- Datalake:** A dropdown menu with a red asterisk. The current selection is "Select Datalake", which is highlighted in blue. A mouse cursor is pointing at the dropdown arrow.
- Tags:** A label "Tags" followed by the instruction "Add tags to your asset collection for context and subsequent lookup" and an empty text input field.
- Buttons:** A green "NEXT" button and a white "CANCEL" button at the bottom.

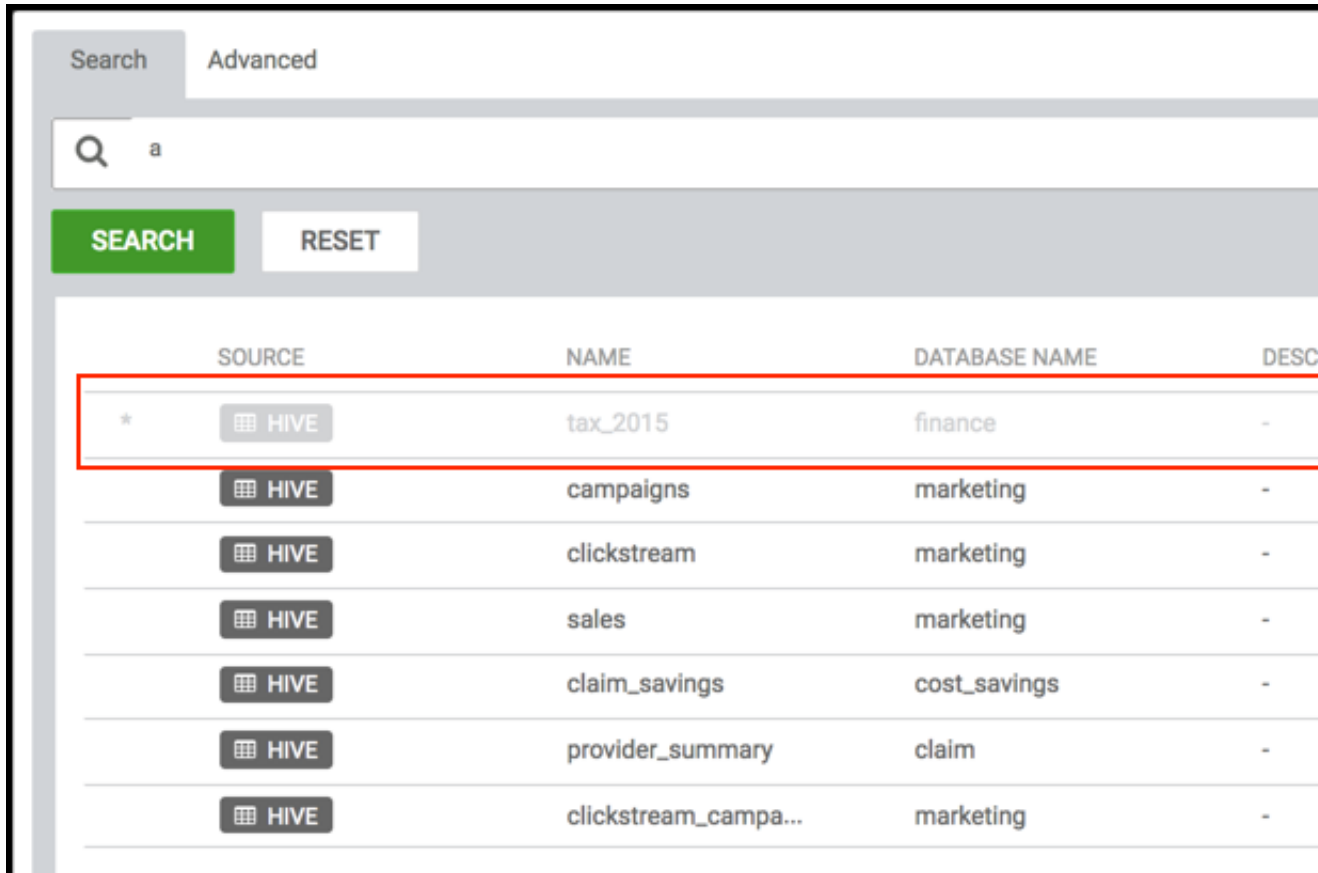
**Workaround:** You might need to either register the cluster, or install Apache Atlas and Apache Ranger on the cluster:

- [Register a cluster in DataPlane](#)
- [Install Apache Atlas](#)
- [Install Apache Ranger](#)

## 4.2. Data Asset is greyed out

**Issue:** When assigning Data Assets to an Asset Collection, some data assets are greyed out and unselectable.

**Description:** Data Assets can only be assigned to one Asset Collection at a time; those that are already assigned are greyed out.



	SOURCE	NAME	DATABASE NAME	DESC
*	HIVE	tax_2015	finance	-
	HIVE	campaigns	marketing	-
	HIVE	clickstream	marketing	-
	HIVE	sales	marketing	-
	HIVE	claim_savings	cost_savings	-
	HIVE	provider_summary	claim	-
	HIVE	clickstream_campa...	marketing	-

**Workaround:**

- [Delete the Asset Collection](#) the Data Asset belongs to, and [re-create the Asset Collections](#) with new assignments.
- [Create the Asset Collection](#) without the unavailable Data Assets.

## 4.3. Edit an Asset Collection

**Issue:** If you wish to remove or add Data Assets to an Asset Collection, you would like to edit the AC.

**Description:** You cannot edit Asset Collections after you have created them.

**Workaround:** [Delete the Asset Collection](#) the Data Asset belongs to, and [re-create the Asset Collections](#) with new assignments.