

Release Notes

## Release Notes

Date published: 2020-10-30

Date modified: 2022-09-21

# CLOUDEXERA

<https://docs.cloudera.com/>

# Legal Notice

© Cloudera Inc. 2024. All rights reserved.

The documentation is and contains Cloudera proprietary information protected by copyright and other intellectual property rights. No license under copyright or any other intellectual property right is granted herein.

Unless otherwise noted, scripts and sample code are licensed under the Apache License, Version 2.0.

Copyright information for Cloudera software may be found within the documentation accompanying each component in a particular release.

Cloudera software includes software from various open source or other third party projects, and may be released under the Apache Software License 2.0 (“ASLv2”), the Affero General Public License version 3 (AGPLv3), or other license terms. Other software included may be released under the terms of alternative open source licenses. Please review the license and notice files accompanying the software for additional licensing information.

Please visit the Cloudera software product page for more information on Cloudera software. For more information on Cloudera support services, please visit either the Support or Sales page. Feel free to contact us directly to discuss your specific needs.

Cloudera reserves the right to change any products at any time, and without notice. Cloudera assumes no responsibility nor liability arising from the use of products, except as expressly agreed to in writing by Cloudera.

Cloudera, Cloudera Altus, HUE, Impala, Cloudera Impala, and other Cloudera marks are registered or unregistered trademarks 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 CLOUDERA, CLOUDERA DOES NOT MAKE NOR GIVE ANY REPRESENTATION, WARRANTY, NOR COVENANT OF ANY KIND, WHETHER EXPRESS OR IMPLIED, IN CONNECTION WITH CLOUDERA TECHNOLOGY OR RELATED SUPPORT PROVIDED IN CONNECTION THEREWITH. CLOUDERA DOES NOT WARRANT THAT CLOUDERA PRODUCTS NOR SOFTWARE WILL OPERATE UNINTERRUPTED NOR THAT IT WILL BE FREE FROM DEFECTS NOR ERRORS, THAT IT WILL PROTECT YOUR DATA FROM LOSS, CORRUPTION NOR UNAVAILABILITY, NOR THAT IT WILL MEET ALL OF CUSTOMER’S BUSINESS REQUIREMENTS. WITHOUT LIMITING THE FOREGOING, AND TO THE MAXIMUM EXTENT PERMITTED BY APPLICABLE LAW, CLOUDERA 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.

# Contents

<b>What's new in Data Visualization?</b>	<b>4</b>
September 21, 2022	4
June 17, 2022	5
May 12, 2022	5
Older releases	6
May 2, 2022	6
March 3, 2022	7
December 17, 2021 - CVE-2021-44228	9
January 28, 2022	9
December 10, 2021	11
November 8, 2021	11
September 30, 2021	12
August 24, 2021	14
July 30, 2021	15
June 4, 2021	16
April 29, 2021	18
April 7, 2021	18
February 26, 2021	19
February 2, 2021	20
December 15, 2020	21
December 3, 2020	22
October 30, 2020	22
<b>Known issues and limitations in Data Visualization</b>	<b>23</b>

# What's new in Data Visualization?

You can find here a summary of Data Visualization major features and updates. Learn how these new functionalities and improvements benefit you.

## September 21, 2022

**New CML engine:** [docker.repository.cloudera.com/cloudera/cdv/cml-dataviz:6.4.3-b33](https://docker.repository.cloudera.com/cloudera/cdv/cml-dataviz:6.4.3-b33)

**New CDSW engine:** [docker.repository.cloudera.com/cloudera/cdv/cds-dataviz:6.4.3-b33](https://docker.repository.cloudera.com/cloudera/cdv/cds-dataviz:6.4.3-b33)

### New features and improvements

#### VIZ-1295

Cloned dashboard can now be imported.

#### VIZ-1346 & VIZ-1401

Relative date range filters are now respected during snapshots or email jobs.

#### VIZ-1480

Daterange filters can be set to default to the max date rather than a fixed date.

#### VIZ-1519

CSV and Excel downloads will show additional information when download/view fails because of global download row or size limit.

#### VIZ-1543

Dataset field names no longer allow parenthesis to avoid potential issues if used in filters.

### Fixed issues

#### VIZ-1188, VIZ-1600, VIZ-1601 & VIZ-1602

Improved the dataset selector for visuals and filters in the dashboard builder:

- The selected dataset in the filter tab now shows the correct fields and the data connections selector is always enabled.
- The data connections on the filters tab are now alphabetically sorted.
- All edited visuals are now listed as recent visuals in the visuals tab.

#### VIZ-1355 & VIZ-1390

Fixed a bug where a dashboard's filter parameter popup could become stuck if clicked.

#### VIZ-1414 & VIZ-1636

Fixed errors when downloading data as Excel:

- Excel downloads that use results from cache no longer return just the headers and one column of data.
- Downloading fields with date display formats no longer throws an error.

#### VIZ-1526

Fixed a bug where renaming a column in the dataset breaks previously created dashboards using that column as a filter.

#### VIZ-1545 & VIZ-1003

Improved display of the user-added values in filters.

**VIZ-1546 & VIZ-1412**

Direct Access SQL now applies CSV download limits as expected.

**VIZ-1547, VIZ-1345 & VIZ-1622**

Fixed errors with editing and creating scheduled intervals in the Email form.

## June 17, 2022

**New CML engine:** [docker.repository.cloudera.com/cloudera/cdv/cml-dataviz:6.4.2-b13](https://docker.repository.cloudera.com/cloudera/cdv/cml-dataviz:6.4.2-b13)

**New CDSW engine:** [docker.repository.cloudera.com/cloudera/cdv/cdsw-dataviz:6.4.2-b13](https://docker.repository.cloudera.com/cloudera/cdv/cdsw-dataviz:6.4.2-b13)

### New features and improvements

**VIZ-913**

Improvements for handling complex types in Impala queries.

**VIZ-1103**

The Reset Filter button in a dashboard now clears the filter widget search value and results.

**VIZ-1286**

The Recent Connections carousel on the CDV homepage now shows the most recently used data connections, rather than those that were recently created.

**VIZ-1374**

Admins now have greater insight into affected users and dashboards when deleting a dataset.

### Fixed issues

**VIZ-1034 & VIZ-1203**

Fixed a bug where opening a new tab in an embedded CDV application could result in unexpected behavior.

**VIZ-1187**

Total Row for Column Totals should now show in Crosstab visuals with multiple measures as expected.

**VIZ-1214 & VIZ-1380**

Fixed a bug where large Excel or CSV download files from streaming connection types could fail with a memory error.

**VIZ-1413**

Filters containing null values should no longer display an error message when searching within the filter options.

## May 12, 2022

**New CML engine:** [docker.repository.cloudera.com/cloudera/cdv/cml-dataviz:6.4.1-b7](https://docker.repository.cloudera.com/cloudera/cdv/cml-dataviz:6.4.1-b7)

**New CDSW engine:** [docker.repository.cloudera.com/cloudera/cdv/cdsw-dataviz:6.4.1-b7](https://docker.repository.cloudera.com/cloudera/cdv/cdsw-dataviz:6.4.1-b7)

### Security fixes and improvements

**VIZ-1340**

Fixed critical and high Python and npm package vulnerability findings in Cloudera Data Visualization (CDV).

The following critical vulnerabilities have been fixed:

- CVE-2022-24303
- CVE-2022-28346
- CVE-2022-28347
- CVE-2022-22817

### New features and improvements

#### VIZ-1185

Rows fetched for this visual have been limited automatically and invalid values are skipped warnings are now hidden in View mode by default.

### Fixed issues

#### VIZ-1350

Fixed a bug where uploading a CSV file to a data connection could result in an unexpected error.

## Older releases

Overview of new features, enhancements, and changed behavior introduced in earlier releases of Data Visualization.

### May 2, 2022

**New CML engine:** [docker.repository.cloudera.com/cloudera/cdv/cml-dataviz:6.4.0-b12](https://docker.repository.cloudera.com/cloudera/cdv/cml-dataviz:6.4.0-b12)

**New CDSW engine:** [docker.repository.cloudera.com/cloudera/cdv/cdsw-dataviz:6.4.0-b12](https://docker.repository.cloudera.com/cloudera/cdv/cdsw-dataviz:6.4.0-b12)

### Security fixes and improvements

#### VIZ-1161

Fixed critical and high Python and npm package vulnerability findings in CDV 6.3.6-b44. The following critical vulnerabilities have been fixed:

- CVE-2022-22817
- CVE-2022-24303
- CVE-2013-7459
- CVE-2022-28347
- CVE-2022-28346
- CVE-2022-22815

#### VIZ-1213

Update CDSW engine image to version 16 to get the latest Log4J2.x patches. This issue does not directly impact CDV. It is related to the version of Scala used in earlier versions of the base CDSW image.

### New features and improvements

#### VIZ-447, VIZ-1260, VIZ-815, and VIZ-1116

Extended SAML authentication with CDP Group syncing for CDW and fixed a backwards-compatibility issue with legacy SAML backends. Additionally, user permissions are now fully managed by CDP Groups for CDW deployments.

#### VIZ-1154 and VIZ-1175

Updated the Machine Learning Runtime version of CDV to support additional metadata stores.

**VIZ-1184**

Users can now clone a dashboard from View mode.

**VIZ-1220 and VIZ-1228**

It is now easier to upload files including images, fonts, and JavaScript packages for use in custom styles, emails, or rich text visuals.

**VIZ-1166 and VIZ-1180**

Direct access to data through SQL is now available on additional connection types, and to make using the query editor easier, users can send a query with cmd + enter keyboard shortcut.

**VIZ-1288**

Users can now move a variety of 'picklist' filter types to the dashboard canvas.

**VIZ-1173**

A new site setting is available, which disables descendant information for dashboards for CDV instances that wish to optimize Data tab performance.

**VIZ-1174, VIZ-132, and VIZ-1255**

Other performance improvements and optimizations.

**Fixed issues****VIZ-732**

Fixed a bug where a filter widget's dropdown menu appears behind other page elements in View mode.

**VIZ-1182**

Deleting users via Users/Groups page should now work as expected for CDV instances using a MySQL metadata store.

**VIZ-1183**

Fixed a bug where backend Excel and CSV downloads could fail with "Unknown String Format" error.

**VIZ-1264**

Fixed a bug where a dashboard's URL failed to retain certain filter values or the dashboard default filters overrode the URL values.

**VIZ-1106**

Fixed a bug where internal naming of connection types was visible in Historical Logs.

**VIZ-1270**

Changing and deleting roles from the Manage Roles page should now work as expected.

**VIZ-1283**

Fixed a bug where some users might see a Javascript error on applications that contain dashboards with multiple sheets.

**March 3, 2022**

**New CML engine:** [docker.repository.cloudera.com/cloudera/cdv/cml-dataviz:6.3.7-b38](https://docker.repository.cloudera.com/cloudera/cdv/cml-dataviz:6.3.7-b38)

**New CDSW engine:** [docker.repository.cloudera.com/cloudera/cdv/cdsw-dataviz:6.3.7-b38](https://docker.repository.cloudera.com/cloudera/cdv/cdsw-dataviz:6.3.7-b38)

**New features and improvements****VIZ-503**

This release introduces an improvement to searching for specific values in a filter, and a loading icon will be displayed when the search is not yet complete.

**VIZ-694**

Aggregate Display was renamed to Calculated Display, and introduced better difference calculating logic.

**VIZ-720**

The SQL editor now includes line numbers, for easier debugging of queries.

**VIZ-785**

This release adds proxy username and attribute settings in Impyla based connectors (Hive, Impala, Arcengine V2).

**VIZ-881**

The field statistics visual is improved for Hive connections.

**VIZ-997**

Downloading a crosstab visual as an Excel file should now display data in the same way it appears in the UI.

**VIZ-1018**

Performance improvements for visual and report metadata queries.

**VIZ-1065**

Data model now prompts a reload of preview data after changes in dataset.

**Fixed issues****VIZ-681**

The context menu now appears as expected within timeline visuals.

**VIZ-682, VIZ-1108, and VIZ-1127**

Tooltips in the Show Usage Info menu now clear when closing the modal, and the Queries tab should refresh as expected.

**VIZ-793**

Formatting for a dataset description is now preserved in View mode.

**VIZ-875**

Fixed a bug where refreshing the page or going to Edit mode in a multi-tab dashboard caused the user to be navigated from current tab to first tab.

**VIZ-921**

Fixed a bug where font size did not adjust as expected on the list visual.

**VIZ-956**

Fixed a bug where deleting derived data - calculated fields saved to report did not work as expected.

**VIZ-1049**

Fixed a bug where filter results returned unsorted on Impala connection types.

**VIZ-1070**

Fixed arcapi.sendParameters interaction with dataset-scope filters.

**VIZ-1077, and VIZ-1129**

Fixed a bug where users may have seen a schedule group error in the job edit modal, and added a warning for users that might be creating a duplicate schedule group.

**VIZ-1097**

Users can now have unfixed colors for dimensions as expected.



**VIZ-1104**

Search option is limited to only appear on the action visual if Search is enabled on the dataset.

**VIZ-1128**

Fixed a bug where database migrations could fail with Oracle: ORA-00910: specified length too long for its datatype.

**VIZ-1151**

Fixed a bug where adding a dimension to the color shelf of a line visual resulted in an unexpected error.

**VIZ-1158**

Home page now longer shows EDIT button when set to a custom dashboard.

## December 17, 2021 - CVE-2021-44228

### New CML engine: [docker.repository.cloudera.com/cloudera/cdv/cml-dataviz:6.3.5-b5](https://docker.repository.cloudera.com/cloudera/cdv/cml-dataviz:6.3.5-b5)

Cloudera released a new version of CDP Data Visualization (CDV). This new version addresses CVE-2021-44228 which affects products using Apache Log4j2 versions 2.0 through 2.14.1.

CDV is not written in Java and therefore is not vulnerable. However, as the custom CDP Data Visualization engine is built upon a CML engine, it has been updated to the newly released version of the CML engine that removes the vulnerability reported in CVE-2021-44228. For more information about the new CML engine, see [CVE-2021-44228 Remediation for CML Data Service](#).

If you use CDV with Cloudera Machine Learning, update your CML engine to the latest version, which includes fixes for the log4j2 security vulnerability in CML. After updating the engine to the latest version, running CDV instances (applications) should be restarted.

If you use CDV with Cloudera Data Science Workbench, no action is required.

## January 28, 2022

### New CML engine: [docker.repository.cloudera.com/cloudera/cdv/cml-dataviz:6.3.6-b44](https://docker.repository.cloudera.com/cloudera/cdv/cml-dataviz:6.3.6-b44)

### New CDSW engine: [docker.repository.cloudera.com/cloudera/cdv/cdsw-dataviz:6.3.6-b44](https://docker.repository.cloudera.com/cloudera/cdv/cdsw-dataviz:6.3.6-b44)

### New features and improvements

**VIZ-299**

A more robust selection of default display formats specific to currencies is now available under the Currency category in the Display Format modal.

**VIZ-345**

The line, combined bar/line, and grouped bar visuals now support independent minimum and maximum aggregate scales for primary and secondary axes.

**VIZ-622 and VIZ-941**

Threshold-based email jobs can now be configured from applications, and the parameters of a previously-scheduled job can now be modified without re-creating the job.

**VIZ-631**

Query history is now accessible from the CDV HOME tab with a new Queries tile.

**VIZ-741**

The DATA overview page now displays the number of dashboards associated with each dataset.

**VIZ-776**

Historical logs under Usage Info now show Visual, Dashboard, Dataset, Connection, State, and Query information where applicable.

**VIZ-811**

Visibility into the queries behind each visual has been added to the Data Detail menu in a new Queries tab.

**VIZ-839**

The results of a query can be downloaded as a CSV file with a specified number of rows from the Direct Access view.

**VIZ-905**

It is now possible to create multiple job run schedule groups with the same interval.

**VIZ-911**

Table and crosstab visuals with pagination now offer the option to show intermediary totals for the page displayed.

**VIZ-1015**

A link has been added to the Cloudera Support Hub directly from the CDV Help menu, with the ability to customize this to link to any chosen URL.

**Fixed issues****VIZ-940 and VIZ-1033**

LDAP authentication backend has been updated and should now perform better in instances where large LDAP groups are queried.

**VIZ-946**

Visual menu options to create tables or datasets on Hive connections display correctly.

**VIZ-959**

Fixed a bug where dimensions added to shelves via dragging were not persisted unless visual is refreshed or saved.

**VIZ-962**

The expression validator on Impala datasets created from SQL will no longer show syntax error when there is not one.

**VIZ-976**

CDV instances using Kerberos authentication and running the ML Runtime version should no longer encounter SASL issues when opening a dashboard.

**VIZ-979**

An expression will now be saved as expected in Edit mode without visual refresh.

**VIZ-989**

Fixed width visual sizing and column dimension value wrapping options now appear as expected for the crosstab visual type.

**VIZ-1013**

The crosstab visual's totals row now attaches to the bottom of the visual as expected and should not extend beyond the table.

**VIZ-1005, VIZ-1006, and VIZ-1047**

Fixed a bug where sorting a table or changing column width in Connection Explorer or Data Detail tables caused the table to disappear from the page.

**VIZ-1010 and VIZ-1032**

Resolved an issue where CDV instances with Oracle metadata backend connections encountered unexpected issues after upgrade.

**VIZ-1050**

Fixed a bug where date parameters were not saved when opening a dashboard from URL.

**December 10, 2021**

**New CML engine:** [docker.repository.cloudera.com/cloudera/cdv/cml-dataviz:6.3.4-b13](https://docker.repository.cloudera.com/cloudera/cdv/cml-dataviz:6.3.4-b13)

**New CDSW engine:** [docker.repository.cloudera.com/cloudera/cdv/cds-dataviz:6.3.4-b13](https://docker.repository.cloudera.com/cloudera/cdv/cds-dataviz:6.3.4-b13)

**New features and improvements****VIZ-810**

When adding a filter shelf to a visual, it is now possible to add and edit a custom filter expression directly from the filter modal.

**VIZ-896**

Cross Tabulation, Row Listing, and Table visuals now use a default number format with comma separators if a display format is not specified.

**VIZ-917**

Dashboard snapshot timeouts are now configurable by using an advanced site setting flag.

**VIZ-925**

The Dataset ID is now shown for each dataset listed on the Dataset overview page.

**Fixed issues****VIZ-436**

Dashboard-level settings for showing detail data in context menu now work as expected.

**VIZ-915**

Fixed a bug where dashboard titles could appear editable in view mode.

**VIZ-916**

Dashboard reset after drill-into now refreshes the dashboard as expected.

**VIZ-952**

Fixed a bug where setting the default homepage for all users as an admin user failed to save.

**VIZ-986**

Fixed a bug where importing a dashboard and running a data table compatibility check resulted in an unexpected error.

**November 8, 2021**

**New CML engine:** [docker.repository.cloudera.com/cloudera/cdv/cml-dataviz:6.3.3-b43](https://docker.repository.cloudera.com/cloudera/cdv/cml-dataviz:6.3.3-b43)

**New CDSW engine:** [docker.repository.cloudera.com/cloudera/cdv/cds-dataviz:6.3.3-b43](https://docker.repository.cloudera.com/cloudera/cdv/cds-dataviz:6.3.3-b43)

**New features and improvements****VIZ-475**

Checking dataset compatibility when importing a dataset from SQL is now possible.

**VIZ-612**

Including or excluding a data point from a visual now shows a confirmation message prior to visual refresh.

**VIZ-680, VIZ-745, VIZ-877 and VIZ-878**

Several improvements have been implemented for the Timeline visual type, including adding default x-axis formatting, easier display format selection, and the option to add a legend.

**VIZ-721**

You can now use the EDIT button on the dataset field tile to streamline the dataset editing process.

**VIZ-750**

When configuring custom site settings, errors encountered in the startup process are now logged and bypassed instead of blocking the startup, to allow for easier debugging.

**VIZ-847**

Configuring a visual's click behavior is now easier with new context menu options available in build mode.

**VIZ-908**

Job logs can now be filtered by job type and status.

**Fixed issues****VIZ-385**

Fixed a bug where only one column was shown for large tables in Sample Data inside the Connection Explorer.

**VIZ-414, VIZ-862**

Table fields with varchar, large, or irregular characters in comments are now parsed properly during dataset creation.

**VIZ-696, VIZ-901**

Other bug fixes and UI improvements.

**VIZ-732**

Fixed a bug where the menu for an on-dashboard filter could appear behind the visual.

**VIZ-859, VIZ-860**

Fixed data connection modal bugs where multiple empty parameter rows could be added, or non-numeric values could be saved in fields where they could cause errors.

**VIZ-876**

Downloaded Detail Data from a visual is now filtered as expected.

**VIZ-942**

Fixed a bug where CDV instances using a MySQL metadata store could see an error while upgrading.

**September 30, 2021**

**New CML engine:** [docker.repository.cloudera.com/cloudera/cdv/cml-dataviz:6.3.2-b29](https://docker.repository.cloudera.com/cloudera/cdv/cml-dataviz:6.3.2-b29)

**New CDSW engine:** [docker.repository.cloudera.com/cloudera/cdv/cdsw-dataviz:6.3.2-b29](https://docker.repository.cloudera.com/cloudera/cdv/cdsw-dataviz:6.3.2-b29)

**New features and improvements****VIZ-398**

A new style setting allows the user to change the font weight of row and column summaries. Data summary settings have also been moved into their own subsection for better discoverability.

**VIZ-473**

Dashboards created for the purpose of threshold-triggered jobs are now editable.

**VIZ-713**

It is now possible to chain multiple conditions for threshold based emails.

**VIZ-689, VIZ-848, VIZ-861, VIZ-880, VIZ-897**

Additional UI and usability improvements.

**VIZ-234, VIZ-641, VIZ-835**

Other security fixes and improvements.

**Fixed issues**

**VIZ-99 & VIZ-304**

Users with first names or last names longer than 30 characters can now be created as expected.

**VIZ-316**

Downloads of SQL visual types now inherit global limit settings from Site Settings as expected.

**VIZ-384 & VIZ-886**

Fixed a bug where CSV or Excel download could apply an unwanted default display format to some columns, or fail to show a display format that had been added.

**VIZ-418**

Fixed a bug where infinity or NaN values in Impala caused an error.

**VIZ-545**

PDF or PNG downloads for slow-loading dashboards now display fully rendered visuals rather than progress bar icons.

**VIZ-693**

Fixed a bug where a label on a scatter visual would be hidden while hovering.

**VIZ-714**

The create threshold functionality in the email jobs modal now works as expected.

**VIZ-722**

Highlighting elements by hovering over legend items now works as expected.

**VIZ-724**

The visual setting option to hover over a dimension and show each point with that dimensional value functionality now works as expected.

**VIZ-747**

Using an image in an Action visual now works as expected.

**VIZ-757**

Fixed a bug where time control in a dashboard's filter bar was not removable once added to dashboard.

**VIZ-784 & VIZ 808**

Display formats should now appear as expected in Grouped Bar and Row Listing visuals.

**VIZ-790**

Dimension color palettes now accept typed-in choices when configuring background colors for Table and Cross Tabulation visuals.

**VIZ-804**

Fixed a bug where rearranging elements in Heatmap visual shelves was not saved as expected.

**VIZ-832**

Email jobs with send limits greater than once per day should now be triggered as expected.

**VIZ-857**

Default date formatting on x-axis of bar visuals should now work as expected.

**VIZ-885**

Setting CSV download locale in the dashboard and visual settings now works as expected.

**VIZ-891**

Fixed a bug where LDAP Mirror Groups did not work as expected in version 6.3.1.

## August 24, 2021

**New CML engine:** [docker.repository.cloudera.com/cloudera/cdv/cml-dataviz:6.3.1-b27](https://docker.repository.cloudera.com/cloudera/cdv/cml-dataviz:6.3.1-b27)

**New CDSW engine:** [docker.repository.cloudera.com/cloudera/cdv/cds-dataviz:6.3.1-b27](https://docker.repository.cloudera.com/cloudera/cdv/cds-dataviz:6.3.1-b27)

### New features and improvements

**VIZ-383**

Display formats are now applied as expected on CSV and XLS downloads when the data connection type is Impala or Arcadia.

**VIZ-434**

You can drill-into your data from the context menu to discover more granular information for a particular data point by examining other dimensions of your data.

**VIZ-647**

New icons have been added to the username display based on user type — an asterisk appears for admin users and a checkmark appears for LDAP/SSO-signed users.

**VIZ-700**

Usability improvements have been implemented to the dashboard builder sidebar.

**VIZ-719**

The full dataset name can now be viewed on hover in dashboard builder menus.

**VIZ-736**

You can now save a segment from a filter definition of a visual.

**VIZ-770**

Creating and editing HTML extension visuals is now easier with syntax highlighting, autocompletion, and side-by-side preview.

**VIZ-773**

Additional details on job parameters, including trigger conditionals and active states can now be viewed from the Job Status page.

### Fixed issues

**VIZ-666**

Fixed a bug where a filter's 'Maximum number of rows to fetch' setting unexpectedly affected the filter limit.

**VIZ-667**

Filters with a slide range selector now allow for precise selection of range values.

**VIZ-691**

Dashboards with multiple filters that are linked and given app scope now properly apply across all sheets.

**VIZ-759**

Fixed a bug where the relative dates timestamp filter reset upon switching between sheets of a dashboard.

**VIZ-796**

Fixed a bug where the Direct Access SQL editor applied the default limit even when the user specified a different value.

**VIZ-820**

Fixed a bug where changes in the Edit User modal could not be saved without retyping the current user password.

**July 30, 2021**

**New CML engine:** [docker.repository.cloudera.com/cloudera/cdv/cml-dataviz:6.3.0-b53](https://docker.repository.cloudera.com/cloudera/cdv/cml-dataviz:6.3.0-b53)

**New CDSW engine:** [docker.repository.cloudera.com/cloudera/cdv/cdsw-dataviz:6.3.0-b53](https://docker.repository.cloudera.com/cloudera/cdv/cdsw-dataviz:6.3.0-b53)

**New features****VIZ-367, VIZ-715 - Data Visualization as Machine Learning Runtime**

Data Visualization is available as a Machine Learning Runtime for Cloudera Machine Learning (CML) on CDP. For more information, see the [ML runtime documentation](#).

**VIZ-619 - Natural Language Search**

Natural Language Search (NLS) is now generally available. You can speed up visual creation and data analysis insights by enabling search-based data exploration. For more information, see the [NLS documentation](#).

**VIZ-639 - SSB data connection [Tech Preview]**

A new data connection type is available in technical preview: you can connect to SQL Stream Builder (SSB), an integrated job management interface. SSB is a part of Cloudera Streaming Analytics powered by Apache Flink. For more information on SSB, see the [Introduction to SQL Stream Builder](#).

**Improvements****VIZ-278**

Improvements have been implemented for table expansion and sorting within an expanded table column.

**VIZ-359**

You can export all columns in CSV without selecting or forcing maximum column display to fit the entire column list.

**VIZ-452**

If you use the default credentials to login to Data Visualization, you will be prompted to change your password at the first login.

**VIZ-454**

Editing an HTML Extension visual is now easier with a larger modal.

**VIZ-491**

If you use Oracle metadata connections, you can now configure to connect using a Service Name.

**VIZ-549**

If you have dashboard editing permissions, you can view the clone history of a dashboard in the Usage Info menu.

**VIZ-621, VIZ-623, VIZ-687**

Multiple improvements have been implemented for email jobs, including the ability to configure a job to send only on the first trigger, XLS attachment options, and the ability to include a message along an embedded image sent via email.

**VIZ-640**

Views are shown along with tables on PostgreSQL connections in the Connection Explorer.

**VIZ-668**

If you are an admin user, you can access the Daily Usage metrics page by clicking through the view count on the Data Visualization homepage.

**VIZ-683**

You can select any specific color from a color palette as the default or starting color for a visual.

**VIZ-710**

Improvements have been implemented for migrations on mySQL metadata connections.

**Fixed issues****VIZ-343**

Fixed a bug where the table expansion tooltip displayed HTML elements when you selected 'Send all fields as parameters'.

**VIZ-361**

Refreshing an External Link visual now works as expected.

**VIZ-495**

Enabling highlighting on table visuals using a Solr connection now works as expected.

**VIZ-528**

Fixed a bug where the 'Download As' options were hidden under the neighboring menu.

**VIZ-548**

Fixed a bug where the Direct Access SQL editor may run queries as lowercase.

**VIZ-650**

Date and Time Functions on Hive connections now work as expected.

**VIZ-651**

Fixed a bug where casting a field resulted in any custom expression getting overwritten.

**VIZ-662**

Users may now copy the job status error text by clicking on the error icon.

**VIZ-664**

Fixed a bug where crosstab download limits did not apply as expected for CSV downloads.

**VIZ-673, VIZ-674**

The Custom Styles page now shows dashboards and applications that use custom CSS, not just visuals.

**VIZ-690**

The 'Set as Homepage' option is now visible from dashboards but not individual visuals.

**VIZ-717**

Fixed a bug where sorting on a Y-trellis did not work as expected.

**VIZ-753**

Fixed a bug where Custom Styles failed to load on the Manage Custom Styles page as expected.

**June 4, 2021**



**New CML engine:** [docker.repository.cloudera.com/cloudera/cdv/cml-dataviz:6.2.7-b48](https://docker.repository.cloudera.com/cloudera/cdv/cml-dataviz:6.2.7-b48)

**New CDSW engine:** [docker.repository.cloudera.com/cloudera/cdv/cdsw-dataviz:6.2.7-b48](https://docker.repository.cloudera.com/cloudera/cdv/cdsw-dataviz:6.2.7-b48)

### New features and improvements

#### VIZ-84

CDP Data Visualization applications running in CML can be configured with unauthenticated access.

#### VIZ-433

When configuring email jobs, you can specify a reply-to email address that is different from the sender's email address.

#### VIZ-464

Users with manage users and roles permissions can now assign roles as expected.

#### VIZ-484

You can toggle between filter types when creating a filter for a date or for a numeric field.

#### VIZ-552

Field comments are shown by default when viewing a dataset.

### Fixed issues

#### VIZ-147

The Solr connection type no longer permits expression creation that may cause visual failure.

#### VIZ-358

Fixed a bug where the use of advanced site settings along with a non-default metastore resulted in an unexpected error.

#### VIZ-465

Disabled legacy connection types by default, which had bugs that could result in an unexpected connection error.

#### VIZ-469

Smart acceleration now works as expected on the Arcadia connection type when the environmental variable `ENABLE_LEGACY_DATACONN` is set to true.

#### VIZ-542

Fixed a bug where visual titles did not substitute the correct parameter in edit mode.

#### VIZ-563

In-product help text is now shown as expected when building a list visual.

#### VIZ-605

Fixed a bug where the scrollbar in an application's navigation bar did not appear as expected on narrow screens.

#### VIZ-606

The Search button in an application's navigation bar now appears as expected on narrow screens.

#### VIZ-632

Area graphs that contain a date range now draw as expected.

#### VIZ-636

Fixed a bug where editing a shelf element's expression may have resulted in an unexpected error.

#### VIZ-637

Editing an email job without an attachment now works as expected.

## April 29, 2021

**New CML engine:** [docker.repository.cloudera.com/cloudera/cdv/cml-dataviz:6.2.6-b23](https://docker.repository.cloudera.com/cloudera/cdv/cml-dataviz:6.2.6-b23)

**New CDSW engine:** [docker.repository.cloudera.com/cloudera/cdv/cdsw-dataviz:6.2.6-b23](https://docker.repository.cloudera.com/cloudera/cdv/cdsw-dataviz:6.2.6-b23)

### New feature

#### **VIZ-152 – Single sign-on in CDW**

Single sign-on (SSO) is now enabled for Cloudera Data Visualization (CDV) applications running in Cloudera Data Warehouse (CDW). For more information, see [Start Data Visualization in CDW](#).

### Improvements

#### **VIZ-389**

Numerous bug fixes and improvements for Natural Language Search [Tech Preview] functionality.

#### **VIZ-424**

Timestamp columns are now auto-recognized in Druid data connections.

#### **VIZ-461, VIZ-532**

Improvements for threshold job creation.

#### **VIZ-472**

Improvements to sample dashboards that ship with CDV by default.

#### **VIZ-597**

Improvements for displaying dashboards on smaller screens.

### Fixed issues

#### **VIZ-353**

For Hive and Impala connections, CDV can now pass down an application ID in opened sessions for better visibility and auditing into query workloads.

#### **VIZ-422, VIZ-457**

Error messages now appear as expected if a CSV/Excel download fails to complete.

#### **VIZ-474**

Fixed a bug where importing a dataset from SQL could result in an unexpected error.

#### **VIZ-483**

Fixed a bug where the Ignore missing dates setting did not work as expected on line and area charts.

#### **VIZ-529**

The Refresh button now appears only on data connections where this query is supported.

#### **VIZ-541, VIZ-543**

Fixed a regression from CDV 6.2.5 where visual context menu items did not react as expected.

#### **VIZ-557**

Admins can now update their own user profiles through Site Settings as expected.

#### **VIZ-562**

Fixed a bug where the PostgreSQL data connection settings did not save as expected.

## April 7, 2021

**New CML engine:** [docker.repository.cloudera.com/cloudera/cdv/cmldataviz:6.2.5-b25](https://docker.repository.cloudera.com/cloudera/cdv/cmldataviz:6.2.5-b25)

**New CDSW engine:** [docker.repository.cloudera.com/cloudera/cdv/cdswdataviz:6.2.5-b25](https://docker.repository.cloudera.com/cloudera/cdv/cdswdataviz:6.2.5-b25)

### New features

#### **VIZ-388 – Natural language search**

[Tech Preview] Use natural language search to find relevant information in your datasets through natural language statements, and render it in graphical format.

#### **VIZ-468 – Account lockout**

You can enable lockout after too many failed login attempts by adding `AXES\_ENABLED` to the advanced site settings in CML or CDSW. This feature is disabled by default.

### Improvements

#### **VIZ-145**

Improved Solr aggregation and faceting.

### Fixed issues

#### **VIZ-362, VIZ-420, VIZ-533**

Fixed bugs for CSV and Excel downloads.

#### **VIZ-387**

Error message popovers now close when clicking elsewhere on the page as expected.

#### **VIZ-408**

Expansion on crosstab visuals now works as expected.

#### **VIZ-415**

Changing values on a custom picklist filter in dashboard mode now works as expected.

#### **VIZ-419**

Fixed a bug where filters on an Arcengine connection did not reset after unselecting.

#### **VIZ-437**

Enable "Download as Image/PDF" switch in dashboard settings now works as expected.

#### **VIZ-486**

Dashboards created from Arcengine connections can now be accelerated as expected.

#### **VIZ-498**

Changing colors in a scatter visual now redraws the visual as expected.

## February 26, 2021

**New CML engine:** [docker.repository.cloudera.com/cloudera/cdv/cmldataviz:6.2.4-b16](https://docker.repository.cloudera.com/cloudera/cdv/cmldataviz:6.2.4-b16)

**New CDSW engine:** [docker.repository.cloudera.com/cloudera/cdv/cdswdataviz:6.2.4-b16](https://docker.repository.cloudera.com/cloudera/cdv/cdswdataviz:6.2.4-b16)

### New feature

#### **VIZ-72 – Job scheduling and customization**

Email jobs can now be customized or changed post-creation, making it easy to change the send schedule, add additional recipients, or update the messaging to accompany a dashboard.

### Usability improvements

#### **VIZ-350, VIZ-406**

Options that are not available on particular data connections are now hidden as expected.

**VIZ-380**

New Apply Display Format checkbox in the Data Model tab applies selected display formats to the shown data.

**VIZ-407**

Improvement to Oracle metadata database support.

**VIZ-413**

Autocomplete options in expression editor now includes ML Model API.

**Fixed issues****VIZ-180**

Importing access to Private workspaces when Public workspace access is disabled now works as expected.

**VIZ-316**

SQL Visual limits are now inherited from global limits and table limits as expected.

**VIZ-323**

Fixed a bug where PDF download of a dashboard that had not loaded fully resulted in impartial PDF download.

**VIZ\_335**

PDF downloads of dashboards with multiple sheets now work as expected.

**VIZ\_344**

Combo charts now allow for more granular control of aggregate axis size.

**VIZ-378**

Large Excel or CSV downloads that fail to complete are removed from temporary files.

**VIZ-379**

SQL Visuals downloaded as Excel should now work as expected.

**VIZ-412**

Fixed a bug where Show Selected and Show All in filter list selection did not work as expected.

**VIZ-425**

Fixed a bug where setting visual\_max\_dataresults in Site Settings could result in query failure.

**VIZ-432**

Improved horizontal scrolling on dashboards with multiple sheets.

**February 2, 2021**

**New CML engine:** [docker.repository.cloudera.com/cloudera/cdv/cml-dataviz:6.2.3-b18](https://docker.repository.cloudera.com/cloudera/cdv/cml-dataviz:6.2.3-b18)

**New CDSW engine:** [docker.repository.cloudera.com/cloudera/cdv/cdsw-dataviz:6.2.3-b18](https://docker.repository.cloudera.com/cloudera/cdv/cdsw-dataviz:6.2.3-b18)

**New features and improvements****VIZ-317**

Applications can now be configured to always display the dashboard titles within a tab.

**VIZ-330**

Additional in-product documentation has been included in the New Data Connection and Edit Data Connection modals.

**VIZ-349**

Refreshing a dataset cache now correctly logs the user and timestamp for when the cache was refreshed.

**VIZ-358**

Added support for Oracle metadata databases in CDSW Data Visualization instances.

**VIZ-376**

Make it easy to configure external metadata store with env variables for CDV in CDSW & CML.

**VIZ-382**

Added support for connecting to legacy ArcEngine databases from Data Visualization.

**Fixed issues****VIZ-122**

Fixed a bug where using custom aggregates resulted in an error.

**VIZ-245**

Display formats are now applied as expected in csv/xls downloads.

**VIZ-263**

Fixed a bug where a timestamp value could display differently on a dashboard than in an Excel download.

**VIZ-351**

Aggregates and functions in Impala and Hive connection types now work as expected.

**VIZ-363**

Sample mode is now hidden for unsupported connections.

**VIZ-377**

Fixed a bug where migration to Data Visualization from legacy product could result in a workspace error.

**VIZ-386, VIZ-400**

Searching within a filter and making multiple selections now works as expected.

**VIZ-411**

Threshold-based jobs now work as expected.

**December 15, 2020**

**New CML engine:** [docker.repository.cloudera.com/cloudera/cdv/cml-dataviz:6.2.2-b383](https://docker.repository.cloudera.com/cloudera/cdv/cml-dataviz:6.2.2-b383)

**New CDSW engine:** [docker.repository.cloudera.com/cloudera/cdv/cdsw-dataviz:6.2.2-b383](https://docker.repository.cloudera.com/cloudera/cdv/cdsw-dataviz:6.2.2-b383)

**Fixed issues****VIZ-229**

Frequent CML/CDSW ping requests are now filtered out from Webserver logs to increase log readability.

**VIZ-239, VIZ-337**

Apps without a thumbnail image now display a placeholder as expected.

**VIZ-296**

Advanced settings are now disabled by default in CDW versions of CDV.

**VIZ-341**

Fixed a bug that prevented attaching CSV files to emailed dashboards.

**VIZ-342**

Fixed a bug where crosstab sort buttons failed after scrolling on a visual.

**VIZ-346**

Linked visuals must now be edited on their original dashboards, to prevent inadvertent breakage on a dashboard.

## December 3, 2020

**New CML engine:** [docker.repository.cloudera.com/cloudera/cdv/cml-dataviz:6.2.1-b12](https://docker.repository.cloudera.com/cloudera/cdv/cml-dataviz:6.2.1-b12)

**New CDSW engine:** [docker.repository.cloudera.com/cloudera/cdv/cds-dataviz:6.2.1-b12](https://docker.repository.cloudera.com/cloudera/cdv/cds-dataviz:6.2.1-b12)

### New features and improvements

CDP Data Visualization applications running in Cloudera Machine Learning released on November 23, 2020 or later can permit SSO authentication in admin settings.

### Fixed issues

**VIZ-322**

Changing cache settings no longer causes the data connection type to unset itself.

**VIZ-321**

Fixed a bug that prevented some users from downloading a visual as a csv or Excel.

**VIZ-329**

Fixed a bug that displayed an error message when importing visual artifacts to a private workspace.

**VIZ-328**

Data Compatibility check when importing visual artifacts now works as expected.

**VIZ-286, VIZ-295, VIZ-298**

The correct version number and product name now display in all Data Visualization applications.

**VIZ-137**

Fixed a bug that caused expansion field values to throw an error when clicking Show Detailed Data or when including/excluding the value as a filter on click.

**VIZ-320**

Dashboard filter parameters now load as intended when sharing a dashboard via URL.

**VIZ-310**

SQL Visual Download CSV options now work as intended.

**VIZ-326**

Save as Table or Dataset functionality no longer displays an error message on Impala connections.

**VIZ-270**

Provided further in-product instructions for admin settings that can accommodate multiple inputs.

## October 30, 2020

This marks the General Availability (GA) of the first CDP Data Visualization release. Data Visualization, the latest Cloudera feature built into the CDP platform can be accessed through Cloudera Data Warehouse (CDW) and Cloudera Machine Learning (CML) in the Public Cloud. It can also be accessed on-prem in CDSW.

It allows data engineers, data scientists, business analysts, and business users to quickly and easily explore data, collaborate, act on, and communicate explainable insights across the data lifecycle.

Fully integrated with CDW, CML, and CDSW, CDP Data Visualization (CDV) provides self-service and drag-and-drop visualization from both enterprise data and predictive models natively in CDP.

CDV enables:

- Fast, intelligent reporting – Rapid, out-of-the-box dashboarding and application building with built-in visual recommendations
- Intuitive workflows, secured by SDX – Easy-to-use visual UI for fast data exploration and instant sharing anywhere without moving data or creating silos
- Integrated data lifecycle collaboration – Accelerate insight sharing with a consistent, integrated data visualization experience across all data and business teams

## Known issues and limitations in Data Visualization

You can review the list of known issues and limitations that you might experience while using CDP Data Visualization.

You can find here more information about the areas of impact and possible workarounds.

### CSV & Excel download results in a file with headers only

If you only see headers when downloading CSV and Excel files using legacy Arcengine, Impala, or Hive connections, you should switch to non-legacy connections.

If you have questions regarding this issue, contact Cloudera Support by logging a case on our [Support Portal](#).

Cloudera issue: VIZ-1555

### Saved value does not show properly when arcapi is present

After the fix included for VIZ-1070, a known issue still exists when using `arcapi.sendParameters` with app-scope filters.

Cloudera issue: VIZ-1181

### Picklist in complex data types Show Selected unselects previous selections

Show selected in a filter list selection may not show all selections depending on the data type. A fix is expected in a future release.

Cloudera issue: VIZ-456

### CANCEL button on Edit User or New User modal needs to be clicked twice

Clicking the CANCEL button in the Edit User or New User modals may display an unexpected validation error instead of closing the modal. This can be bypassed by clicking CANCEL a second time. A fix is expected in a future release.

Cloudera issue: VIZ-829

### Inconsistent support for non-roman or character-based alphabets across visual types

Non-romanized or character-based alphabets are not consistently supported across various visual types. If not supported, the affected visual is not properly rendered.

Cloudera issue: VIZ-984

**Excel or streaming CSV download error for Boolean data types**

When the Number of rows downloaded during CSV/Excel export and Detailed Data setting is applied for Excel downloads (all connections) or CSV downloads (Impala/Hive connections), Boolean data types will cause download error. Cast the Boolean data as a string.