Delphix October/ November 2020 Release

Several new features were made available in October and November 2020. These features significantly enhance data accessibility in Data Control Tower (formerly branded as "Central Management"), improve masking performance, and simplify the upgrade process. We also progressed against our goal of supporting customers wherever their data resides, with several new certifications and virtualization plugin updates.

High-Level Update

- **Character Mapping Algorithm:**

We have created a replacement for the Segment Mapping algorithm, the Character Mapping algorithm. The new Character Mapping algorithm was built using the recently released algorithm SDK, and in most common configurations this new algorithm will be faster and require less memory than the existing segment mapping algorithm. In addition, this new version does not have a length limitation for the input string and can handle non-ASCII characters.

- **Data Control Tower Attributes/Groups Support:**

We recently introduced the concept of user groups and data access groups in Data Control Tower (formerly Central Management.) This enables customers to manage data and users across engines, greatly simplifying data access. We have now added the ability to control data access via Identity Provider attributes. Customers can create these attributes directly in their identity provider(IDP) or by federating Active Directory or LDAP with their IDP.

- **Data Control Tower Upgrade Notification:**

We will now directly notify users in Data Control Tower when new versions of appliance software are available. This represents a continued integration between our SaaS and appliance offerings that ensures users are aware of the latest offerings and paves the way for more direct communication.

Technical Update

- **Expanded Replication:** Your customers may be using replication to facilitate moves of data across network boundaries, to the cloud and for DR purposes. In the 6.0.5 release, we now support replication of users, roles, permissions, policies and configuration templates.

- **Target Environment Lock Down (CLI/API):** Delphix Engines frequently are shared by multiple application teams who provide their own target environments. Delphix Virtualization has introduced

functionality that will allow an engine-wide lock down of target environments coupled with the ability to attribute VDB provision permissions on specific environments to user groups. This will prevent one team from accidentally provisioning VDBs to another team's infrastructure. The UI will be introduced in the Data Control Tower (formerly Central Management) at a later date.

- **Upgraded Windows Connector:** The Windows Connector will now support newer versions of Microsoft's .NET framework (4.x), which encompasses myriad higher security standards, new functionality, etc. Previously, the connector relied on .NET 3.5 due to two dependencies: SQL Server and Powershell, which have both been removed with SQL Server 2016+ and Powershell update in 6.0.3.0.

- **Staging Push - Db2 Plugin**: We now support an extensible model for ingesting Db2 data. In this new, additive model, we will support your customers manually performing a restore & roll forward of their staging database to Delphix from native backups or arbitrary third-party backup tools which integrate directly with Db2. This will allow customers to bring data from whatever system or backup they have and restore it to an exact point in time, as needed.

💡 The Staging Push concept will be added in addition to our current data "Pull" capabilities and will be released for the rest of the supported data sources in future releases.

- **Snapshot Metadata Visibility:** On Delphix plugins we show when the data was ingested. This enhancement allows Db2 users to have visibility of the backup generation time in the UI.

- **HANA Deferred Recovery Plugin Enhancements.** We are providing multiple enhancements to the plugin that simplifies and improves performance and end user experience. Some notable improvements to highlight:

  - The overall logic of the plugin has been greatly simplified, which provides better overall performance. In our labs we have seen improvements up to 25%.

  - Provisioning of a VDB from a dSource snapshot no longer requires the target HANA instance to be stopped.

  - Administration and troubleshooting on the target has been simplified as each scale-up HANA VDB is now backed by a single NFS mount point, rather than multiple mount points per tenant database.

  - HANA Native Backups and Logs for a dSource snapshot can now reside on shared storage which allows the dSource snapshot process to bypass the step to ingest the Backups into Delphix for the associated dSource snapshot.

  - Support has been added for a customer-specified HANA administrator account (other than SYSTEM user) inside of a tenant database being virtualized.

Certifications

The following certifications were completed through November.

- ESX 7.0

- NFS v4 support on AIX 7.1+.

- IBM Cloud Catalog. Delphix is now available in the IBM Cloud Catalog, a private marketplace for trusted IBM Technology partners that is offered to large IBM enterprise customers. In 6.0.5 we have started with a few certified instances for virtualization and masking and will grow our presence as more adoption justifies the cost and effort. Specifically, we support the following instances:

  - mx2-8x64

  - mx2-16x128

  - mx2-32x256

  - mx2-48x384

- Oracle Cloud. The following are newly supported instance types:

  - VM.Standard2.8

  - VM.Standard2.16

  - VM.Standard2.24

- Virtualization Certifications:

  - ASE 16.0 on RHEL8.1 and RHEL8.2 on 6.0.4+

  - ASE 16.0 on SLES12.4 on 6.0.4+

  - Oracle 18 on RH7.9 on 5.3.9 and 6.0.4+

  - Oracle 19.7 on RH7.9 on 6.0.4+

  - Oracle 19.7 (April 2020 PSU) on RH7.8 and RH8.0-8.2 on 5.3.9+ and 6.0.3+

  - DB2 11.5 on RH 8.0-8.2 on 5.3.9+ and 6.0.4+

- Masking Certifications:

  - MySQL 8

  - PostgreSQL 12

- Db2 LUW 11.5

- Oracle Database Cloud Services on Virtual Machines

- Oracle Database Cloud Services on Bare Metal

Deprecations

The following list of OS and DB versions are now past their respective support windows. Delphix has deprecated these versions to stay in line with Microsoft, Oracle, and SAP lifecycle policies:

- Windows 2008 R2: Microsoft End of Extended Support (EoES) January 4th, 2020

- SQL Server 2008/2008 R2: Microsoft End of Extended Support (EoES) July 9th, 2019

- Oracle 10: Oracle End of Extended Support (EoES) July 2013

- SAP ASE 15.0.3: SAP End of Life (EoL) March 31st, 2015