## **Db2 Tools New Features Summary - Winter 2021 Edition (Level Set PTF 20.0.02)**

Here's a summarized list of the enhancements we have made to Version 20.0 of the Database Management Solutions for Db2 for z/OS from October 2021 to December 2021. You can access all of these features by applying the new Level Set PTF 20.0.02 (LU03712). No activation is required.

## Feature Highlights



**DevOps:** The **DBM** for **Db2 Plug-in** for **Zowe™ CLI** introduces new Zowe CLI commands that enable you to interact with Db2 using the Broadcom Database Management Solutions for Db2 for z/OS. You can use the pre-GA version of the plug-in to automate Db2 schema provisioning (generate DDL, verify DDL syntax, and deploy changes to a production environment).

**Note:** The pre-GA version of the DBM for Db2 Plug-in for Zowe CLI is now available from our <u>validate site</u>. This is not part of Level Set PTF 20.0.02.



Recovery Estimator support for Db2 12 M508 multi-table tablespaces migrated to partition-by-growth universal tablespaces. The recovery estimator now supports multi-table tablespaces that have been migrated to partition-by-growth universal tablespaces through an ALTER TABLESPACE MOVE. This migration capability was introduced in function level V12R1M508.

The Recovery Estimator checks the IBM.SYSCOPY table to determine whether your specified tablespaces have been migrated. If you estimate a recovery to a point in time that precedes the tablespace migration, the Recovery Estimator reports these tablespaces as unrecoverable.



**Fast Load** now optimizes the execution of DFSORT based on the availability of real or virtual storage. Previously, the real and virtual storage profiles for DFSORT were not calculated autonomically. Now the sort parameters are calculated for you. Use the SORT-OPTIMIZE keyword to enable this feature.

## Other Features

- Multi-row selection and hyperlinks added to MTC-DBM. The Mainframe Team Center –
  Database Management for Db2 for z/OS (MTC-DBM) user interface has been enhanced to
  enable multi-row selection of table data in the Performance function, provide breadcrumbs to
  associated data in the Administration function, and provide new SQL Detail and Dynamic SQL
  Details reports in tab format to ensure consistency with other categories.
- **Fast Recover** now provides precise calculations of the time to recover your objects when you perform a recovery simulation. The simulation output displays the elapsed time for the individual utility statements and for the recovery job as a whole. These calculations help you verify that you can meet your recovery service level agreements (SLAs).
- Fast Unload enhancements:
  - Dynamically allocate sort work data sets using Real-Time Statistics. Sort work data sets can now be dynamically allocated using RTS when you specify the ORDER BY or ORDER CLUSTERED clause. You can use RTS to calculate the number of rows to be unloaded for each SELECT statement to dynamically allocate sort work data sets.
  - Filter rows by values in an external data set with WHERE IN FILE. You can now dynamically
    filter the rows for the unload by specifying the values for the IN predicate in an external
    data set and including IN FILE syntax in the WHERE clause of the unload job.
- Log Analyzer enhancements:
  - LUWID information is now displayed in the DML and DDL Reports. The logical unit of work ID (LUWID) is now displayed in the UR header. This information helps you identify activities that were performed by concurrent threads, locate activity from a CICS terminal in a highly executed transaction, or locate activity from a DDF thread.
  - Db2 commands report output in CSV format. Output from the Db2 Commands report can now be provided in a comma-separated value (CSV) format. This option offers a convenient way to combine the Db2 data with data from other sources. For example, when using external auditing tools.
- RC/Query has been enhanced to support advanced trigger clauses. Advanced triggers support a
  larger set of SQL statements and offer several advantages over basic triggers. You can now
  generate DDL and HDDL that includes the ADD VERSION clause or the CREATE TRIGGER
  statement with the OR REPLACE clause. You can use triggers to enforce data integrity rules.
- SYSVIEW for Db2 enhancements:
  - Archiving table enhancements to improve exploitation of IFCID 376. The history unload utility now populates IFCID 376 records with SQL text from the dynamic SQL text database when the text is in the database, but not in the original trace record. A new IQL variable and new archive tables are provided.
  - Extended profile monitoring statistics support for IFCID 402. The profile exception records can now be collected at a fixed-time interval. Enhanced profile monitoring statistics reports let you detect anomalies and measure workload against the thresholds that are defined in system profiles. Capturing the delta between two intervals lets you track profile exceptions and warnings that are triggered in specific intervals.

- Support for new I/O interrupt processing metric. A new field named CPU-IO-INTERRUPT
  has been added to STATS1 and CURR-STATS1 (IFCID 1 and IFCID 1001). This field specifies
  the CPU time that is spent in I/O interrupt processing and is available for each Db2 address
  space in the STATS record.
- Support for new QMDA fields. New fields have been added to the QMDA section of IFCID 003 and IFCID 148. The new fields provide additional identification details to improve the analysis of native Db2 RESET API service threads.

For more information about these enhancements and others that have been released before and after Level Set PTF 20.0.02, see <u>New Features</u> in the Release Notes.

## What's cooking in the lab?

Join the **Db2 Tools 20.0 Validation Project**, where the Broadcom labs reveal upcoming features and seek feedback. See what we are developing, as we develop it. Validation meetings are your best opportunity to influence the development of the Database Management Solutions for Db2 for z/OS products. Register today at <a href="https://validate.broadcom.com/key/db2tools200">https://validate.broadcom.com/key/db2tools200</a>.