

SOFTWARE RELEASE DOCUMENT (SOFTDOC)

Product:	HPE Shadowbase for Other Servers
Release:	Gravic Version 6.240 T1123-AAE (SB REPL/OSS)
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NOTE: This softdoc covers new features and corrected problems for HPE Shadowbase for Other Servers, Version 6.240 for HP NonStop OSS only. It is available as an Adobe PDF file (.PDF). Copies of the PDF file reader can be freely downloaded from www.adobe.com

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Disclaimer

We are distributing this communication in an effort to bring important information to the attention of users of the affected products. We recommend that all users determine the applicability of this information to their individual situations and take appropriate action. We do not represent or warrant that this information is necessarily accurate or complete for all user situations and, consequently, we will not be responsible for any damages resulting from the user's use or disregard of the information provided. To the extent permitted by law, we disclaim all representations and warranties, whether express, implied, statutory, or otherwise, including the warranties of the merchantability, fitness for a particular purpose, title, and non-infringement.

Special Notes for Version 6.240

1. Version 6.240 is a restricted TCF release (HPE version AAE) based upon the restricted TCF release Version 6.230. This release applies to the T1123-AAD (SB REPL/OSS) component of HPE Shadowbase only; this component provides the target SQL/MX functionality.
2. Due to licensing changes introduced in Version 6.100, existing installations of Shadowbase prior to that version will require a new password file in order to run after the upgrade.
3. HPE Shadowbase for Other Servers now obfuscates configuration data (in particular the passwords) for objects when it is stored in the COLLCONFIG data file (in other words, the information is no longer stored in 'clear text'). Version 6.230 and beyond can read the configuration records created by prior releases and will automatically store the information in obfuscated format when the record is saved/written. Once the information has been obfuscated, the record is no longer usable in prior versions. If you are upgrading from a version prior to 6.230 and you want to maintain the ability to fall back to a prior release, you must keep a copy of the collconfig.dat and collconfig.idx files for the prior release.

You can, for example, install the release in a new directory and copy the data directory from the old directory to upgrade. This will maintain both the binaries and the configuration files for the old release.

If you do need to need an obfuscated configuration with a prior release, you will need to drop and re-add the objects using the prior version of SBMON.

New Features in Version 6.240

No new features in Version 6.240 were added since Version 6.230. Please see the Version 6.230 softdoc for new features added since the previous General Availability release, Version 6.220.

Problems Corrected in Version 6.240

This section provides a summary of the problems corrected in HPE Shadowbase for Other Servers products since the previous release (V6.230). Please see the Version 6.230 softdoc for new features added since the previous General Availability release, Version 6.220.

- 1) The cached Direct Writer did not properly process the SHAD_MAX_CURSORS parameter. As a result, SHAD_MAX_CURSORS could only be left at its default setting, 50 cursors.
- 2) The cached Direct Writer did not properly close open cursors when the number of statements exceeded the cache size (50). This resulted in a memory / resource leak which eventually would cause the Direct Writer to shutdown when the number of unique statements being executed exceeded 50.

New & Modified SBMON Commands

No commands were added or modified since version 6.230. Please see the Version 6.230 softdoc for new and modified SBMON commands added since the previous General Availability release, Version 6.220.

New & Modified shadparm.ini Parameters

No parameters for the shadparm.ini configuration file were added or modified since the previous release (V6.230). Please see the Version 6.230 softdoc for new and modified shadparm.ini parameters since the previous General Availability release, Version 6.220.

New & Modified User Messages

No user messages were added or modified since the previous release (Version 6.230). Please see the Version 6.230 softdoc for changes to user messages since the previous General Availability release, Version 6.220.

Known Problems Remaining

1. **Audit Log:** The Audit Log image column SHAD_EVENT_TIMESTAMP reflects the wall clock time in which the Shadowbase NonStop Consumer process replicated the event to the HPE Shadowbase for Other Servers DOC database. This column is meant to reflect the NonStop audit trail event timestamp. That is, this timestamp does not represent the events source database activity time, but rather the time the event was replicated to the Open Server DOC database. This issue will be changed in an upcoming Shadowbase NonStop release, such that the SHAD_EVENT_TIMESTAMP column will contain the time the event was recorded in the HPE NonStop system audit trail.
2. **DOC Writer and Source Collector** restarts the TRS/TFS even if the TRS/TFS was stopped by SBMON. When enabled, the DOC Writer and the Source Collector will monitor and restart TRS/TFS if it stops running. If a TRS/TFS was manually stopped by an SBMON STOP command (normal shutdown), the DOC Writer and or Source Collector will continue to restart the TRS/TFS instead of leaving it in a stopped state. This issue will be addressed in an upcoming release.
3. ***The SBMON ROLL command must not be used on actively replicating objects or DOC corruption may result.*** DOC rolls generated internally by the DOCW or collector object are handled correctly. However, there is a risk that a DOC roll triggered by a user issuing the ROLL command may do so while the replication object is in a critical state. If a manual SBMON ROLL command is required, shut down the relevant DOC writing replication object(s) (e.g., OPCOL, DOC Writer) and all database user sessions for source collection objects prior to issuing the ROLL command.
4. **Use of Reserved Words as target SQL Table Column Names.** In particular, the following reserved words are not supported for HPE Shadowbase for Other Servers target replication:

AND
WHERE
VALUES

5. **Under certain transaction profiles when replicating from Other Servers to HPE NonStop Guardian, the Consumer will stop with an EMS message error message (#2017):**

```
SBOS-TO-NSK COVERSION BUFFER OVERRUN, SET  
SHAD_REMOTE_MAX_EVENTS BETWEEN 100 TO 400  
IN SHADPARM.INI
```

This typically occurs if there are many empty transactions (transactions with no associated database modifications) sent to the NonStop Consumer. If this occurs, set the SHAD_REMOTE_MAX_EVENTS parameter in SHADPARM.INI to between 100 to 400 events, e.g.:

```
SHAD_REMOTE_MAX_EVENTS=200
```

6. The sample DOC reader code (SBDOCRD) for reading non-cached DOCS fails. Both a sample program that reads and prints the DOC, as well as source code to allow the user to process the data in the DOC. Both the sample program and code fail.

This code has limited functionality and is deprecated. However, if you need a working copy of SBDOCRD, please contact Support.

7. Due to limitations in configuration record sizes, DNS names cannot be longer than 20 characters. If the DNS name exceeds 20 characters, use the dotted IP address instead.
8. When replicating from the NonStop in a multi-ported DOC environment, the SUSPENDUPD/RESUMEUPD command **cannot be used** if the SHAD_TRANS_EXPECTED_ENDS parameter is set to a value greater than 1. The SHAD_TRANS_EXPECTED_ENDS parameter is not required in configurations where the NonStop Shadowbase is sending to a single multi-ported DOC Writer. If the configuration includes multiple DOC Writers and Direct Writers, SHAD_TRANS_EXPECTED_ENDS is a required parameter.

Only one commit is sent for a SUSPENDUPD command. If SHAD_TRANS_EXPECTED_ENDS is greater than 1, the DOC Writer will leave the SUSPENDUPD command in an uncommitted state, preventing the DOC files from being removed by the DOC cleaner.

A configuration using a consumptive Direct Writer (a Direct Writer that is not connected to a database) connected to an HPE NonStop system as a source is not supported. If you need to use a consumptive process, you must either setup a configuration that replicates from the NonStop to a Doc Writer, and then uses a consumptive TRS; or use a Direct Writer that does connect to the database with your consumptive user exit.

9. SBFILE does not display text fields containing the string 'N', 'NU', 'NUL', or 'NULL' correctly – the enclosing single quotes are left off. For example, if TEST_TABLE has four varchar fields, SBFILE will display the statement:

```
INSERT INTO TEST_TABLE (C1,C2,C3,C4) VALUES ('N', 'NU', 'NUL',  
'NULL')
```

incorrectly as:

```
INSERT INTO TEST_TABLE (C1,C2,C3,C4) VALUES (N, NU, NUL, NULL)
```

Note: This is a display issue only. The data will be correctly applied to the database.

10. Internal testing uncovered a number of limitations on the size of columns, tables, and statements:

- a. There is a limit to the size of a row in the DOC database which limits the size of statements (for EI Docs), cached statements (for cached DOCS) and statement data (for cached DOCS) to approximately 56K bytes.
- b. Table names are limited to 80 characters.
- c. Column names are limited to 74 characters.

11. Pulse processing is not compatible with DOC writing with no TRANS DOC (transaction processing disabled). The pulse request never completes and shows as active, resulting in invalid pulse statistics. The output from a pulse request to a DOC Writer configured without transaction process is shown below:

```
=====
NAME: CONS-OPN-PULC1      PROCESS: \VIV1.$PULC1      AUDMON: \VIV1.$PAUDM

MOST RECENT PULSESTATS (MAXPULSESTATS = 5):
-----
CONFIG PARAMETERS:      ADTSAMPLEDELAY=?      ADTXSAMPLEDELAY=?
ADTXEOFREPEATS=?      ADTTHROTTLEDELAY=?  ADTTHROTTLELIMIT=?
FASTSAMPLE=?          IPMBLOCKING=?       PULSEAUTOADJ=?
TURBOMODE=?          TURBOWAITTIME=?     TURBOMAXEVENTS=?

TGT PROCESS:           UNAVAILABLE          TYPE:  NOT KNOWN YET
CREATE TS:             2016-10-14 12:17:52.242862  STATE: ACTIVE
COMPLETE TS:          UNAVAILABLE          DIFF:  UNAVAILABLE
CONS USRX CALLS:      0                   DUR:   00:00:00.000000
-----

NUMBER OF PULSES FOR CONS CONS-OPN-PULC1:
TOTAL DISPLAYED      1          TIMED OUT      0
ACTIVE (INCOMPLETE) 1          INCOMPLETE     0
IN BAND              0          OUT OF BAND    0
```


Installation Instructions

Please follow the installation instructions included in the README.<platform>.<version>.TXT file that accompanies this release.

***** End of Document *****