



DIGITool VERSION 3

The DigiTool Service Pack

CONFIDENTIAL INFORMATION

The information herein is the property of Ex Libris Ltd. or its affiliates and any misuse or abuse will result in economic loss. **DO NOT COPY UNLESS YOU HAVE BEEN GIVEN SPECIFIC WRITTEN AUTHORIZATION FROM EX LIBRIS LTD.**

This document is provided for limited and restricted purposes in accordance with a binding contract with Ex Libris Ltd. or an affiliate. The information herein includes trade secrets and is confidential.

DISCLAIMER

The information in this document will be subject to periodic change and updating. Please confirm that you have the most current documentation. There are no warranties of any kind, express or implied, provided in this documentation, other than those expressly agreed upon in the applicable Ex Libris contract.

Any references in this document to non-Ex Libris Web sites are provided for convenience only and do not in any manner serve as an endorsement of those Web sites. The materials at those Web sites are not part of the materials for this Ex Libris product and Ex Libris has no liability for materials on those Web sites.

Copyright Ex Libris Limited, 2008. All rights reserved.
Documentation produced April 2008
Document version 1.5
Web address: <http://www.exlibrisgroup.com>

Table of Contents

1	THE DIGITOOL SERVICE PACK.....	5
2	SERVICE PACK LEVEL	5
3	VIEWING THE SERVICE PACK CONTENTS.....	6
4	RELEASE NOTES AND E-MAIL NOTIFICATION	6
5	SERVICE PACK IMPLEMENTATION DIRECTORIES.....	6
5.1	DigiTool u tree.....	7
5.2	DigiTool d tree.....	7
5.3	DigiTool j tree.....	7
5.3.1	Overrides.....	7
5.3.2	Ignores.....	7
5.3.3	Conflicts.....	7
5.3.4	Reports.....	7
6	HOW TO USE THE SERVICE PACK INSTALLATION UTILITY	8
6.1	UTIL SP 1 - Prepare/Update Environment.....	9
6.1.1	UTIL SP 1.1 – Parameters Setting	9
6.1.2	UTIL SP 1.2 – Show Configuration.....	10
6.2	UTIL SP 2 - Download Latest SP.....	10
6.3	UTIL SP 3 - Check SP Download Completion	10
6.4	UTIL SP 4 - Install SP	10
6.5	UTIL SP 5 - Run SP Utility	11
7	POST-INSTALLATION UTILITY.....	11
7.1	Post-Installation Options.....	12
7.1.1	Service Pack Summary (Excel Format)	12
7.1.2	CRM Knowledge Base.....	13
7.1.3	Service Pack Summary (Plain Format)	13
7.2	Manual Access to the SP Utility	13
8	MEDITOR COMPONENTS.....	13
9	MEDITOR DISTRIBUTION	14

APPENDIX A: QUICK START.....15

1 The DigiTool Service Pack

A DigiTool Service Pack updates your system with all improvements made available since the last DigiTool version was released. Most updates are executed automatically through the Service Pack mechanism so that very little or no work is required of the institution receiving the update. Automatic Implementation Notes (AIN) inform you of the changes that were applied to your system, generally server-side setup items including code changes and configuration implementations.

After the Service Pack utility has run, you receive an e-mail listing changes performed completely and changes that require further configuration on your part. These latter changes are generally optional items or items that some but not all institutions will want to implement. Descriptions are linked to detailed instructions should you want to complete these optional items.

Ideally, and in most cases, the Service Pack can be installed and no manual changes will be needed to continue working with the system.

2 Service Pack Level

The Service Pack *level* indicates the number of fixes made since the version was made available. The Service Pack includes all of these changes.

The current Service Pack level is determined from the `$dtlm_proc/report_change.dat` file. Do not modify this file manually under any circumstances.

To view your current level, use the `ver` command from the command prompt. For example:

```
il-dtldev02.exlibris-int.il-d3(6) >>ver
LINUX, il-dtldev02.exlibris-int.il, DigiTool 3 revision 00 copy 1,
07-Aug-2005
DigiTool 3.0 SP 4 (Build Date:Sunday, January 29, 2006, Build
Machine:Israel/Jerusalem/Ram7)
Oracle Version: 920
PDS version : 1.2.10070
Service Pack : 232 (4)
```

In cases where a Service Pack contains an unusually high number of changes, the level may not start with the number 1 and progress from there. It may instead be frozen at a certain number, and the next Service Pack will start where the previous block left off.

For example, the first Service Pack might be 1-1000 and the second might be 1001-1211. A third Service Pack might be 1001 - 3052. In this case, the second and third Service Pack's start number, 1001, is also called their *base level number*.

Any Service Pack which has a base level higher than 1 will prompt an error and will not be installed unless your current system's level is higher or equal to its base level (minus one). If, for example, your system's level is 966, Service Pack 1001-1211 cannot be installed before Service Pack 1-1000 is installed.

In addition, a special *SP* number marks each Service Pack. Whenever a Service Pack is issued, it is given a sequential SP number. For example, the first Service Pack after

DigiTool version closure is SP 1, the second SP 2 and so on. The SP number indicates the order of the updates, and it is coordinated with the Service Pack level number.

3 Viewing the Service Pack Contents

To decide if you should download the Service Pack, you may review the changes that are included in it before the installation. Check the knowledge base on the CRM or view the SP release notes. Release notes for the current Service Pack are available in PDF format on the [Ex Libris Documentation Center](#) under the *Service Packs/Version <version number>* directory.



The Service Pack contains all the relevant files that have been changed. However, only the files needed to be upgraded from your current level to the Service Pack level will be installed.

4 Release Notes and E-mail Notification

Release Notes contain two tables, one for configuration changes and one for code-based changes, each containing the following information for each change in the current Service Pack:

- Target audience
- Brief text description of the change
- Module/topic the change impacts
- Classification of the change (for example, a defect fix or an enhancement)
- Whether the change is required, recommended, or optional

Configuration changes also list whether the change was intended to be automatically performed by the Service Pack or manually performed by the user.

More information is provided for changes requiring more details or subsequent action.

Users also receive an e-mail following the installation of the Service Pack that tells them which updates did not automatically install. This e-mail contains a table similar to those in the Release Notes with information about each change and whether or not it is optional. It also contains a Status column stating that the change was completed or partially completed. Those changes that were only partially completed link to instructions further in the e-mail about how to manually implement the change, if the user deems it necessary.

5 Service Pack Implementation Directories

DigiTool uses three separate directory trees, the d tree (d3_nn), the u tree (u3_nn) and the j tree (j3_nn).

5.1 DigiTool u tree

The u tree contains local and configuration data for the customer. The Service Pack updates changes automatically when possible to do so without interfering with the customer's configuration and data.

5.2 DigiTool d tree

Configurations downloaded to the d tree serve as a generic model for demo unit configurations. Customers can use these configurations as a template or reference for u-side local configurations.

5.3 DigiTool j tree

Under the j tree there are 2 major directories:

`home`: the customer's working environment, where the Service Pack modifications should be implemented according to pre-defined rules (described below). In this directory, only non-disruptive Service Pack changes will take affect.

`home.orig`: the current Ex Libris DigiTool version with all its latest Service Pack modifications implemented. After the Service Pack implementation completes, this directory will be considered the new Ex Libris base version.

To support this structure, the Service Pack downloads all its changes to the `home.orig` directory, reflecting the latest Ex Libris version.

The changes are downloaded to the `home` directory using a policy file that is attached to the Service Pack and that defines the Service Pack behavior for each directory: `override`, `ignore`, `conflict`, or `report`.

5.3.1 Overrides

Some of the files and directories are overridden during the Service Pack implementation. These are mainly directories that contain functional executable files or demo data (for example, the directories: `/home/profile/units/DTL01` and `/home/system/thirdparty`).

5.3.2 Ignores

Other directories are ignored during Service Pack implementation, according to the policy file. These are mainly directories that contain customer data. For example, `/home/profile/storage`.

5.3.3 Conflicts

Then there are files and directories that are to be overridden unless the customer already configured these files, in which case the file will be reported in a special report known as the Conflicts Report. For example, the directory `/home/profile/overrides`.

5.3.4 Reports

Finally, there are files and directories that are never overridden but are only reported. In these cases, where there are suggested changes to be made, the report will indicate the manual change that may be employed. For example, the `/home/profile/global.properties` file.

6 How to Use the Service Pack Installation Utility

The Service Pack Utility (`Util sp`) is an interactive routine that provides a simple download of the latest Service Pack from the Ex Libris FTP server or from an office's FTP server to the customer's machine. The utility is responsible for installing all Service Pack changes.

Note

Before beginning the installation process, make sure you have sufficient disk space—at least as twice the size of the `sp.tar` file—and sufficient time to carry out the procedures.

`Util sp` provides a menu-based interface that allows you to configure and run the original DigiTool routine `install_main.csh`.

```
Utilities
=====
A. File administration and building
C. Monitor batch jobs
D. Online store/restore administration
E. Monitor background jobs
F. View procedures and files
G. Tables for defining database structure
H. Library and installation report (files, tables and
definitions)
I. Formatting data (PC, WWW, reports)
J. Web and Server configuration
K. GUI MEDITOR tables
L. GUI tables
M. GUI MEDITOR Marc tables
N. Z39.50 management
O. ORACLE management
P. Unicode tables
Q. Data loading, import and export tables
S. Statistics
SP. Download and install the latest DigiTool Service Pack
W. Server management (Monitor, Stop, Start, Log files)
X. Clean up
Y. Node management
```

Through the `util sp` menus you can configure parameters to download the latest available Service Pack, check this download, and receive an automatic e-mail confirmation after download.

Running the `util sp`

In order to use the Service Pack management utility, log in to the DTL application. (Make sure to log in to the appropriate slot, if applicable.)

Run:

```
>>dlib <library-name>
>>util
>>sp
```

Note that at any step of the menu stage you can select “exit” or press **Enter** to return to the previous menu.

The Service Pack Utility contains 5 options:


```
SP. Service Pack Management
-----
0. Exit Procedure
1. Prepare/Update Environment
2. Download latest SP
3. Check SP download completing
4. Install SP
5. Run SP Utility (view implementation notes)
Please select [exit]:
```

6.1 UTIL SP 1 - Prepare/Update Environment

```
SP.1. Environment Setting
-----
0. Exit Procedure
1. Parameters setting
2. Show configuration
Please select [exit]:
```

6.1.1 UTIL SP 1.1 – Parameters Setting

All installations come with the parameter settings necessary to carry out updates. The bolded parameters below can be updated

```
SP installer configuration
-----
Enter new values or press <Enter> to keep existing

FTP server for SP download [ftp.exlibris.co.il]:

FTP user for SP download [dtl_sp]:
(This is an option for future usage)

FTP special options - only change if you encounter FTP problems []:

If you want to insert new FTP password please type it now:

If you want to change the language please type it now [english]:
(This is an option for future usage)

Ex Libris customer code (country code + customer) [01UNI]:

Customer mail address for download status notifications (leave empty
for none) [name@company.com]

SP download directory [$TMPDIR/sp]:

Configuration summary:
-----
FTP server:                ftp.exlibris.co.il
FTP user:                  dtl_sp
FTP options:
Language:                  english
Service pack download dir: $TMPDIR/sp
Customer code:             01UNI
Notification address:     name@company.com

Press <Enter> to continue
```

Note that after running Util SP 1/1, the `sp.config` file is created under the `$dtle_root` directory. This file should not be edited. If there is a need to modify the file such as when there is a need to define special FTP conditions, consult the Ex Libris Office before implementing the change.

6.1.2 UTIL SP 1.2 – Show Configuration

This step shows the current values of the `util_sp` parameters:

```
Configuration summary:
-----
FTP server:                ftp.exlibris.co.il
FTP user:                  dtl_sp
FTP options:
Language:                  english
Service pack download dir: $TMPDIR/sp
Customer code:             01UNI
Notification address:      name@company.com

Press <Enter> to continue
```

6.2 UTIL SP 2 - Download Latest SP

This step runs the download according to the parameters that have been defined in the previous step.

The latest available Service Pack will be downloaded.

You will receive an e-mail when the download is complete.

```
Dear Customer
The DigiTool Service Pack download has been successfully
Completed.
Service Pack 1184. SunOS-old
il-dtldev01 DigiTool 18 copy 1

You may continue with the SP installation steps
```

6.3 UTIL SP 3 - Check SP Download Completion

This step checks the integrity of the downloaded files.

For example, in case of a download problem, you will be informed as follows:

```
SP Download status - failed
Dear Customer,
The DigiTool Service Pack download failed
SeverName DigiTool 20 copy 1
Please see ftp logs in $TMPDIR/sp
Error message is:
DGTL-3.00-ServicePack-1-1184.tar.gz_aa ./sp.tar ./sp.install ./gnu_tar
tar error extracting SP binary files
```

6.4 UTIL SP 4 - Install SP

This step runs the latest Service Pack installation using the `sp.install` routine.

Note: Before running this step, make sure that Apache is down and that `dtl_shutdown_all` has been performed.

The installation does the following:

Opens the `sp.tar` file in a temporary location.

Copies the files one-by-one to their final location at the `d_tree` while backing up the original files.

Runs a number of processes. For example, it compiles all relevant files after backing up their binary products.

Opens the `j_sp.tar` file under `/sp/sp.nn/` directory.

Runs apply process on the `j` tree.

Creates a Utility script (`sp.utility`) under `/sp/sp.nn/`.

Runs automatic implementation notes.

Sends implementation status report as an e-mail to your address.

After the installation process has completed, run

1. `set_globals.sh (cd $jdtlh_bin)`
2. `dtl_startup_all (cd $dtle_root)`
3. Make sure Apache is up.

6.5 UTIL SP 5 - Run SP Utility

Once the installation of the Service Pack completes, the utility will redirect you to the `sp.utility` script, the post-installation utility menu:

```
The Service Pack was installed successfully.  
The Service Pack utility is at  
/exlibris/dtl/j3_1/digitool/sp/sp.4/sp.utility  
Do you want to run it now? [Y]/N
```

To activate the post-installation utility menu, enter **Y**.

7 Post-installation Utility

After you run the utility, the system returns the following menu:

```
Welcome to Service Pack utility.  
Your current Service Pack level is [first#] - [current#].
```

- 0. Exit Procedure
- 1. View Service Pack Run Reports
- 2. View Service Pack Summary Reports

9. Rollback

Please select [0]:

7.1 Post-Installation Options

The Service Pack post-installation utility includes a rollback option (menu 9 in `sp.utility`). This option restores the system to its configuration and functional state prior to the installation of the last Service Pack.

This utility also enables viewing reports, should you wish to view these in addition to viewing the information that is e-mailed to you on completion of the Service Pack implementation. There are two types of reports:

Run Reports: Reports that give information about the results of the Service Pack installation.

Summary Reports: Reports that describe the Service Pack updates and implementation notes.

If you choose one of the reporting options (menu options 1 or 2), the following menu appears:

```
View Service Pack summary (Excel format)  
  
0. Exit Procedure  
1. Create report for levels 1-1183  
2. Create report for this Service Pack (1118 - 1183)
```

To create a report for the entire Service Pack, select option 1.

To create a report of the fixes you do not have in your current level, select option 2. While plain format, PC files, and implementation notes reports can be viewed immediately, the report created for Excel cannot be viewed immediately. We recommend that you download it to a PC via FTP.

7.1.1 Service Pack Summary (Excel Format)

This report contains a grid with the following columns:

- Change Number
- Short description
- Module
- Change type (Correction/Enhancement/Technical Change)
- SI number if available
- PC files involved
- Implementation Notes

7.1.2 CRM Knowledge Base

The screenshot displays the ExLibris Knowledge Base interface. The main content area shows details for KB Item # 55846. The 'KB Type' is 'Rep. Change', 'Version' is 'DTL 3.1: 20', and 'Subject' is 'Search (500)'. The 'Description' field contains the following text: 'Preserving Traditional Chinese in search queries after submitting a search query in Traditional Chinese in the Web OPAC or in a GUI Search, the corresponding search term in the Search Results List was changed to Simplified Chinese, which is problematic outside of mainland China. The reason the text was displayed in Simplified Chinese is that the system converts Traditional Chinese text in records into Simplified Chinese, both for records indexing and for searching. This problem has been corrected on the display level only; that is, the originally typed query is displayed in the "Search Results List" without being converted to Simplified Chinese.' The 'Resolution' field lists Unix files: '/alephm/source/set_server/set_find.cbl' and '/alephm/source/pc_sear/pc_sear_c1011.cbl'. The left sidebar contains navigation options like 'WEB SEARCH' and 'Other KB Items for Issue'.

7.1.3 Service Pack Summary (Plain Format)

This report creates a text file which is very similar to the one created by the `rep_change view` command.

7.2 Manual Access to the SP Utility

After installation of the Service Pack, the post-installation utility (`sp.utility`) can be found in `$jdtlh/sp/sp.<sp-number>`.

To run it from the command prompt, type:

```
./sp.utility.
```

8 Meditor Components

All PC-related files are downloaded under the `./dtl/pc_exe` directory. Usually, there are two files in the `pc_exe` directory:

```
digitool.exe - Full Meditor package  
dignet.exe - Network installation package
```

When a Service Pack is installed, these two files are replaced and the old files are backed up with an `sp.NN` extension in cases where there were updates to the Meditor since the last Service Pack.

In addition, individual Meditor files are downloaded under two directories:

```
./dtl/pc_exe/sp_exe  
./dtl/pc_exe/sp_conf
```

Meditor files that have changed are placed under these directories with a full path, for example: `./dtl/pc_exe/sp_exe/meditor/bin/meditor.exe`. Executable files are

placed under the `sp_exe` directory and configuration files are placed under the `sp_conf` directory. The configuration files are only used as templates and are not to be distributed automatically. In cases where the file already exists from previous Service Pack installations, it will be backed up with an `sp.NN` extension.

Please note that once you have installed the new Service Pack on the server, you must distribute at least the executable (.exe) Meditor.exe files to all workstations.

9 Meditor Distribution

The easiest way to distribute the changed Meditor executable files is to use Version Control. In this case, make sure that the definition in `common.ini` is set up as follows:

```
[VersionControl]
Type=sp_exe
```

The Update Version Utility which is available in the Meditor enables the user to keep its Meditor version up-to-date. The utility can be set to run every time the Meditor is started. The latter can be determined by the user by checking the box 'Run Version Check at Startup', or by setting the parameter `RunAtStartup` to "Y" in the `common.ini` file under `.\Common\Tab`.

To access the Update Version utility, from the **DigiTool** menu, point to **Utilities** and click **Version Check**.



If you want to ensure that no Meditor files are downloaded to workstations before a thorough test is conducted, define the following:

```
[VersionControl]
Type=sp_final
```

In addition, copy `./dtl/pc_exe/sp_exe` to `./dtl/pc_exe/sp_final` upon completion of testing.

Appendix A: Quick Start

This appendix contains a quick start set of instructions for Service Pack installation.

To install the DigiTool Service Pack via the Util SP:

1. Run `util_sp 1` to prepare the environment (see [Section 6.1](#)).
2. Download the Service Pack by running `util_sp 2` (see [Section 6.2](#)).
3. Check the integrity of the download files by running `util_sp 3` (see [Section 6.3](#)).
4. Run `dtl_shutdown_all (cd $dtle_root)`.
5. Make sure Apache is down.
6. Install the Service Pack by running `util_sp 4` (see [Section 6.4](#)).

Note: Any optional changes or changes not automatically performed will be listed in the status e-mail sent to you when the installation finishes. Review this and the Release Notes instructions for this Service Pack to determine whether and how to implement those changes.

7. Run `set_globals.sh (cd $jdtlh_bin)`.
8. Run `dtl_startup_all (cd $dtle_root)`.
9. Restart Apache.

Note that by default, files are backed up with an `sp.NN` extension where `NN` is the Service Pack level.