



Release Notes

Ephesoft Transact Version 4.1.2.0

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We are pleased to give you Ephesoft Transact v4.1.2.0.

February, 2017.

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1. Document Overview

This document describes the improvements and new features introduced in Ephesoft Transact 4.1.2.0. The improvements section has been categorized based on various parameters so that the functionality of the current release is compared to the functionality of previous versions of Transact.

2. Release Charter

#	Release Type	Category	Description
1.	New Features	Validation	<ul style="list-style-type: none"> Support for Field Value Change scripts for table data Restrict changes to document type on validation screen
		Database	<ul style="list-style-type: none"> Encrypted database connection passwords in Microsoft Windows registry Microsoft SQL Server 2016 support
		Installer	<ul style="list-style-type: none"> Check the prerequisites first and then back up the folders Hot fix for handwritten text extraction in the Nuance Form Template Editor Microsoft Windows Server 2016 support
		Tomcat	<ul style="list-style-type: none"> Tomcat version upgrade to 7.0.73
		Fixed Form Extraction	<ul style="list-style-type: none"> RSP files must reside in their own subfolder under \Ephesoft\SharedFolders\BCX\fixed-form-extraction\docType
2.	Improvements	Database	<ul style="list-style-type: none"> Match registry database type to server.xml on upgrade Transact no longer installs Microsoft SQL Server 2008 R2 when trying to use a previously installed instance of Microsoft SQL Server 2014 or 2016 on the same server
		Batch Class Management	<ul style="list-style-type: none"> Batch pickup optimization
		Fuzzy DB	<ul style="list-style-type: none"> Migrate fuzzy mappings only if not already migrated
		Classification	<ul style="list-style-type: none"> Improvements to keyword based classification using the "is unique" operator Automatic classification in ocrClassifyExtract API
		Web Scanner	<ul style="list-style-type: none"> Web Scanner toolkit service improvements

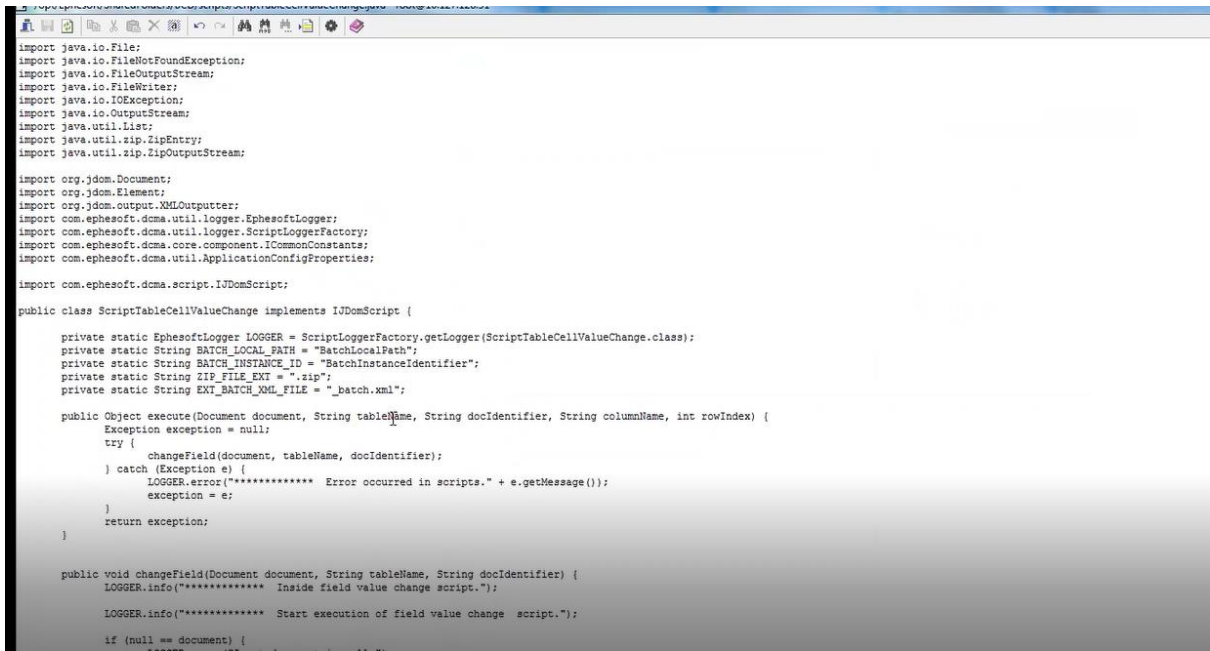
#	Release Type	Category	Description
	Improvements	Web Services	<ul style="list-style-type: none">Improvements to multiple web service APIs

3. **Appendix A - New Features**

Support for Field Value Change scripts for table data

Summary:

This feature allows the user run a custom script while changing table data on the validation screen. Transact can trigger a validation script if any table field is changed by the user. System control routes to the first invalid entry in the table view if the script is on. The Field Value Change script also works for document level fields.



```
import java.io.File;
import java.io.FileNotFoundException;
import java.io.FileOutputStream;
import java.io.IOException;
import java.io.InputStream;
import java.io.OutputStream;
import java.io.OutputStreamWriter;
import java.io.PrintWriter;
import java.io.Writer;
import java.util.List;
import java.util.zip.ZipEntry;
import java.util.zip.ZipOutputStream;

import org.jdom.Document;
import org.jdom.Element;
import org.jdom.output.XMLOutput;
import org.jdom.output.XMLWriter;
import com.ephesoft.dcm.util.logger.EphesoftLogger;
import com.ephesoft.dcm.util.logger.ScriptLoggerFactory;
import com.ephesoft.dcm.core.component.ICommonConstants;
import com.ephesoft.dcm.util.ApplicationConfigProperties;

import com.ephesoft.dcm.script.IJDomScript;

public class ScriptTableCellValueChange implements IJDomScript {

    private static EphesoftLogger LOGGER = ScriptLoggerFactory.getLogger(ScriptTableCellValueChange.class);
    private static String BATCH_LOCAL_PATH = "BatchLocalPath";
    private static String BATCH_INSTANCE_ID = "BatchInstanceIdentifier";
    private static String ZIP_FILE_EXT = ".zip";
    private static String EXT_BATCH_XML_FILE = "_batch.xml";

    public Object execute(Document document, String tableName, String docIdentifier, String columnName, int rowIndex) {
        Exception exception = null;
        try {
            changeField(document, tableName, docIdentifier);
        } catch (Exception e) {
            LOGGER.error("***** Error occurred in scripts. " + e.getMessage());
            exception = e;
        }
        return exception;
    }

    public void changeField(Document document, String tableName, String docIdentifier) {
        LOGGER.info("***** Inside field value change script.");
        LOGGER.info("***** Start execution of field value change script.");
        if (null == document) {
```

This script is bound to the table. Configure the script as required.

Ctrl + open bracket [is used as the script enable/disable shortcut key.

The script contains the following information:

- a. Updated document object
- b. Table name
- c. Document identifier

- d. Table column name
- e. Row index

Restrict changes to document type on validation screen

Summary:
To prevent document types from being changed in validation, two new properties, “**Can be Changed**” and “**Can be Assigned**”, have been introduced for document types created under a batch class. By default, both properties are set to “true” for newly added/imported documents.

Open

Apply

Deploy

Add

Copy

Export

Delete

Learn File(s)

View Learn File(s)

Test Classification

Test Extraction

	Name	Description	Minimum Confiden...	Number of Alterna...	Additional Configurations	Roles of Machine Learn...	Global
<input type="checkbox"/>	US Invoice	US Invoice	51	5	Can be Assigned		<input type="checkbox"/>
<input type="checkbox"/>	AUS Invoice	AUS Invoice	51	5	Can be Changed		<input type="checkbox"/>
<input type="checkbox"/>	NZ Invoice	NZ Invoice	51	5	Can be Changed;Can be ...		<input type="checkbox"/>
<input type="checkbox"/>	Test	Test	10	5	Can be Changed;Can be		<input type="checkbox"/>

☐ Line Item Matching

☒ Can be Changed

☒ Can be Assigned

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Displaying 1 - 4 of 4

Showing

Upload File(s)

Encrypted database connection passwords in Microsoft Windows registry

Summary:

Transact will store database connection passwords in the Microsoft Windows registry in encrypted form in 4.1.2.0 onwards

Microsoft SQL Server 2016 Support

Summary:

Ephesoft Transact is now certified for Microsoft SQL Server 2016

Check the prerequisites first and then back up the folders

Summary:

The Transact installer will now check prerequisites first and then backup the folders

Hot fix for handwritten text extraction in the Nuance Form Template Editor

Summary:

For handwritten data extraction, Nuance has provided a patch which must be applied irrespective of the Microsoft Windows operating system version.

The following steps need to be performed after Form Template Editor installation to support handwritten data extraction

1. Download the zip file, HandWrittenDataExtractionFiles.zip using the link below:
http://www.ephesoft.com/Ephesoft_Product/Wiki_links/HandWrittenDataExtractionFiles.zip
This zip file will now be shipped in the Linux installer for Transact 4.1.2.0 and later versions.
2. The downloaded zip file contains files which need to be copied to:
C:\Program Files (x86)\Nuance\FormTemplateEditor20\Engine

Microsoft Windows Server 2016 Support

Summary:

Ephesoft Transact is now certified for Microsoft Windows Server 2016

Tomcat version upgrade to 7.0.73

Summary:

Tomcat version has been upgraded from 7.0.68 to 7.0.73.

RSP files must reside in their own subfolder under \Ephesoft\SharedFolders\BCX\fixed-form-extraction\docType

Summary:

In previous versions of Transact, RSP files needed to be placed in the \Ephesoft\SharedFolders\BCX\fixed-form-extraction folder. Starting with Transact 4.1.x.x., the product requires these RSP files to reside in their own subfolder per docType. If this is not done, the user will encounter an error saying, "No RSP file found to configure."

4. **Appendix B - Improvements**

<p>Match registry database type to server.xml on upgrade</p> <p>Summary:</p> <p>While upgrading Transact, the system will check the Server.xml file in addition to the Windows registry entry. Both should match. If not, the system will halt the installation with the error message, "Mismatch between the Server.xml specified database and the registry entry for the database".</p>
<p>Transact no longer installs Microsoft SQL Server 2008 R2 when trying to use a previously installed instance of Microsoft SQL Server 2014 or 2016 on the same server</p> <p>Summary:</p> <p>During a fresh installation of Transact 4.1.1.0 and using an existing instance of Microsoft SQL Server 2014, the installer installs a fresh version of Microsoft SQL Server 2008 as well. This needlessly wastes time during the installation process and consumes hard disk space. A check was missing for Microsoft SQL Server 2014 in the installer. This has been fixed in Transact 4.1.2.0</p>
<p>Batch pickup optimization</p> <p>Summary:</p> <p>In earlier versions of Transact, batch pickup time was related to the number of document types in the batch class. For batch classes containing many document types, it was observed that batch pickup was slow. This has been optimized in Transact 4.1.2.0. Batch pickup time has been made independent of the number of document types in the batch class.</p>
<p>Migrate fuzzy mappings only if not already migrated</p> <p>Summary:</p> <p>Fuzzy DB mappings will only be migrated if they had not previously been so</p>

Improvements to keyword based classification using the "is unique" condition

Summary:

If you use page level fields and define classification rules using the "is unique" condition, Transact will create a new document for the page even if a page level field marked to be unique repeats in value, provided this value is different from the previous page.

Automatic classification in the ocrClassifyExtract API

Summary:

The ocrClassifyExtract API has been enhanced to support Automatic Classification.

Web Scanner toolkit service improvements

Summary:

Code optimization has been done for the Web Scanner. Performance has been improved for grayscale and black and white images.

Improvements to multiple web service APIs

Summary:

The **initiateOcrClassifyExtract**, **checkWSStatus**, **ocrClassifyExtractSearchable**, and **ocrClassifyExtract** web service APIs have been enhanced to return HOCR files in the response. A new parameter, "**downloadHOCR**", has been added to the request. This parameter is optional. The APIs will return the HOCR files in .zip format if this parameter is set to "true".

5. Appendix C - Bug Fixes

JIRA ID	Axosoft ID	Bug Description
EEN-7278	#EPHE-15040	An issue was reported where the RegEx Pool entry for 'Date with format of DD Month YYYY' did not spell February correctly. This has been corrected.
EEN-7236	# EPHE-13990	An issue with multipage invoices was reported. When selecting certain line items, the cursor went to the correct spot but on the wrong page. After looking into the issue it was found that the plugin configuration in the Page Process module was not correct (this is a known issue). If the Create_Display image plugin is added before Recostar_HOCR the Page ID generated inside the HOCR file is incorrect. For this reason, when a batch was processed to extract a multi-page table, the page rendering for overlay was not displayed properly. Logic has been changed to fetch the Page ID from the Batch.xml file instead of the HOCR file.
EEN-7116	#EPHE-14949	When upgrading from 4.0.4.0 to 4.0.6.1, an error was triggered saying, "Error occurred while fetching batch details". This has been fixed.
EEN-6951	#EPHE-14783	A client reported that after migrating a Transact QA environment to version 4.1.1.0 they had an issue with the table extraction module. When a table had only one row, that row did not get extracted when the extraction module ended. This issue has been fixed.
EEN-6801	#EPHE-14730	An issue was raised for the demo batch class which worked on 4.0.6.0 but when upgraded to 4.1 did not work for line item matching. After analysis, it was found to be a bug introduced during 4.1 implementation and has been fixed.

EEN-6570	#EPHE-14687	Table Extraction was not producing the same results at runtime as it did in the Batch Class Configuration testing and setup. After looking into the issue, it was found to be a problem with a batch processing table extraction algorithm for multi-page files. This issue has been fixed.
EEN-6461	#EPHE-14572	A client reported a significant performance issue. After looking into the issue, it was found to be a problem with the thread pool's efficiency in the ocrClassifyExtract web service. It has been determined that ImageMagick was not utilizing threads appropriately. This has been corrected.
EEN-6282		During an upgrade, if the CMIS export plugin was not present in any of the batch classes the upgrade procedure would fail. This has been fixed.
EEN-6278	#EPHE-14504	An issue was reported that when using the new feature "Automatic Refresh", Transact would not log out the current user for inactivity. This was happening because auto refresh was reloading the page, thus preventing a session time out. The issue has been fixed.
EEN-5973	#EPHE-14384	The Batch Class setup screen had a noticeable delay after opening up a batch class in Transact 4.1.0.0. It was observed that the root cause of the delay was related to the Global Batch Class. Code changes were implement to fix this issue.
EEN-5030	#EPHE-13822	<p>Transact threw an exception, "SQL Exception. The number of row value expressions in the INSERT statement exceeds the maximum allowed number of 1000 row values".</p> <p>Analysis showed that this is a hard-coded restriction in Microsoft SQL Server. Code refactoring has been done to create multiple insert statements instead of a single insert statement with multiple value expressions.</p>
EEN-5971	#EPHE-14379	A client had set up separator sheets to classify documents correctly at the page level. However, when the batch went through Document Assembly with Automatic Classification turned on, it grouped some "middle" pages with the "first" pages when evaluating confidence scores. On analysis, it was observed that Advanced Document Assembly was not implemented for Automatic Classification. This was fixed. Automatic Classification now works with the Advanced DA switch turned on in the Document Assembler plugin.
EEN-6525	#EPHE-14664	ScannerUIEnabler.exe showed high CPU utilization when not scanning.

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EEN-6799	#EPHE-14711	Transact installs Microsoft SQL Server 2008 R2 when trying to use an existing Microsoft SQL Server 2014.
	#EPHE-14684	Web Service Error in Transact 4.1. A fix was implemented for automatic classification with the ocrClassifyExtract web service.
	#EPHE-15101	In Google Chrome, clicking an image in the Review Validate screen caused the document list on the left to move to the first image.