

# Kodak

## Info Input Solution

### Info Input Solution *Release Notes*

**Version 7.0**



# Table of Contents

|  |    |
|--|----|
| Legal Notice .....   | 1  |
| 1. New Features / Enhancements .....   | 2  |
| 2. Fixed Issues .....  | 7  |
| 3. Known Issues .....  | 9  |
| 4. Upgrade Notes .....   | 10 |
| 4.1. Upgrade Preparation .....   | 10 |
| 4.2. Upgrade steps .....   | 11 |
| 5. System & Environment Requirements .....                                     | 12 |
| 5.1. System requirements for the InfoInputSolution Application Server: .....   | 12 |
| 5.2. Software requirements for the InfoInputSolution Application Server: ..... | 13 |
| 5.3. Antivirus detection/interference .....                                    | 13 |
| 5.4. Requirements for Thick Client .....                                       | 14 |
| 5.5. Requirements for HTML Client .....  | 14 |

## Legal Notice

Copyright © 2008-2024 Kodak Alaris Inc.. All rights reserved. Info Input Solution is a trademark or registered trademark of Kodak Alaris Inc.. The list of trademarks is not exhaustive of other trademarks, registered trademarks, product names, company names, brands and service names mentioned herein are property of Open Text or other respective owners.

## Disclaimer

No Warranties and Limitation of Liability.

Every effort has been made to ensure the accuracy of the topics presented in this publication. However, Kodak Alaris Inc. and its affiliates accept no responsibility and offer no warranty whether expressed or implied, for the accuracy of this publication.



This software is protected by copyright law and international treaties. Unauthorized reproduction or distribution of this program, or any portion of it, may result in severe civil and criminal penalties, and will be prosecuted to the maximum extent possible under the law.

# 1. New Features / Enhancements

InfoInputSolution is a web-based scanning software solution that enables users to scan documents from any remote location and deliver the captured information to an Enterprise Content Management system, for storage or further processing.

New features in InfoInputSolution v.7.0.1:

HTML Client:

- Batch Manager: added a minimum size for the Batch Manager window when opened as standalone, to keep all the internal windows visible

Core Service:

- Introduced the `imagenio` server property that will dictate the method that the Application will use to write files to the file system
- Introduced the `filesystem-perfomance-test.bat` (Windows) and `filesystem-perfomance-test.sh` (Linux) files under the tools directory, to perform tests in the file system and select the most efficient method for the `imagenio` property

Import Service:

- Email Import: implemented an upper limit to the number of emails laoded at a time, to avoid memory loads
- Introduced the `imagenio` server property that will dictate the method that the Application will use to write files to the file system
- Enhanced the Import mechanism with safeguards so the service can recover after errors

Export Service:

- Introduced the `imagenio` server property that will dictate the method that the Application will use to write files to the file system

HTML Service:

- Introduced the `imagenio` server property that will dictate the method that the Application will use to write files to the file system

Database:

- Updated the default SA password for the bundled SQL Express Server

**Classification:**

- Classification Designer: enhanced the keyword zone tester to highlight zones with confidence less than 100%

**Extraction:**

- When the Image Registration fails, a warning message will always be displayed in the Client and all the fields will be set for review
- The *ExtractionData* object will contain the `\n` special character at the end of each line, so it can be used to break lines in custom scripting

**Intelligent OCR:**

- Added new option to retain the extracted entities and OCR data of a page when it's moved or split
- Microsoft Document Intelligence: added support for the *Health Insurance Cards*, *US Tax 1098*, and *Contracts* recognition models
- Microsoft Document Intelligence: renamed some of the recognition models in accordance to the official Microsoft documentation

**Image Enhancement:**

- Added additional options in the Resize Image operation

**New features in InfoInputSolution v.7.0:****Thick / HTML Client:**

- Updated the Login error message when the max user sessions are reached, to be more explanatory
- Created a notification message upon user login to warn them that one of the volume licenses has reached a specific threshold limit. By default, the limit is set to 95% and it can be changed by modifying the `scanapp.client.volume_license_consume_warn_ratio` server configuration parameter

**Thick Client:**

- Updated the Opener mechanism to pass the Windows Authenticode Signature Verification
- Upgraded the bundled Java to a newer OpenJDK version 17.0.9

**HTML Client:**

- Enhanced the HTML Client to support thousands of nodes, both in the View and in the Batch Explorer panels
- Optimized the HTML Service to upload a large batch instantly when discarding/closing it

- Batch Manager: added the option to make the Batch Manager a top-level window that remains open while working on other Client-side tasks
- Point & Click OCR: added the ability to use the pre-generated OCR data in the HTML Client indexing, in a more advanced and user-friendly experience
- Upgraded the Pix Tools for Web to the latest 23.4 version
- Driverless: Added extra configuration settings for the S3000 Kodak scanners
- Updated the Statistical tables to keep track of the indexing keystrokes in the HTML Client

#### Core Service:

- Batch cleanup: Introduced the `batch.cleanup.period.min` server configuration parameter, to determine how often the batch cleanup is executed
- Batch cleanup: Updated the `batch.deletion.threshold` server parameter to `batch.deletion.threshold.min` to allow values less than an hour to be set
- Upgraded the bundled Java to a newer OpenJDK version 17.0.9
- Added REST API endpoints for supporting Core Service functionalities such as Classification and zonal Extraction from third party applications
- Refactored the configuration loading system for the Core and the HTML services. From v.7.0, the `svc-core.properties` and `svc-html.properties` will be empty by default and the default values will be set for all properties. The list with the available properties (if they need to be modified) can be found in the Administrator's Guide
- Apache Tomcat: Upgraded the bundled Apache Tomcat to version 9.0.84

#### Import Service:

- Enhanced the Import Service to monitor in a deeper depth when the *Create multiple batches, one for each subdirectory* option is selected
- Added an extra option for handling what happens when one or more file(s) fail to be imported
- Refactored the configuration loading system for the Import Service. From v.7.0, the `importd.properties` will be empty by default and the default values will be set for all properties. The list with the available properties (if they need to be modified) can be found in the Administrator's Guide

#### Export Service:

- Images Export: Added new conflict actions in case the same file already exists during export
- Images Export: removed the PDF + Text (Searchable) option using the Tesseract engine from the available file formats
- Refactored the configuration loading system for the Export Service. From v.7.0, the `released.properties` will be empty by default and the default values will be set for all properties. The list with the available properties (if they need to be modified) can be found in the Administrator's Guide

**Database:**

- Optimized the database queries for the Batch Manager, the Next indexing task and the Select next indexing task windows
- Optimized the Database polling queries for the Core, HTML, and Export Services

**Job Setup:**

- Added the original Job ID in the General Option tab of the Job Setup
- Enhanced the Javascript editors within the Application to support search, auto-complete, help, and other functionalities

**Workflow:**

- Updated the Step permissions model to only allow one custom permission per step. In case more than one Workflow permissions exist to a system that will be upgraded to version 7, some manual actions need to take place before the upgrade. Please, refer to the [Upgrade Notes](#) section for more information
- Added the ability to create custom activities for server-side Workflow steps
- Implemented public API for creating a custom callback based Workflow actor
- Implemented a public REST endpoint on which third party services will callback into
- Added the ability to suspend a batch for a given time in a custom Workflow actor

**Classification Designer:**

- Allow testing with cloud OCR engines inside the designer, for keyword zones
- Enhanced the test dialog with more panels and visual information for the testing cases
- Added a new Save and Exit button next to the Save one. The Save button can be used to temporarily save the working progress in the dialog, without exiting
- Added a Regular Expressions tester for the keyword classification
- Added support for importing PDF files, both as training and as test images

**Extraction / Intelligent OCR:**

- Google Document AI: added support for the latest API versions 1.3 and 1.5
- Tesseract: Upgraded the bundled OCR engine to version 5

**Image Enhancement:**

- Added a new image operation to rotate an image to 90 degrees left/right or 180 degrees

**Document Split:**

- Added support for the Azure Custom Document Classification module



## 2. Fixed Issues

Fixed Issues in InfoInputSolution v.7.0.1:

Thick / HTML Client:

- Specific PDFs that contain XML attachments failed to be rasterized as images

Thick Client:

- The `itlaunch.txt` is not always updated when a new jar is added under the client directory
- Some Chinese or Japanese characters are not displayed correctly in the document headers

HTML Client:

- The `ScanSinlgeAndInsert` operation may delete all the pages after the one selected, when the browser is extremely slowed down
- Added the exact Application version in the login window
- Duplicating nodes that have not been loaded to the Client yet will cause an error
- The page DPI is changed after adding an annotation
- Advanced Indexing Forms: when the focus is moved to an index field, its text is not entirely selected
- Fixed a synchronization issue where the `pageArrived` hook function was executed before the barcode detection
- The HTML Client fails to launch when the license does not contain volume tokens

Export Service:

- A batch may get stuck at a Processing state for a long time on rare occasions
- SharePoint Export: when the exported batches contain required column(s), the files are uploaded in checked out mode
- OpenText File360: the File360 server starts polling batches before the export is successfully completed
- OpenText File360: the files are exported with incorrect order
- OpenText File360: the folder structure is incorrect during export

Import Service:

- Import configuration GUI: the server configuration properties are not saved

Database:

- Error upgrading a database from version 6.3 when at least one batch contains null priority

**Authentication:**

- The Active Directory authentication does not work due to missing Java arguments
- The Windows Integration authentication does not work due to missing Java arguments

**Intelligent OCR:**

- ABBYY Vantage: if the Intelligent OCR profile does not return any OCR entities, an error occurs during processing

**Extraction:**

- Extraction fails if the document contains more than one page
- Test Zones dialog: fixed an issue where the RegEx similarity is not calculated correctly
- Test Zones dialog: fixed an issue where the extracted value was not populated

**Image Enhancement:**

- The Image Enhancement Actors always run in 2 concurrent threads ignoring the value set in the `svc-core.properties` file
- Testing some heavy Image operations in the 32-bit Thick Client may cause an `OutOfMemory` error

## 3. Known Issues

Known issues in InfoInputSolution v.7.0:

Thick Client:

- In InfoInputSolution v7.0, the bundled Java was upgraded to a newer OpenJDK version 17.0.9. As a result, the Thick Client of older versions won't be able to launch after launching the Thick Client for version 7.0. As a workaround, a user can delete the contents of the `C:/Users/<username>/App-Data/Local/InfoInputSolution` folder and re-launch the Thick Client from scratch. Another workaround would be to launch one Client in 32-bit mode and the other Client in 64-bit.
- The opener mechanism will not work when the browser setting to *Ask where to save each file before downloading* is enabled.
- The Scripting Editors inside the Application may fail to be loaded correctly. Closing and reopening the editor will resolve the issue.

Task Filtering:

- When the Application is connected to a PostgreSQL and a server-side task filter plugin is used, the amount of results retrieved in the Client may be less than expected. For example, if the Batch Manager Dialog has a max row count 1000, then the query will return 1000 batches, but after the plugin(s) is/are applied, the remaining batches may be 800. So the client requested 1000 batches, but received 800 even though there are more in the system.

## 4. Upgrade Notes

The InfoInputSolution v7.0 installer supports both new installations and upgrading an existing InfoInputSolution installation, version 3.x, 4.x, 5.x or 6.x installation.

### 4.1. Upgrade Preparation

#### 4.1.1. When upgrading an existing application server installation, note the following:

- In InfoInputSolution v.7.0, the Step permissions model was updated to only allow one custom permission per step. In case more than one Workflow permissions exist to a system that will be upgraded to version 7, some manual actions need to take place before the upgrade. Run the following query against the Database that hosts the Application:

SQL, PostgreSQL Server:

```
select stepId, count(*)
from ITSCH.WFStepPermissions
group by stepId having count(*) > 1
```

Oracle Server:

```
select stepId, count(*)
from WFStepPermissions
group by stepId having count(*) > 1
```

If the above query returns any results, then this system cannot be upgraded using the standard upgrade procedure and it must be done manually. The Job Setup(s) that contain(s) a Workflow step with more than one custom permissions must be changed and saved before running the upgrade. The custom permissions must be deleted and they can be re-created after the upgrade.

- Any Export Destination plugin, previously installed on the Application Server, must be re-deployed after the upgrade by running the corresponding plugin installer. In that case, the "Upgrade Libraries only" option must be selected, when prompted by the installation wizard.
- After upgrading to InfoInputSolution v7.0, importing Jobs from previous product versions is not supported.
- After upgrading to InfoInputSolution v7.0, the *PDF + Text (Searchable)* option is removed from the

available file formats in the Images Export. A Job that was using this option before, must be re-configured to use Tesseract in an Intelligent OCR step and add the text layer at the Export step.

#### **4.1.2. When upgrading an existing application server installation that uses a Microsoft SQL Server:**

It is required to use at least TLS 1.2 protocol. This is a requirement for JDK 17.0.9 that is bundled with InfoInputSolution v7.0. In case TLS 1.1 or older protocol is used, the 1.2 TLS protocol must be set up in the MS SQL Server. More details and patch links can be found in the link below:

<https://support.microsoft.com/en-us/topic/kb3135244-tls-1-2-support-for-microsoft-sql-server-e4472ef8-90a9-13c1-e4d8-44aad198cdbc>

## **4.2. Upgrade steps**

Before starting the upgrade, take a backup copy of the installation directory and the Application Database. The InfoInputSolution application services must be stopped, using the Administration Utility (Services tab) in the following order:

- InfoInputSolution Import Server (if installed)
- InfoInputSolution Export (Release) Server
- InfoInputSolution Apache Tomcat Server

Finally, close the Administration Utility window, before launching the installer. The wizard will detect the current installation on the server, and the administrator will have to point to the existing installation path.

Following the successful completion of the upgrade, the InfoInputSolution Administration Utility will check the active Database configuration, perform the required Database Schema upgrade and finally, start the corresponding Services.

## 5. System & Environment Requirements

### 5.1. System requirements for the InfoInputSolution

#### Application Server:

##### System Sizing

- Small Volume: 4 concurrent users / 200K pages per year
- Medium Volume 80 users / 10M pages per year
- High Volume: 250 users / 50M pages per year

##### CPU

- Minimum requirement is 6 cores at 2GHz.
- For High Volume systems, the recommended configuration is 32 cores @2.7+ GHz. Contact the Support team for the exact requirements according to the business case.
- When the InfoInputSolution HTML Client is used by end-users, additional CPU is required for the HTML supporting service/process. The hardware specs depend on the use case and estimated load.
- When the InfoInputSolution Classification and Extraction server-side engines are used in the Job Workflow(s), additional CPU is required for the InfoInputSolution Core service/process. The hardware specs depend on the use case and estimated load.
- For virtual environments, features like Intel VT-x / VT-d and AMD V / Vi must be supported by the processors, activated on the machine, enabled in the Virtualization product and activated for the virtual machine.

##### Memory

- Minimum memory size is 6 GB.
- Recommended memory size for High Volume systems is 32 GB.

##### Operating System

- Windows Server (on premises or Cloud) 2012 / 2016 / 2019 / 2022.
- Red Hat Enterprise Linux 7 / 8.
- SUSE Linux Enterprise Server 12 / 15.

##### Disk Storage

- Single server installation: The recommended configuration is a dedicated disk array (RAID 5 or 10) either physically installed on the server, or exported over a dedicated high-speed Storage Area Network (SAN). The minimum configuration is a single disk, again either physically installed in the server, or exported over a SAN.
- Cluster installation: The recommended configuration is a dedicated Network Attached Storage (NAS) unit, using a file system native to the OS of the application servers, connected to the server over a dedicated high-speed network. The minimum configuration is a NAS that can be used by

all nodes in the server cluster.

- SMB v3 compatible Windows Server file storage systems are supported.

### Network

- Single server: The recommended configuration is separate networks for HTTP, Database and storage traffic, if external storage is used. All networks should be at least 1 Gb and all nodes should be attached to the networks through switches. The minimum configuration for Small Volume systems is a single 1 Gb network.
- Server cluster: In addition to the single-server recommended configuration, the recommended configuration for a cluster is to provide additional networks for cluster heartbeat and reverse proxy to cluster node HTTP traffic. The minimum configuration for Small Volume systems is a single 1 Gb network.

## 5.2. Software requirements for the InfoInputSolution Application Server:

Apache Tomcat: version 9.0.84 64-bit (included in the installation package) or any 9.0.x Tomcat version.

### Database

- SQL Server 2014 / 2016 / 2017 / 2019 / 2022.
- Oracle 11.2 / 12.1 / 18c / 19c.
- PostgreSQL 13 or later.
- Azure SQL Server.

### Bundled Database in installer

If during installation, you choose to install a new instance of SQL Server 2019 Express, the operating system must meet the minimum requirements:

- SQL Server 2019 installer will automatically install/enable Microsoft .NET Framework 4.6.
- Windows Server 2012 R2 require KB2919355 before installing .NET Framework 4.6.

For more information, see Hardware and Software Requirements for installing SQL Server 2017 at the Microsoft website.

## 5.3. Antivirus detection/interference

It is possible that an Antivirus program might detect InfoInputSolution or any of its components as a threat. Which would in turn cause instability and block the seamless functioning of the application. In that case it is recommended to whitelist all the directories used by InfoInputSolution as well as the opener on the respective workstations. This includes:

- The installation directory.
- \Users\\.scanclient
- \Users\\AppData\Local\InfoInputSolution
- The opener executable on the respective workstations where InfoInputSolution will be used.

## 5.4. Requirements for Thick Client

Before launching the Thick Client, make sure the user's workstation meets the following pre-requisites.

- Operating Systems: All supported Windows OS versions (Windows 8.1, 10, 11, 2012, 2016, 2019 and 2022, Windows 10 or 11 at Windows 365 Azure Cloud PC). The Thick Client can also be accessed through the Microsoft Azure Virtual Desktop application.
- All contemporary web browsers are supported: Google Chrome, MS Edge, Mozilla Firefox, Mozilla Firefox ESR.
- With version 7.0, running the Application as an Applet inside a browser is no longer supported

## 5.5. Requirements for HTML Client

Before launching the HTML Client application, make sure the user's workstation meets the following pre-requisites.

- Operating Systems: All supported Windows OS versions (Windows 8.1, 10, 11, Windows Server 2012, 2016, 2019 and 2022, Windows 10 or 11 at Windows 365 Azure Cloud PC). The HTML Client can also be accessed through the Microsoft Azure Virtual Desktop application. All supported Mac OS versions.
- All contemporary web browsers are supported: Google Chrome v40+, MS Edge, Mozilla Firefox 40+, Mozilla Firefox ESR 40+, Apple Safari (on Mac OS).