Information Builders

iWay Release Notes

Version 8.0 Service Manager (SM)

DN3502314.1217

Contents

Chapter 1

iWay Version 8.0 Integration Release

This document provides release information for iWay Version 8.0. It is intended for all levels of users, including system integrators, application developers, and administrators. For more information on specific features, refer to the online documentation.

In this chapter:

iWay Service Manager

iWay Service Manager (iSM) is an integration server that ensures rapid access to timely, accurate data across all systems, processes and stakeholders – with unmatched interoperability between disparate systems and data. With iSM, all aspects of your existing infrastructure – every integration, application, and development platform – work in concert with modernized architectures to rapidly develop new business applications, and create powerful, reusable business services from existing applications. This support for modern architectures ensures a highly optimized development environment and rapid creation of internally and externally consumable services.

iSM offers end-to-end integration of the widest variety of sources, including real-time, batch, streaming, big data, structured and unstructured information, cloud-based sources, social network, and machine-generated data.

Installation Notes

This section provides installation notes for iWay version 8.0.

- iWay version 8.0 requires Oracle Java Version 8 as the minimum run-time environment. The recommended release is Java 1.8 build 152.
- iWay version 8.0 requires Java Cryptography Extension (JCE) Unlimited Strength Jurisdiction Policy Files, which can be obtained from the Oracle Java download.
- iWay version 8.0 can be installed on the same environment where previous versions of iWay Service Manager (6.x and 7.x) have been installed. You must follow the proper procedure to migrate an application from a previous version to iWay version 8.0. iWay version 8.0 cannot be overlaid on top of an older version, and must be installed in parallel into an empty location (directory) on the file system.
- iWay version 8.0 does not include migration facilities for design-time artifacts, such as process flows, channels, and other design-time components. This will be addressed in a future update.
- iWay version 8.0 continues to provide a runtime environment for iWay version 7.x based applications. iWay Integration Applications (iIAs) created on iWay version 7.x platforms, can be deployed into the iWay version 8.0 environment and will continue to run.
- iWay version 8.0 includes online documentation, which is located on the iWay Information Center and can be accessed using the following URL:

  `http://ecl.informationbuilders.com/iway/index.jsp`

- iWay version 8.0 does not provide a 32-bit installation, only a 64-bit installation is supported. The installation requires administrative rights for installation and runtime purposes. iWay version 8.0 requires full access to the sub-directories of its installation. As a result, please ensure that the end-user has full access rights.
- On Windows platforms, a deployed iIA will create its own corresponding Windows service. This Windows service is not recreated with each iIA deployment and will retain its properties.

Deprecated Components

This section provides a summary of deprecated components in iWay version 8.0.

- MQSI components have been removed from the product and are no longer supported in this release. If you have a requirement for continuing support for this and related components, please contact iWay Customer Support.
- SOAP over JMS/MQ has been removed from the product and is no longer supported. For alternative approaches, you may use a direct connection to the JMS/MQ components for data processing.
- WAR-based deployment has been deprecated. The ability to create WAR packages has been removed from the iSM Administration Console. You can build iSM WAR packages using the iWay Software Development Kit (SDK). If you require WAR-based deployment support, please provide your use case to iWay Customer Support.
- The Log Event Adapter for Microsoft SQL Server has been deprecated from this release.
- The Emitter object has been deprecated from this release in iWay Integration Tools (iIT). Emitters can be used as part of the channel itself. If you have a use case for accessing Emitters in process flows, open a case with iWay Customer Support and provide full details.
- The following product components have been deprecated and removed from distribution. There are alternatives approaches for achieving the required functionality or the components are deemed no longer viable.
  - Corba
  - Fix
  - Clarify
  - Tuxedo
  - BEA JDBC
  - BEA PS
  - IBO
  - Validation (an older implementation of the QA Service)
  - CS3
  - Lawson Preparser

- Manugistics Preparser
- CDF/CSV (an updated version is available for flat file processing)

Resolved Issues

This section provides a reference to the resolved customer cases in iWay version 8.0. Some of the cases listed in the following table have also been patched to the iWay version 7.x level and have been provided as updates in iWay version 7.0.7 and higher.

IRN Number	Summary
170322037	IPv6 addresses don't work with BAM
170920062	Secure iWay Administration Console
171017020	Need assistance determining connection setup for a BI execution object
171110017	Unable to execute the same web service twice
170628003	SWIFT 2017 - MT535 _90a tag has incorrect ordering of tags in schema
171010067	FTP Agent checking more than necessary directories for an absolute file path
170905002	BAM - Parse And Validate Error
170602012	FTP Dir List Agent with Creation Date and Time
170419047	MQ Emitter for Clustered Queues
160524013	IRN#160524013 xQuery in _IF | iFL Compilation Error
170920037	Adapter - got exception: java.sql.SQLRecoverableException: Closed Connection[StoredProcedure

IRN Number	Summary
171017050	HIPAA - errors seen processing 837P EDI files with new Ebix file provided in case (170927058)
171026024	HTTP Emit Agent does not emit document when content is stream
170124088	Feature request - SFTP - Add Validate Host Keys \ Host Key Repository in service properties
170412006	URL encoding error in listener (or my understanding of how it works)
170227070	Add read to EOL to NTCP listener
170127045	Another FTP connection that will not work
170915006	Channel Redeployment issue
170907055	iSM 7.0.7-P2064.1537 - Error on "put protection" file rename after upload of initial file
170920080	Add another super user / group equivalent to ism.admin
170519046	NFR for role of ism.admin LDAP group in console
170907053	Since the 707 upgrade, the logs are filling up with "ActiveSession" logs at about one log-per-hour
170720085	The JCRAFT API In ISM 800 Needs To Be Updated From Version 0151 TO 0154
170713046	Our ISM/iWay environment suffers from JVM problems

IRN Number	Summary
171006037	HIPAA - errors seen processing 837I EDI files with old and new ebix file provided in case (170927058)
170815027	iWay Service Manager Production License Key Request
161209020	Microsoft Excel tool adapters
170324062	Need to confirm SFTP agents will work with SHA-2 (Prudential is discontinuing SHA-1 support)
170822051	iSM 7.0.5 - FTP agent (not sure which one) - logging "INFO" when I think it should be "DEBUG"
170803013	SFTP emitter - only moves 2 GB for a 4 GB file
170908058	XDFTPClientSterlingUnix - getFTPFile - double path on GET (see 170228094) ComData - Sterling Unix
170629085	iSM 7.0.7 - TLS FTP connection - No trusted certificate found
170809072	XDSQLInsert agent will not accept _flatof() as a value for a User Properties value
170508097	NRF - Want NHTTP listener option to generate an event for POST request
170412046	iWay Cloud Roadmap for BNS
170511059	XDFailAgent - pflow 7.0.5+, Properties has Bypass Catch Processing, XML missing nocatch PROPERTYITEM
161206067	Need a way to get Hex Values to be selectable when creating X12 data

IRN Number	Summary
170725031	ISM for MS Dynamics - Azure Bus
170628033	POC support for Kafka
170515062	File Listener Improper File Reprocessing (8,000+ IDOC upload to SAP)
161219101	Enhancement Request: Schedule Provider Next \ Last Run showing per selected calendar time?
170110025	Pipe with header channel is not stripping out the header record before processing
170412038	Nine digit issue in HWM listener.
170203089	XDSFTPEmitAgent not falling back to SCP like XDSFTPDirectFileTransfer does? (file is as directory?)
170228094	XDNFTPDirectFileTransfer - Not working with ComData (problem when home DIR is not ROOT?)
170321043	iWay is putting a double path when doing an SFTP Dir List when home folder is not root - FirstData
170202086	XDNFTPDirListAgent (ftp.theworknumber.com): Unable to setup file list; '/' is either missing...
161107007	Temp space filling up by iWay Clob queries
160518037	IRN#160518037 TPN web page is not showing anything after signing on
170516027	User can not log into FTP
170612101	iSM 7.0.7 FTP Server listing filenames with directory structure as name

IRN Number	Summary
170411007	nHTTPEmitAgent | POST | MultiPart Data | Content-Type
161021032	Envoy startup issues - random?
170314012	Oracle Apps Procedures schemas are generated with invalid namespace
170103055	XDNFTPEmitAgent - Unexpected exception not triggering catch?
161104067	FTP Operator Delete: General failure: 451 Requested action aborted: session in inconsistent state
170412077	iSM 7.0.7 (and before?) File Emit does not evaluate _sreg() value when setting "Append" property
170327016	How to pass a value from a BI Object to a WebFOCUS variable
170127001	Support STR-Transform for XML Digital Signature
161220053	iWaySDK 7.0.6 won't build due to error not encountered during build in iIT or 7.0.4
161206022	Cannot read and then delete a file in the same process flow using the Samba agent
160919086	RN#160919086 A Oracle SQL query that works in Oracle cannot be run by iSM SQL Object
160804006	IRN#160804006 Salesforce Adapter's persistence not working as expected
160723001	IRN#160723001 _iwexists - (anoy exist rtelated IFL) does not return true if sreg has blank value

IRN Number	Summary
160810059	IRN#160810059 iwayworkdir in console resolving to "base" path instead of iIA path
160720094	IRN#160720094 Error: Error doing runtime transform [xslt]: Document construction [string] failed
123623515	IRN#23623515 Force array on JSON objects
171114041	BAM 7.0.6 anomaly: La conversion d'un type de données varchar en type de données datetime
170829084	Hexadecimal to Text & Vice-versa
171116029	Encountering Invalid Iteration Semantics Error Termination of Process Flow
161221066	Specify SSL Key/Trust-store Alias for SOAP Server
170825068	Transforming from XML to HTML tables only first table gets column HDR definition
170206001	IRL:Testing IRN
170915021	Transform failing to work when using the word Provisionsempfänger in a constant value
170829084	CLONE - Hexadecimal to text and vice versa
170329021	iSM Decision Switch Routing Not Working
170331078	XML to JSON inconsistency handling digits as string

Known Issues and Considerations

This section describes known issues and considerations in iWay version 8.0.

iWay Business Activity Monitor

iWay Business Activity Monitor (BAM) requires the creation of a new database. An existing iWay BAM database (created in iWay version 7.x) can be archived for future access through standard database utilities. There are known issues with the resubmit functionality of iWay BAM in iWay version 8.0, due to repackaging into the application structure. This will be resolved in the next product update. For more information or if you have any questions, please contact iWay Customer Support.

Process Flow Test-Run (z/OS)

On z/OS platforms, a *test run* for a process flow from iWay Integration Tools (iIT) can be performed only against the local configuration or a remote configuration. The *test run* against a test server is not supported at this time.

RTDR Object

There is no RTDR object in iWay version 8.0, which will be returned to the product in a future update. In the meantime, you can access the same functionality by adding a Service object into a process flow, and configure it to call an SQL Batch Insert Iterator (XDIterSQLBatchAdd).

WebFOCUS Support

iWay version 8.0 has been certified with WebFOCUS release 8.0 version 07. There are known issues with accessing WebFOCUS release 8.2 from iWay. For more information, contact iWay Customer Support.

iWay Service Manager

This section provides a summary of the new features in iWay Service Manager (iSM) version 8.0. For more information, refer to the online documentation.

JSON Processing

iWay version 8.0 provides full support for JSON-based data processing. This can be seen in several product areas. For example, the listener configuration for channels has an additional option for JSON as an input format. This will ensure that proper JSON processing is enabled on the data bus. There are also several new JSON services, including a JSON Iterator. There are also new JSON functions for parsing out JSON elements. This support is crucial to the implementation of API management and interactions, but can be leveraged across any applicable protocol for data processing.

Remote Artifact Access

Certain application development designs may require that the application be updated frequently to accommodate a new or an updated component, such as a process flow or a transformation. For example, on-boarding a new partner might require packaging of the new transform, which must be executed for this specific partner. In previous releases, such updates required the application to be rebuilt and redeployed with the new component. This is still a recommended approach, as it provides a guarantee that all related components to the application execution in production are native to the application and are of a given version.

In this release, a new function called *_fetch()* is available, which enables an application designer to create a call to a transform or a sub-flow in a main/central application. Instead of providing a name of the local resource, which must be available within the application itself, the application designer can now configure the fetch call to an external resource, which can reside in another application (such as an application library of resources) or even on a different server in a remote configuration. For more information, see the *iWay Functional Language Reference Guide*.

iWay Business Activity Monitor and iWay Trading Partner Manager

iWay Business Activity Monitor (BAM) and iWay Trading Partner Manager (TPM) have been repackaged and are now delivered through an iWay Integration Application (iIA) with a corresponding deployment template. For more information, see the *iWay Business Activity Monitor User's Guide* and *iWay Trading Partner Manager User's Guide*.

Bearer Token Agent Changes

The Token Field parameter was added to the Bearer Token Service (XDBearerTokenAgent). The default value is *access_token*. As an example, this is the Token Field used by Microsoft Azure. Before the Token Field parameter was created, the hard-coded Token Field name was *token*. To achieve the same behavior, the configuration of the Bearer Token Service (XDBearerTokenAgent) must be updated to set the Token Field explicitly to *token*.

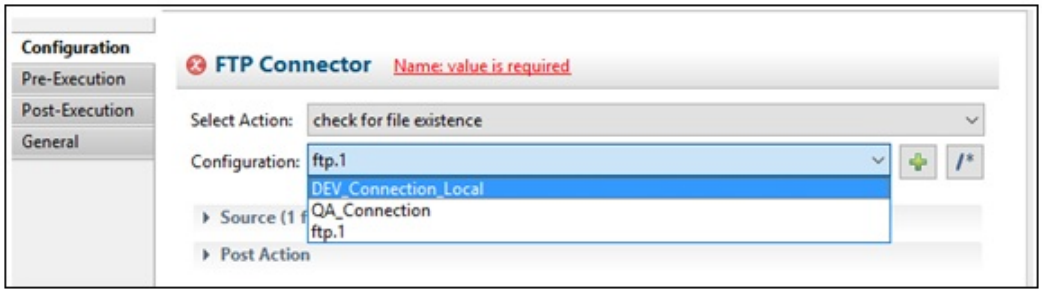
The Expiration Field parameter was added to the Bearer Token Service (XDBearerTokenAgent). The default value is *expires_in*. As an example, this is the Expiration Field used by Microsoft Azure. Before the Expiration Field parameter was created, the service did not look for an expiration field. To achieve the same behavior, the configuration of the Bearer Token Service (XDBearerTokenAgent) must be updated to set the Expiration Token explicitly to *none*.

iWay Integration Tools

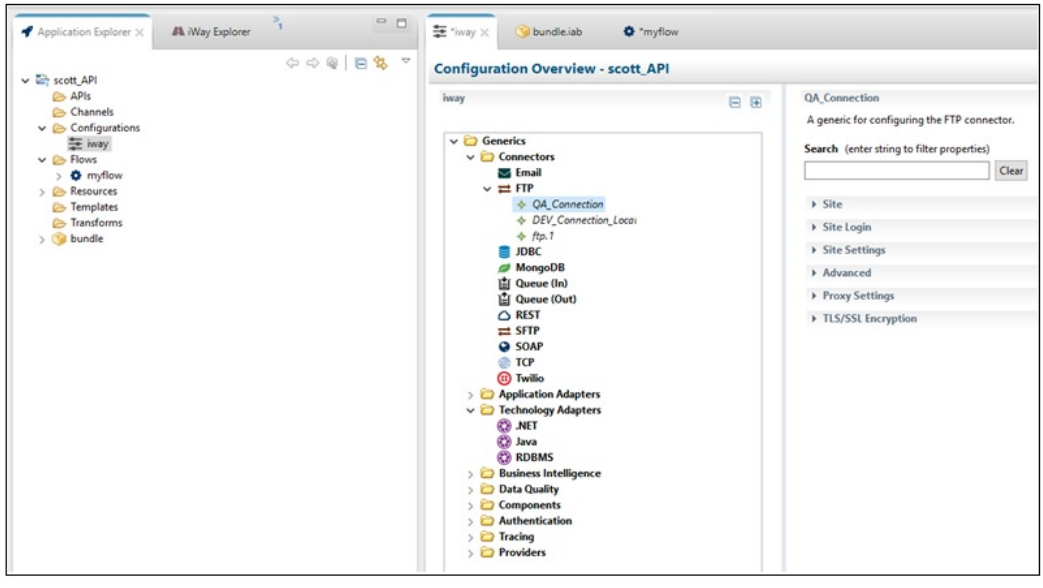
This section provides a summary of the new features in iWay Integration Tools (iIT) version 8.0. For more information, refer to the online documentation.

Configuration Profiles

Configuration profiles, which provide information on connectivity to various systems are also known as *generics*. The generics are pointers to the common connectivity/configuration properties that can be shared across many objects of the same type. For example, multiple FTP components can share the same FTP generic with pre-configured connection information, so you will not need to re-create it for each object. An adapter such as SAP, can have multiple SAP nodes in an application project, which shares the same SAP connection information. Using generics prevent you from having to recreate it for each instance. The configuration profiles can be created during when defining an object (or addition of an object to a process flow) by clicking on the plus sign (+) icon next to it. You can also select an existing profile to use for connectivity. The following image shows a sample configuration for the FTP object.



The configuration profiles are saved and managed in the *iway* configuration file, which is accessible under the Configurations folder of the project. The following image shows the sample *iway* configuration file, where you can update, delete, or add additional components.

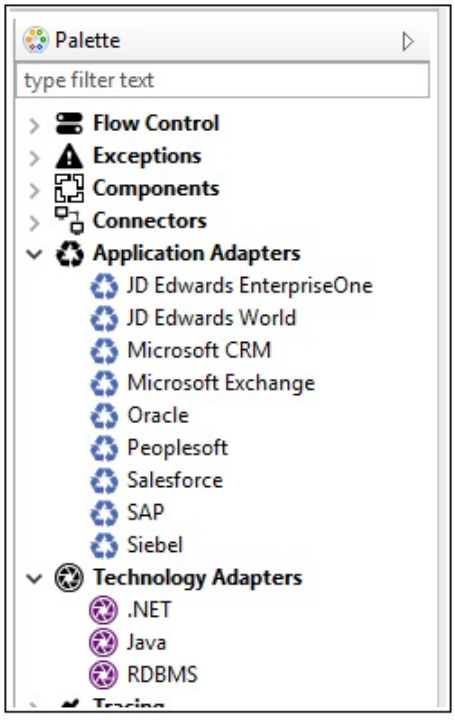


If the generic relies on the user of the provider (for example, a security provider used in secure communication), then the user will have an option to either type in the provider name. This means the user must ensure that the provider exists in the runtime environment and is defined in the deployment template. The user can also create a provider on-the-fly as part of a configuration step for the generic.

This will store the provider in the *Providers* section of the *iway* configuration profile. This creates an inline local instance of the provider, which will then be available during runtime.

Adapter Configuration

In this release, adapters can be configured in-place for quick and direct access as part of the business logic. There is no need to navigate to the iWay Explorer tab to configure adapters. Most common adapters are available through the Palette of the process flow designer, as shown in the following image.



Once the adapter is added to the process flow, the configuration of the adapter is enabled. You can create multiple connection profiles and then simply reuse them across various adapters of same type in the application. You can set the target for adapter execution, generate request/response schemas, and generate sample request/response documents for quick access to all adapter artifacts.

Note: You are responsible for ensuring that the correct dependency libraries for the adapter in use are available in the iWay installation. The iWay home directory also needs to be set in iIT for the adapter to load and be able to connect to the target system.

Application Creation

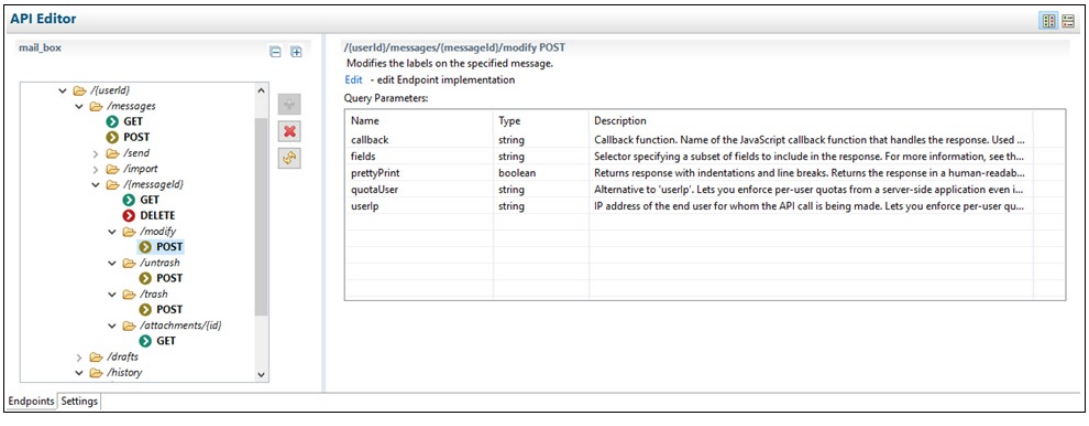
An application project is designed to host all of the artifacts that are required for the application. All of the artifacts within the project are automatically packaged into the deployed application and do not need to be added separately. This approach ensures that the application contains all of the necessary components to run properly and eliminates the need for you to create an application manually.

The default application name is *bundle* and corresponds to the bundling of all of the components. You can change this name value. However, the more important name is the actual deployment name of the application that you assign during the deployment step. To deploy an application, right-click on the application bundle, select *Run As*, and then select *Application Deployment*. Provide the required information, such as the deployment template, the deployment name, and the location of the server where the application should be deployed. You may also choose to automatically start the application.

If you want to update the application components, add or remove resources, then you may do so by double-clicking on the application bundle, which will open an editing utility for the application. You can add or remove various components and resources by clicking through the tabs. This is the same view as was available to users in iWay version 7 of the product.

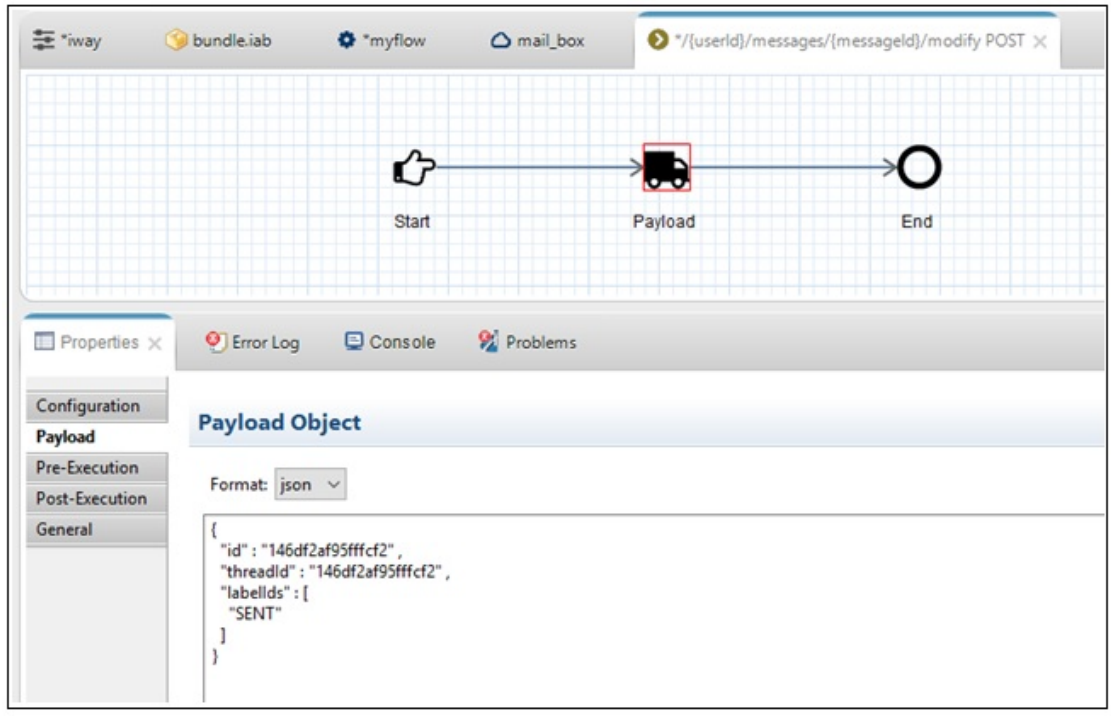
API Hosting

The ability to expose services as callable APIs is critical to a flexible application that enables you to have rapid access to vital callable services. You can create a new API and simply point to a RAML file defining the API endpoints, and then start modifying the associated business logic to each action. For example, the following image shows a mail-box processing API with different end-points. The RAML file is parsed during the load operation. If there are query parameters for a given action, then they are displayed on the right side, along with the description and the full URI call.



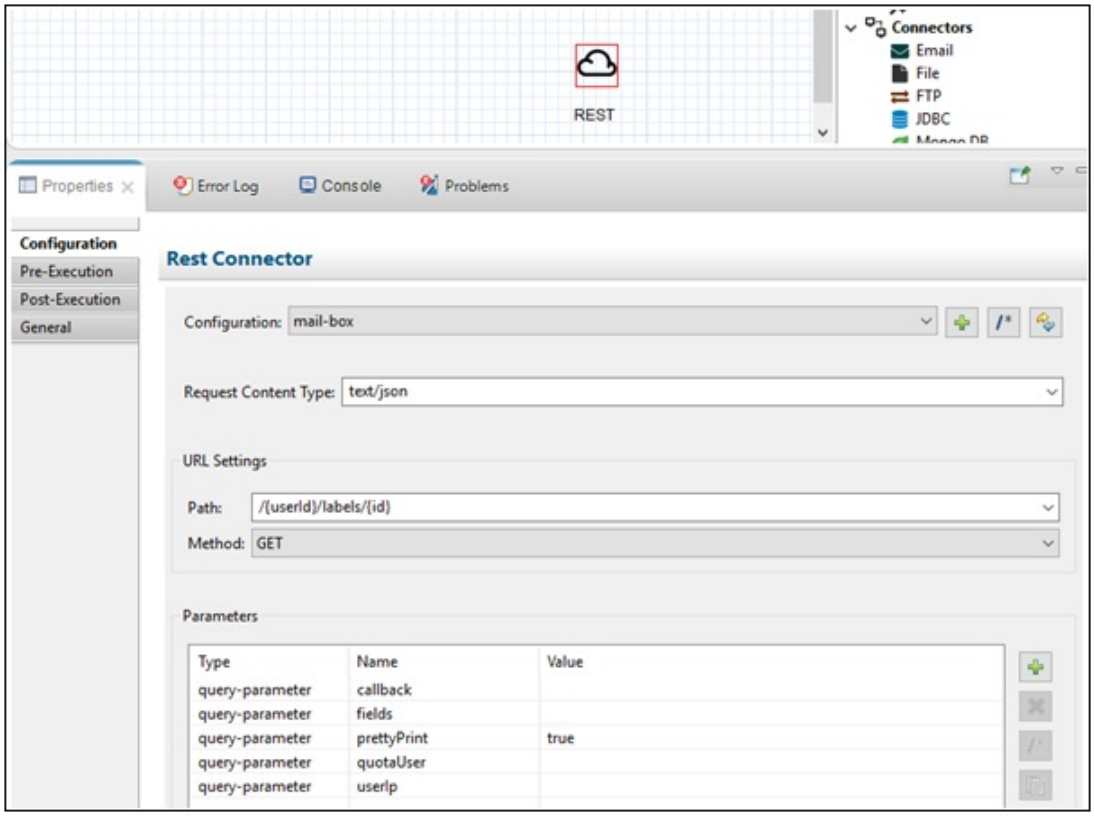
The Settings tab enables you to provide information related to the protocol definition, such as port, security, and other related protocol attributes.

You can click the Edit option on the right to edit the process logic associated with a specific end-point. By default, if the RAML file had a sample response defined, then it will be loaded as a Payload Object in a default process, as shown in the following image. The goal is for you to update the business logic of the process to implement the functionality, which will be hosted by the given end-point.



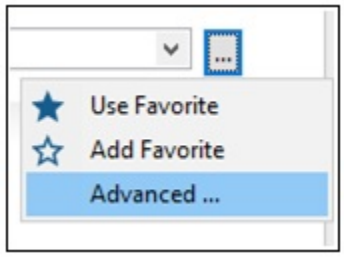
API Consumption (REST Object)

A REST object allows you to call exposed APIs, such acting as a consumer, or simply execute a RESTful call to an external resource. It is configured similar to other objects, where a configuration profile is created. The configuration profile for REST object can point to a RAML file, and if such exists, it is parsed out and yuo can simply select the Path/Method from the drop-down list and provide the requested query parameters. If the RAML file is not available, then you can type in the path and add any URI or Query parameters in the object configuration.

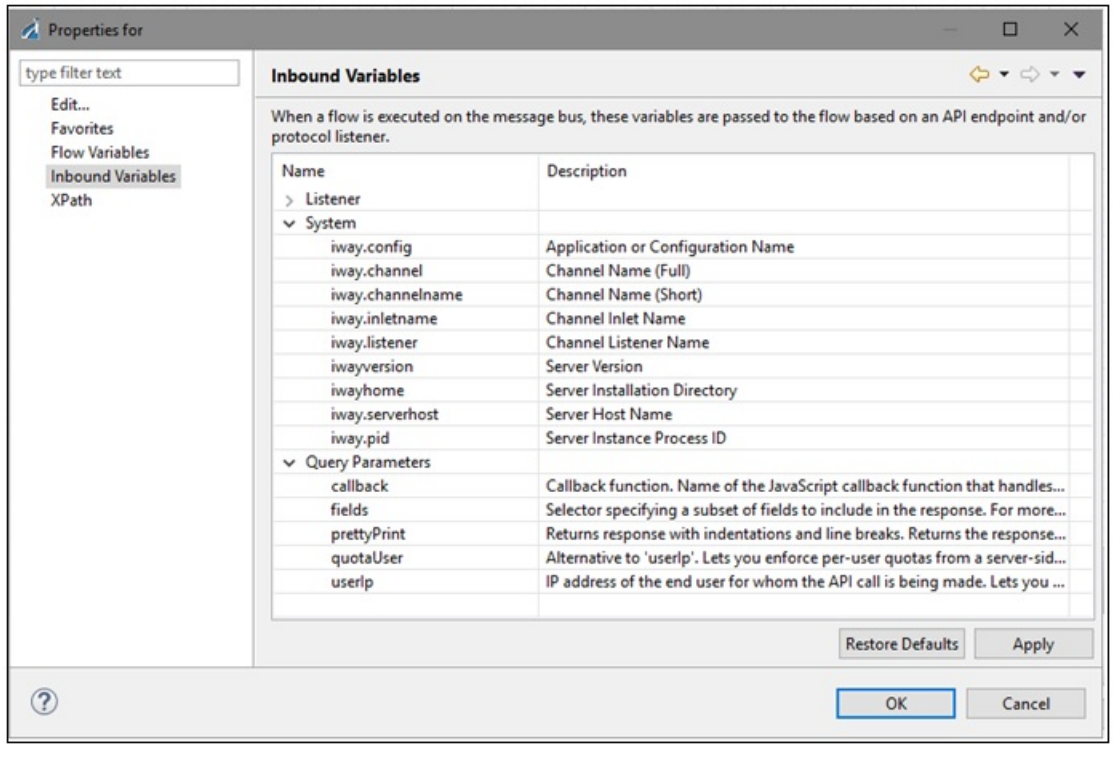


Variable Viewer and Configuration

When you configure any property for an object that accepts a parameter, you can click the *Advanced...* option, as shown in the following image.



This action takes you to the advanced variables viewer. Here you can create an XPath, select defined favorites, or get access to automatically populated and available inbound variables, as shown in the following image.

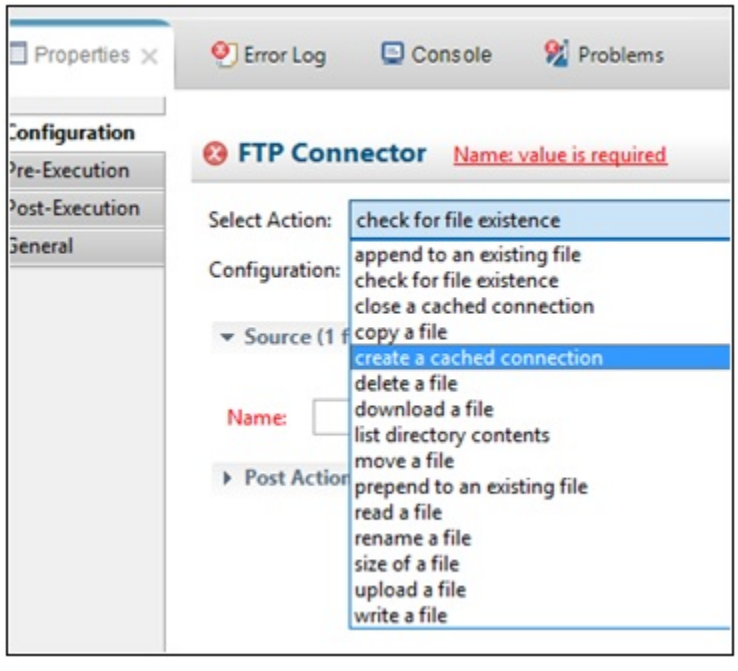


The Inbound Variables are organized into three categories:

- **Listener** provides a list of all supported listeners and the available registers that are set upon runtime. You can simply pick a variable to access for the configuration parameter without having to guess what is available.
- **System** refers to system level variables that are set by the system.
- **Query Parameters** will display for the API end-point and would be available if defined in the RAML file for a given end-point. At runtime they will be predefined and parsed out from the incoming URI. As a result, you are not required to do any parsing on your own, and can simply access the variable directly for further configuration of the process (for example, decision making or a data retrieval query).

Action-Driven Configuration

In this release, the technique used to configure all objects has changed. Instead of having to rely on the knowledge of which service to call, the product expands on the available direct object. Execution objects in the palette provide different action selection that are more user intuitive, such as reading or writing a file. Based on your selection, a proper set of parameters for configuration are presented. The system will automatically choose and configure the proper underlying services based on your selection. You do not need to keep track or have extended knowledge of what services are available. For example, the following image shows various actions available for the FTP connector. Based on the selection, the required properties will be made available.



Transformer

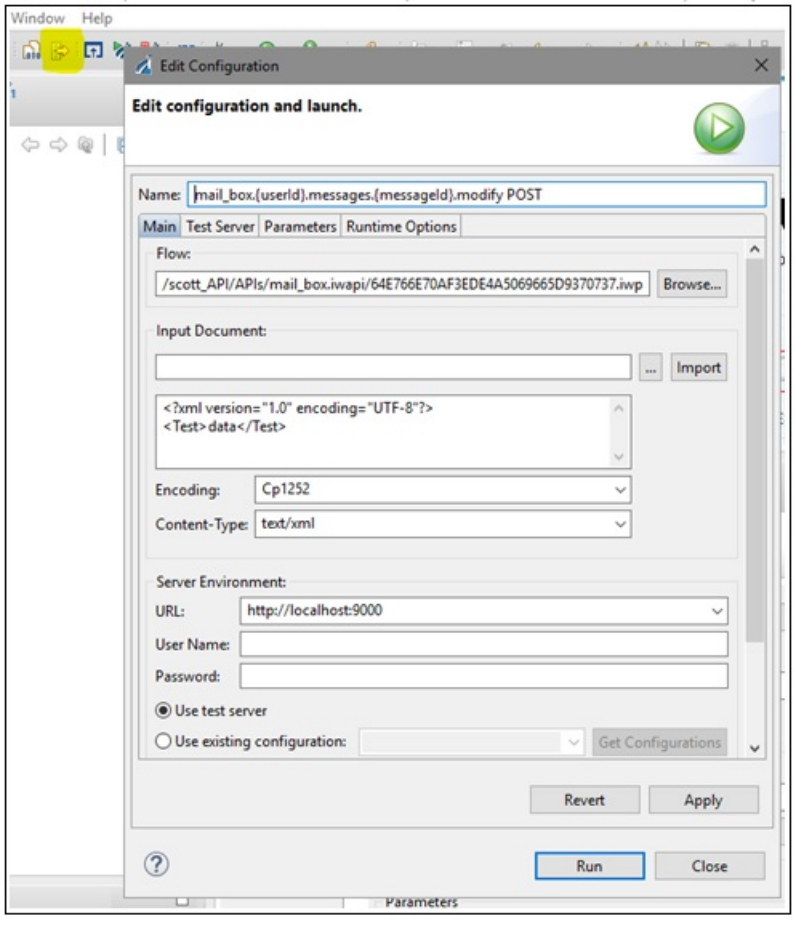
Transformer provides full support for inbound/outbound transformations with JSON. You can easily convert into and out of the JSON format by building a customized transform manually or by pointing to the JSON schema. This enables direct transformation across various formats.

To access available transformations, drag the Transformer object into the process flow design view. You have the option of selecting default JSON/XML transformations, or user created transforms. If you choose to execute an iWay Transform, you will be able to select an existing transform from the drop-down list, or provide a name of the transform to be accessed during runtime, creating a dynamic lookup.

Process Flow Testing

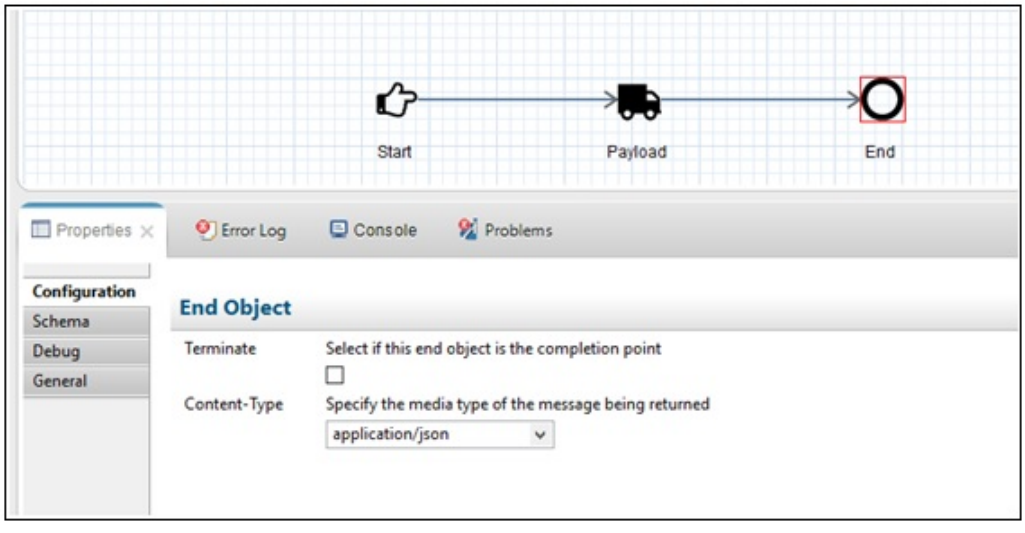
The process flow, which is not attached to the API end-point, can be tested by right-clicking and selecting *Test Run*. If the process flow is attached to the API end-point, then it is not listed in the project folder, but can still be tested. While the process flow is open, click the *Run Flow* icon, as shown in the following image, and the test view is opened. The same approach can be used for any process flow testing, but is required for API testing. In this view, you can provide all of the details for the test-run environment. You also have an option to provide parameters (simulating different test calls), which would normally originate from an incoming URI call.

You can select different request types and provide the proper document associated for testing and in a proper format. This is critical if the testing is done using the JSON format or any other non-XML based format.



Response Content Type

The END object used in process flows now includes an additional option to provide the response content type. This enables control of the response type based on the given execution path within the same process flow. This is also critical when hosting API endpoints, which can return different response types. As a result, the configuration of this option must be unique to each end-point (process flow) and not centralized on the protocol (listener) definition.

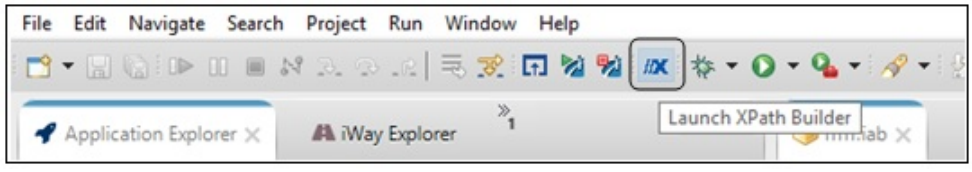


Library Deployment

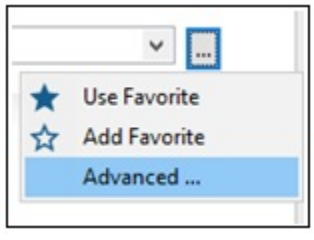
To enable component sharing and accessibility from different applications (which can be achieved using the _fetch() function), users need the ability to deploy a given component directly into the runtime environment. For example, you can deploy a transform or a process flow by right-clicking on it, and selecting the Library and Deploy option. Provide the location of the runtime server and the artifacts will be deployed into the selected configuration. This resource is accessible to any other components within its runtime environment or to components outside its runtime environment through the _fetch() function call.

XPATH Builder

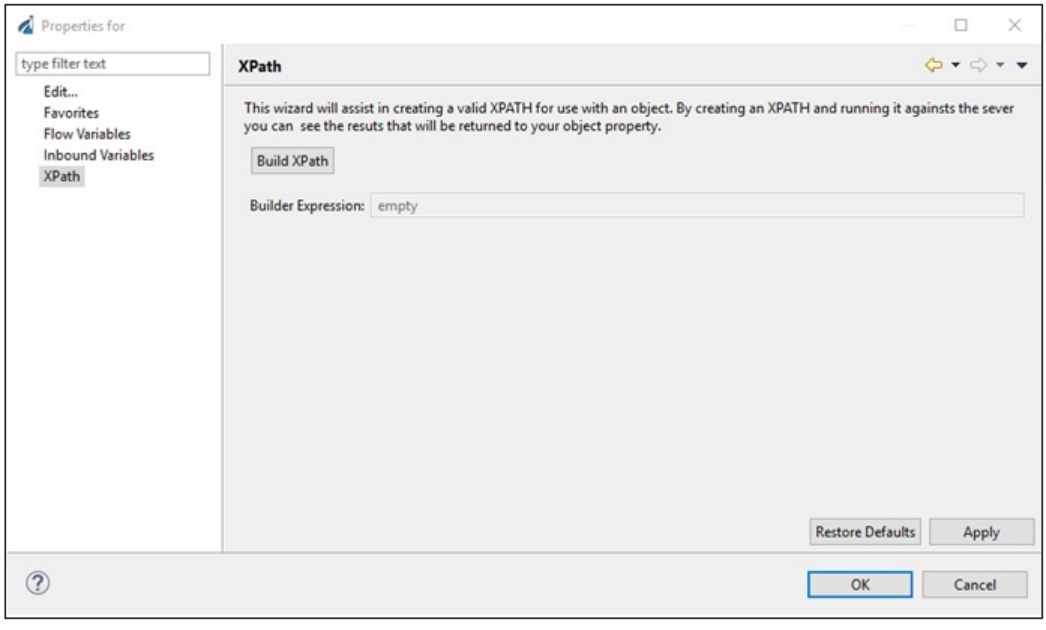
iIT provides access to the XPath Builder from the toolbar. This option enables you to load an XML document and create an XPath statement visually, which can then be copied into the variable, configuration parameter, or any location that accepts XPath.



You can also access XPath Builder at any point during any component configuration. For any parameter that accepts properties, you can click the ellipses button (…) to access Advanced settings.



In the Advanced settings, you can create your XPath, select existing variables, or your favorites for the configuration parameter.



iWay Adapters

This section provides release notes for iWay Adapters in iWay version 8.0.

J.D. Edwards Adapters

- J.D. Edwards EnterpriseOne version 9.2 is supported.
- J.D. Edwards World version 9.3 is supported.

Known Issue

ATE-63 - Responses for Insert and Update operations include a warning message.

MySAP Adapter

Users of the MySAP adapter should migrate to the SAP ERP adapter by obtaining the migration patch. This issue is described in:

ATE-108 - Adapter Migration from MySAP to SAP ERP

SAP ERP Adapter

The SAP ERP adapter is now certified by SAP for CA-ALE and CA-AMS (IDOC) in iWay version 8.0.

Check the SAP Service Marketplace and SAP Note 1077727 for the current SAP JCo release level.

.NET Technology Adapter

There are known issues with the .NET adapter and recent Microsoft patches for Windows 2008, 2010, and 2016.

Currently there is no workaround, but the issue is being researched (IIT-377).

iWay E-Business Adapters

To review the latest release notes for iWay E-Business Adapters, see the standalone *Release Notes for iWay E-Business Adapters* document.

Customer Support

Do you have questions about iWay version 8.0?

Join the Focal Point community. Focal Point is our online developer center and more than a message board. It is an interactive network of more than 3,000 developers from almost every profession and industry, collaborating on solutions and sharing tips and techniques, *http://forums.informationbuilders.com/eve/forums*.

You can also access support services electronically, 24 hours a day, with InfoResponse Online. InfoResponse Online is accessible through *https://techsupport.informationbuilders.com*. You can connect to the tracking system and known-problem database at the Information Builders support center. Registered users can open, update, and view the status of cases in the tracking system and read descriptions of reported software issues. New users can register immediately for this service. The technical support section also provides usage techniques, diagnostic tips, and answers to frequently asked questions.

Call Information Builders Customer Support Services (CSS) at (800) 736-6130 or (212) 736-6130. Customer Support Consultants are available Monday through Friday between 8:00A.M. and 8:00P.M. EST to address all your questions. Information Builders consultants can also give you general guidance regarding product capabilities and documentation. Be prepared to provide your six-digit site code (*xxxx.xx*) when you call.

Feedback

Customer success is our top priority. Connect with us today!

Information Builders Technical Content Management team is comprised of many talented individuals who work together to design and deliver quality technical documentation products. Your feedback supports our ongoing efforts!

You can also preview new innovations to get an early look at new content products and services. Your participation helps us create great experiences for every customer.

To send us feedback or make a connection, contact Sarah Buccellato, Technical Editor, Technical Content Management at *Sarah_Buccellato@ibi.com.*

To request permission to repurpose copyrighted material, please contact Frances Gambino, Vice President, Technical Content Management at *Frances_Gambino@ibi.com.*

Information Builders

iWay Release Notes

Version 8.0 Service Manager (SM)

Information Builders
Two Penn Plaza
New York, NY 10121-2898

Printed on recycled paper in the U.S.A.