



INTEGRATION MODULE FOR ORACLE

For Keverion Runbook Studio and Azure Automation

Release Notes

Version 2.6

January 2024



Introduction

The *Kelverion Integration Module for Oracle* is an Integration Module for *Runbook Studio* and *Azure Automation* that lets you manipulate and query data in Oracle databases. The Kelverion Integration Module for Oracle is Microsoft Azure Certified.

The integration module includes the following activities:

Delete-OracleRow	Delete rows from a database table
Insert-OracleRow	Insert a row into a database table
Invoke-OracleProcedure	Run a stored procedure
Invoke-OracleCommand	Run a script containing SQL statements supported by Oracle
Select-OracleRow	Select rows from a database table using easy-to-use filters
Update-OracleRow	Update rows in a database table

System Requirements

The Integration Module for Oracle requires the following software to be installed and configured prior to implementing the integration.

- Kelverion Runbook Studio 5.6.1
- Microsoft .NET Framework 4.7.2

Oracle database requirements:

- Oracle 18c
- Oracle 19c
- Oracle 21c
- Oracle 23c

Installing the Integration Module

The easiest way to install and deploy the Integration Module for Oracle is from the PowerShell Gallery, but you can also download the module from Kelverion and perform the steps manually.

You must install and deploy the Integration Module to each Azure Automation Account and Hybrid Worker host system that you plan to use to run your runbooks. You must also install the Integration Module on any Runbook Studio host systems that you will be using to build and manage your runbooks.

Using the PowerShell Gallery

Using the commands in the **PowerShellGet** module you can download the Keverion Integration Module for Oracle from the PowerShell Gallery and install it on your local computer. You can also deploy the module directly from the PowerShell Gallery to any of your Azure Automation Accounts.

Install the Integration Module on your local computer:

1. Confirm that you the PowerShellGet module installed.
2. Start a PowerShell window as Administrator and run the command:
Install-Module -Name Keverion.Oracle -Scope AllUsers

Upload the Integration Module to an Azure Automation Account:

1. Go to the [PowerShell Gallery](#).
2. Click the **Azure Automation** tab.
3. Click **Deploy to Azure Automation**. You will be directed to Microsoft Azure.
4. Select the **Automation Account** that you want to deploy the module to.
5. Click **OK**.

Manual Installation

Alternatively, you can download the Integration Module package from Keverion and deploy it manually to your local computer, hybrid workers and Automation Accounts.

The download package from Keverion includes a **.zip** file containing the Integration Module as well as the User Guide and Release Notes. The following instructions assume that you have unzipped the download package and have access to the **.zip** file containing the Integration Module.

Install the Integration Module on your local computer:

1. Copy the **Keverion.Oracle.zip** file to your local computer.
2. Right-click on the file and select **Properties**.
3. Click the **General** tab. If necessary, click **Unblock**, and then click **OK**.
4. Unzip the **Keverion.Oracle.zip** file.
5. Copy the **Keverion.Oracle** folder to a location in the `%PsModulePath%` path.

Important: When installing the Integration Module on a Hybrid Worker, you must use a location that is accessible to all users of the computer.

Upload the Integration Module to an Azure Automation Account:

1. Sign into [Microsoft Azure](#).
2. Open the Automation Account that you want to upload the module to.
3. Click **Modules** under Shared Resources. The list of installed modules is displayed.
4. Click **Add a module** at the top of the list.

5. In the **Upload File** box, select the **Kelverion.Oracle.zip** file that you downloaded.
6. Click **OK**. Importing the module may take several minutes.

Licensing the Integration Module

Licenses for Kelverion Integration Modules are managed and deployed using the *Kelverion Runbook Studio* and *Automation Connection Assets*.

Register an Integration Module license with Runbook Studio:

1. Open **Kelverion Runbook Studio**.
2. On the **File** tab, click **About**.
3. Click **License Information**.
4. Click the **Integration Modules** tab, and then click **Add License**.
5. Select the integration module license file (.kaml) and click **Open**.
6. You should see your entitlements displayed in the list.
7. Click **OK**.

Important: Entitlements will not display until after the Integration Module has been installed on the Runbook Studio computer.

Create a Connection Asset with a license key and upload it to Azure:

1. On the **Home** tab, click **Sign In**. The Sign In dialog appears.
2. Sign into your account.
3. In the **Active Azure Automation Account** box, select the account that you want to add the connection asset to.
4. Click **New Asset** and then click **Connection**. The New Connection dialog appears.
5. In the **Name** field, enter a name to identify the connection.
6. In the **Connection Type** field, select the desired connection type.
7. Enter the appropriate connection information in the provided fields.
8. Click **OK**.

Update all Connection Assets license keys and upload them to Azure:

1. On the **Home** tab, click **Sign In**. The Sign In dialog appears.
2. Sign into your account.
3. In the Explorer panel, click the **Azure (Online)** group.
4. Right-click the Azure Automation Account that contains the connection assets you want to update, and then click **Update License Keys**. A summary is displayed.

Change History

Version 2.6

- Fixed an issue where the **Select Rows** activity may fail with a *'ORA-00933: SQL command not properly ended'* error when using the **Contains**, **Starts With** or **Ends With** filters.

Version 2.5

- Added support Oracle 21c and 23c.

Version 2.4

- Add database view support to Select-OracleRow.
- Add database view support to Update-OracleRow.

Version 2.3

- Fixed a bug in which providing a number for an INTERVAL DAY TO SECOND column results in an incorrect value being used in the resulting SQL statement used to manipulate or query the database.
- Added support Oracle 18c and 19c.

Version 2.2

- Improved error message when no valid licenses are found.
- Fixed problems with using -Top parameter. Added additional parameters for limiting the number or records that are returned, including **Offset**, **Percent** and **WithTies**. The **Top** parameter can only be used with Oracle 12C or greater.

Version 2.1

- Removed dependency on remote NTP servers.

Version 2.0

- **This version is not backwards compatible with previous versions due to changes to Connection Type used by this module. It is a new integration module with a new name and module identifier.**
- Removed requirement for Keverion Management Server. License files and entitlements are now managed in Keverion Runbook Studio.

Version 1.0

- The Keverion Integration Module for Microsoft Oracle is a new Integration Module for Runbook Studio and Azure Automation that lets you manipulate and query data in Oracle databases.