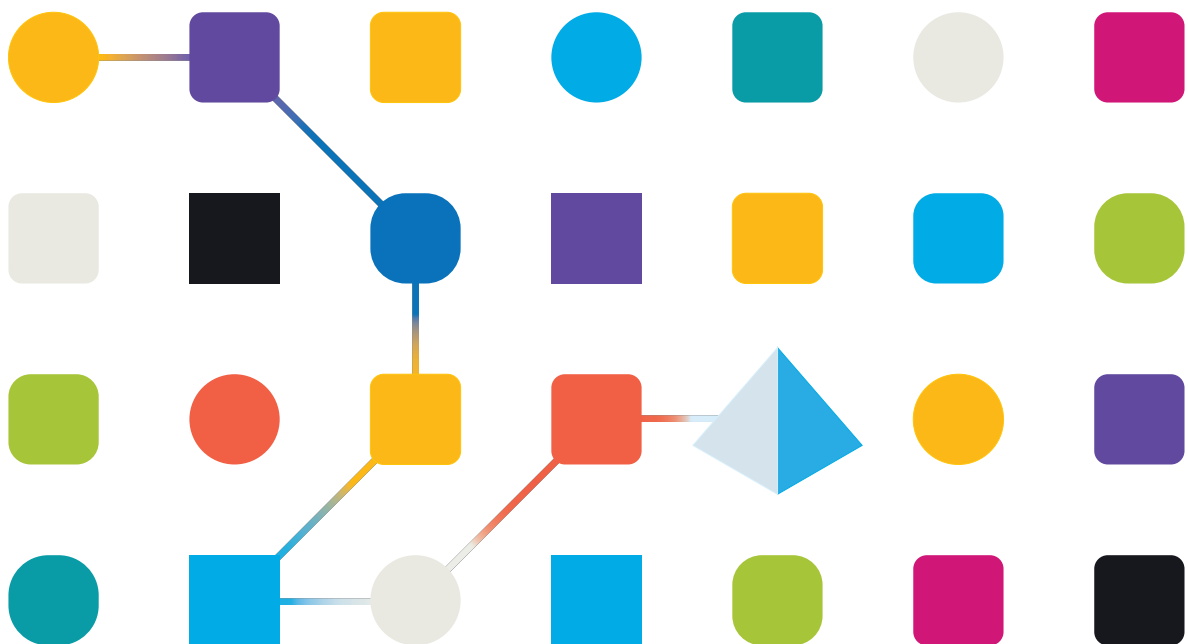# blueprism®

Automation Lifecycle Management 4.5

User Guide

Document Revision: 1.0

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Contents

Automation Lifecycle Management (ALM)

This guide outlines functionality and usage of the Automation Lifecycle plugin. By utilizing ALM, business analysts can capture and document the business process definitions along with the applicable applications and any business exceptions. It is assumed as part of this guide that the user is familiar with Blue Prism digital workfers and has experience with components such as Hub and Blue Prism.

Overview

The Blue Prism Digital Workers provide an unparalleled skill and capability set, with further use cases being addressable with each new release. Whilst capability is important, usability has been equally considered during the delivery cycle, ensuring enterprises are provided with guard rails to ensure best practices are met. The Robotic Process Automation (RPA) and Intelligent Automation (IA) industry has a multitude of methodologies and operating models however these are contained in documents and training materials only. With the development of Blue Prism Automation Lifecycle Management (ALM) capability within Blue Prism® Hub, enterprises early on in their RPA/IA journey can benefit from application driven controls to ensure the key milestones of a successful delivery are met.

Installation and access

To access Automation Lifecycle Management (ALM), the Automation Lifecycle plugin must be installed by an administrator.
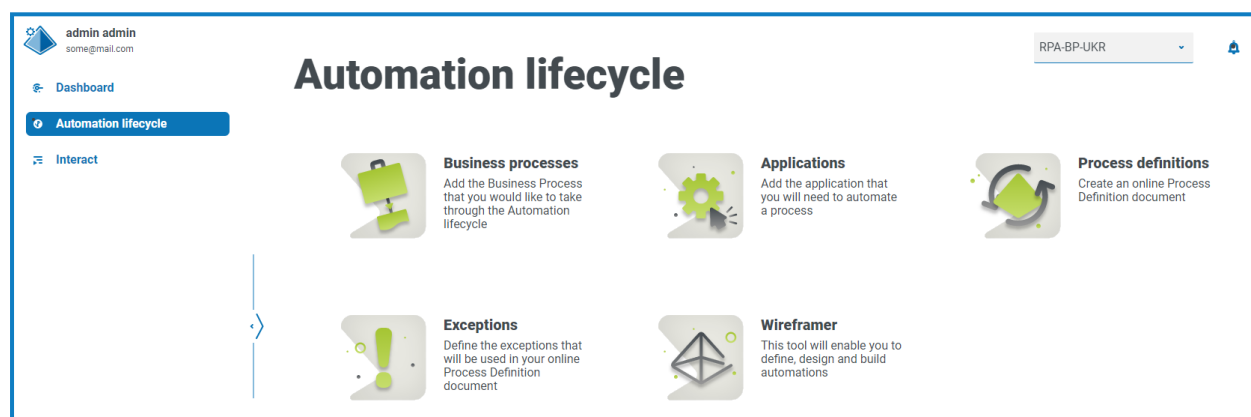
Once the plugin has been installed, it needs to be added to a role and a user then assigned to that role. The plugin can be assigned to the default user role if required or a custom role can be created.

For more information about installing plugins and configuring roles, see the Hub user guide.

ALM is accessible through the Automation Lifecycle menu from the sidebar menu.

The following options are available:

- Business Processes
- Applications
- Process Definitions
- Exceptions
- Wireframer, see the Wireframer user guide for more information.

> To use the full functionality of Wireframer, Blue Prism 6.4.0 or later is required.

The typical flow through the Automation Lifecycle Management functions is as follows:

1. Identify the organization's business processes and determine whether they are suitable candidates for automation.
2. Capture the applications that these processes use.
3. Define the process using process definitions.
4. Capture the low-level steps of the process.
5. Exceptions that may apply to one or more of the business processes is performed.

Though this is a typical flow, once several items have been captured and defined, ALM allows the reuse of parts of a process. This means that common elements can be defined as templates and reused as required. For example, the login process into say Salesforce is the same whether you are creating a new user or creating a new account. Therefore, the defined process steps for *Login to Salesforce* can be defined as a template and used in both processes.

Business processes

The **Business processes** option allows you to define the business processes within your organization.

Once the business processes have been created, they can be viewed, edited, retired or deleted using the icons on the page.
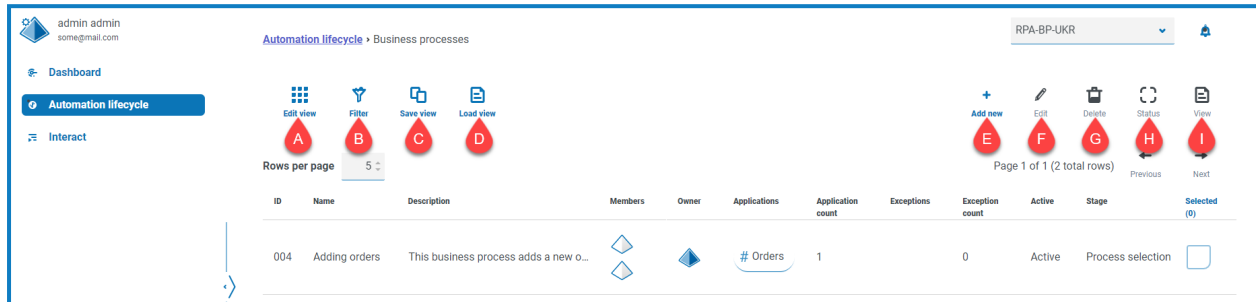
The Business processes page provides you with the following information and functions:

A. **Edit view** – Define the columns that are displayed. You can then show or hide the columns using the toggle switches.

B. **Filter** – Filter the information that is displayed. You can then turn on the required filters and enter or select the appropriate information for display, for example, you could turn on the **Active** filter. By default, the filters are set to show you only your business processes. If you want to see them all, you must change the **Business processes** filter to all.

C. **Save view** – Save your current column settings. You can enter a name for your view to make it easily identifiable when loading views.

D. **Load view** – Load a saved view. You can select the required view and click **Apply**.

E. **Add new** – Add a new business process.

F. **Edit** – Edit the details of the selected business process.

G. **Delete** – Delete a retired business process. This icon is only active when you select a business process that meets specific criteria.

H. **Status** – This icon changes when you select a business process based on the status of the business process.

I. **View** – View the details of the selected business process.

Add a business process

1. On the Automation lifecycle page, click **Business processes**, and then click **Add new**.
2. On the Create business process page, in the Basic section, add the required basic information about the business process:
   - **ID** – A unique number to identify the business process. Companies can define their own identification system which could assist in identification of processes for different departments, for example, Finance, Sales, and so on, or just a unique identification across the organization's processes generally.
   - **Name** – A name for the business process.
   - **Descriptions** – An optional description of the business process.
   - **Stage** – The stages involved in capturing the business process:
      - Process Selection, (default option)
      - Deep Dive
      - Design
      - Development
      - Internal UAT
      - External UAT
      - Live Proving
      - Live
   - **Stage Progression** – A slider that allows you to set how much of the stage has been completed as a percentage.
3. In the Members section, add any key stakeholders that will contribute towards the automation of the business process throughout the lifecycle. If you create a business process, you will be automatically added as a member.
4. In the Notes section, add information about the business process. Only the person who created the business process will have write privileges, everyone else will only have read privileges.
5. Click **Create business process**.

   If the business process has been successfully created, a notification displays in the top right corner.

Edit a business process

1. On the Business processes page, select the check box for the required application.
2. Click **Edit**.
3. Edit the information as required.
4. Click **Save**.

Retire and reinstate a business process

If you retire a business process, any process definitions associated with the business process are also retired.

1. On the Business processes page, select the check box for the required business process.

   If the process is:

   - Live, the Status icon changes to Retire.
   - Retired, the Status icon changes to Make active.

2. To retire a business process:
   a. Click **Retire**.

      A message displays asking you to confirm.

   b. Click **Yes**.

      The business process is retired and the Retire icon changes to Make active.

3. To make a retired business process live, click **Make active**.

   The business process is instantly reinstated and the Make active icon changes to Retire.

   > 💡 You can use the **Active** filter to filter the list for retired business processes.

Delete a business process

You can permanently delete obsolete business processes that adhere to the following:

- The business process is retired.
- It does not have any items attached to it, such as an ALM Process Definition or an Interact Form – If the business process has any of these, you will need to remove the items by either linking them to another business process or deleting them first.
- You are defined as the owner on the business process.

> ⚠ If you delete a business process, it is permanently deleted. You cannot restore a deleted business process.

To delete a business process:

1. On the Business processes page, select the check box for the required business process.

    If the business process is eligible for deletion, the **Delete** icon becomes active. If the icon remains inactive, it indicates the criteria mentioned above has not been met.

> 💡 You can use the **Active** filter to find retired business processes.

2. Click **Delete**.

    A message displays asking you to confirm that you want to delete the business process.

3. Click **Yes** to permanently delete the business process.

Use the filters on the Business processes page

The filters enable you to easily find a specific business process or similar processes based on the selected criteria.

1. On the Business processes page, click **Filter** to open the Filter panel.

2. Use the toggle to turn on the required filter and complete the information to find the required business process. You can apply multiple filters at the same time.

    The available filters are:

Filter	Description
Business processes	Select the business processes you want to view from the drop-down list; the options are: • **My business processes** – Displays the business processes of which you are an owner or a member. • **All business processes** – Displays all the business processes that are available. ✏️ By default, the **Business processes** filter is already turned on and set to **My business processes**.
ID	Enter the full or partial identifier for the business process.
Name	Enter the full or partial name of the business process.
Description	Enter a term or word to search against the text in the business process description.
Members	Enter the user's username, or part of their username.

Filter	Description
Owner	Enter the user's username, or part of their username.
Applications	Enter the full or partial name of the application to see the business processes that are linked with that application.
Application count	Enter a numerical range. If you want to see business processes that are linked with a set number of applications, enter the same number in both fields, for example, 1.
Exceptions	Enter the full or partial name of the exception.
Exception count	Enter a numerical range. If you want to see business processes that are linked to a specific number of exceptions, enter the same number in both fields, for example, 10.
Active	Select the status of the business process from the following options: • **Active** – Displays the active business processes; these are processes that have not been retired. • **Retired** – Displays the business processes that have been retired by an administrator.
Stage	Select the stage from the drop-down list. The available options are the same as those available when adding the business process. For more information, see Add a business process on page 7.
Stage progression	Enter a numerical range reflecting the stage progression percentage. For example, enter 0 in the first field and 50 in the second field to view all stage progression percentages under 50%.

The information on the Business processes page is immediately filtered.

> If you have set the filters but want to view the unfiltered information again, either turn off the required filters, or remove any settings within the filter so that it is blank.

3. Click **Close drawer** to close the filter panel.

Applications

The **Applications** option allows the definition of applications.

Once an application have been created, it can be viewed, edited or retired using the icons on the page.

The Applications overview page provides you with the following information and functions:

A. **Overview** – Changes the view to the Applications overview page. This shows the applications that have been defined within ALM. This is the default view.

B. **Access and permissions** – Changes the view to the access rights and permissions page.

C. **Edit view** – Define the columns that are displayed. You can then show or hide the columns using the toggle switches.

D. **Filter** – Filter the information that is displayed. You can then turn on the required filters and enter or select the appropriate information for display, for example, you could turn on the **Active** filter.

E. **Save view** – Save your current column settings. You can enter a name for your view to make it easily identifiable when loading views.

F. **Load view** – Load a saved view. You can select the required view and click **Apply**.

G. **Add new** – Add a new application.

H. **Edit** – Edit the details of the selected application.

I. **Status** – This icon changes when you select an application based on the status of the application.

Add an application

1. On the Automation lifecycle page, click **Applications**, and then click **Add new**.

   The Create application page displays.

2. Complete the following fields:

   - **ID** – A unique number to identify the Application. Companies can define their own identification system which could assist in identification of applications within different departments, for example, Finance, Sales, and so on, or just a unique identification across the organization's applications generally.

   - **Name** – The application name.

   - **Description**– An optional description of the application.

   - **Version** – The version number of the application.

- **Owner** –The person in your organization responsible for the version deployed and in operation. This could be the Finance Director for applications that are specific to the Finance team and not just an individual who oversees IT.

- **Availability** – The availability of the application. You could set the application to be constantly available or limit its availability to a specific day and/or time. For example, only between 09:00 to 17:30 on business days. This can be used to ensure that backups and maintenance periods are included in the definition of the application.

- **Connectivity Method** – The method of access for the application. Options include:
    - Web Access (Internet Explorer)
    - Web Access (Chrome)
    - Desktop Application
    - Citrix (Application)
    - Citrix (Desktop Application)
    - Remote Application
    - Remote Desktop Application
    - Other

- **Timeouts** – The period of time after which the application will timeout and exit if unused.

3. Click **Create application** to store the information in the Hub database.

   A notification displays to confirm a the application has been successfully created. The application is added to the list in the Application overview page.

Edit an application

1. On the Applications overview page, select the check box for the required application.
2. Click **Edit**.
3. Edit the information as required.
4. Click **Save**.

Retire and reinstate an application

1. On the Applications overview page, select the check box for the required application.

   If the application is:

   - Live, the Status icon changes to Retire.
   - Retired, the Status icon changes to Make Live.

2. To retire an application:

    a. Click **Retire**.

       A message displays asking you to confirm.

    b. Click **Yes**.

       The application is retired and the Retire icon changes to Make Live.

3. To make a retired application live, click **Make Live**.

   The application is instantly reinstated and the Make Live icon changes to Retire.

> 💡 You can use the **Active** filter to filter the list for retired applications.

Set permissions on an application

> ✎ For the on-premise version of the product, the Access and Permissions capability is non-operational. This functionality will be re-introduced in a later version.

Once an application has been added, access rights can be defined.

1. On the Applications overview page, click **Access and Permission**.

   The Applications access and permissions page displays.

2. Click **Add new**.

   The Create application access page displays.

3. Complete the following fields:

   - **Application Name** – Allows you to select a defined application.

   - **Integrated Authentication** – If single sign-on is enabled for the Digital Workers then this option should be selected. This will enable the Digital Worker to directly authenticate inside the application without the need to complete username fields.

   - **Environment** – Allows you to select the environment that the credentials apply to, for example, Production, Development, and so on.

   - **Digital Workers** – Allows you to select the Digital Workers that will be accessing the application.

   - **Expiry Period** – The period defining the frequency that the password is updated. Most organizations utilize Active Directory and Group Policy to define a password expiration date, this field is used to notifying the password expiration period.

   - **Notes** – Allows you to capture any additional information relating to the application access or permissions.

4. Click **Create application process**.

> ✎ You will not be able to perform this step as the functionality is not operational.

Use the filters on the Applications overview page

The filters enable you to easily find a specific application based on the selected criteria.

1. On the Applications overview page, click **Filter** to open the Filter panel.

2. Use the toggle to turn on the required filter and complete the information to find the application. You can apply multiple filters at the same time.

    The available filters are:

Filter	Description
ID	Enter the full or partial identifier for the application.
Name	Enter the full or partial name of the application.
Description	Enter a term or word to search against the text in the application description.
Version	Enter the version number of the application. The will also filter against partial matches, for example, if you enter 1, the filter will also display applications which have versions such as 1.0 and 10.
Owner	Enter the user's username, or part of their username.
Availability	Enter the full or partial text to match against the availability of the application.
Connectivity method	Select the connectivity method from the drop-down list. The available options are the same as those available when adding the application. For more information, see Add an application on page 11.
Timeouts	Enter a time range. The time must be in the format hh:mm:ss.
Active	Select the status of the application from the following options: • **Live** – Displays the active applications; these are applications that have not been retired. • **Retired** – Displays the applications that have been retired by an administrator.

The information on the Applications overview page is immediately filtered.

> 💡 If you have set the filters but want to view the unfiltered information again, either turn off the required filters, or remove any settings within the filter so that it is blank.

3. Click **Close drawer** to close the filter panel.

Process definitions

The **Process definitions** option under ALM allows the creation of electronic versions of the process definition document and their attributes.

A process definition is a document, whether a physical document or an electronic version, that describes in detail a business process. A process definition document should consist of the following:

- A summary of what the overall process and solution is.
- Definitions of unique language used within the business process.
- Scope and expectations as to what the automation should achieve.
- Volumes, how many instances of this task are going to be ran each day.
- Interact design to dictate what the solution would visually look like.
- A list of applications that your automation will interact with as well as their versions.
- A high-level process map of what the goal is.
- Low level steps, keystroke level details of the process.
- Inputs, triggers and outputs relevant to the automation.
- Exceptions, what varying scenarios should you expect and handle.

The process definition is the core tool for the automation developer role, its accuracy and consistency will mean the difference between an average and great automation so ensure the information is complete before starting your work. The build of an automation shouldn't commence without a process definition and so Blue Prism emphasizes the importance of this document.

On the Process definitions page in ALM, the following attributes for a process definition display:

- **Process name** – Name of the process definition. This is inherited from the business process.
- **Version** – The version number of the process definition. See Versioning on the next page for more information.
- **Update note** – The note saved on a process definition when the latest update to the major/minor version was saved.
- **Updated by** – The last user to update the process definition.
- **Update date** – The latest date that the process definition was updated.
- **Sections** – Different sections that make up the process definition.
- **Locked by** – The user who currently has the process definition "open", if appropriate.
- **My access** – The access the current user has on the process definition.

By default, the Process definitions page displays the latest version of each process definition. If you want to view all versions, open the **Filters** and turn off the **Latest** filter. For more information on the filters, see Use the filters on the Process definitions page on page 37.

Versioning

Versioning is the method used to manage the creation and management of multiple releases of process definitions. As they are developed, improved, upgraded or customized users can save versions to capture versions at particular points in time.

There are two versions levels, minor and major versions. A minor version of the process definition is captured every time you save the document. Only an owner or contributor can update to the major version. This would be used typically when a milestone has been reached and the process definition is being sent for review. More details on versioning are included in Process definition sign-off on page 33.

By default, the **Latest** filter is turned on and only the latest versions of each process definitions display. Earlier versions are hidden to provide a clean view. Click **Filter** to display the filters and turn off the **Latest** filter to see previous saved versions.

Add a process definition

You must have a business process defined before you can create a process definition. For more information, see Business processes on page 6.

1. On the Automation lifecycle page, click **Process definitions**, and then click **Create definition**.

   The Create definition page displays.

2. Select the appropriate process from the **Business process** drop-down list.

   The Members and permissions section displays all the users assigned to the selected business process.

> 💡 You can use the **Members** search field to find a specific user. The list of users filters as you type.

3. Set the permissions at the required level. By default, the creator will be the owner and all others will be members. You can change any permission, but you must have at least one owner assigned:

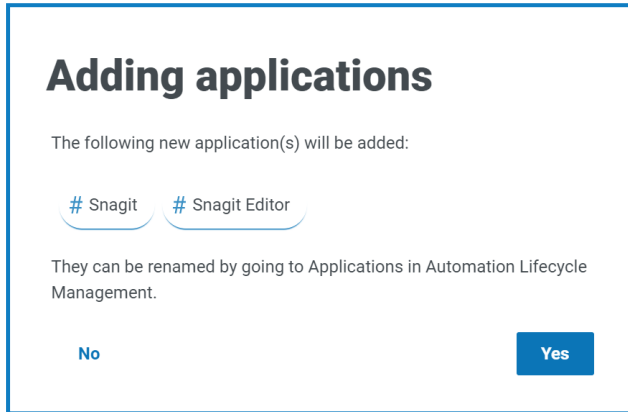| Access Level	Description

Owner	With this level of access the user can read, write, delete and initiate sign-off of the process definition. The user who created the process definition will automatically be given owner rights. In detail, they can perform the following:
	
	• **Edit Definition** – Allows the user to edit the process definition, if it's not locked by another user.
	
	• **Increase Major** – Allows the user to increase the major version of the process definition.
	
	• **View** – Allows the user to view the process definition, they will not be able to edit the process definition in this mode.
	
	• **Edit Access Control** – The user can alter the access privileges of different members. Members are alerted to their access change via a notification.
	
	• **Sign off Options** – This gives the user three options:
	   • **Submit for sign off** – Sends a notification to members letting them know that they need to sign off on the process definition.
	   • **Redact Sign-off** – Owner can redact the sign-off.
	   • **Member Sign off** – View the different members who have and have not signed off.
	
	• **View Update Note** – Allows the user to see the latest update note, date it was updated and the user who updated.
	
	• **Delete** – Reverts the process definition to the previous version. If it is the earliest version, this deletes the process definition entirely.

Access Level	Description
Contributor	With this level of access the user can read and edit the process definition. In detail, they can: • **Edit Definition** – Allows the user to edit the process definition, if it's not locked by another user. • **Increase Major** – Allows the user to increase the major version of the process definition. • **View** – Allows the user to view the process definition, they will not be able to edit the process definition in this mode. • **View Update Note** – Allows the user to see the latest update note, date it was updated and the user who updated.
Viewer	With this level of access the user can read the process definition. In detail, they can: • **View** – Allows the user to view the process definition, they will not be able to edit the process definition in this mode. • **View Update Note** – Allows the user to see the latest update note, date it was updated and the user who updated.

4. Click **Create definition**.

   A notification displays confirming the definition has been saved and the Edit definition page displays. You are now ready to add sections.

Import a Capture JSON file

You can import a Capture JSON file into ALM that has been exported from Blue Prism® Capture. This enables you to quickly transfer processes and further define your process definition in ALM.

The following details are taken from the Capture JSON file and are used to populate the process definition:

- Branch names
- Step numbers
- Step actions
- Step notes
- Images with bounding boxes and obfuscated areas
- Decision steps (up to 15 custom choices per decision step)

Any applications used in Blue Prism® Capture that are not already listed in the Applications page in ALM are added during the import and are automatically assigned a name (the application name referenced in Capture) and an ID.

> ✎ You can import JSON files from Capture versions 1.0, 2.0, and 2.1.

You must have a business process defined before you can import the Capture JSON file. For more information, see Business processes on page 6.

1. On the Process definitions page, click **Import Capture JSON**.

   The Open dialog displays.

2. Navigate to the required JSON file and click **Open**.

3. If prompted, click **Yes** to confirm that you would like to add the Applications that are defined in the Capture JSON file. Any new Applications are added to the Applications page and are available for selection when adding an Action step to a process definition. For more information, see Action.

    You will only be prompted if you are adding new applications which are not already defined in ALM.

    Adding applications

    The following new application(s) will be added:

    # Snagit   # Snagit Editor

    They can be renamed by going to Applications in Automation Lifecycle Management.

    No   **Yes**

    > ✎ You can rename and edit your imported applications in the Applications page, see Applications on page 11.

    The Import Definition page displays.

4. Select a business process from the **Business process** drop-down list to associate with the new process definition.

5. Assign a role to all members of the selected business process.

    Each role gives a different level of access. See Add a process definition for details.

6. Click **Import Definition**.

    A notification displays confirming that the process definition has been created.

    The Edit definition page displays. You can now edit, add, delete, and reorder sections and action steps as required. See Sections and Steps.

> ✎ If any images fail to upload, a warning message displays. If this happens, please note down the affected step numbers, edit the steps and upload the missing images manually.
>
> To manually upload an image to a step:
>
>   1. On the Process definitions page, click **Production**.
>   2. Navigate to the relevant process definition, click **Options** and then click **Edit definition**.
>   The Edit definition page displays.
>   3. Navigate to the required step and click the 🖉 icon.
>   The Edit action step drawer displays.
>   4. Navigate to the upload area. You can drag an image file into the upload area or click **Upload** to select a file from your machine.
>   5. Click **Save**.

Sections

A section is a group of steps that describe a combined part of the process, for example, the 'Login steps' into an application. Using this structured approach enables the users to create 'reuseable' sections which can be stored as templates and reused in other process definitions. See Templates on page 42 for more information.

Add sections to a process definition

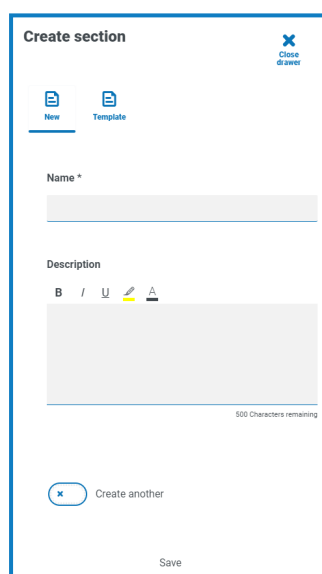If you have just created a new process definition and now want to add sections, go to step 2.

> You can not edit a process definition which has been sent for sign off. When you click **Options**, you will see that the **Edit definition** option is inactive. For more information, see Process definition sign-off on page 33.

1. On the Process definitions page, click **Options** next to the required process and click **Edit definition**.

   The Edit definition page displays.

2. Click **Add Section**.
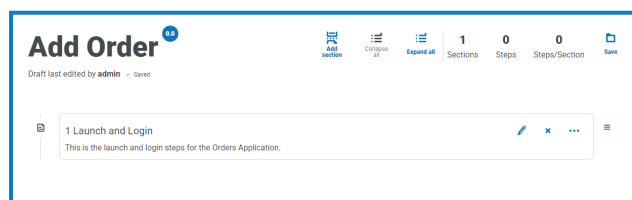
   The Create section panel displays.

3. Enter a name and an optional description of the section being created. Alternatively, you can click **Template** and select a template for the section.

4. Click **Save**.

   The section is added to the process definition.

   As more sections are added, the order can be amended by dragging the section to the required place. The icons next to the section enable you to edit the section, export to a template, or delete it from the process definition.

5. Repeat this process to add further sections.

    You are now ready to add steps to your sections, see Steps below.

6. Click **Save** on the Edit definition page to commit the sections to the process definition.

Steps

Steps are the tasks that the human worker would undertake to perform the business process. They are the actions, for example, input username, input password, click login button, and then a decision to check that the credentials were correct. There are fours types of steps you can use, these are:

- Action – This allows you to define an action for your application.
- Decision – This allows you to insert true/false or multiple conditions.
- Email – This allows you to include an email step within your process.
- Object – This allows you to add Blue Prism Object to your process definition.

Action

Actions are used to configure the steps a user would perform in a screen such as input data into a field, click a button, close an application.

An action step is configured using the following fields:

- **Application** – Select the required action from the drop-down. Each currently defined application is available.
- **Screen name** – The name of the screen in the application on which the action will occur. As you start to type the screen name, a list of possible names will appear that have been created earlier. If reusing an existing screen name, you can select it from the list. If it is a new name, type the name and then move to the next field to create the new screen name.

- **Action** – The type of action the step will perform:
  - **Input** – Inputs data into a field.
  - **Key press** – Presses a key on the keyboard.
  - **Read** – Reads data from a form or field.
  - **Select** – Selects an option, for example, a drop-down menu item.
  - **Launch** – Launches an application.
  - **Close** – Closes an application.
  - **Drag and drop** – Allows a data item to be moved between two applications.
  - **Click** – Presses a button or file menu item.
  - **Click hold** – Clicks and holds a button or item on the screen.
  - **Click release** – Releases a button or item currently being held by the **Click hold** action.
  - **Triple click** – Triple-clicks a button or item on the screen.
  - **Double click** – Double-clicks a button or item on the screen.
  - **Right click** – Right-clicks a button or item on the screen.
  - **Terminate** – Terminates the application following an exception.
  - **Custom** – Allows you to create a custom action by entering a name into the **Custom name** field.
- **Element name** – Enter a name for the element that will enable the automation developer to recognize the field that the automation will interact with, for example, username, password, or login button.
- **Route to** – Determines what happens when the step is complete:
  - **Next step** – Moves to the next step in the process.
  - **TBC** – A placeholder that is useful if the required step has not yet been configured.
  - **End** – The end of the process. Each process must finish with a step that routes to End.
- **Image** – Take a snapshot of the application showing the fields and the buttons. The automation developer can then review this during the build to ensure that they are on the correct screen within the application. This also ensures they can recognize fields and buttons correctly.
- **Description/summary** – An optional description of the step.

To quickly add the next step in the process, select **Create another** before saving. When you click **Save**, the dialog will refresh allowing you to quickly configure the action.

Decision

A decision determines what option should be taken if more than one outcome is available. The process can continue to the next step or another defined step. In the example below, a decision has been added after the login button has been pressed. The decision checks whether the incorrect username or password dialog displays. If neither appears, then a decision needs to be made as to the next step undertaken.

A decision step is configured using the following fields:

- **Type of decision** – The options that are available for the decision. This could be true/false or a custom choice.

- **List of choice** – The options available. Once selected, configure what will happen when the outcome of the choice occurs, such as progress to a specified stage.

> 🖋 You can add up to 15 custom options per decision step.

Email

If a business process includes sending an email, configure the contents and recipients in an email step.

Object

Incorporate Blue Prism business objects in process capture.

An object step is configured using the following fields:

- **Environment** – The Blue Prism environment in which the business object/utility file is located in.
- **Utility** – The name of the business object/utility file that the automation developer will use to call the required action.
- **Action** – The required action that the developer will use from the business object/utility file.
- **Route to** – Determines what happens when the step is complete.

Add steps to a process definition

1. From the Edit definition page of a process, navigate to the required section of the process definition, then click the ellipsis icon within the section and select **Create Step**.

   The Choose step type dialog displays.
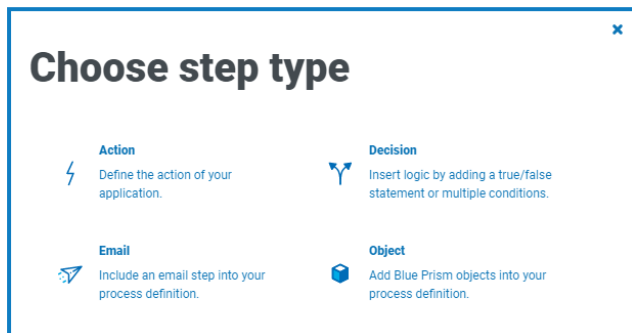
   > You can also add steps above or below an existing step by clicking the ellipsis icon within an existing step and selecting **Add step above** or **Add step below**.
   >
   >
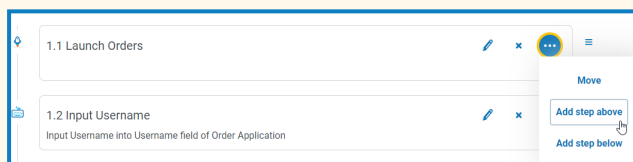
2. Select the required step type:
   - Action
   - Decision
   - Email
   - Object

3. Configure the step.

4. Add and define all the required steps until you have built up the complete process.
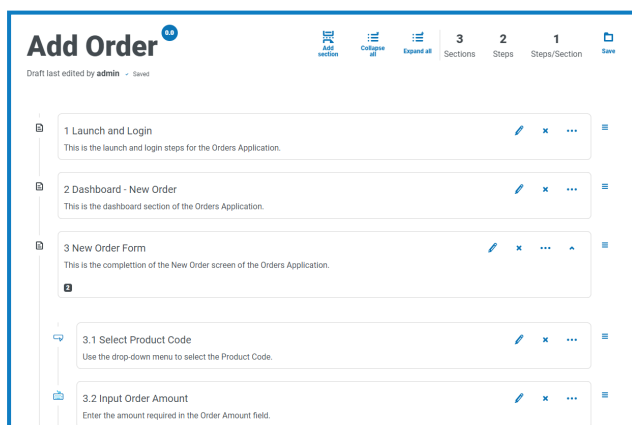
   > The final step in a business process must be the steps required to exit the application and the final step needs to include a route to End.

5. Click **Save** to create a minor version of the process definition. See Versioning for further information.
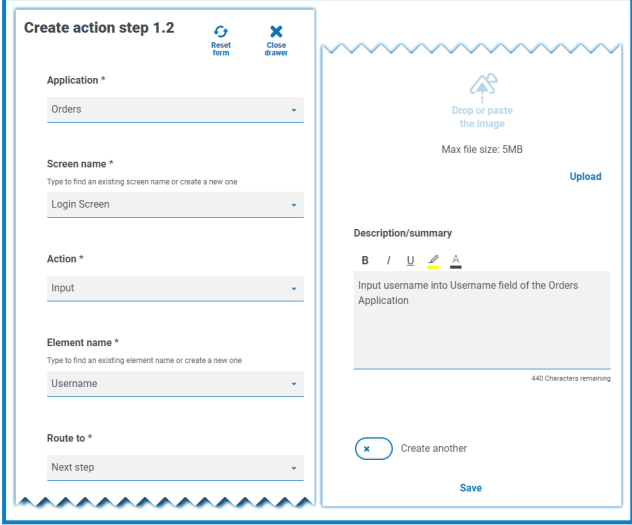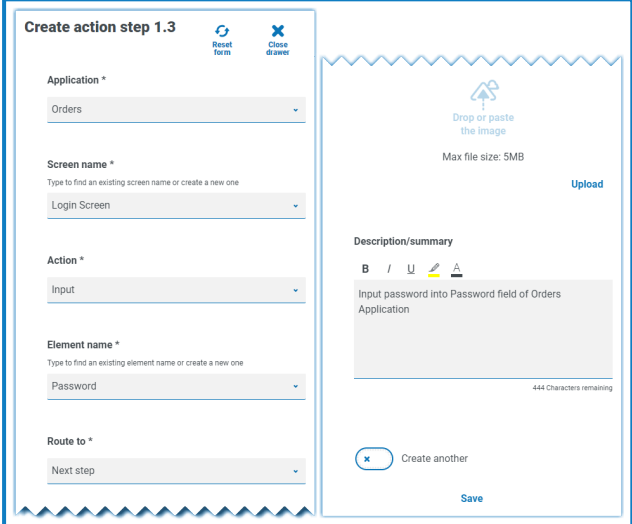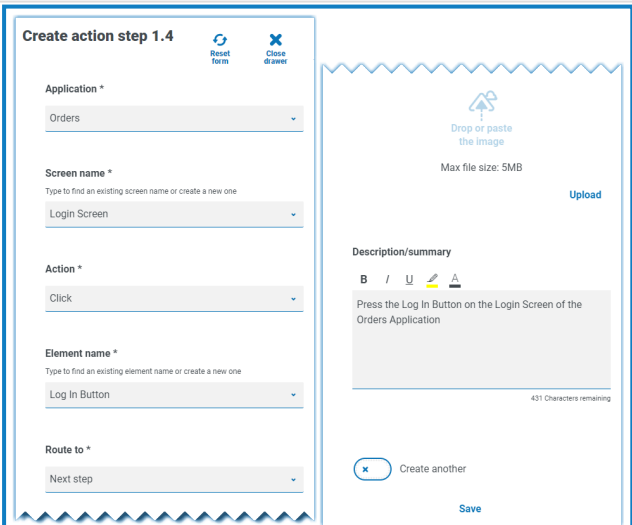
   The Increase minor panel displays.

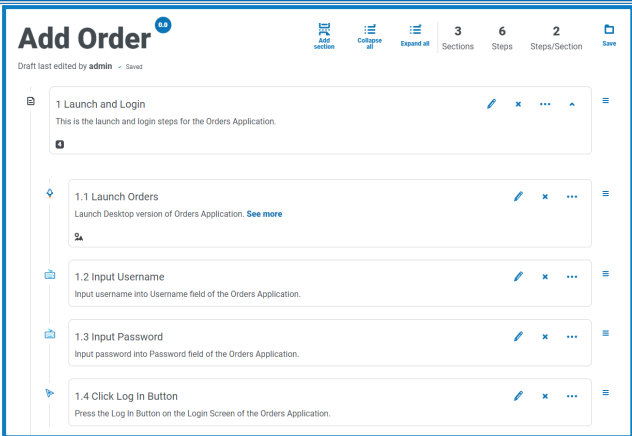6. Enter a description to remind you where you are up with the process and click **Save**.

The Process Definition screen displays, updated to show the latest version of the process definition.

Example: Add a login section

This example demonstrates how to create the steps for a simple application login.

Step	Example screen	Details
1		**Launch the application** Open the selected application on the login screen and proceed to the next step: • **Action** – Launch • **Application** – As required • **Route to** – Next step

Step	Example screen	Details
2		**Enter a username** Enter a username in the Username field on the Login screen and proceed to the next step: • **Action** – Input • **Application** – As required • **Screen name** – Login screen • **Element name** – Username • **Route to** – Next step
3		**Enter a password** Enter a password in the Password field on the Login screen and proceed to the next step: • **Action** – Input • **Application** – As required • **Screen name** – Login screen • **Element name** – Password • **Route to** – Next step
4		**Click the log in button** Click the Log in button and proceed to the next step: • **Action** – Click • **Application** – As required • **Screen name** – Login screen • **Element name** – Log in button • **Route to** – Next step

Step	Example screen	Details
5		**Process complete** All the required actions have been completed and are listed on the Edit definition page.

Rearrange sections and steps

You can drag a step to a new position in its current section, or drag it to a new section. You can also drag sections to reorder them.
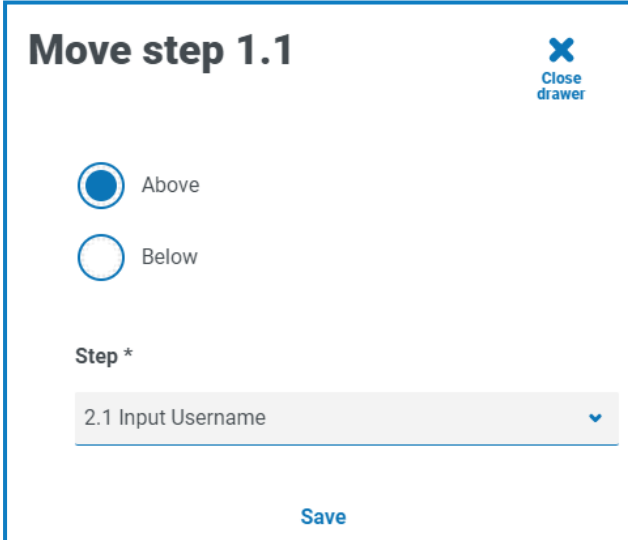
To click and drag a section or a step to a new position:

1. Click and hold the ☰ (grab) icon next to a section or step.

2. Drag the section or step to a new position.

To move a section or step to a specific position:

1. Click the ellipsis icon in a section or step and click **Move**.

   The Move (section or step) dialog displays.

2. Click either **Above** or **Below**, then click the **Section** or **Step** drop-down arrow and select the position. The drop-down list contains all the available sections and steps in the process definition that you can move your selected section or step above or below.

3. Click **Save**.

   The section or step moves to the specified position.

# Add an exception to a process definition

Exceptions can be added to a process to cater for unexpected occurrences when running a process. You will need to have created at least one exception before following the process below.

For information about creating exceptions, see Exceptions on page 39.

1. On the Process definitions page, click **Options** next to the required process and click **Edit definition**.

   The Edit definition page displays.

2. Locate the step that requires an exception.
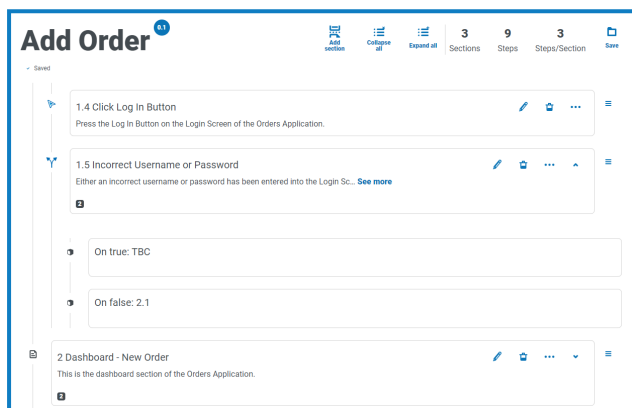
3. Click the edit icon ✎ next to the step.

   The Edit page displays for the step type, for example, the Edit decision page.

4. Select the required exception for this choice. You can:

- **Use an existing exception** – Select an exception from the drop-down list.

  In the example below, the Incorrect Credentials Supplied exception is being added to the Incorrect Username or Password step.

- **Enter a new exception** – If the required exception has not yet been created, you can create the skeleton of an exception by selecting **Add new exception** and entering a new name.

For further information, see Exception pending below.

5. Click **Save**.

Exception pending

If you have selected **Add new exception** for a step choice, when you save the step, a flag is added to the step in the process definition to show that it references an exception that has not yet been populated.

Click the **Click here** link in the flagged step and configure the exception as described in Exceptions on page 39.

Process definition sign-off

In the Automation Lifecycle plugin, the users with the Process Definition Owner role can initiate the sign-off procedure. This workflow usually occurs when all the sections and steps in a business process have all been captured.

Submit for sign off

Once a process definition has been fully configured, you can send it to be signed off by the appropriate people in your organization. Each person must have a valid login so they can be selected to sign off the process definition.

1. On the Process definitions page, click **Options** next to the required process and click **Sign off options**.

   The Sign off options dialog displays.
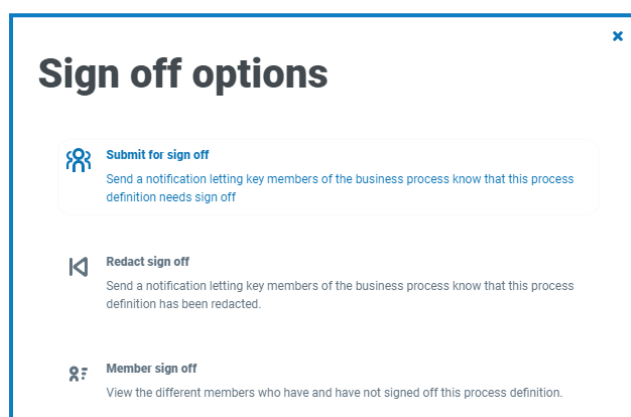
2. Click **Submit for sign off**.

   The Select required members page displays.
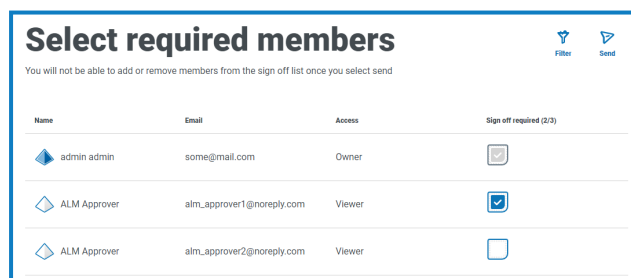
3. Select the members who are responsible for signing off the process definition. You will not be able to change the signatories once you have sent the process definition for approval, unless you redact the sign off process.

4. Click **Send**.

   The selected users are sent a notification telling them that the process definition needs to be signed off.

Sign off a process definition

When a business process owner initiates the sigh-off procedure, the required members receive an in-product notification letting them know that sign off is required.

Once signed off, you have the option to redact the definition until the sign off process is complete. Once every member has approved and signed it off, you will no longer have this option. Only the owner of the process definition will be able to redact the sign off at that point.

To sign off the process definition:

1. On the Automation lifecycle page, click **Process definitions** to view all the definitions.

   > 💡 To limit the list of process definitions to those that require sign off, click **Filters** and set the **Signed off** filter to **Required**.

2. Click **Options** next to the required process and click **Sign off process definition**.
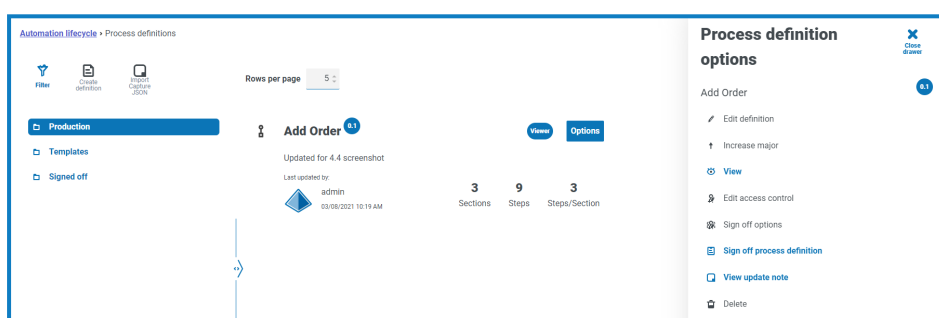
   The Sign off dialog displays asking you to confirm that you have reviewed the process definition in accordance with best practice, and that you want to sign it off.
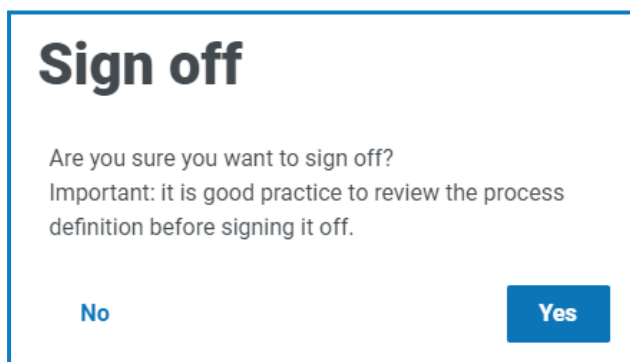
3. Click **Yes**.

   The process definition is signed off and a notification message displays. A notification is also sent to the business process owners.

Redact sign off

When a process definition has been sent out for review, it is locked for editing. Only an owner can redact this process. However, a reviewer can redact their own review, providing this is done prior to all other reviewers completing their review. Once all reviewers have either approved or rejected the sign-off process the only individual who can remove the lock, whether through redaction or acceptance is the owner of the process definition.

To redact your review:

> 💡 To limit the list of process definitions to those that you have sign off, click **Filters** and set the **Signed off** filter to **Approved**.

1. On the Process definitions page, click **Options** next to the required process and click **Redact sign off**.

   The Redacting process definition dialog displays asking you to confirm your redaction.

2. Click **Yes**.

   Your sign off is redacted and a notification message displays.

To redact the review process – this has to be performed by the process definition owner:

1. On the Process definitions page, click **Options** next to the required process and click **Sign off options**.

   The Sign off options dialog displays.

2. Click **Redact sign off**.

   The Redact definition dialog displays asking you to confirm the redaction.

3. Click **Yes**.

   The sign off is redacted and a notification message displays.

Member sign off

This option lets you to keep track of the sign-off and check the status of the sign-off for each member. The page shows the members name, email address, sign-off status and sign-off date time. There are three possible sign off states:

- **Awaiting Sign-off** – Member has not signed-off yet.
- **Redacted Sign-off** – Member had signed-off, however has chosen to redact the initial sign-off.
- **Signed-off** – Member has signed-off.

The process definition will not appear in the Signed off folder on the Process definitions page until all members have signed off the process. If any members redact their sign off, the process definition will appear in the Production folder.

To view the member sign off:

1. On the Process definitions page, click **Options** next to the required process and click **Sign off options**.

   The Sign off options dialog displays.

2. Click **Member sign off**.

   The Member sign off status page displays.

Other features

A number of other features are available when you are viewing and editing processes definitions, as described below:

- Expand or collapse individual sections by clicking on them.
- The **Collapse all** and **Expand all** icons expand or collapse all sections.

In addition to the features listed above, the following features are available when you are editing processes definitions:

- Grabbing the ☰ icon next to the step or section allows you to drag and drop the item elsewhere to update the order.
- The icons in the section or step allow you to edit, export to template (sections only) or delete the steps or sections. If you delete a section, it will remove any steps within it.
- If you leave the business definition without saving it, any changes you have made are stored as draft. They will be available the next time you return to edit the definition.

Delete a process definition

You can permanently delete any version of a process definition, for example, you might want to delete version 0.4 of a process definition to revert to the structure it was using in version 0.3, or you might want to delete an obsolete process definition entirely. You can only delete a process definition for which you are defined as the owner and it is not being edited by another user at that time (it does not show as locked).

⚠ If you delete a process definition, it is permanently deleted. You cannot restore a deleted process definition.

To delete a process definition:

1. On the Process definitions page, click **Options** next to the required process definition and click **Delete**.

   A message displays asking you to confirm that you want to delete that version.

2. Click **Yes**.

   If you have selected:

   - Version 0.1 or 0.0 of a process definition, it is completely deleted.
   - Version 0.2 or higher of a process definition, that version is deleted and the process definition is reverted to the earlier version.

3. If required, repeat steps 1 and 2 until you have completely deleted the process definition.

Use the filters on the Process definitions page

The filters enable you to easily find a specific process definition based on the selected criteria.

1. On the Process definitions page, click **Filter** to open the Filter panel.
2. Use the toggle to turn on the required filter and complete the information to find the required process definition. You can apply multiple filters at the same time.

   The available filters are:

Filter	Description
Process name	Enter the name of the process definition, or part of the name.
Version	Enter the version number of the process definition. The will also filter against partial matches, for example, if you enter 1, the filter will also display definitions which have versions such as 1.0 and 10.
Sections	Enter the name of the section that appears in the process definition, or part of the name.
Contributors	Enter the user's username, or part of their username.
Owners	Enter the user's username, or part of their username.
Locked by	Enter the user's username, or part of their username.
Latest	Select whether you want to only see the latest version of the process definition or earlier versions; the options are: • **Yes** – Displays only the latest version of the process definition. This is the default setting. • **No** – Displays only the earlier versions of the process definition and not the latest version. 🖉 By default, the **Latest** filter is already turned on. You can turn this off if you want to view all versions of the process definitions.
Updated by	Enter the user's username, or part of their username.
Updated date	Enter a date range. In the: • First field, select the earliest date. • Second field, select the latest date. • If required, adjust the time fields. By default, the earlier date has the time 00:00:00 and the later date has the time 23:59:59, thereby including the full day. This displays any exceptions updated during this time frame.
Process active	Select the active status of the process definition from the following options: • **Yes** – Displays the active process definitions; those that have not had the associated business processes retired. • **No** – Displays the process definitions that are no longer active; those where the associated business processes have been retired by an administrator.

Filter	Description
Signed off	Select the signed off setting from the following options: • **None** – Displays the process definitions that have not yet been submitted for sign off. • **Required** – Displays the process definitions that have been submitted for sign off but not yet approved by the reviewers. • **Approved** – Displays the process definitions that have been submitted for sign off and approved.
Sign off status	Select the signed off status from the following options: • **Yes** – Displays the process definitions that have been signed off by one or more members. • **No** – Displays the process definitions that have not been signed off by any members.
My access	Select your access level from the drop-down list. The options are: • **Owner** – Displays the process definitions for which you are an owner. • **Contributor** – Displays the process definitions for which you are a contributor. • **Viewer** – Displays the process definitions for which you are a viewer. For more information on access levels, see Add a process definition on page 17.

The information on the Process definitions page is immediately filtered.

> If you have set the filters but want to view the unfiltered information again, either turn off the required filters, or remove any settings within the filter so that it is blank.

3. Click **Close drawer** to close the filter panel.

Exceptions

The **Exceptions** option under ALM allows the creation of exceptions and their attributes.

Create an exception

1. On the Exceptions page, click **Create exception**.

   The Create exception page displays. The exception code is automatically assigned and populated by the system

2. Enter a description for the exception in the **Name** field.

3. Click **Create exception**.

   A notification displays confirming the exception has been created.

4. Click **Add section** to add the necessary sections and steps that must be performed if the exception occurs.

   The Create section panel slides out from the side.

5. Enter the required information and click **Save** at the bottom of the Create section panel.

   The section displays in the exception.

6. Click **Save** to save the changes to the exception.

   The Increase minor panel slides out from the side.

7. Enter a note regarding the changes to the exception and click **Save**.

   The changes are saved and the exception version number is incremented.

The exception can now be used in the steps in a process definition document as described in Add an exception to a process definition on page 30.

Default exception

The first exception is automatically created and is the default "Unplanned Exception" and is used as a catch all when something unexpected happens.
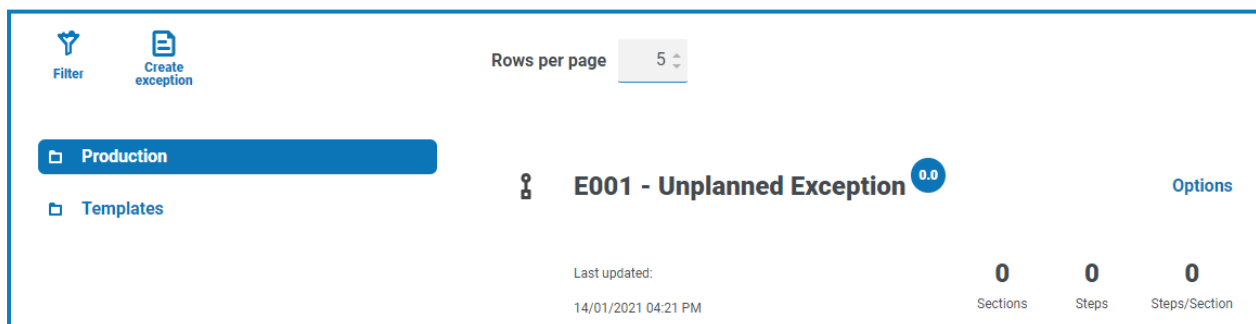
As this is the catch all exception, it must be modified each time a new application is added to support the termination process. Subsequent exceptions should be specific to the business process and the error that has occurred.

In this example, the following is created to handle the incorrect credentials being added.

Create section 1 ✖ Close drawer

📄 New   📄 Template

Name *

Incorrect Credentials

Description

B *I* U ✏️ A

Incorrect Username or Password has been supplied for the Orders Application.

424 Characters remaining

✖ Create another

Save

Create exception

Define the details of your desired exception

Exception code *

E002

Name *

Incorrect Credentials Supplied

70 Characters remaining

Create exception

Use the filters on the Exceptions page

The filters enable you to easily find a specific exceptions based on the selected criteria.

1. On the Exceptions page, click **Filter** to open the Filter panel.

2. Use the toggle to turn on the required filter and complete the information to find the required exception. You can apply multiple filters at the same time.

   The available filters are:

Filter	Description
Exception code	Enter the full or partial code for the exception.
Exception name	Enter the name of the exception, or part of the name.

Filter	Description
Version	Enter the version number of the exception. The will also filter against partial matches, for example, if you enter 1, the filter will also display exceptions which have versions such as 1.0 and 10.
Processes	Enter the full or partial name of the process definition that the exception is associated with.
Latest	Select whether you want to see the latest version of the exception or earlier versions; the options are: • **Yes** – Displays only the latest version of the exception. This is the default setting. • **No** – Displays only the earlier versions of the exception and not the latest version. ✎ By default, the **Latest** filter is already turned on. You can turn this off if you want to view all versions of the exceptions.
Sections	Enter the name of the section that appears in the exception, or part of the name.
Locked by	Enter the user's username, or part of their username.
Updated up	Enter the user's username, or part of their username.
Updated date	Enter a date range. In the: • First field, select the earliest date. • Second field, select the latest date. • If required, adjust the time fields. By default, the earlier date has the time 00:00:00 and the later date has the time 23:59:59, thereby including the full day. This displays any exceptions updated during this time frame.

The information on the Exceptions page is immediately filtered.

💡 If you have set the filters but want to view the unfiltered information again, either turn off the required filters, or remove any settings within the filter so that it is blank.

3. Click **Close drawer** to close the filter panel.

Templates

Templates exist in both the process definitions and exceptions options of the Automation Lifecycle plugin. Templates allow you to re-use sections of a process definition or exception as a repeatable block. For example, a login section may be used in multiple processes and using a template means you will not have to recreate the login section for each.

Export a section as a template

1. On the Edit definition page, click the ellipsis icon for the appropriate section and click **Export**.

   The Export to template panel slides out, showing the name and description of the section you have chosen.
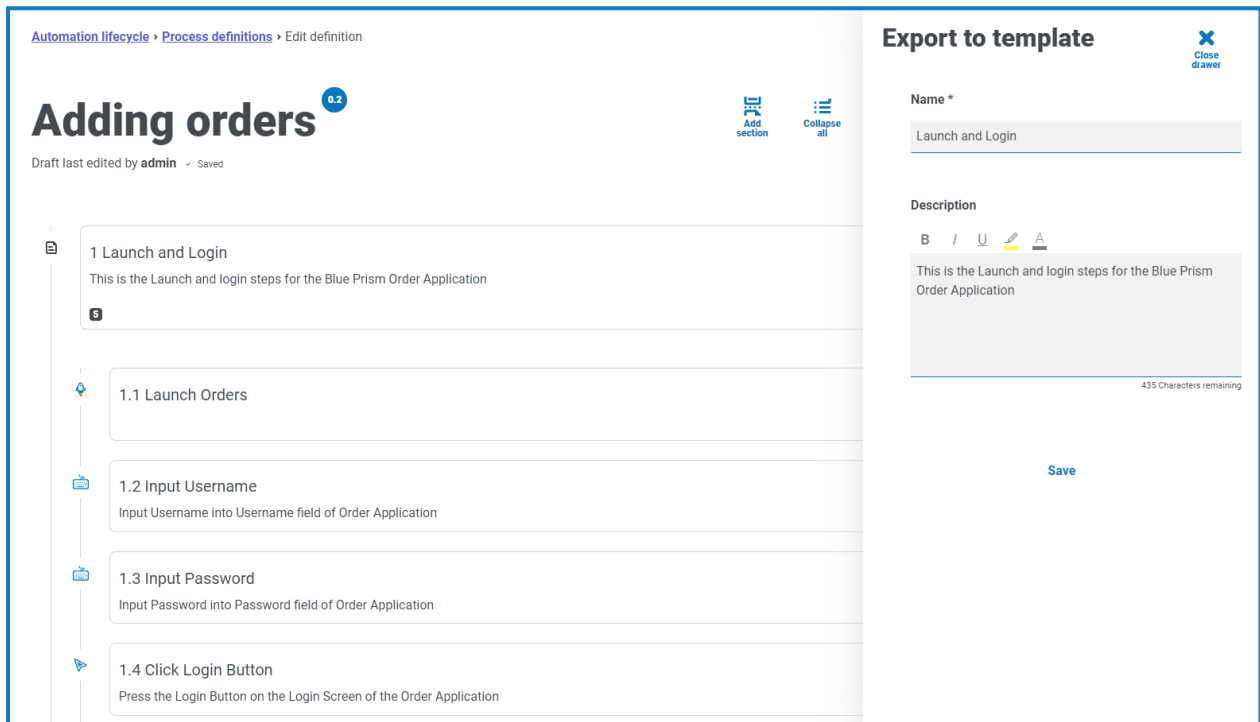
2. Update the name and description if required.

3. Click **Save**.

   The section is saved as template.

Use a template in a process definition

1. Create a definition in the normal way (see creating a business process and a new process definition).

2. When you create a section, select **Template** rather than creating a new section from scratch.

3. Select the required template from the drop-down list.

4. Click **Save** to create the section of the process from the saved template.

> ✎ Templates can also be used in Exceptions in the same way.

Triggered notifications

There are several in-built triggers that notify users about specific events throughout the automation life cycle. To view these notifications, select the bell icon located in the top-right corner of your screen. If you have no notifications, the notification tray will be empty. This icon is also used to review any future system announcements.

The table below describes each notification type.

Notification	Trigger	Recipients
Process definition sign off	The Business Process Owner initiates a process definition sign off.	Members who need to sign off the process definition.
Process definition signed off	All required members have signed off a process definition.	Business process owners.
Process definition sign off redacted	A required business process member has redacted a process definition that they have previously signed off.	Business process owners.
Process definition sign off by Business Process Owner	A business process owner redacts the sign-off process.	Members who need to sign off the process definition.
All required members have signed-off	All required business process members have signed a process definition off.	Business process owners.
Process definition created	A process definition has been created.	Members of the process definition.
Process definition deleted	A process definition has been deleted.	Members of the process definition.
Removed from a Business Process	A member is removed from a business process.	The member who has been removed from the business process.