

# **HOPEX Business Process Analysis**

## **User Guide**

HOPEX V3



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# INTRODUCTION



**HOPEX Business Process Analysis** is software edited by **MEGA International** to assist:

- ✓ Organizers in improving and redesigning enterprise business processes.
- ✓ Quality engineers describing the business processes of their organization.

This is used to

- ✓ Description of the detailed organization of operations during execution of organizational processes, and the participation of each of the enterprise org-units in these processes.
- ✓ Description of product or service offerings proposed by enterprise business processes.
- ✓ Description of enterprise value streams.
- ✓ Description of the enterprise organizational chart.
- ✓ Identification of the risks linked to the enterprise processes.
- ✓ Detailing of information system requirements involved in these application business processes. It is then possible to draw a map of the enterprise organization and information system (in conjunction with **HOPEX IT Architecture**).

☛ *The description of processes with **HOPEX Business Process Analysis** is based on the Business Process Modelling Notation (BPMN) maintained by the Object Management Group (OMG).*

The following points are covered in **HOPEX Business Process Analysis**:

- ✓ "Organizational Processes", page 35
- ✓ "Business processes", page 69
- ✓ "Value streams", page 77
- ✓ "System Processes", page 83
- ✓ "Conversations", page 97
- ✓ "Organizational Charts and Responsibilities", page 111
- ✓ "The customer journey", page 125
- ✓ "Assessments With HOPEX Business Process Analysis", page 161
- ✓ "Action Plans with HOPEX Business Process Analysis", page 171
- ✓ "HOPEX Business Process Analysis Reports", page 175.

## PRESENTATION OF HOPEX BUSINESS PROCESS ANALYSIS

Combined with the products of **HOPEX** suite, **HOPEX Business Process Analysis** supports a methodology and the tools used to describe your business organization and manage change.

Because business modeling helps you:

- Explaining how your enterprise operates
- Considering changes in the organization
- Defining IT requirements
- Identify the risks linked to the enterprise processes
- Specifying interactions with partners

### Explaining how your enterprise operates

There are three situations in which an explanatory diagram of processes implemented in an enterprise can enable better understanding of its operation:

- When a person is hired.
- When a person's duties change.
- When instructions are not fully understood.

The standard organizational chart provides you with only an overview showing the organizational unit hierarchy, without explaining how the enterprise functions. A process diagram helps you better understand how your enterprise operates.

### Considering changes in the organization

Management must improve processes in an enterprise in order to eliminate weaknesses. Management can go further by transforming certain processes so that they become key competitive advantages for the enterprise.

Formally defining processes is a way to highlight those areas needing improvement.

### Defining IT requirements

You can complete the process descriptions with the information technology means required:

- The functionalities (which may or may not be IT) required to execute each operation.
- The applications and the application services used.
- Other material or human resources required to carry out the process.

### Identify the risks linked to the enterprise processes

The description of processes can be completed with the risks identified at each step of these processes or with IT resources or other equipment or human resources that they need.

## Specifying interactions with partners

Interactions with partners of the enterprise should be precisely defined to enable automation of exchanges between the business processes of the enterprise and those of its partners as part of an e-business or EAI (Enterprise Application Integration) project.

---

## Modeling with HOPEX Business Process Analysis

**HOPEX Business Process Analysis** offers tools enabling enterprise organization description.

### Describing processes

You can write comments for each process element directly from the diagram. This offers many advantages:

- Description of each element is simpler and faster than writing the complete process.
- Reports can be built automatically.
- Easy retrieval of process descriptions for insertion into other processes.
- The volume of text is significantly reduced.

### Producing documents

Documents are automatically generated from the elements entered when describing the diagram.

- The general structure is independent of the writer.
- Document generation is automatic.
- Documents have a standard layout and consistent style.
- Descriptions are automatically reused in the different documents.
- Document consistency is assured.

☺ You can modify the layout and formatting of documents generated by **HOPEX Business Process Analysis** and create new ones. See the **HOPEX Power Studio** guide.

**HOPEX Business Process Analysis** allows you to automatically generate an Intranet site describing the processes used in the enterprise.

### Upgrading and maintaining your processes

As your organization evolves, so do your processes.

**HOPEX Business Process Analysis** allows you to make your changes in one location, and have them propagated to all processes involving those elements. This allows:

- Rapid access to the elements that you want to modify.
- You can analyze impacts of modification of a process in other processes in which this element appears.
- Automatic regeneration of all documents concerned.

This User Guide is designed to help you quickly discover the power of **HOPEX Business Process Analysis**.

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## Positioning of the HOPEX Business Process Analysis solution

**HOPEX Business Process Analysis** can be used with other products in the **HOPEX** suite.

### ***HOPEX Business Architecture***

The **HOPEX Business Architecture** solution is based on tools offered by the **HOPEX** platform to support business transformation on the basis of the analysis of business capabilities and the enterprise model.

Business Architecture helps managers define the operating architecture of their enterprise to remain in compliance with its Business Model and to adapt to changes in the enterprise and in its economic and regulatory environment. **HOPEX Business Architecture** is thus a key tool for enterprise transformation

**HOPEX Business Process Analysis** thus provides **HOPEX Business Architecture** with:

- The description of organizations that implement the business functions and/or the business function capabilities identified in **HOPEX Business Architecture**;
- The description of organizational processes that implements the value streams identified in **HOPEX Business Architecture**.

### ***HOPEX IT Architecture***

The **HOPEX IT Architecture** solution provides **HOPEX Business Architecture** with the possibility to define whether business capabilities, functionalities or business functions are implemented by resource architectures or application systems and applications.

### ***HOPEX Portfolio & Planning***

By means of portfolio management, **HOPEX Portfolio & Planning** enables planning over time of development of information systems, organizations and more generally all enterprise architecture.

## HOPEX Risk Mapper

The **HOPEX Risk Mapper** solution provides **HOPEX Business Process Analysis** with the possibility to associate risks with business functions and value streams.

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## HOPEX Business Process Analysis Profiles

In **HOPEX Business Process Analysis**, there are profiles associated to specific activities.

Presentation of the solution interface depends on the profile selected by the user on connection to the application; the tree of menus and functions varies from one business role to another.

☛ For more details on the Desktops connected to each of the profiles, see ["HOPEX Business Process Analysis Desktop Presentation"](#), page 24.

Profiles	Tasks
Process Functional Administrator	<p>In addition to the functional rights of the Process Manager, the Process Functional Administrator has rights to all objects, methods, projects and workflows.</p> <p>Prepares the work environment and creates elements required for management of process.</p> <p>He manages:</p> <ul style="list-style-type: none"><li>- Users, assignment of roles and access rights to the different project steps.</li><li>- all environment objects (processes, customer journeys, reports, etc.),</li><li>- Workflows.</li></ul> <p>For more details, see <a href="#">"Presenting the Functional Administrator space"</a>, page 26.</p>
Process Manager	<p>The Process Manager has rights to all objects, methods, projects and assessments.</p> <p>For more details, see <a href="#">"Presenting the Process Manager space"</a>, page 25.</p>

Profiles	Tasks
Process Designer	The Process Designer is responsible for creating the value streams and organizational process models entrusted to him/her. In addition to the tasks assigned to the Process Designer (basic), the Process Designer can manage transformation projects. For more details, see <a href="#">"Presenting the Process Designer space", page 27</a> .
Process Designer (Basic)	The Process Designer is responsible for creating the value streams and organizational process models entrusted to him/her. For more details, see <a href="#">"Presenting the Process Designer space (basic)", page 28</a> .
Process Contributor	The contributor to a process is responsible for validating the design of the processes entrusted to him/her. For more details, see <a href="#">"Presenting the Process Contributor space", page 28</a> .

## Business Roles of HOPEX Business Process Analysis

In **HOPEX Business Process Analysis**, there are, by default, business roles that can be assigned to certain users. These roles are:

- **Value streams Designer** to assign a user to value streams. The Value streams Designer is responsible for designing the value streams assigned to him/her.
- **Business Process Designer** to assign a user to functional processes. The Business Process Designer is responsible for designing the processes assigned to him/her.
- **Organizational Process Designer** to assign a user to organizational processes. The Organization Process Designer is responsible for designing the processes assigned to him/her.
- **Org-Unit Designer** to assign a user to org-units of the organization. The Org-Unit Designer is responsible for managing the processes assigned to him/her.
- **Organization Process Contributor** which is used to assign a user to organizational processes. The contributor to an organizational process is



responsible for validating the design of the processes entrusted to him/her.

- **Process Portfolio Manager** to assign a user to process portfolios. The Portfolio Manager is responsible for managing the portfolios assigned to him/her.
- **Business Process Owner** to assign a user to functional processes. The Business Process Owner is responsible for the following tasks:
  - Identifies risks
  - Responding to Questionnaires
  - Defining and implementing action plans,
  - Validating modifications made by the Business Architect in the context of object review workflows.
- **Organizational Process Owner** to assign a user to organizational processes. The Organization Process Owner is responsible for the following tasks:
  - Identifies risks
  - Responding to Questionnaires
  - Defining and implementing action plans,
  - Validating modifications made by the Business Architect in the context of object review workflows.

## THE HOPEX BUSINESS PROCESS ANALYSIS METHOD

The method embedded in the **HOPEX Business Process Analysis** solution is used to perform the following tasks:

- "Preparing the Work Environment", page 16
- "Building customer journeys", page 16
- "Describing the existing organization", page 17
- "Managing organizational transformation", page 22

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### Preparing the Work Environment



*Libraries are collections of objects used to split repository content into several independent parts. They allow creation of virtual partitions of the repository. In particular, two objects owned by different libraries can have the same name.*

In the context of the **HOPEX Business Process Analysis** solution, a library can hold all the elements of your project: processes and org-units, for example.

➤ For more details on managing libraries, see the "Enterprises and Libraries" chapter in the **HOPEX Common Features** guide.

### Accessing the list of libraries with HOPEX Business Process Analysis

To access the list of libraries from the **Environment** navigation pane:

1. Select **Standard Navigation > Standard Navigation** in the navigation menu.  
The library tree appears.

### Creating a library with HOPEX Business Process Analysis

To access the list of libraries from the **Environment** navigation pane:


1. Select **Standard Navigation > Standard Navigation** in the navigation menu.  
The library tree appears.
2. Select **New > Library**.  
A **Library** creation dialog box opens.
3. Specify the the name of the library.
4. If appropriate, enter the name of the **Owner**.
5. Click **OK**.  
The library appears in the tree.


---

### Building customer journeys

The **HOPEX Customer Journey** module is used to represent the acquisition process of a product or a service by a specific customer. Mapping a customer

journey provides an overview of customer expectations, painpoints encountered, and the resources used at each step of the journey. Last but not least, touchpoints, which are the points of interaction between the customer and the company, are used to measure and improve overall customer satisfaction.

 A customer journey is used to describe and organize all interactions between the enterprise and a persona for a given result.

 A persona corresponds to a customer segment targeted by the experience of the client journey. The resources implemented to give customers the ability to interact with the enterprise and its environment, to acquire the expected results, are supported by the interaction channels.


Representing a customer journey will allow you to easily identify these critical points. **HOPEX Customer Journey** is used to describe solutions for improvement and to assess them at different dates.


➡ For more details on the description of workspaces, see ["The customer journey"](#), page 125.


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## Describing the existing organization

The purpose of this step is to describe the *org-units* in the enterprise, its different processes, the *risks* encountered as well as the associated *controls*.

 An org-unit represents a person or a group of persons that intervenes in the enterprise business processes or information system. An org-unit can be internal or external to the enterprise. An internal org-unit is an organizational element of enterprise structure such as a management, department, or job function. It is defined at a level depending on the degree of detail to be provided on the organization (see org-unit type). Example: financial management, sales management, marketing department, account manager. An external org-unit is an external entity that exchanges flows with the enterprise. Example: customer, supplier, government office.

 A risk is a hazard of greater or lesser probability to which an organization is exposed.

 A control is a set of rules and means enabling the assurance that a legal, regulatory, internal or strategic requirement is respected.

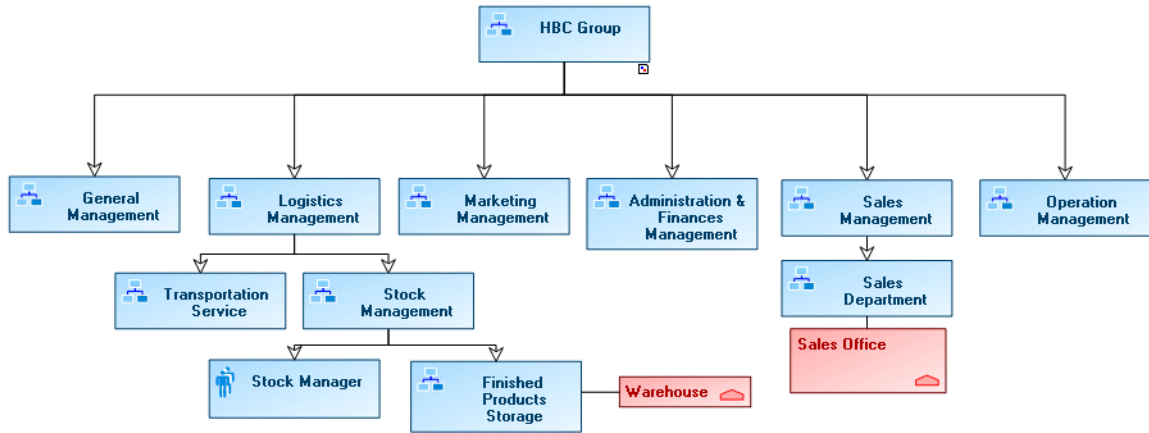
This consists of the following tasks:

- ["Describing the organization"](#), page 17,
- ["Describing processes"](#), page 18,
- ["Describing controls and risks"](#), page 22.

## Describing the organization

With **HOPEX Business Process Analysis** the organizational chart shows the hierarchy of the org-units in the enterprise, their responsibilities with respect to the processes and specifies the persons associated with each org-unit and on which site.

Example of organizational chart:



For more information on describing enterprise org-units, see ["Organizational Charts and Responsibilities", page 111](#).

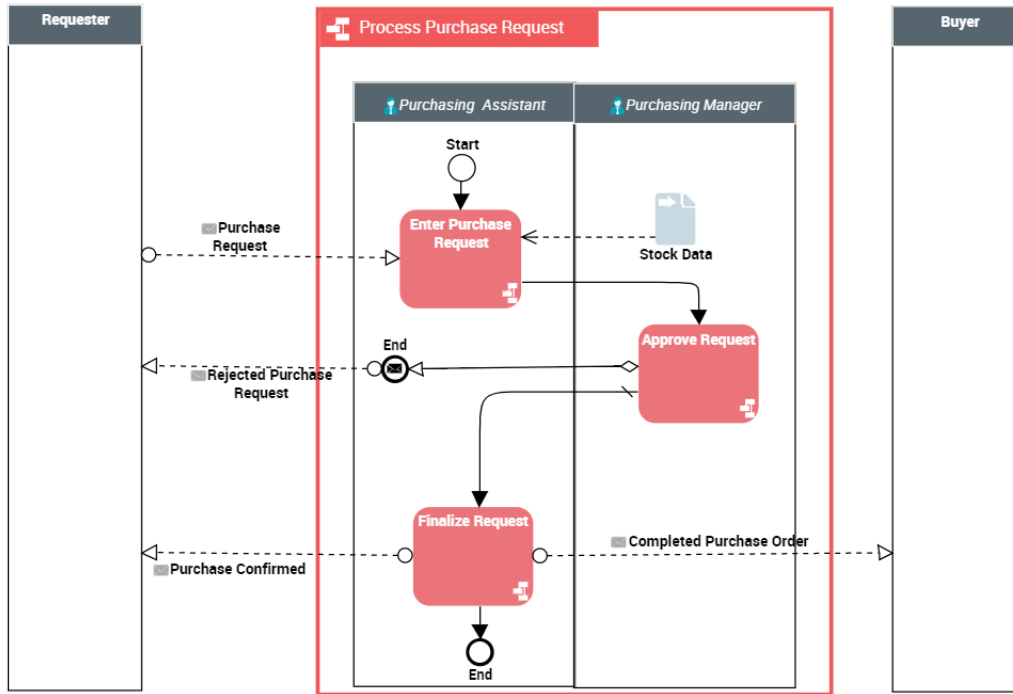
## Describing processes

### **Describing organizational processes**

An organizational process is a set of operations performed by org-units within a company or organization, to produce a result. It is depicted as a sequence of operations, controlled by events and conditions.

With **HOPEX Business Process Analysis**, organizational processes are described in the form of diagrams.

In the example of the purchase request process, the organization is represented by the following diagram.

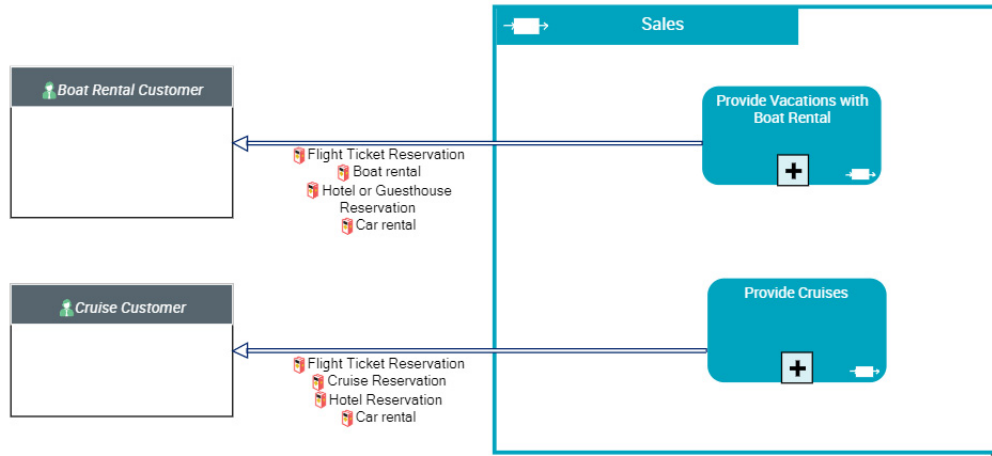


For more details describing an organizational process, see ["Organizational Processes"](#), page 35.

## Business process modeling


A business process represents a system that offers products or services to an internal or external client of the company or organization. At the higher levels, a business process represents a structure and a categorization of the business. It can be broken down into other processes. The link with organizational processes will describe the real implementation of the business process in the organization. A business process can also be detailed by a functional view.

The business process diagram enables representation of product or service offerings proposed by the enterprise to each of its markets, as well as the processes that produce these.

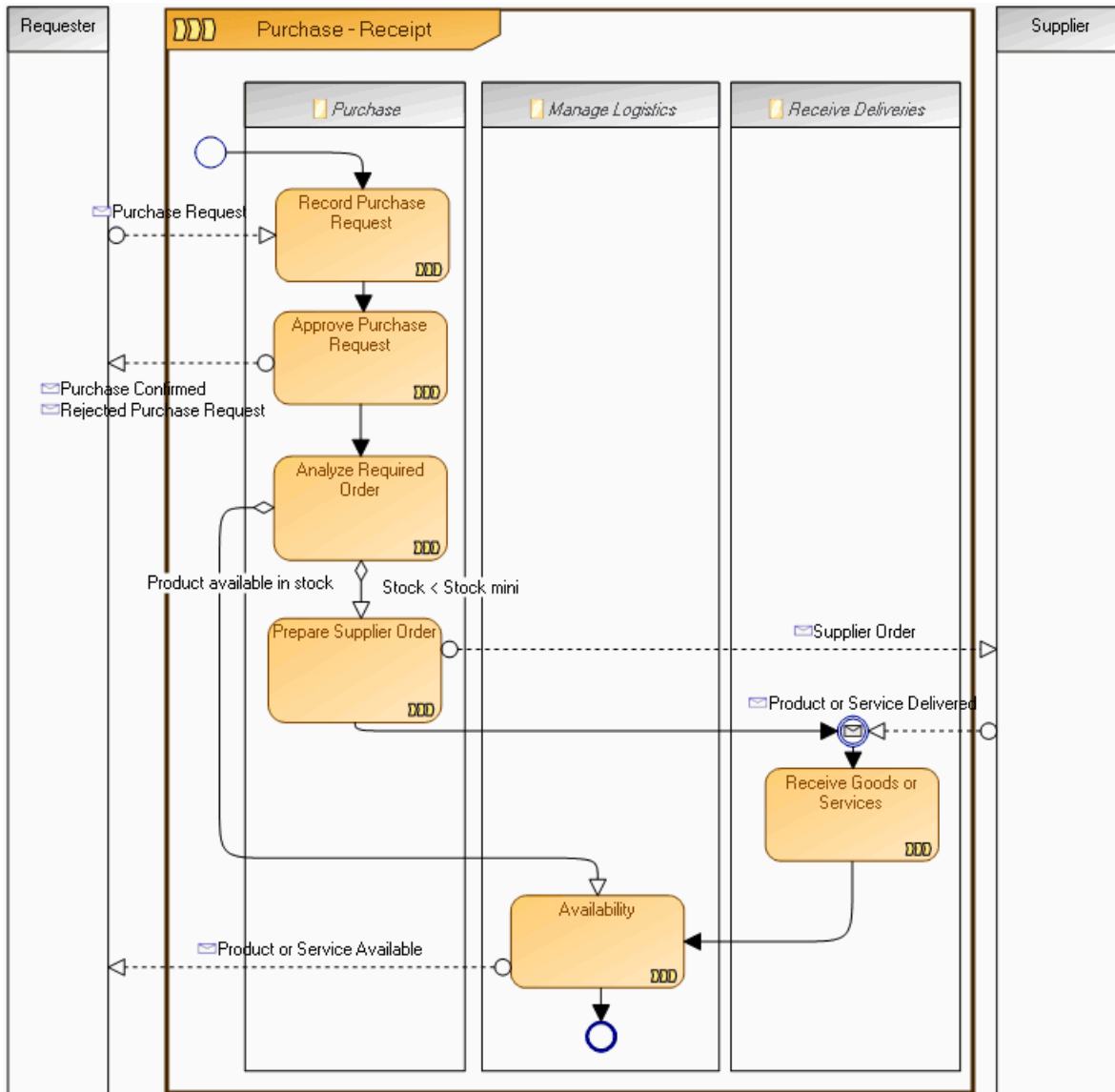


For more details describing an organizational process, see ["Business processes", page 69](#).

## Describing value streams

 A value stream is an end-to-end collection of Value Stages that creates an outcome for a customer, who may be the ultimate customer or an internal end-user of the value stream.

The following diagram presents an example of a value stream:



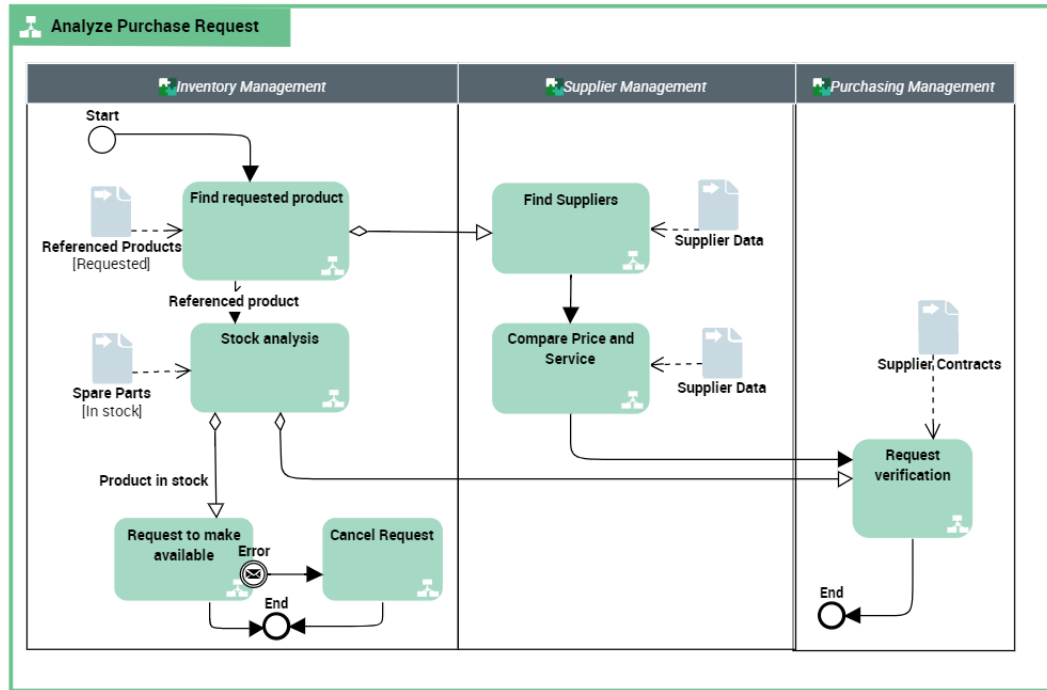
➤ For more details on value stream description, see ["Value streams"](#), page 77.

## Describing application processes

📖 A system process is the executable representation of a process. the events of the workflow, the tasks to be carried out during the processing, the algorithmic elements used to specify the way in which the tasks follow each other, the information flows exchanged with the participants.

**HOPEX Business Process Analysis** allows you to model the IT system process implemented when using an organizational process. This description is made in a BPMN model detailing the sequence flow of tasks performed when executing the application in the particular context.

The diagram below represents an example of a purchase request processing application process.



For more details describing a system process, see ["System Processes"](#), page 83.

## Describing controls and risks

A risk is a hazard of greater or lesser probability to which an organization is exposed.

A control is a set of rules and means enabling the assurance that a legal, regulatory, internal or strategic requirement is respected.

The **HOPEX Business Process Analysis** repository covers all enterprise resources, from global value streams to IT resources. The **HOPEX Risk Mapper** approach enables business and IT managers to guarantee traceability of compliance controls via application layers, data and infrastructures.

For more information, see **HOPEX Control and Risk**.

## Managing organizational transformation


The purpose of this step is to prepare for the transformation of your enterprise.



Given the products in the Suite **HOPEX** available to you, you can manage the transformation of your enterprise in a number of different ways:

- ["Using portfolios", page 23](#)
- ["Managing Action Plans", page 23](#)
- ["Describing implementation projects", page 23](#)
- ["Documenting projects implemented in SAP", page 23](#)

## Using portfolios

 *A portfolio enables representation of all investments of an enterprise (or department) necessary to carry out changes required to achieve strategic objectives. It comprises a set of initiatives to be compared based on comparison criteria associated with the portfolio.*


By means of portfolio management, **HOPEX Portfolio & Planning** enables planning over time of development of information systems, organizations and more generally all enterprise architecture.

Depending on the **HOPEX** Suite of products you have available, different object types can be described in enterprise portfolios. With **HOPEX Business Process Analysis**, you can work with process portfolios.

By selecting **Transformation > Portfolios**, you can access the features available with **HOPEX Business Process Analysis** to manage portfolios.


 For more information, see **HOPEX Portfolio & Planning**.

## Managing Action Plans


 *An action plan comprises a series of actions, its objective being to reduce risks and events that have a negative impact on company activities.*

**HOPEX Business Process Analysis** allows you to specify, implement and follow up *action plans* defined for remediating, for example, a process or a customer journey.

By selecting **Transformation > Action Plan**, you can access the facilities available with **HOPEX** platform to describe and manage action plans.

 For more information on use of action plans, see ["Action Plans with HOPEX Business Process Analysis", page 171](#).

## Describing implementation projects


 *A project consists of a set of tasks entrusted to a team, which transforms a system or part of a system with the aim of achieving a given objective.*

By selecting **Transformation > Projects**, you can access the facilities available with the **HOPEX** platform to manage projects.

 For more details on managing projects, see the *"Projects in HOPEX" chapter in the HOPEX Common Features guide*.

## Documenting projects implemented in SAP

By selecting **Transformation > Solution Manager**, you can access the features proposed with the **HOPEX SAP Blueprint** product.

 For more information, see **HOPEX SAP Blueprint**.

# HOPEX BUSINESS PROCESS ANALYSIS DESKTOP PRESENTATION

The menus and commands available in **HOPEX Business Process Analysis** depend on the profile with which you are connected.

➤ For more details on using the Web platform for **HOPEX** solutions, see the **HOPEX Common Features** guide.

➤ Desktops described in this guide are accessible only to Web desktop users.

---

## Connecting to HOPEX Business Process Analysis

To connect to **HOPEX Business Process Analysis**, see in **HOPEX Common Features** guide, chapter "The HOPEX Web Front-End Desktop" and "The HOPEX Windows Front-End Desktop".

---

## HOPEX Business Process Analysis Desktop Presentation

The menus and commands available in **HOPEX Business Process Analysis** depend on the profile with which you are connected.

➤ For more details on using the Web platform for **HOPEX** solutions, see the **HOPEX Common Features** guide.

➤ **HOPEX Business Process Analysis** is mainly intended for web users. Desktops described in this guide are accessible to Web desktop users.

### Presentation of space common to all profiles

All users, except users connected with the **Process Contributor** profile, have access to the HOPEX Business Process Analysis desktop and the following panes:

- **Home:** provides quick access to user objects.
- **Dashboards:** displays the list of indicators required to steer objects such as processes, applications or org-units.
- **My Work:** displays the tasks assigned to the user.
- **Design:** gives access to all the process models described.
- **Customer Journey:** gives access to the mapping of the customer journey if you have the **HOPEX Customer Journey** module.

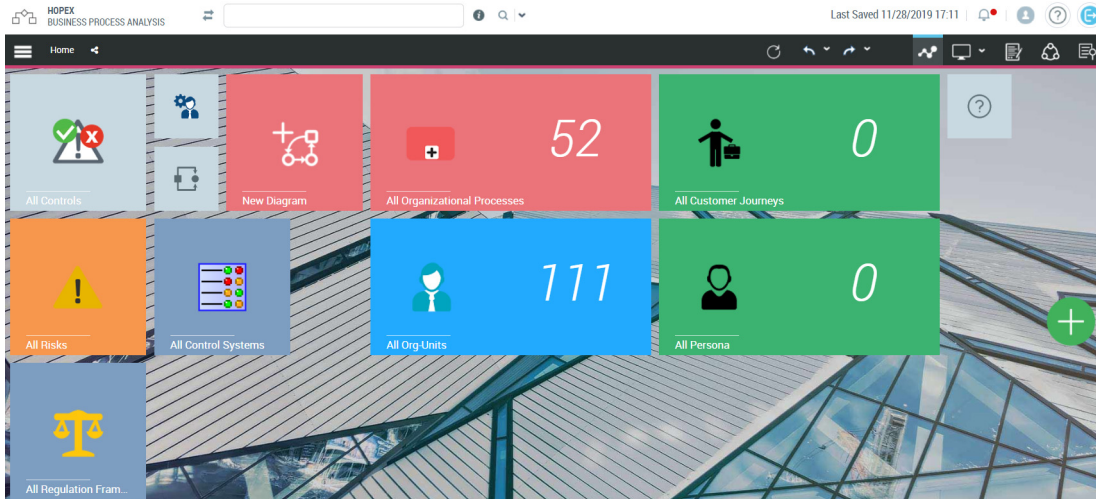
➤ For more details, see ["The customer journey", page 125](#).

- **Reports:** accesses all reports, improving understanding of terms and their use.

➤ For more details, see ["HOPEX Business Process Analysis Reports", page 175](#).

## Presenting the Process Manager space

In addition to the panes offered in standard mode to all **HOPEX Business Process Analysis** desktop users, the users connected with the **Process Manager** profile have access to the following panes:



### **The Environment pane**

The **Environment** pane provides access to the following menus.

- **Libraries**, to access the management features for libraries.  
For more details, see ["Preparing the Work Environment", page 16](#).
- **Organization**, to access the main objects processed with the **HOPEX Business Process Analysis** solution.





### **The Design pane**

The **Design** pane provides access to the following menus.

- **Organization**, for describing the org-units of the organization.  
For more details, see ["Organizational Charts and Responsibilities", page 111](#).
- **Process**, for describing the business and organizational processes of the organization.  
For more details, see ["Organizational Processes", page 35](#) and ["Business processes", page 69](#).
- **Controls & Risks**, for accessing the risk management features offered with the **HOPEX Risk Mapper** product.  
For more information, see **HOPEX Risk Mapper**.

## The Transformation pane

The **Transformation** pane provides access to the management features of transformation projects and offers the following menus.

- **Planning**, to access the portfolio management features offered with the **HOPEX Portfolio & Planning** product.  
 For more information, see **HOPEX Portfolio & Planning**.
- **Corrective Action Plans**, to describe and manage the action plans linked to the transformation of processes.  
 For more details, see ["Action Plans with HOPEX Business Process Analysis"](#), page 171.
- **Implementation Projects**, to access and manage transformation projects.  
 For more details on managing projects, see the "Projects in HOPEX" chapter in the **HOPEX Common Features** guide.
- **Solution Manager**, to access the features offered with the **HOPEX SAP Blueprint** product.  
 For more information, see **HOPEX SAP Blueprint**.


## The Campaign Management pane

The **Campaign Management** pane provides access to the creation and management functionalities.

 For more details, see ["Assessments With HOPEX Business Process Analysis"](#), page 161.

## The Administration pane

The **Administration** pane provides access to the user management features. The rights of different users on objects of imported libraries depend on their assigned profiles.

 For more information on creation of users and assignment of profiles, see the chapter "Managing Users" in the **HOPEX Administration** guide.

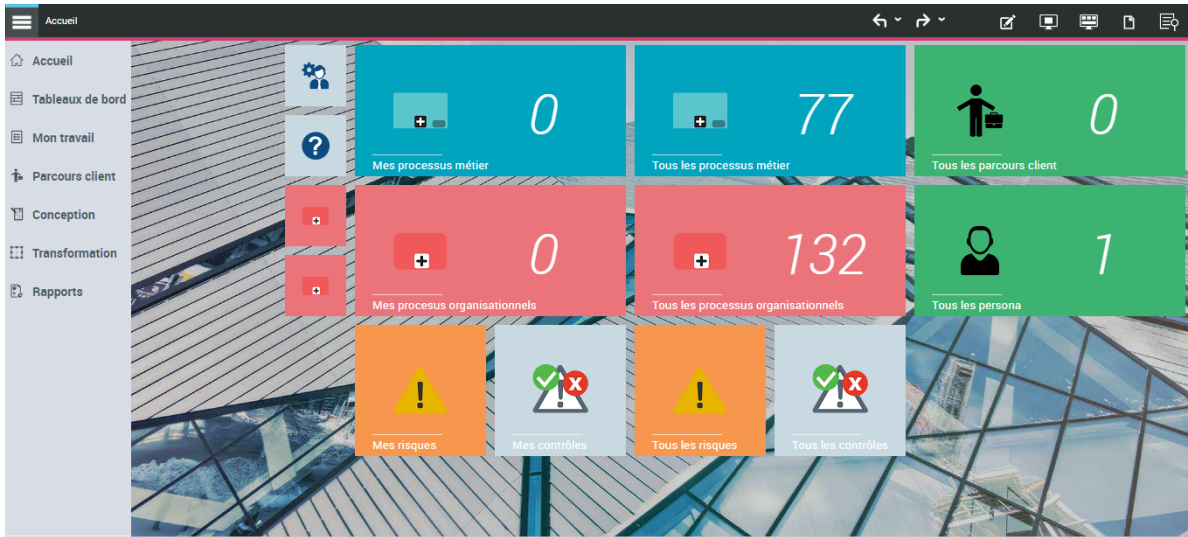
## Presenting the Functional Administrator space

In addition to the panes offered in standard mode to all **HOPEX Business Process Analysis** desktop users, the users connected with the **Process Functional Manager** profile have access to the same functions as users connected with the **Process Manager** profile:

 For more details, see ["Presenting the Process Manager space"](#), page 25.

## Presenting the Process Designer space

In addition to the panes offered in standard mode to all users of the **HOPEX Business Process Analysis** desktop, the **Process Designer** has access to the **Design** and **Transformation** panes.



### The Design pane

The **Design** pane provides access to the following menus.

- **Organization**, for describing the org-units of the organization.  
*For more details, see "Organizational Charts and Responsibilities", page 111.*
- **Process**, for describing the business and organizational processes of the organization.  
*For more details, see "Organizational Processes", page 35 and "Business processes", page 69.*

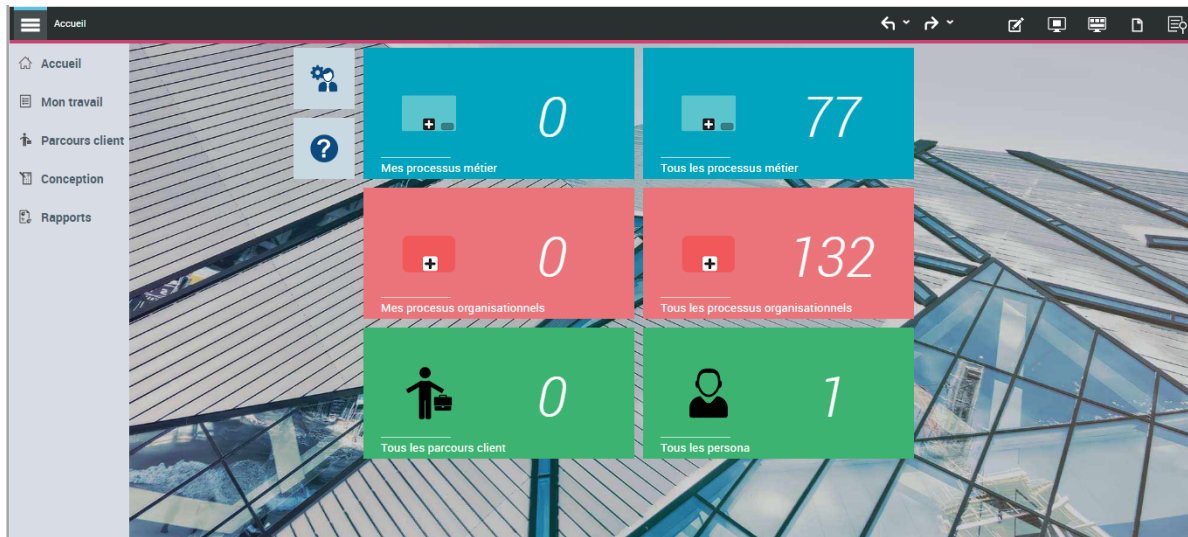
## The Transformation pane

The **Transformation** pane provides access to the management features of transformation projects and offers the following menus.

- **Corrective Action Plans**, to describe and manage the action plans linked to the transformation of processes.  
*For more details, see "Action Plans with HOPEX Business Process Analysis", page 171.*
- **Implementation Projects**, to access and manage transformation projects.  
*For more details on managing projects, see the "Projects in HOPEX" chapter in the HOPEX Common Features guide.*
- **Solution Manager**, to access the features offered with the **HOPEX SAP Blueprint** product.  
*For more information, see HOPEX SAP Blueprint.*

## Presenting the Process Designer space (basic)

Users connected with the **Process designer (basic)** profile have access to the panes offered in standard mode to all users connected with the **Process Designer** profile. Only the **Transformation** pane is not available to them.



## Presenting the Process Contributor space

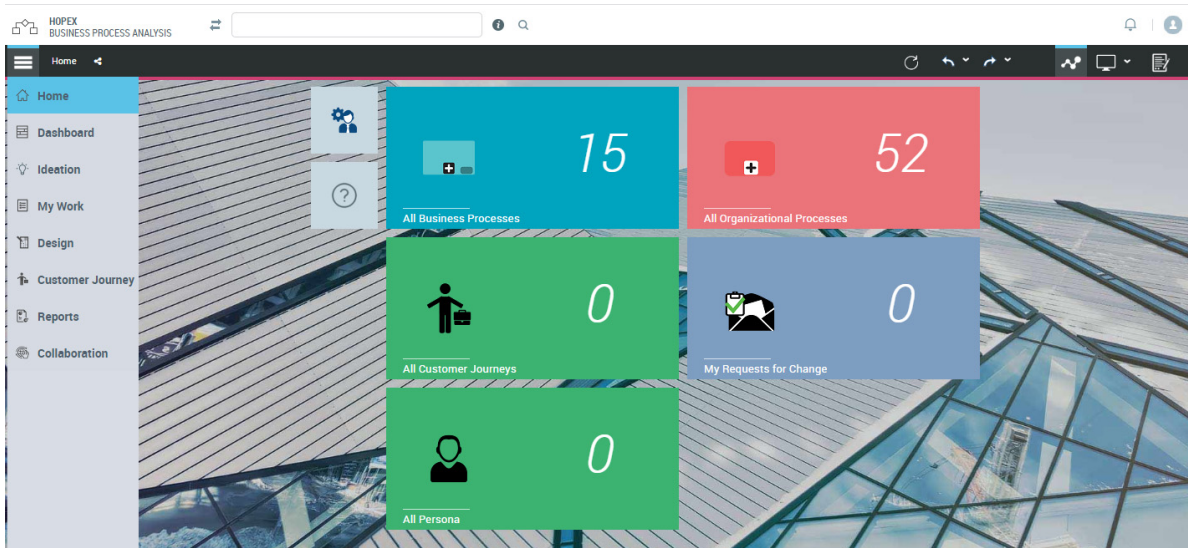
In addition to the panes offered in standard mode to users of the **HOPEX Business Process Analysis** desktop, the **Process Contributor** has access to the **Design** and **Transformation** panes.

Users connected with the **Process Contributor** profile have access to the **Home**, **My Work**, **Design** and **Reports** panes offered in standard mode to all users connected with the **Process Designer** profile.



## Presenting the Process Observer space

Users connected with the **Process Observer** profile have a reading access to the objects offered in the **HOPEX Business Process Analysis** desktop.



## ABOUT THIS GUIDE

This guide presents how to make best use of **HOPEX Business Process Analysis** to assure efficient management of your modeling projects.

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### Guide Structure

The **HOPEX Business Process Analysis** guide comprises the following chapters:


- ["Organizational Processes", page 35](#) presents how to define participants and the sequence flow of operations of an organizational process.
- ["Business processes", page 69](#) presents how to specify enterprise product and service offerings, and the breakdown of the processes producing these.
- ["Value streams", page 77](#) describes the representation of enterprise value streams in terms of activities. It enables freeing from the existing organization to imagine new organization solutions for your processes.
- ["System Processes", page 83](#) describes the IT process required for implementation of an organizational process by sequencing tasks executed.
- The ["Conversations", page 97](#) chapter explains how to model conversations between process architecture components.
- ["Organizational Charts and Responsibilities", page 111](#) chapter describes how to create an enterprise organizational chart and how to define responsibilities of persons and org-units.
- The ["The customer journey", page 125](#) chapter is used to represent the acquisition process of a product or a service by a specific customer.
- The ["Assessments With HOPEX Business Process Analysis", page 161](#) chapter describes how to assess the execution and performance of business and organizational processes with **HOPEX Business Process Analysis**.
- The ["Action Plans with HOPEX Business Process Analysis", page 171](#) chapter describes how to use the action plans with **HOPEX Business Process Analysis**.
- ["HOPEX Business Process Analysis Reports", page 175](#) presents reports proposed by **HOPEX Business Process Analysis** to assist users at each step of architecture description and analysis projects.



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## Additional Resources

This guide is supplemented by:

- The **HOPEX Common Features** guide describes the basic functions common to **HOPEX** products and solutions.  
 *It can be useful to consult this guide for a general presentation of the interface.*
- The **HOPEX IT Portfolio Management** guide, which describes functions proposed to manage all your applications.
- the **HOPEX Power Supervisor** administration guide.
- More advanced technical functions are described in the **HOPEX Power Studio** guide.

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## Conventions used in the guide

-  *Remark on the preceding points.*
-  *Definition of terms used.*
-  *A tip that may simplify things.*
-  *Compatibility with previous versions.*
-  **Things you must not do.**



**Very important remark to avoid errors during an operation.**

Commands are presented as seen here: **File > Open**.

Names of products and technical modules are presented in bold as seen here: **HOPEX**.



# ORGANIZATIONAL PROCESSES



The aim of this chapter is to familiarize you with **HOPEX Business Process Analysis**: it introduces a few features of the software dedicated to organizational process modeling activities.

➤ *For more details on management of your desktop, and of diagrams and objects, see the **HOPEX Common Features** guide.*

An organizational process is a set of operations performed by org-units within a company or organization, to produce a result. It is depicted as a sequence of operations, controlled by events and conditions.

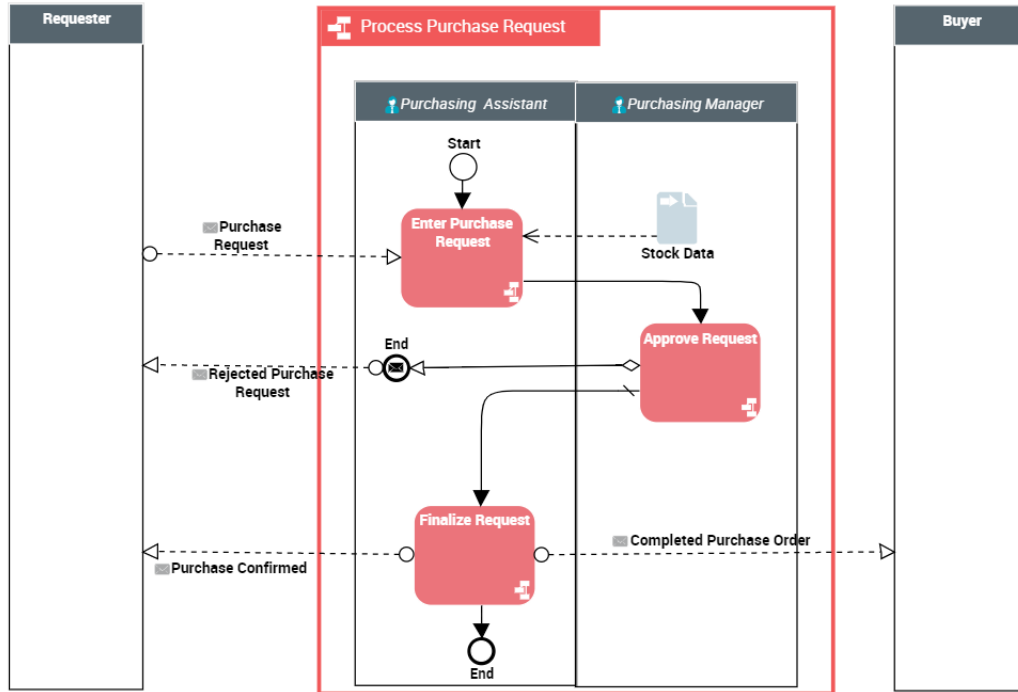
With **HOPEX Business Process Analysis**, an organizational process representation is based on the standard BPMN (Business Process Modeling Notation) offering notation easily used by all participants concerned.

The points covered here are:

- ✓ [Organizational Process Example](#)
  - ✓ [Managing an Organizational Processes](#)
  - ✓ [Defining Participants](#)
  - ✓ [Creating Operations](#)
  - ✓ [Describing Operations Sequence Flows](#)
  - ✓ [Defining Message Flows](#)
  - ✓ [Defining Process Events](#)
  - ✓ [Using Shared Objects](#)
  - ✓ [Using Gateways](#)
-

## ORGANIZATIONAL PROCESS EXAMPLE

In the example of the purchase request process, the organization is represented by the following diagram.



The purchase request is received by a purchasing assistant, who enters the request and submits this for the approval of the purchasing manager.

If the request is rejected, the purchasing manager informs the requester.

If the request is approved, the assistant sends a completed request to buyers responsible for issuing the order, and sends a confirmation message to the requester.

This chapter explains how to use the main objects presented in this diagram.

- The frame containing the different components represents the *organizational process* described by the diagram. Its name "Process Purchase Request" appears in the box at top left.



*An organizational process is a set of operations performed by org-units within a company or organization, to produce a result. It is depicted as a sequence of operations, controlled by events and conditions.*

- The *participants* in execution of this process are *org-units*. They are represented in columns for reasons of diagram readability. For more

details, see [Defining Participants](#).



*A participant (org-unit) enables representation of org-units assigned to execute a group of process operations.*



*An org-unit represents a person or a group of persons that intervenes in the enterprise business processes or information system. An org-unit can be internal or external to the enterprise. An internal org-unit is an organizational element of enterprise structure such as a management, department, or job function. It is defined at a level depending on the degree of detail to be provided on the organization (see org-unit type). Example: financial management, sales management, marketing department, account manager. An external org-unit is an external entity that exchanges flows with the enterprise. Example: customer, supplier, government office.*

- The different steps in this process are **operations**. Organization of these steps is described by sequence flows.



*An operation is an elementary step in an organizational process executed by an org-unit. It cannot be broken down. An operation can be industrial (manufacturing a component), logistical (receiving a delivery), or can involve information processing (entering an order).*

- **Message flows** enable representation of data or information circulating between a process and the exterior.



*A message flow represents circulation of information within an exchange contract. A message flow transports its content.*

# MANAGING AN ORGANIZATIONAL PROCESSES

This section explains how to describe your work context and describe an organizational process.



*An organizational process is a set of operations performed by org-units within a company or organization, to produce a result. It is depicted as a sequence of operations, controlled by events and conditions.*

---

## Creating an Organizational Process

To create an organizational process from the **Design** navigation pane:

1. Select **Processes > Organizational Processes**.
2. In the **My Organizational Processes** tab, click **New**.  
The **Organizational Business Process** dialog box appears.
3. Enter the name of the organizational process.
4. Click **OK** to close this dialog box.  
The organizational process appears in the list.

---

## Managing an Organizational Process Diagram

An organizational process diagram can be created and updated in tabular input mode.



*For more information on using tabular input, see the "Entering a diagram in tabular mode" in the **HOPEX Common Features** guide.*

### **Creating an Organizational Process Diagram**

To create an organizational process diagram:

1. Right-click the process name and select **New > Organizational Process Diagram**.  
The entry mode selection dialog box opens.
2. Click **No** to open the diagram editor.  
The diagram opens in the edit area. You are now in the **HOPEX** graphic editor. The frame of the described organizational process appears in the diagram.

### **Accessing an Organizational Process Diagram**

To access an organizational process diagram:

1. Right-click the process to open its pop-up menu.

2. Select **Organizational Process Diagram**.

The diagram opens in the edit area.

☛ If the process does not have a diagram, you can create it by clicking **New > Organizational Process Diagram** in its pop-up menu.

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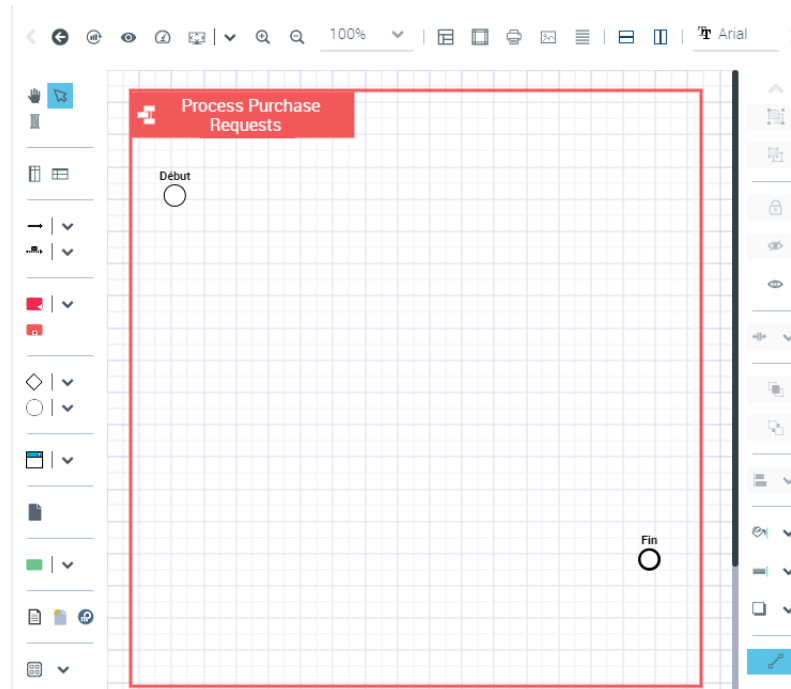
## Organizational Process Diagram initialization

By default, with **HOPEX Business Process Analysis**, the BPMN diagram is initialized with the current process, represented by a frame; Start and End events are added in the frame as well as input and output gates.

If the organizational process is represented in a higher level diagram, the diagram is initialized taking into account participants and flows that are represented in the higher level diagram. A note provides the name of the diagram from which the new diagram has been initialized.

☛ After reading this note, you can remove it.

### **Example of an Organizational Process Diagram**









## Accessing organizational process properties

The properties of the different business processes available in **HOPEX Business Process Analysis** depend on the profile with which you are connected and the products that you possess.

### Organizational Process characteristics






The **Characteristics** page of the properties window of a process is divided into different sections:

- The **Identification** section of the properties window for a process provides access to:
  - its **Name**,
  - its **Owner**, by default on creation of the process, it is held by the default library.  
 For more details on libraries, see [Preparing the Work Environment](#).
  - its **Code**,
  - its update **State**,  
 For more details on process statuses, see [Organizational process review workflow](#).
  - the text of its **Description**.
- The **Responsibilities** section enables to identify all persons concerned by the process description depending on their role.
- The **Components** section enables to access all organizational Processes and operations that contribute to the organizational process execution.
- The **System Used** section enables to access the list of elements used by the process.  
 For more details, see [Modeling the Systems Used](#).
- The **Details** section enables access to process type, for more details, see [Task type](#).
- The **Controls et Risks** section enables business and IT managers to guarantee traceability of compliance controls via application layers, data and infrastructures.
  -  A risk is a hazard of greater or lesser probability to which an organization is exposed.
  -  A control is a set of rules and means enabling the assurance that a legal, regulatory, internal or strategic requirement is respected.
  -  For more details on controls, see the **HOPEX Risk Mapper** guide.
- The **Attachments** section enables to access all documents dedicated the described process.
- The **Word Report** section enables creation of word reports of the described process.



## The property pages of an organizational process

With **HOPEX Business Process Analysis** a process is described by the following properties:

- the **Assessment** page that is used to access the different possibilities for assessing the process.  
 For more details, see [Assessments With HOPEX Business Process Analysis](#).
- **Action Plans** page, used to access the action on the process.  
 For more details, see [Action Plans with HOPEX Business Process Analysis](#).
- **Quality** page, allows to enter quality characteristics specific to the process.  
 For more details, see [Managing Quality](#).
- **Reports** page, used to access the different reports available on the process.  
 For more details, see [HOPEX Business Process Analysis Reports](#).
- **SolMan Manager** and **SolMan History** pages, used to access the facilities offered with the **HOPEX for SAP Solution Manager 7.2** product.  
 For more information, see [HOPEX for SAP Solution Manager 7.2](#).

## DEFINING PARTICIPANTS



*A participant defines a partition of the actions of a process that will be assigned to a same agent.*

A participant enables:

- Assignment of a group of operations to one or to several enterprise org-units.
- Representation of a unit external to the process with which the process communicates by means of message flows.

Organizational process participants may be associated to different object types, but **org-units** are privileged.



*An org-unit represents a person or a group of persons that intervenes in the enterprise business processes or information system. An org-unit can be internal or external to the enterprise. An internal org-unit is an organizational element of enterprise structure such as a management, department, or job function. It is defined at a level depending on the degree of detail to be provided on the organization (see org-unit type). Example: financial management, sales management, marketing department, account manager. An external org-unit is an external entity that exchanges flows with the enterprise. Example: customer, supplier, government office.*



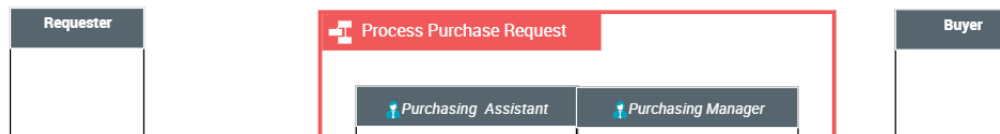
*You can also use the **Assignment** section of the **Characteristic** property page of a participant to connect new or existing objects of different types to the participant.*

## Using Participants



*A participant defines a partition of the actions of a process that will be assigned to a same agent.*

### Example of participants



## Creating a Participant (Org-Unit )




*A participant (org-unit) enables representation of org-units assigned to execute a group of process operations.*

Org-units, either new or already created, can be assigned to participants of a process.

Example: The "Analyze Purchase Request" operation in the "Process Purchase Request" process, handled by the

Purchasing Manager, is assigned to the Purchasing Assistant when the manager is absent. To represent this, we assign org-units "Purchasing Manager" and "Purchasing Assistant" org-units to the same participant.


To create a *participant (Org-Unit)* in an organizational process diagram:

1. Click the arrow at the right of the **participant (org-unit)**  button in the insert toolbar.
2. Click within the organizational process frame.  
The **Creation of Participant- Assignement** wizard opens.
3. In the **Org-Unit** field, select the org-units you wish to assign to the participant.
4. Click the **Next** button.  
The **Creation of Participant - Assignment** wizard allows you to modify the list of selected actors.
5. Click **OK**.  
The participant is positioned in the diagram. If you have not specified a name, it will carry the name of the assigned org-unit.

☺ To hide the name of the participant, open its pop-up menu and select **Shapes and Details**. In the tree on the left, click the "Short Name" folder, then in the **Content** tab, clear the **Short Name** check box.

## Creating a Participant

To create an org-unit participating in execution of a process:

1. In the diagram insert toolbar, click the **Composite Participant (Org-Unit) > Participant**  button.
2. Click in the diagram within the organizational process frame.  
The participant appears in the diagram.
3. Click the "Participant" name and press key <F2> to modify the name of the participant.

## Assigning an org-unit to a participant

Org-units, either new or already created, can be assigned to participants of a process.

Example: The "Analyze Purchase Request" operation in the "Process Purchase Request" process, handled by the Purchasing Manager, is assigned to the Purchasing Assistant when the manager is absent. To represent this, we assign org-units "Purchasing Manager" and "Purchasing Assistant" org-units to the same participant.

To assign an org-unit to a participant:

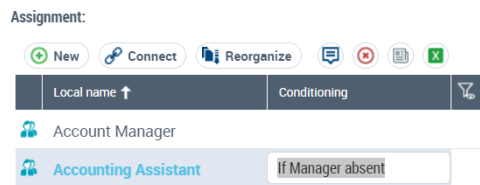
1. Open the **Characteristics** property page of the Participant.
2. In the **Assignment** section, click the **Connect** button.  
A wizard opens.

3. Select **Org-Unit** and select **Propose**.  
A list of proposed org-units is displayed.
4. Select the org-unit you wish to assign to the participant, "Purchasing Assistant" in the example, and click **OK**.  
The assignment appears in the properties dialog box of the participant..

## Conditioning the assignment of an object to a participant

To condition participation of an org-unit:

1. Open the **Characteristics** property page of the Participant.
2. In the **Assignment** section, select the line of the org-unit of which you wish to condition assignment.
3. Click in the **Conditioning** column.
4. Enter the text of the condition.




5. Click **OK** to close the properties of the participant.  
The text of the condition appears between brackets alongside the name of the org-unit in the participant title bar.

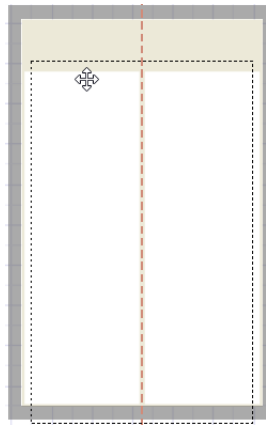
## Positioning a Participant in a Swimlane

The swimlane is a tool that enables graphical presentation of certain diagram types. Objects arranged in swimlanes automatically take the same dimensions and are aligned.

To create a swimlane and place in it the participants you have just created:

1. In the insert tool bar, click the **Vertical Pool**  button.
2. Click on the diagram.  
The swimlane is created.
3. Drag the participant into the swimlane holding the mouse button down.

4. Release the button when the swimlane frame and the described process are highlighted.



The swimlane adapts to the size of the participant.

➡ For more details on swimlanes, see "Using swimlanes" in "Handling HOPEX MEGA Objects" in **HOPEX Common Features**.

## CREATING OPERATIONS

An operation is an important step in an organizational process. For steps requiring greater detail, organizational processes can be used.

### Creating an Operation on a Participant

To create an operation and connect it to the participant responsible for its execution:

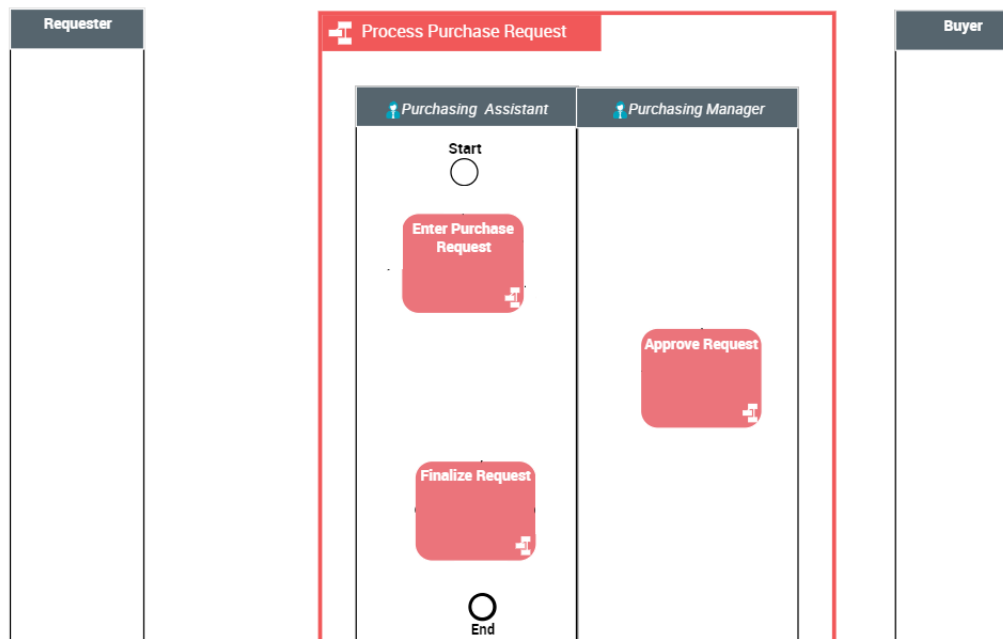
1. Click on the **Operation** button of the Insert toolbar.
2. Click in the diagram within the shape of the participant concerned. The operation is automatically created.

To assign an operation to another participant:

1. Select the operation and move it from one participant to the other.

*When positioned, the operation is disconnected from the initial participant and reconnected to the new participant executing the operation.*

### Operations example

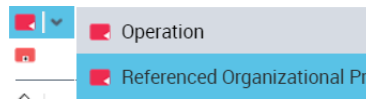


## Calling an Organizational Process in an Operation

You can create an operation that calls an organizational process. This functionality enables, for example, replacement of the process called by another process without disturbing description of the main process.


To create an operation that calls an organizational process:

1. Click the arrow at the right of the **Operation**  button and select **Referenced Organizational Process**.






2. Click in the diagram within the shape of the participant responsible for its execution.  
A creation dialog box opens.
3. In the **Organizational Process** field, enter the name of the process.  
In our example, "Process Purchase Request" could be replaced by "Process Urgent Purchase Request".  
*By default, the operation carries the same name as the organization process called.*
4. Click **OK**.  
The operation appears in the diagram with the name of the organizational process.

## Modeling the Systems Used

 A system used during the execution of a step of a process represents what is necessary to realize this step. It can be an application or an IT service, or any other non IT resource, or more generally a functionality.

A System Used can be of several types:

- an **IT service**,  
 An IT service is a software component of an application, that can't be deployed alone and that realizes a sub-set of the functionalities of this application either for end users of this application or inside the application (or another application). This includes batch programs.
- an **application**,  
 An application is a software component that can be deployed and provides users with a set of functionalities.
- a **functionality**,  
 A functionality is a service required by an org-unit in order to perform its work. This functionality is generally necessary within an

activity in order to execute a specific operation. If it is a software functionality, it can be provided by an application.

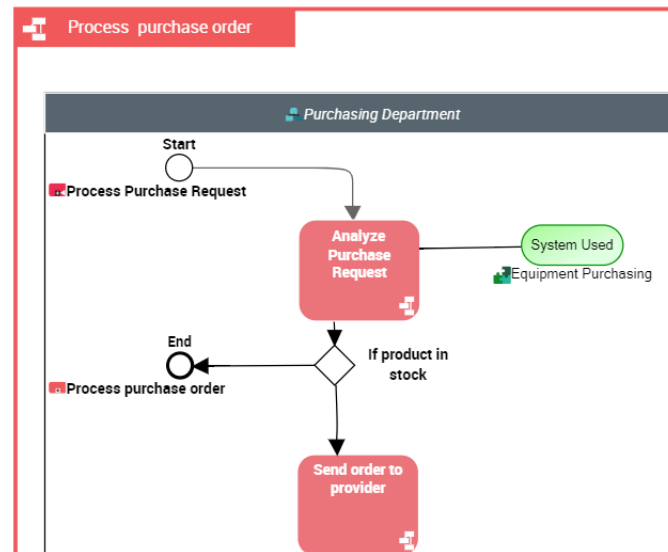
- a **resource**.



A resource is a means used to perform certain actions.

## System used Example

We can define a new organizational process for processing of urgent purchase requests, in which responsibilities of the purchasing assistant are extended. However, the assistant is using an **application**.



"Process Purchase Request" Organizational Process

The purchasing department begins by analyzing the purchase request. Is product in stock? A request for availability is put forth.

To analyze the purchase request and send the order, the purchasing assistant requires data on stock levels. He will have access to the "Equipment Purchasing" application.

## Creating a System Used in an organizational process diagram

You can see the **systems used** by the operations by selecting "System used" in the window opened from the "Views and Details" button.

To create a **system used** representing the use of the application by the organizational process:

1. Click the arrow at the right of the **System Used** button and select **Application Used**.
2. Click on the diagram.  
A creation dialog box opens.
3. In the **Application** field, select the applications you want to use.



4. Click **OK**.  
The system used is positioned in the diagram.
5. Use the link button to connect the system used you have created to an organizational process or an operation.

## DESCRIBING OPERATIONS SEQUENCE FLOWS

A *sequence flow* is a directional link that represents the chronological organization of the different processing steps.

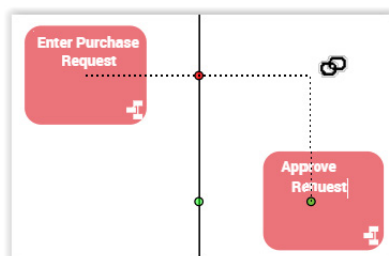


*A sequence flow is used to show the order in which steps of an exchange contract will be performed. A sequence flow has only one source and only one target.*

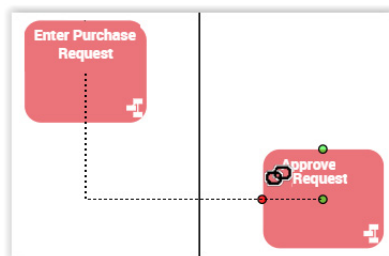
### Creating Sequence Flows

To create a sequence flow between two operations::

1. Click the **Sequence Flow** ➔ button.
2. Click the sender operation and draw a link to the recipient operation. A dotted line link indicates the path taken by the graphic link.



☛ Several paths are possible: you need only move the cursor in the recipient operation frame.



### Moving Sequence Flows

You may need to change the predecessor or successor of a sequence flow.


To move a sequence flow:


1. Click the sequence flow.  
The two link ends are marked by squares.
2. Holding the <Shift> key down, position the mouse on the square at the end you wish to move.  
A reel appears when you are correctly positioned on the link end.
3. Still holding the <Shift> key down, click the square and, holding the mouse button down, move it to its new predecessor or successor before releasing the mouse button.  
The link appears in its new position in the diagram.

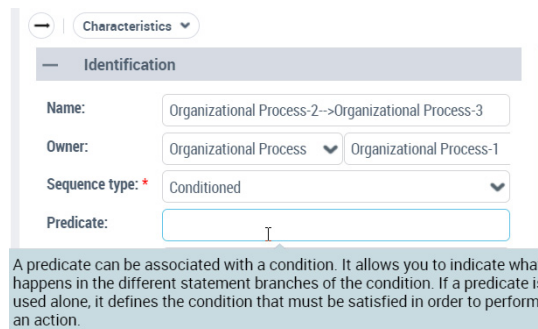
## Defining a Condition on a Sequence Flow

### Specifying that a sequence flow is conditioned

To define that a sequence flow is conditioned:

1. Right-click the sequence flow and select **Sequence Type > Conditioned**.
2. Click the sequence flow and press key <F2> to add a comment if necessary.  
The text associated with the condition appears on the link which then takes form .

 You can also access to the conditions of the sequence flow from the **Characteristics** property pages of the sequence flow. The comment appears in the **Predicate** field.



A predicate can be associated with a condition. It allows you to indicate what happens in the different statement branches of the condition. If a predicate is used alone, it defines the condition that must be satisfied in order to perform an action.

### Defining a Sequence Flow

If several conditioned sequence flows are from the same operation, you can specify that one of these should be used as default. For example, having completed the "Enter Purchase Request" operation, the assistant always executes the "Finalize Request" operation, except if the request is not acceptable and is below a given amount.

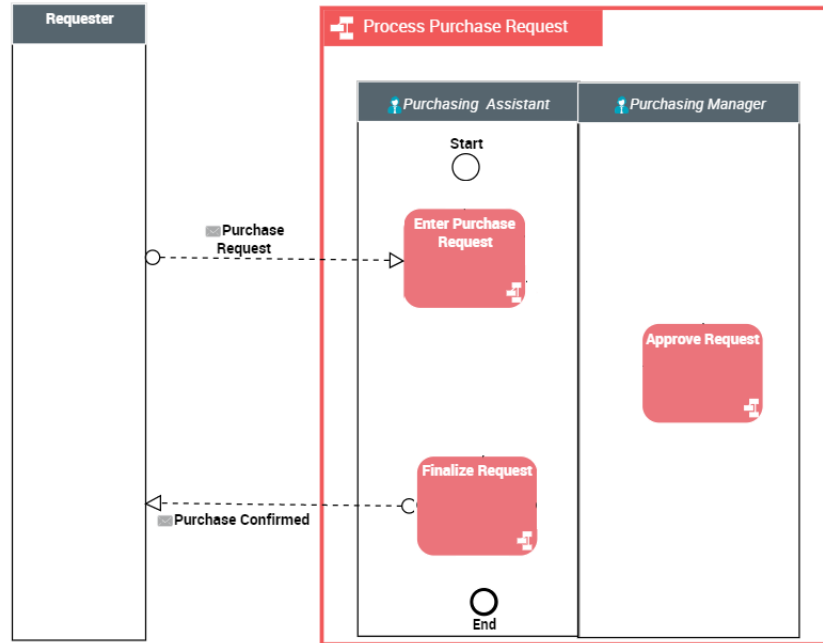
To define that a sequence flow is used by default:

- 1 Right-click the sequence flow and select **Sequence Type > Default**.

The link then takes form .

## DEFINING MESSAGE FLOWS

The content of message flows exchanged with the exterior can be specified.



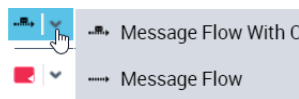
### Creating a Message Flow With Content

You can specify the content of *message flows* exchanged between a process and its environment directly at flow creation.

A message flow represents circulation of information within an exchange contract. A message flow transports its content.

To create a message flow and its content:

1. In the diagram insert toolbar, click the **Message Flow** button arrow, option **Message Flow With Content**



2. Click the first object representing the start step, and, holding the mouse button down, draw a line to the object representing the next step. The **Creation of Message Flows With Content** dialog box opens.
3. In the **Content** drop-down list, select the content you wish to associate with the flow.  
The message flow is displayed with its content in the diagram.

 You can associate several contents with the message flow. For more details, see [Creating a Message Flow With Content](#).

---


## Defining Message Flow Content



*A message flow represents circulation of information within an exchange contract. A message flow transports its content.*

To define content of a message flow:

1. Open the **Characteristics** property page of the Message Flow.
2. Click the arrow at the right of the **Content** field and select **Connect Content**.  
The selection dialog box appears, with a list of contents proposed for the message flow.
3. Select the content name and click **OK**.

 A content can be used by several message flows since it is not associated with a sender or recipient.

The name of the content appears in the diagram.

## DEFINING PROCESS EVENTS

The *events* enabling representation of facts occurring during process execution.



*An event represents a fact or an action occurring in the system, such as updating client information. It is managed by a broker. An application indicates that it can produce the event by declaring that it publishes it. If an application is interested in an event, it declares that it subscribes to the event.*

Events can be used:

- Within a process to define facts internal to the process.
- Outside a process to describe causes and effects of events of the process depending on its use context.

The different event types are presented in this section.

- ✓ [Defining an event](#)
- ✓ [Connecting Events to Sequence Flows](#)
- ✓ [Accessing Preceding or Succeeding Processes](#)

---

### Defining an event

#### Event natures

The nature of the event enables specification of its position in the processing.

- **Start:** start of the processing sequence
- **Catching:** awaiting an event (arrival of a message, signal, etc.) before continuation of processing
- **Throw:** triggering an event (message, signal, etc.) and continuation of processing
- **End:** end of processing

## Event types

Event type enables specification of what will trigger the event and what will be triggered by the event.

- **None**: the trigger is not specified, generally at the start or end of a process
- **Message**: the event is receiving or sending messages
- **Timer**: the event is triggered by a timer
- **Error**: the event is triggered by errors or throws errors that cause interrupt of the process
- **Escalation**: the event is triggered by an error or throws a non-critical error
- **Cancel**: the event reacts to cancellation of a process step or triggers cancellation
- **Compensation**: the event handles or triggers compensation of a failed process
- **Conditional**: the event is triggered by a condition
- **Link**: the event is used to connect two sections of a process
- **Signal**: the event waits for a signal or throws a signal. One signal thrown can be caught multiple times
- **Finish**: the event indicates that all process steps should be immediately ended without compensation or event processing
- **Multiple**: the event has multiple triggers
- **Multiple**: the event has several simultaneous triggers



## Event type and nature combinations

The following table presents valid combinations of event type and nature.

	START			INTERMEDIATE				END
	Top Level	Interrupting	Non Interrupting	Catching	Interrupting	Non Interrupting	Throwing	
None								
Message								
Timer								
Error								
Escalation								
Cancel								
Compensation								
Conditional								
Link								
Signal								
Terminate								
Multiple								
Parallel multiple								

## Current process interruption

The current process may be interrupted when an event occurs. This characteristic of the event is specified in **Interruption** which can be one of the following values:

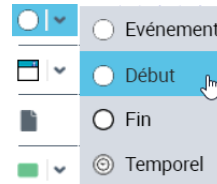
- **Interruption**
- **Non interruption**

➡ By default the event interrupts the current process.

## Creating Events


You can directly create the most frequently used events:

1. Click the **Event** button in the toolbar and select from the predefined nature events the nature that interests you.



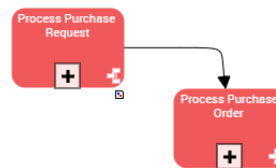
2. Click on the diagram.  
The new event appears in the diagram.

To create an event with a specific nature or type:

1. Click the **Event** button  in the insert toolbar.
2. Click on the diagram.  
The **Create Event** dialog box opens.
3. Enter the name you want to give the event.
4. Select the nature of new event.  
*By default, the nature is **Catching**.*
5. Click **Next** and select the type of event you wish to create.  
*By default the type is **None**.*
6. Click **OK**.  
The new event appears in the diagram. The shape of the event respects conventions linked to its type and nature.  
*By default the event is **interruption**.*

## Connecting Events to Sequence Flows

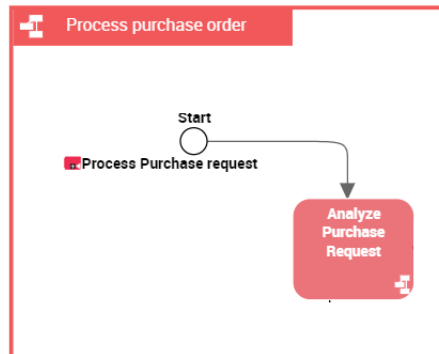
In a given context, a process can be connected to another process by a sequence flow.



In the example above, the "Process Purchase Request" process precedes the "Process Purchase Order" process.

## Displaying external processes

In the diagram describing the process, the preceding process can be displayed.



In the diagram that describes the "Process Purchase Order" process, the "Process Purchase Request" process that precedes it is shown.

To do this, it is necessary to specify the event involved in the sequence flow:

1. Open the **Characteristics** property page of the sequence flow.
2. In the **Triggered Event** section, click the **Connect** button.  
The query dialog box appears.
3. Find **Possible Triggered Events**.  
The list displayed proposes start events or catching events of the successor process.  
*The successor process is generally triggered at its start and normally has only a single start event. This start event is therefore generally the event that interests you.*
4. Select the event corresponding to the sequence flow.
5. Click **Connect**.

If you open the organizational process diagram containing this event, you can view the process that precedes it. For more details, see [Accessing Preceding or Succeeding Processes](#).

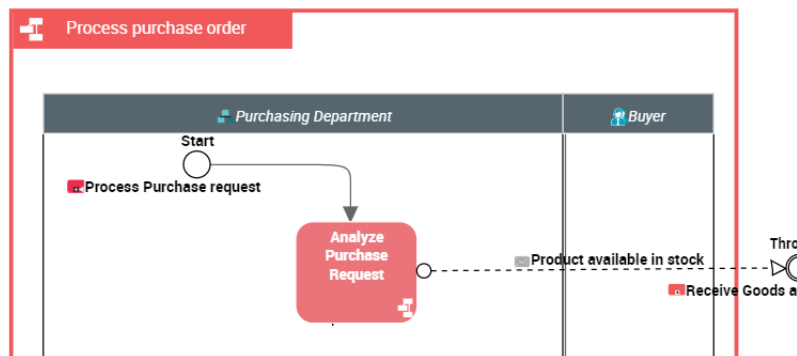
You can similarly select the triggering event of the previous process. In this case, end events or throw events from the preceding process will be proposed.

## Accessing Preceding or Succeeding Processes

In the following example, the "Process Purchase Order" organizational process is activated after processing of the purchase request, and itself activates the "Make Available" process.

To show, at events level, the processes preceding and succeeding the described process, you must:

- Specify the sequence flows in which the events are involved. For more details, see [Connecting Events to Sequence Flows](#).
- Activate the views enabling access to context-sensitive information.



To activate the context-sensitive view:

1. Click the **Views and Details** button in the diagram toolbar.
2. Select the **View External Processes** check box.
3. Click **OK**.

## Attaching an Event to a Process

To attach an event to a process:


1. Click the event and hold the mouse button down.
2. Position the event on the border of the process.

To detach the event from the process border:

1. Right-click the event and select **Detach**.

## USING SHARED OBJECTS

In an organizational process diagram, a *data object* can be used to represent the fact that data or objects (correspondence, raw materials, finished products, etc.) are in stock awaiting use.

 A data object is used to explain how documents, data, and other objects are used and updated during the process. A data object can represent an electronic document, or any other type of object, electronic or physical.






In this example, the shared object "Stock Data" is represented with an open head arrow since it is used by the "Analyze Purchase Request" process without having been produced by one of the processes represented in the repository.

---

### Creating a Data Object

To create a data object:

1. Click the **Data Insertion**  button in the diagram insert toolbar.
2. Click in the diagram to position the object.  
The **Create Data Object** dialog box appears.
3. Click the arrow at the right of the **Content** field and select the content that interests you.  
 A content can be used by several data objects.
4. Enter **Data Object State** if required.  
 By default the data object carries the same name as its content. The state appears between brackets.
5. Click **OK**.  
The data object appears in the diagram.

---

### Describing a Data Object

To specify that a shared object corresponds to an object collection:


1. Open the **Characteristics** properties page of the data object.


2. Click the arrow at the right of the **Collection** box, and select **Yes**. The shared object then takes the following form:




Information necessary for execution of operations can be consulted or updated in the data objects.

To indicate that information was obtained from a data object, for example that stock data used by the "Analyze Purchase Request" operation was obtained from the "Stock Data" data object:

1. Click the link  button in the insert tool bar to link the "Stock Data" to the "Analyze Purchase Request" operation.


 A data object is represented by an open head arrow if it is read by a process without having been updated by one of the processes in the repository.

 A data object is represented with a solid head arrow if it is updated by a process and not read by any of the processes in the repository.

## Associating a data object with Sequence Flow

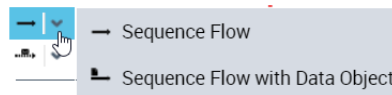
You can specify that the content of a *shared object* is sent at sequencing of two operations.

For example, a shared object "Purchase Request" can be sent between the operations "Enter Purchase Request" and "Finalize Request".

 A data object is used to explain how documents, data, and other objects are used and updated during the process. A data object can represent an electronic document, or any other type of object, electronic or physical.

To simultaneously create a sequence flow and a data object:


1. Click the **Sequence Flow** button arrow, option **Sequence Flow With Data Object**.



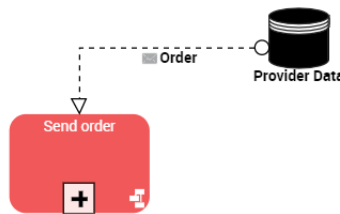
2. Click the operation representing the start step, and, holding the mouse button down, draw a line to the operation representing the next step. The **Creation of Sequence Flow -Data Object** dialog box opens.
3. In the **Content** drop-down list, select the content you wish to associate with the flow. The sequence flow and its content are displayed in the diagram.

## Using Data Stores

Objects that are shared, supplied or used in processing can be stored in a **data store**.


 A data store provides a mechanism to update or consult data that will persist beyond the scope of the current process. It enables storage of input message flows, and their retransmission via one or several output message flows.

In the example below, data relating to suppliers is represented by the "Supplier Data" data store.



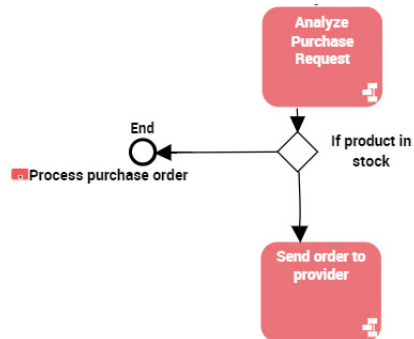
## Creating a data store

To create a data store of processes:


1. Click the **Data Store** button in the insert toolbar.  
 If the button is not visible by default, click the diagram **Views and Details** button and select the "Data Stores" view.
2. Click in the diagram to position the object.  
The **Add Data Store** dialog box appears.
3. Enter the name of the Process data store.
4. Click **OK**.


## USING GATEWAYS

The following example presents a case where continuation of processing is conditioned: following analysis of a purchase request, the process either ends, or an order is sent to a supplier.



To specify that several processing steps are accessible following a particular processing step, you can use a *gateway*.

 Gateways are modeling elements that are used to control how sequence flows interact as they converge and diverge within a process.

 Conversely, you can also use a gateway to indicate that a particular processing step is available from several processing steps of a process.

For more information on gateways, see [System Process Gateways](#).











# BUSINESS PROCESSES



This chapter presents how to describe products or services provided by the enterprise to its customers.

The business process diagram enables representation of product or service offerings proposed by the enterprise to each of its markets, as well as the processes that produce these.

The points covered here are:

- ✓ [Managing Business processes](#)
- ✓ [Representing Product Offerings](#)
- ✓ [Representing Process Contextualization](#)

## MANAGING BUSINESS PROCESSES



*A business process represents a system that offers products or services to an internal or external client of the company or organization. At the higher levels, a business process represents a structure and a categorization of the business. It can be broken down into other processes. The link with organizational processes will describe the real implementation of the business process in the organization. A business process can also be detailed by a functional view.*

### Creating a Business Process

To create a *business process* from the **Design** navigation pane:

1. Click **Process > Business Process**.
2. Select **My Business Processes**.
3. Click **New**.

The **Creation of Business Process** dialog box appears.

4. In the **Name** field, enter the name of the business process.
5. Click **OK**.

The business process is created and added to the list of business processes.

In **HOPEX Business Process Analysis**, business processes are described by diagrams.

### Creating a Business Process Diagram

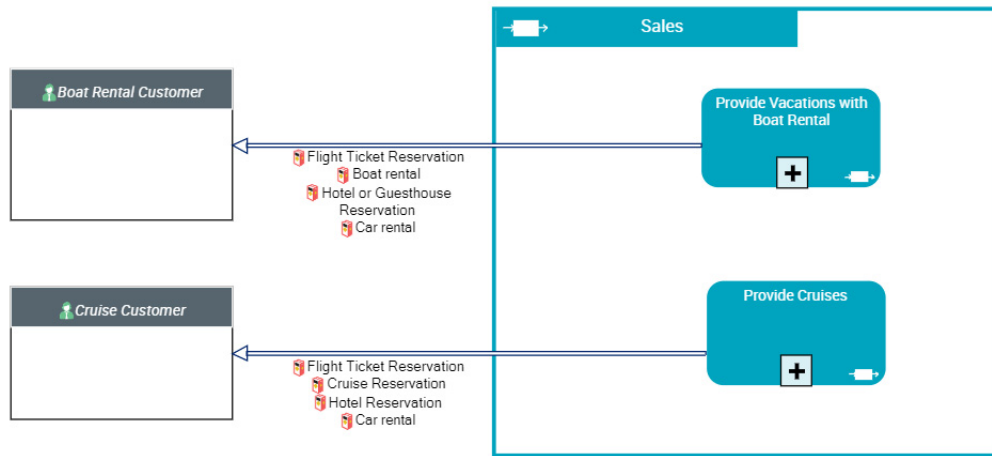
To create a business process diagram:

1. Right-click the process name and select **Business Process Diagram**.

For more information on a business process diagram initialization with **HOPEX Business Process Analysis**, see [Organizational Process Diagram initialization](#).

## REPRESENTING PRODUCT OFFERINGS

The business process diagram enables representation of product or service offerings proposed by the enterprise to each of its markets, as well as the processes that produce these.



In the example above, the enterprise is targeting two customer segments, those that rent boats, and those to whom cruises are proposed.

In the case of boat rental, the enterprise also proposes flight ticket reservation, hotel or guesthouse reservation and car rental.

In the case of cruises, the enterprise also proposes flight ticket reservation, hotel reservation and car rental.

### Defining Offerings

*Offerings* are proposed by enterprise business processes to participants outside the enterprise.

*An offering represents the availability of a product or service supplied by an enterprise through a specific process.*

### Creating an offering

To create an offering:

1. Click the **Offering** button.

2. Click the business process and, holding the mouse button down, draw a link to the participant.
3. Release the mouse button.  
The link representing the offering appears in the diagram.

## Defining offering products



*A product represents commodities offered for sale, either goods or merchandise produced as the result of manufacturing, or a service, ie. work done by one person or group that benefits another.*

To specify the detail of offerings of **products**:

1. Right-click the offering and select **Properties**.  
The properties windows opens.
2. Select **Characteristics**.
3. In the **Product** section, click the **New** button and enter the product name.
4. Click **OK**.  
The name of the product appears in the diagram.

*For more details on products, see [Products](#).*

## Describing offering implementation

Use the **business process diagram** of the process that is linked to the offering to describe the organization and exchanges that are associated with it.

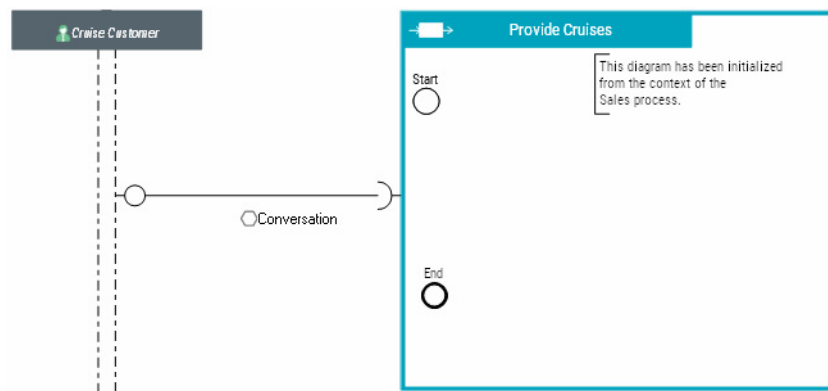
In this way, when you initialize a **business process diagram** for a process, a conversation is automatically created for each offering.

*For more details on business process diagrams, see [Creating a Business Process Diagram](#).*

*For more details on conversations, see [Conversations](#).*

The conversation bears the name of the exchange that is automatically created.

The name of the exchange is that of the offer, or failing this, that of its first product.

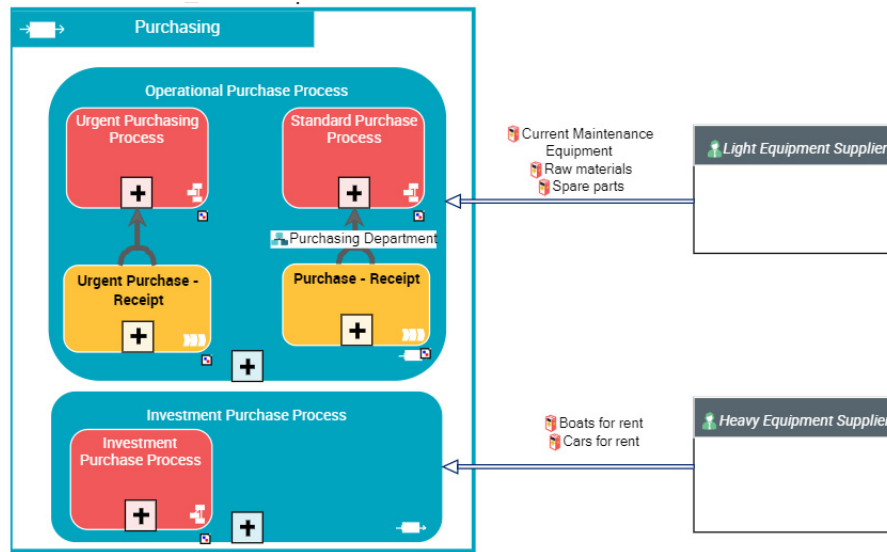


In the example above, a conversation is created to describe the exchanges that support the airline ticket and hotel reservation and car rental offerings.



## REPRESENTING PROCESS CONTEXTUALIZATION

The business process diagram enables representation of the context in which the organizational processes value streams comprising the business process are used.



*Purchasing business process diagram*

In the example above, enterprise purchase processes are shared between operational purchase processes and investment purchase processes.

A specific organizational process is defined to process urgent purchase of car maintenance.

## Defining Contextualizations

**Contextualizations** enable the association of processes between each other.

A contextualization allows specification of the implementation of a process by another process in a specific context, such as the geographical location on a site.

### Creating a contextualization


To create a contextualization:

1. Click the **Contextualization** button

- Click the process to be implemented and, holding the left mouse button down, draw a link to the process describing implementation. Release the mouse button.  
The link representing the contextualization appears in the diagram.

## Defining context

To specify the context in which a process implements another process:

- Right-click the contextualization and select **Properties**.  
The properties dialog box opens.
- Click **Characteristics**.
- In the **Implementation Context** section, click the **Connect** button.
- In the window that opens, select the context type, org-unit or site.
- Click the **Find** button .
- In the list that opens, select the org-units or sites concerned and click **Connect**.
- Click **OK** (Web Front-End) or **Close** (Windows Front-End).  
The implementation contexts appear in the diagram.


## Launching a Report Illustrating Contextualizations

From a business process, you can launch a report in the form of a matrix to illustrate contextualizations.

To launch a report illustrating contextualizations:

- Right-click the business process concerned and select **Report Discovery**.
- In the list of available reports, expand the "Process Analysis" folder.
- From the "Business Process Contextualization Matrix (BPMN)" report, click **Launch a new report**.
- In the report page, click the name of the report chapter.  
A matrix appears.

1. Business Process Contextualization matrix



	Purchase - Receipt	Urgent Purchase - Receipt
Standard Purchase Process	 Contextualization	
Urgent Purchasing Process		 Contextualization

This matrix presents:

- the value streams of the business process in columns
- the organizational processes of the business process in rows

To view a specific context (org-unit, site or product):

- Click the + in the cell.

	 Contextualization
	 Purchasing Department



# VALUE STREAMS



Value streams of the enterprise can be described in the form of functional processes. For example, when an enterprise operates out of numerous geographical locations, organization of business process operations can vary significantly between regions.

It is therefore useful to have a summary view, independent of organizational structure, to represent steps in the value stream connected to enterprise business and common to all organizational variants.

A functional representation of the value stream also facilitates improvement in enterprise operation.

Indeed, when the operation of each organizational process is represented, this enables local optimization of each process.

This structure however remains partitioned by existing organizational structures. More significant changes require a broader view of the value stream, independent of organization. This global view is represented by the value stream diagram.

**HOPEX Business Process Analysis** enables the creation and description of enterprise value streams.

- ✓ ["Creating a value stream", page 78](#)
- ✓ ["Representing a value stream", page 79](#)

## CREATING A VALUE STREAM



*A value stream is an end-to-end collection of Value Stages that creates an outcome for a customer, who may be the ultimate customer or an internal end-user of the value stream.*

One option is used to display the **value streams**.

To activate this option:

1. In the workspace, open the **Options** window.
2. In the left tree, select **Business Process and Architecture Modeling**:
3. Select the **Value stream Modeling** check box.

To create a *Value stream* from the **Design** navigation pane:

1. Select **Functional Design > All Value streams**.
2. Click **New**.  
The **Creation of a Value stream** window appears.
3. In the **Name** field, enter the name of the *Value stream*.
4. Click **OK**.

The value stream is created and added to the list of value streams.

☞ The **Finish** button is grayed if the **Name** box is not completed.

---

### Creating a value stream diagram

To create a value stream diagram

1. Right-click the Value stream name and select **Value stream Diagram**.

# REPRESENTING A VALUE STREAM

☛ To display the **Value streams**, open the **Options** window and check that **Business Process and Architecture Modeling > Value stream Modeling** is activated.

---

## Value stream representation principles

### Highlighting organizational choices

Each enterprise has activities related to its business that must be performed whatever the organization in place. These activities can be purchasing, sales, sales administration, manufacturing, etc.

Defining their organization consists of assigning these activities to the org-units that will perform them.

We can distinguish between:

- Processes relating to the business of the enterprise: these are difficult to change unless the enterprise decides to totally review its business.
- Processing depending on organizational choices.

### Diversity of variants

Most variants of a process are the result of organizational choices such as giving preference to urgent orders, special processing for large or export orders, etc.

It is necessary to overcome this diversity in order to move on to a new set of variants, for example processing orders via telephone or the Internet. Representing a business process in terms of activities gives a unique representation of the value chain, highlighting what must be done irrespective of organization choices.

### Number of steps

Certain steps in an organizational process are exclusively linked to the chosen organization. In such cases, it is useful to check whether these steps provide any real added value to clients or only concern the way things are done.

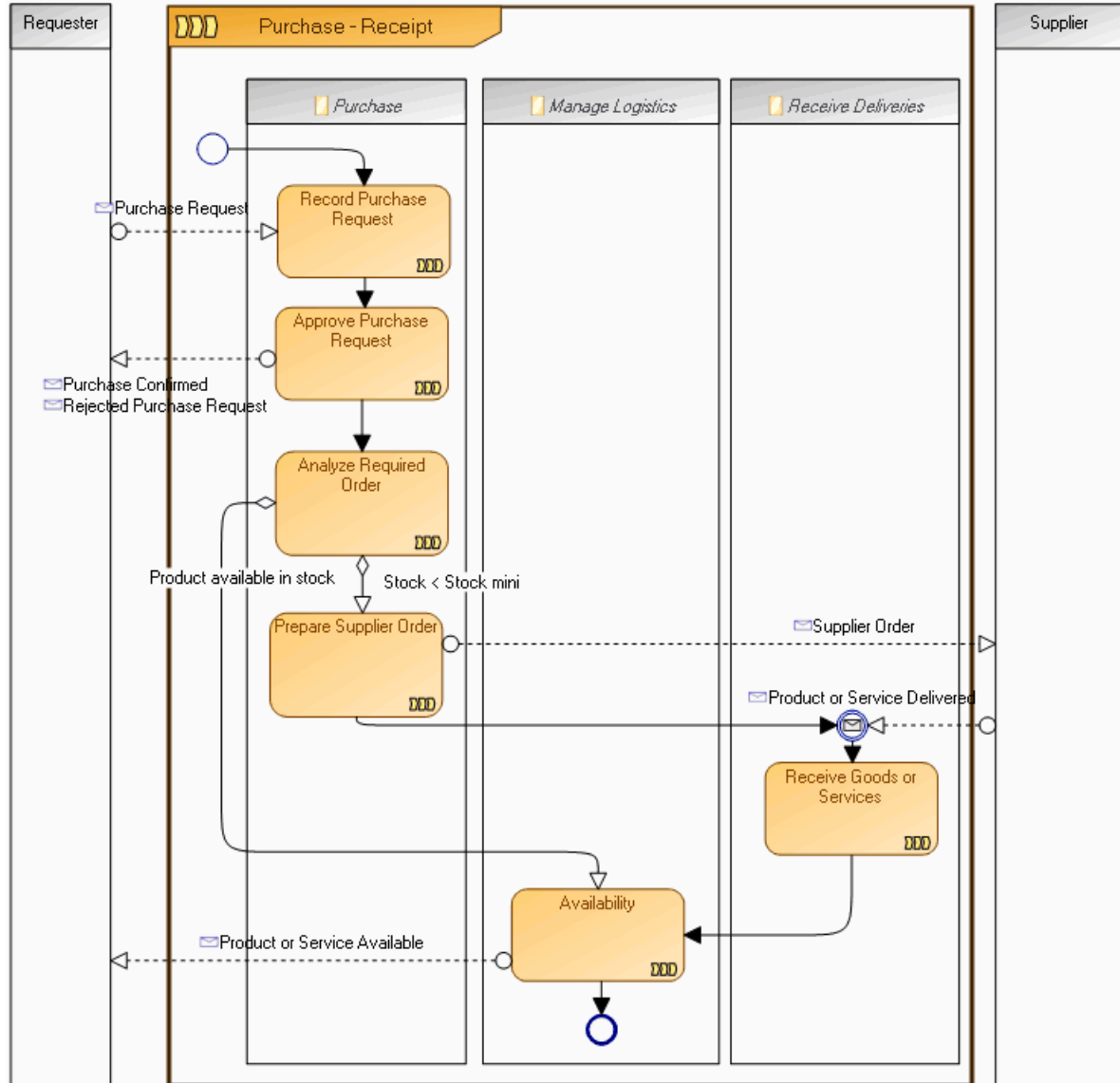
Delivery times can also be reduced by restructuring the order of these steps.

To highlight possible improvements, you can represent a value streams by flows exchanged between enterprise **value stage**.

📖 A value stage is a distinct, identifiable phase or step within a value stream that has a unique entrance criteria, exit criteria, and identifiable participating business function or business functional area.

## Value stream example

The following diagram presents an example of a value stream:



*"Purchase reception" value stream*

The purchase request is recorded and must then be approved. The requester is informed of the approval or rejection of



the request. If the request is validated, an analysis of the required order is carried out.

If stock is lower than a given threshold, an order is prepared and sent to the supplier for resupply.

If the product is available, or as soon as it is received from the supplier, it is made available to the requester.

In this example, the *business functions* concerned are represented in columns.



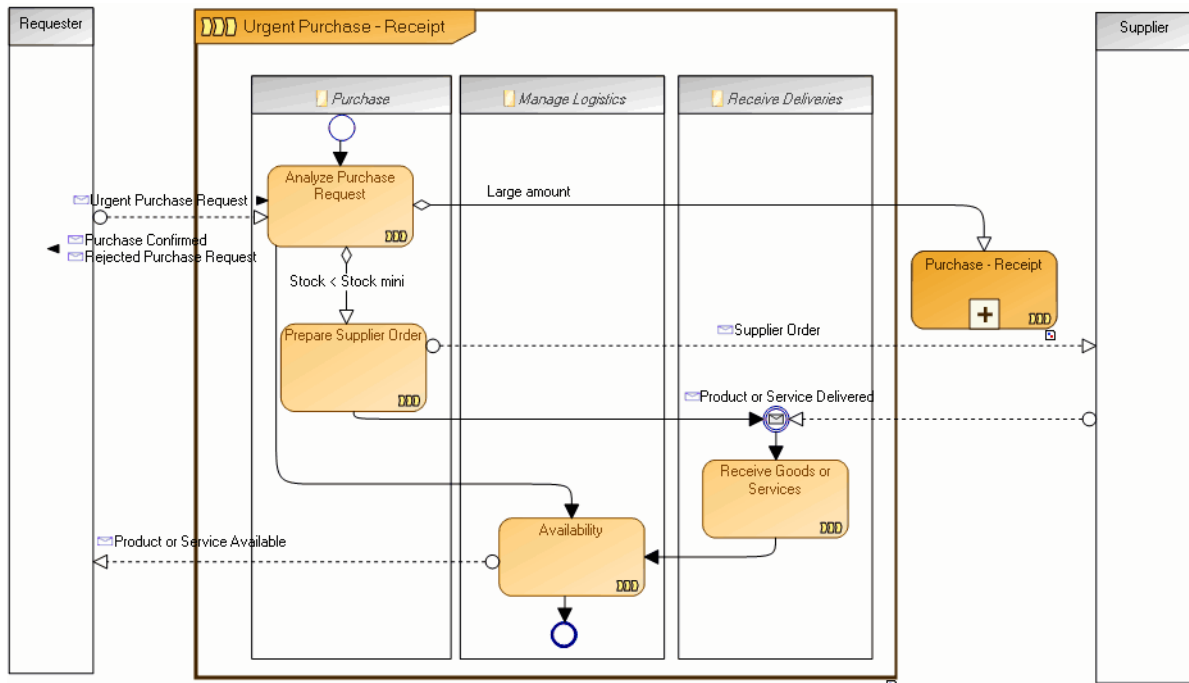
*A business function is a conceptual unit of the division of responsibilities in an enterprise. It is used to structure the management of information processing, energy, and equipment produced or used. Business functions define the skills and the functionalities necessary to the enterprise to fulfill its mission.*

In the organization previously presented, three org-units: purchasing assistant, purchasing manager and buyer, systematically participate to execute the first four steps: record and approve the request, analyze and send the order.

Optimization of the organized process "Process Purchase Requests" has saved one step: when amount of the order is not significant, the purchasing assistant can himself approve or refuse the purchase request.

In the case of urgent orders, you can again save steps by authorizing the purchasing assistant to send the order when the amount is not significant.

We obtain the following value stream for processing of urgent orders:



*"Purchase reception" value stream*

The first step consists of analyzing the purchase request. If the total amount is large, normal processing is carried out.

Otherwise, the availability request and a restock request are sent, if necessary. Continuation of this value stream is identical to the previous one: when the order has been received, it is made available to the requester.

# SYSTEM PROCESSES



**HOPEX Business Process Analysis** allows you to model the IT system process implemented when using an organizational process. This description is made in a BPMN model detailing the sequence flow of tasks performed when executing the application in the particular context.

The BPMN (Business Process Modeling Notation) specification was created to formalize graphical representation of IT and business processes, offering notation easily used by all participants concerned.

The points covered here are:

- ✓ ["Managing a System Process", page 84](#)
- ✓ ["Tasks", page 87](#)
- ✓ ["Sequence Flows, Events and Message Flows", page 88](#)
- ✓ ["Gateways", page 90](#)
- ✓ ["Step Input Gateways", page 90](#)
- ✓ ["Creating a System Process Participant", page 93](#)

## MANAGING A SYSTEM PROCESS

A system process represents automated execution of an organizational process.  
The system process diagram uses notation proposed by BPMN standard.

---

### Creating System Processes

You can create a *system process* from the navigator or from an organizational process diagram.




*A system process is the executable representation of a process. the events of the workflow, the tasks to be carried out during the processing, the algorithmic elements used to specify the way in which the tasks follow each other, the information flows exchanged with the participants.*

To display the view of system processes in an organizational process diagram:

1. Click the  **Views and Details** button in the diagram toolbar.
2. Select the **Implementation Contexts** check box.
3. Click **OK**.

The **Contextualization**  and **System Process**  buttons appear in the insert toolbar.

To create a system process from an organizational process diagram:

1. Click the **System Process** button  in the diagram insert toolbar.
2. Click on the diagram.  
The process appears in the diagram.
3. To rename the system process, select it and press your keyboard F2 key.

---

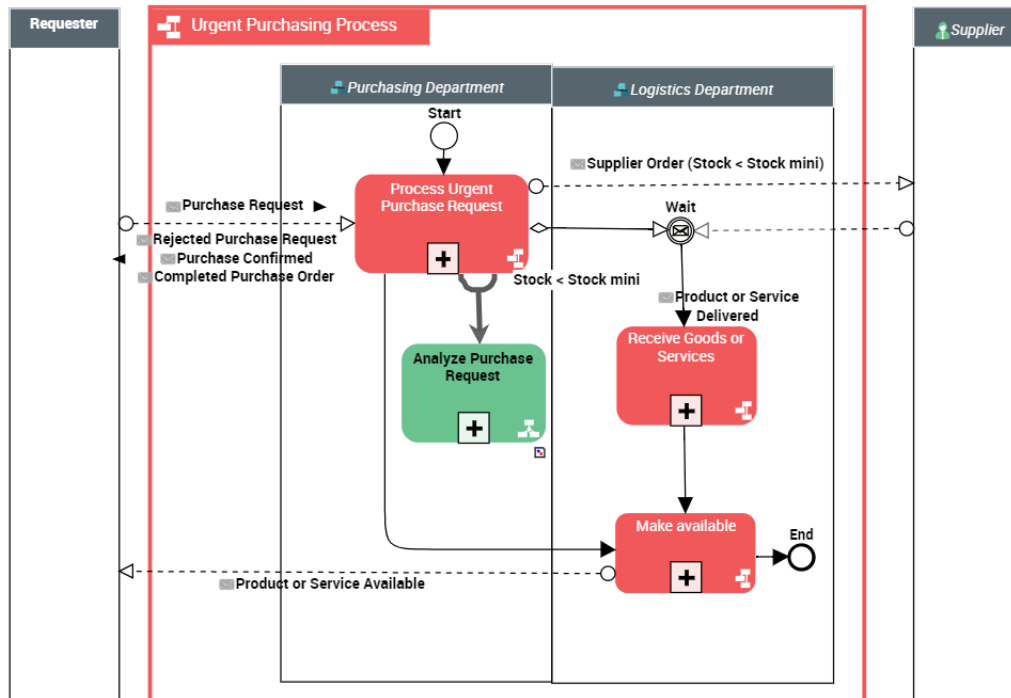
### Connecting a System Process to an Organizational Process

To specify that an organizational process is implemented by a system process in a given context, you must create a *contextualization* link between the two objects.



*A contextualization allows specification of the implementation of a process by another process in a specific context, such as the geographical location on a site.*

For example, the "Process Urgent Purchase Request" process is implemented by the "Analyze Purchase Request" system process to assure speed and efficiency of processing.



To create a connection between an organizational process and a system process from an organizational process diagram:

1. Click the **Views and Details** button in the diagram toolbar.
2. Select the **Implementation Contexts** check box.
3. Click **OK**.

The **Contextualization** and **System Process** buttons appear in the insert toolbar.

4. Click the **Contextualization** button in the insert toolbar.
5. Click the organizational process and, holding the mouse button down, drag the cursor to the system process and release the mouse button. The contextualization appears in the diagram.

## Creating a System Process Diagram

To create a system process diagram:

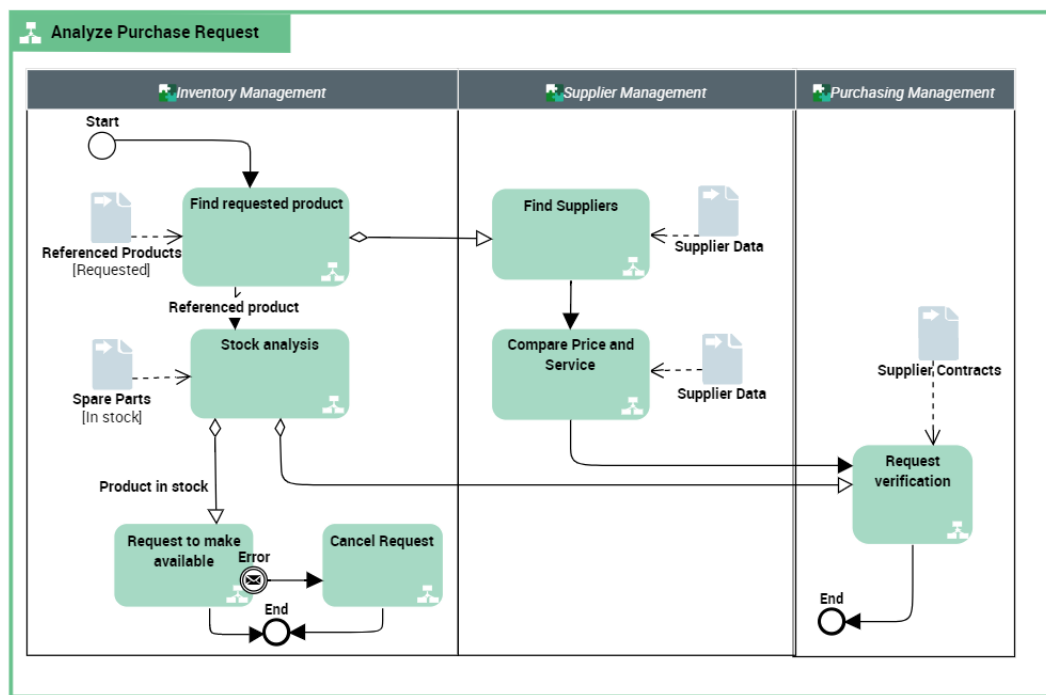
1. Right-click the process name and select **System Process Diagram**.

The system process algorithm can be expressed by sequencing of tasks and decisions.

## Example


The diagram below represents purchase request processing.

- A product search is carried out from the referenced products repository.
- If the product is new, search for a supplier and comparative study of prices is carried out. An order is then sent and the process ends.
- If the product is referenced, stock is analyzed.
- If stock is sufficient, a "Make available" request is activated and the process ends.
- If stock is less than minimum stock, an order is sent to the supplier and the process ends.




# TASKS

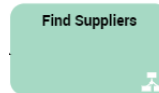
**Tasks** correspond to process steps.

 A task is an elementary step that is included within a system process. A task is used when the work in the system process is not broken down to a finer level of the process. Generally, an end-user and/or an IT service are used to perform the task when it is executed.

## Creating a task in a system process

To create a task:

1. In the diagram insert toolbar, click the **Task**  button then click in the diagram.
2. Enter the task name and click **OK**.  
The task appears in the diagram.



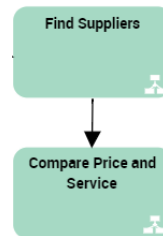
## SEQUENCE FLOWS, EVENTS AND MESSAGE FLOWS

### Sequence flows

Organization of tasks in the system process is represented by *sequence flows* between tasks.



*A sequence flow is used to show the order in which steps of an exchange contract will be performed. A sequence flow has only one source and only one target.*



### Events

*Events* represent facts occurring during process execution.



*An event represents a fact or an action occurring in the system, such as updating client information. It is managed by a broker. An application indicates that it can produce the event by declaring that it publishes it. If an application is interested in an event, it declares that it subscribes to the event.*

An example is the start or end of the system process.



Start



Final


The event can also be sending or receiving a message flow.

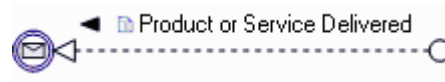




## Message flows

*Message flows* represent exchanges between the system process and the exterior.


 A message flow represents circulation of information within an exchange contract. A message flow transports its content.



 A message flow can be linked to an event of message type.

## GATEWAYS

In compliance with the BPMN standard, in the object toolbar, several *gateway* types are available to you.

 Gateways are modeling elements that are used to control how sequence flows interact as they converge and diverge within a process.

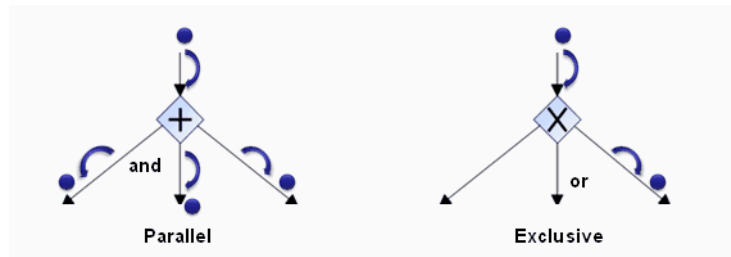
To better understand the main use cases, we distinguish output gateways of a processing step from input gateways.

---

### Processing Step Output Gateways

In the case of an **Exclusive** gateway, only one output branch can be selected from those available. The branch can be selected as a function of the **Data** available for the process, or of the **Events** occurring during its execution.

In the case of a **Parallel** gateway, all output branches are processed simultaneously.



In the case of a **Complex** gateway, one or several output branches can be selected from those available.

A **Complex** gateway represents a combination of those above.

When the gateway has been created, its type can be modified in its properties dialog box.

At output of a step, a gateway represents a point of divergence of sequence flows of a process.

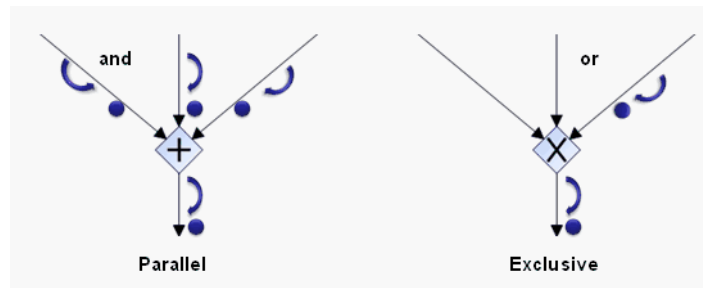
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### Step Input Gateways

At input of a step, a gateway represents a point of convergence of sequence flows of a process.

In the case of an **Exclusive** gateway, the process step is triggered when one of these branches is active.

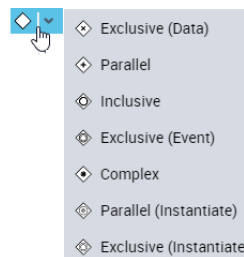
In the case of a **Parallel** gateway, all input branches are processed simultaneously.



## Creating gateways

To create a gateway:

1. Click the arrow at the right of the **Gateway** button in the diagram insert toolbar and select the gateway type you wish to create.



2. Click on the diagram.  
The gateway appears in the diagram with the shape appropriate to its type.

## Modifying gateways

To modify a gateway:

1. Right-click the gateway and select **Properties** in its pop-up menu.  
The properties windows opens.
2. Click **Characteristics**.  
You can modify the name or type of the gateway.

## Gateway type

The different **gateway types** proposed are:

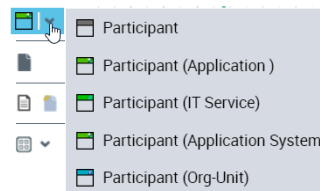
- **Complex**: the process can take a complex combination of paths.
  - **Exclusive (Data)**: the process can take a single path from several possible paths depending on the value of the data available. This is the default gateway type.
  - **exclusive (Start)**: the process is triggered by the first event occurring. The others are ignored.
  - **Exclusive (Event)**: the process can take a single path from several possible paths depending on the events occurring.
  - **Inclusive**: the process can take one or several paths simultaneously.
  - **Parallel**: the process takes several parallel paths simultaneously.
  - **Parallel (Start)**: the process is triggered by the first event occurring. The other events occurring during progress of the process are also taken into account.
3. Click **OK**.


## CREATING A SYSTEM PROCESS PARTICIPANT


In a system process diagram, a participant enables grouping of tasks assigned to an application or service.

To create a participant:

1. In the diagram insert toolbar, click the arrow at the right of the



2. In the list proposed, select for example **Application Participant** and click in the diagram.  
The participant creation dialog box appears.
3. Click the arrow  at the right of the **Application** field and select **Connect Application**.  
The query dialog box appears.
4. Find the application and click **Connect**.
5. In the participant creation dialog box, click **OK**.  
The participant created appears in the diagram with a header containing the name of the assigned application.

 To place a participant with assignment as yet unknown, select the **Participant** icon.

To assign a task to a participant:

1. place the task within the frame of the participant.

## SPECIFYING PROCESS BEHAVIOR

Complying with BPMN standard, a process can have different behaviors. With **HOPEX Business Process Analysis**, these behaviors are available for organizational processes, operations, system processes and tasks.

To describe for example that a system process is executed by a loop:

1. Right-click the process and select **Properties**.  
The properties windows opens.
2. Click **Characteristics**.
3. In the **Loop** field, select the loop type corresponding to process behavior.
4. Click **OK**.  
Shape of the process is modified to display the symbol of the loop.



Behaviors proposed are:

- **Transaction**: a transaction is a set of coordinated activities leading to a consistent, and verifiable outcome.
- **Loop**: a loop is a process step that is repeated as long as a condition is true.
  - "Do while": the condition is evaluated before the first execution.
  - "Do until": the condition is evaluated after the first execution. In this case, the process step is executed at least once.

The predicate enables specification of the loop execution condition.
- **Ad hoc**: steps of an ad hoc process are not controlled or sequenced in a particular order. Their performance is determined by the performers of the process.
- **Multiple**: the process is repeated a predefined number of times, evaluated only once before it is carried out. Execution type can be specified:
  - "Parallel": all executions carried out simultaneously.
  - "Sequential": executions carried out one after the other.
- **Compensation**: a compensation defines the set of activities that are performed during the roll-back of a transaction to compensate for activities that were performed during the normal flow of the process.

### Task type

To specify the type of a task:

1. Open the properties of the process.
2. Click **Characteristics**.

3. Click the arrow at the right of the **Type Type** field.  
A list of task types appears.
  - **Call Process**: task used to call a second process while executing the current process.
  - **Receive**: elementary task which waits for arrival of a message from a participant external to the process. When the message has been received, the task is completed.
  - **Send**: task that sends a message to a participant external to the process. When the message has been sent, the task is completed.
  - **Manual**: task executed without the help of a automatic execution engine of a process or IT application.
  - **Business Rule**: execution task of a business rule with a rules engine which processes input data and returns calculation results.
  - **Script**: task executed by a process execution engine. The designer defines a script in a language that the engine is able to interpret. When the task is ready to start, the engine executes the script. The task is completed when script execution is completed.

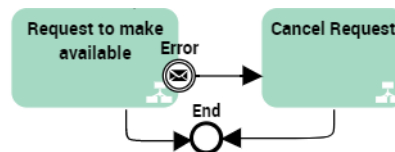
☛ Shape of the process is modified to display the symbol associated with the task type.

## Compensation description

Compensation is caused by an event occurring during process execution. This event is placed at the edge of the interrupted process. It can be moved along the edge of the process.

To free the event from the process, use the detach command in its pop-up menu.

This event can trigger a compensation operation.



☛ For reasons of consistency and simplification, the compensation link is represented in **HOPEX** by a sequence flow. BPMN standard proposes a specific link.





# CONVERSATIONS



This chapter presents how to describe *conversations* between process architecture components.



*A conversation describes an exchange of several message flows between two roles.*




*A composite conversation is described by an exchange contract. This exchange contract uses other exchanges or exchange contracts.*

- ✓ ["Conversations Example", page 98](#)
- ✓ ["Managing Conversations", page 100](#)
- ✓ ["Managing Exchange Contracts", page 104](#)
- ✓ ["Summary of Concepts", page 109](#)

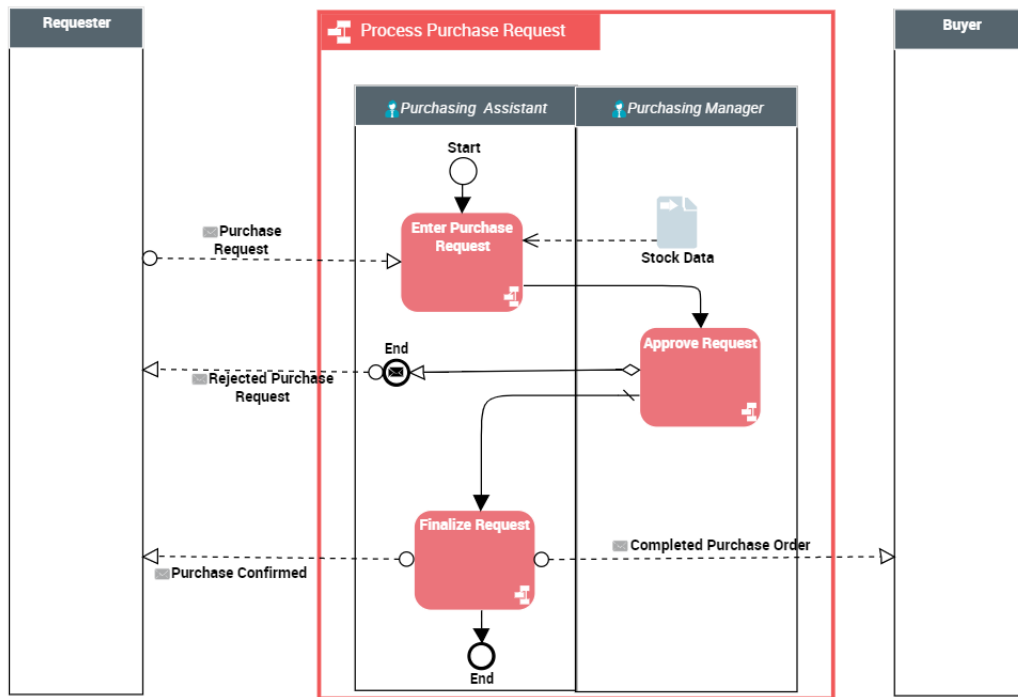
## CONVERSATIONS EXAMPLE

The **Conversation** concept is introduced in standard BPMN 2.0.

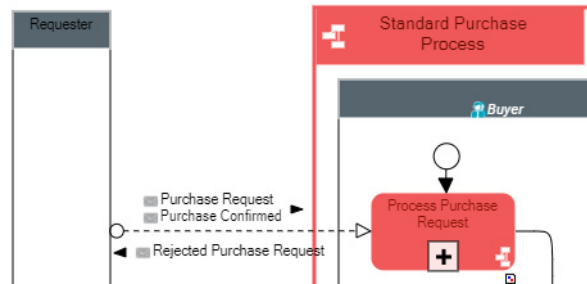
In **HOPEX Business Process Analysis**, a conversation is implemented by an **Exchange**.

 An exchange specifies message flow exchanges between two participants.

The example of purchase request processing involves several exchanges between the requester and the "Purchasing Assistant".



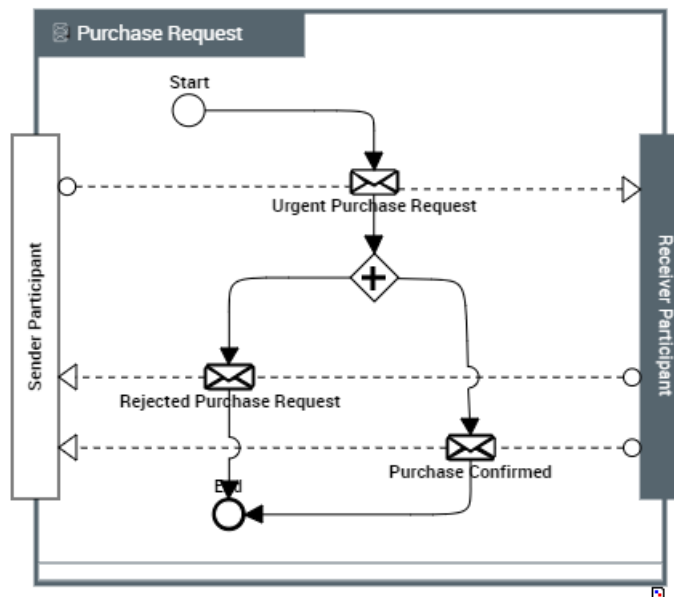
At the highest level, these exchanges can be represented by the same message flow.



A conversation is described by a set of message flows with content.

An exchange diagram can be built presenting the sequence of message flows exchanged.

The "Purchase Request" exchange diagram is shown below.



## MANAGING CONVERSATIONS

A conversation represents the exchange of information between architecture components.



*A conversation describes an exchange of several message flows between two roles.*

---

### Creating Conversations


#### Creating Conversations with an Existing Exchange

A conversation is described by an exchange representing an information exchange channel between architecture components.



*An exchange specifies message flow exchanges between two participants.*

To create a conversation from an existing exchange:

1. In a process diagram Insertion, click the **Conversation**  button.
2. Draw a link between the two entities in communication.
3. In the conversation creation dialog box:
  - Specify the name of the conversation.
  - Select the **Exchange** you want to use.


☛ You can also create a new exchange, see ["Creating Conversations with a New Exchange", page 100..](#)

4. Click **OK**.

#### Creating Conversations with a New Exchange


You can create an **Exchange** from a library or a process diagram.

To create an *exchange* from a process diagram:


1. Click the **Conversation** button  and create a link between the two communicating entities.  
The conversation creation dialog box appears.
2. Click the arrow at the right of the **Exchange** field and select **Create Exchange**.  
The Creation of Exchange dialog box appears.
3. Enter the **Name** of your exchange.
4. Click **OK** to close this dialog box.  
The exchange is automatically created.
5. Click **OK**.  
The conversation appears in the diagram.

## Describing Conversation Message Flows


The *message flows* exchanged in a conversation are described in the exchange associated to the conversation.

 A message flow represents circulation of information within an exchange contract. A message flow transports its content.

Exchange is described by message flows and their content which are exchanged between the two roles representing the stakeholders in the conversation.

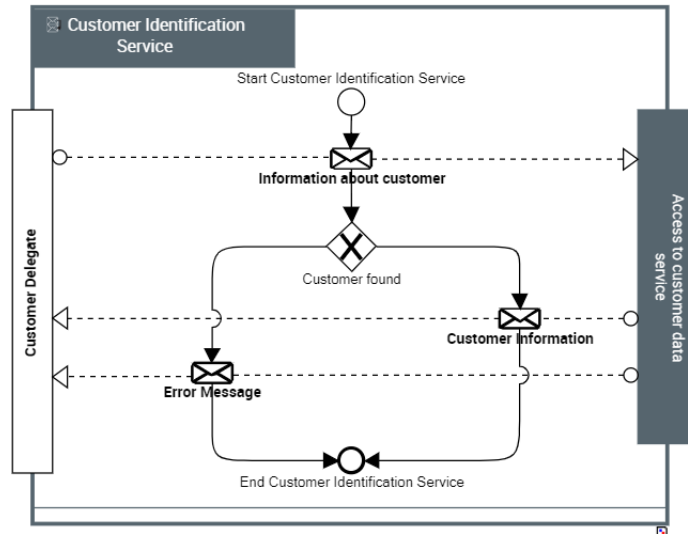
 The content designates the content of a message or an event, independent of its structure. This structure is represented by an XML schema linked to the content. A content may be used by several messages, since it is not associated with a sender and a destination. There can be only one content per message or event, but the same content can be used by several messages or events.

To describe message flows exchanged in a conversation:

1. Open the **Characteristics** property page of the Conversation that interests you.
2. From **Exchange** field, you can access to the pop-up menu of the exchange used.
3. Open the **Message Flow** property page of the exchange.
4. Click the **New** button.  
The **Creation of Message Flow - Content** dialog box opens.
5. From the **Content** drop-down list, select the content you wish to associate with the message flow.  
The message flow with its content is displayed in the list of conversation contents.  
 You can associate several contents with the message flow.
6. Specify the direction of each message flow.
7. Click **OK**.

## Creating an exchange diagram (BPMN)

The sequence of flows exchanged during a conversation can be described by an exchange diagram.



*"Customer Identification Service" Exchange Diagram*

The customer identification service protocol begins by sending information enabling identification of the customer. An error message appears if the customer is not found, otherwise customer information is sent (customer identification, status of orders, etc.).


To create an exchange diagram:


1. Open the **Characteristics** property pages of the conversation that interests you.
2. From **Exchange** field, you can access to the pop-up menu of the exchange used.
3. In the pop-up menu of the exchange, select **New** > **Exchange Diagram (BPMN)**.

The diagram opens. The exchange frame is positioned and the two roles (Consumer and Supplier) are created. The message flows associated with the exchange are also positioned in the diagram.

## Creating a composite conversation


A composite conversation is described by an exchange contract. This exchange contract uses other exchanges or exchange contracts.

 *An exchange contract is a model of a contract between organizational entities. This contract is described by exchanges between an initiator role and one or several contributor roles.*

 *For more details on exchange contracts, see "[Managing Exchange Contracts](#)", page 104.*

To create a **composite conversation** from an existing **exchange contract**:


1. In the diagram insert toolbar, click the **Composite Conversation** button.
2. Draw a link between the two entities in communication.
3. In the composite conversation creation dialog box:
  - Specify the name of the composite conversation.
  - Select the **Exchange Contract** you want to use.

 *You can also create a new exchange contract.*
4. Click **OK**.

## Replacing a conversation


As standard, a conversation is connected to an exchange. However, from its pop-up menu, you can replace a conversation with a composite conversation or by the message flows of the exchange to which it is associated.

To replace a conversation:

1. Right-click on the conversation to open its pop-up menu.
2. Select **Replace Exchange by an Exchange contract**.  
A new exchange contract is created and the conversation becomes a **composite conversation**.  
 *A composite conversation is described by an exchange contract. This exchange contract uses other exchanges or exchange contracts.*
3. Select **Replace by Message Flows**.  
The conversation is replaced by the messages flows of its associated exchange.

## MANAGING EXCHANGE CONTRACTS

An **Exchange Contract** represents the exchange of information between architecture components of the process.

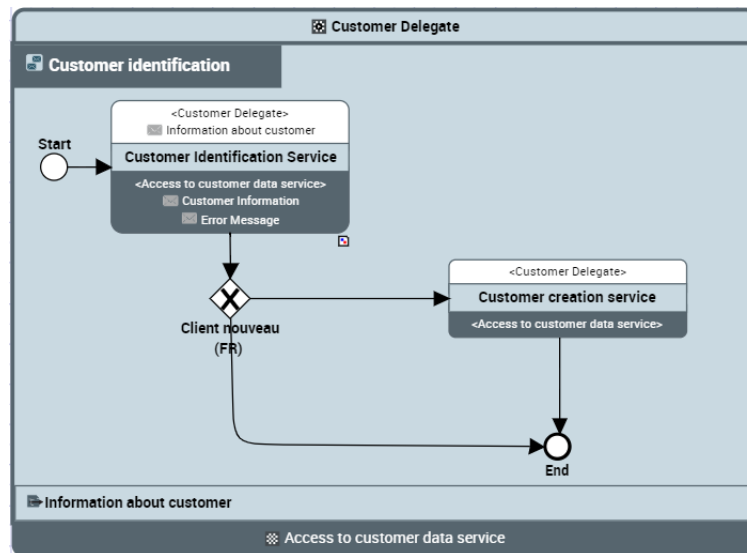
 An exchange contract is a model of a contract between organizational entities. This contract is described by exchanges between an initiator role and one or several contributor roles.

With **HOPEX Business Process Analysis**, an exchange contract can be built using exchanges or using exchange contracts.

### Exchange Contract Example


#### Example of exchange contract using exchanges

The "Customer Identification" exchange starts with a customer search step. If the customer is found, the protocol returns customer information, if not, a "Customer Creation" protocol is activated. The result of the "Customer Identification" exchange contract is a "Customer Information" message.



Exchange contract diagram (BPMN)

Progress steps are represented by **Exchange Uses**.


 An exchange use represents the usage of an exchange in another exchange contract.



## Example of exchange contract using exchange contracts

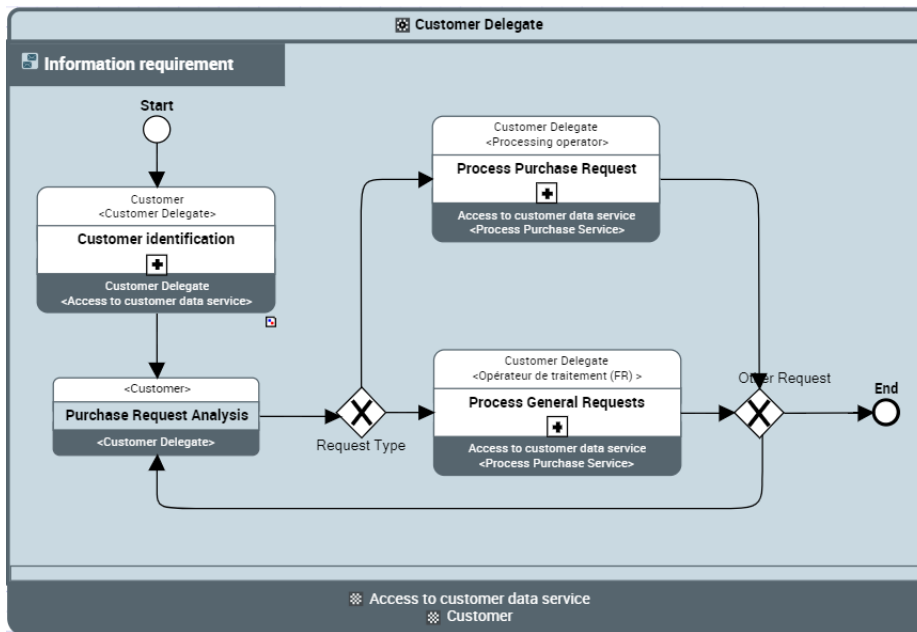
With **HOPEX Business Process Analysis**, a protocol is described by a sequence flow of steps which are represented:

- by **Exchange Uses**,
- by **Exchange Contract Uses**.

 An exchange contract use is associated with an exchange contract. It enables representation of complex exchanges.

The protocol roles, presented at the border of the frame, represent participants *invoker* or *invoked*.

An exchange can be described by involving more than two participants. In this case, a role is consumer of the exchange contract and the others are providers.



"Information Requirement" Exchange Contract Diagram (BPMN)

The "Information Request" exchange contract is used by the supplier call center to take account of a customer request online. There are therefore three participants in this contract: the customer, the IT applications and the customer representative who is the effective requester of the service (in this case the call center).

This contract consists of identifying the customer, then analyzing the request. The request is then processed as a purchase request or as another request if it is an information request for example.

## Using Exchange Contracts

An **Exchange Contract** is described by a **Composite Conversation** which represents the information exchange channel between architecture components.




*An exchange contract is a model of a contract between organizational entities. This contract is described by exchanges between an initiator role and one or several contributor roles.*



*A composite conversation is described by an exchange contract. This exchange contract uses other exchanges or exchange contracts.*

To create a composite conversation:

1. In the diagram insert toolbar, click the **Composite Conversation**  button.
2. Draw a link between the two entities in communication.
3. In the add composite conversation dialog box, specify the name of the conversation and the exchange contract you want to use.




*You can also create a new exchange contract, see ["Creating Conversations with a New Exchange", page 100..](#)*

4. Click **OK**.

## Creating Exchange Contracts

To create an exchange contract from a composite conversation:

To create an exchange contract from a composite conversation:

1. In the diagram insert toolbar, click the **Composite Conversation**  button.
2. Draw a link between the two communication entities.
3. In the composite conversation creation dialog box, click the arrow on the right of the **Exchange Contract** field and select **Create Exchange Contract**.


The **Creation of Exchange Contract** dialog box opens.


4. Enter the name of the contract in the **Name** box.
5. Click **OK**.


The composite conversation and exchange contract are created.

## Describing Exchange Contracts


An **Exchange Contract** can be supported by **Exchanges** or **Exchange Contracts** representing information exchanges between architecture components.

 An exchange contract is a model of a contract between organizational entities. This contract is described by exchanges between an initiator role and one or several contributor roles.

 An exchange use represents the usage of an exchange in another exchange contract.

 An exchange contract use is associated with an exchange contract. It enables representation of complex exchanges.

To describe that an exchange is used by an exchange contract:

1. Open the exchange contract properties dialog box.
2. Select the **Exchange** tab.
3. Click the **New** button.  
A selection dialog box opens.
4. Select **Exchange Use**, which is the type of exchange you want to use, and click **OK**.  
The creation dialog box opens.
5. Click the arrow at the right of the **Specification** box.
6. Select **List** in the drop-down list and select the exchange to be associated with the exchange use.  
The name of the exchange appears in the **Specification** field.
7. In the **From** field, select the described exchange role connected to the *Invoker* role of the exchange used.
8. In the **To** field, select the described exchange role connected to the *Invoked* role of the exchange used.
9. Click **OK**.  
 You can associate several exchanges with the exchange contract.
10. Click **OK**.

## Creating an Exchange Contract Diagram

With **HOPEX Business Process Analysis**, an exchange contract is represented by an Exchange Contract Diagram (BPMN).

To create an exchange diagram:

1. Right-click the conversation containing the exchange.
2. In the pop-up menu of the exchange, select **New** > **Exchange Contract Diagram (BPMN)**.

The diagram opens with the exchange contract frame and the two roles representing invoker or invoked.

## Defining exchange and exchange contract uses

In an Exchange Contract Diagram (BPMN), operations are described by:

- **Exchange Uses**
- **Exchange Contract Uses**




*An exchange use represents the usage of an exchange in another exchange contract.*







*An exchange contract use is associated with an exchange contract. It enables representation of complex exchanges.*

To create an exchange contract use:

1. Click the **Exchange Contract Use** button  and click in the diagram within the exchange contract frame. The creation dialog box opens.
2. Click the arrow at the right of the **Specification** box.
3. Select **List** in the drop-down list and select the exchange contract associated with the exchange contract use.
4. In the **From** field, select the described exchange role connected to the *Invoker* role of the exchange used.
5. In the **To** field, select the described exchange role connected to the *Invoked* role of the exchange used.
6. Click **Finish**.

## SUMMARY OF CONCEPTS

	Exchange	Exchange contract
Definition	An exchange specifies message flow exchanges between two participants.	An exchange contract is a model of a contract between organizational entities. This contract is described by exchanges between an initiator role and one or several contributor roles.
Use in a Process Diagram	 A conversation describes an exchange of several message flows between two roles.	 A composite conversation is described by an exchange contract. This exchange contract uses other exchanges or exchange contracts.
Use in an Exchange Contract Diagram	 An exchange use represents the usage of an exchange in another exchange contract.	 An exchange contract use is associated with an exchange contract. It enables representation of complex exchanges.



# ORGANIZATIONAL CHARTS AND RESPONSIBILITIES



**HOPEX** enables representation of enterprise structure. It indicates the hierarchy of org-units in the enterprise, specifies the persons that play the role of these org-units, and shows at which site the org-unit is located.

**HOPEX** also enables definition of organizational process responsibilities by means of the RACI matrix (Responsible, Accountable, Consulted, Informed) as well as business processes.

- ✓ ["Managing a organizational chart", page 112](#)
- ✓ ["Process responsibilities", page 116](#)
- ✓ ["Organizational process and operation responsibilities \(RACI\)", page 118](#)

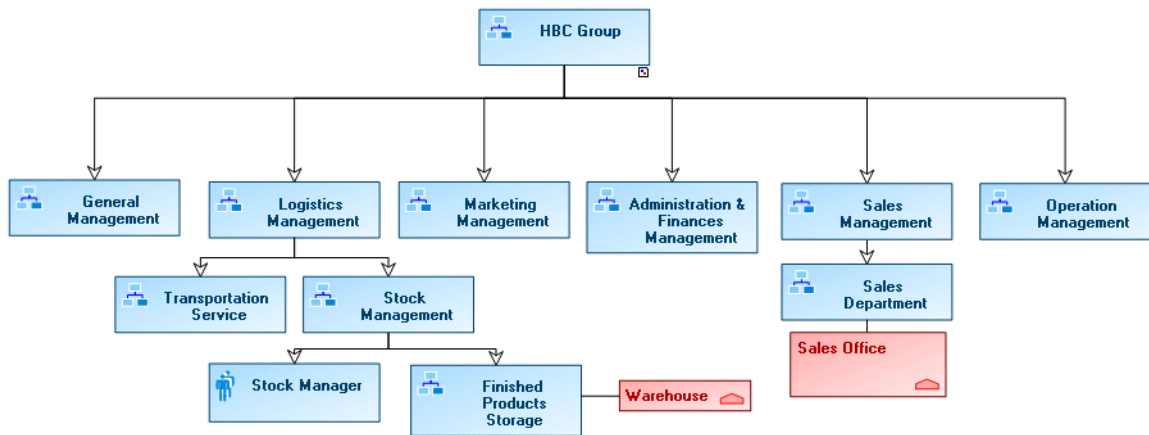
## MANAGING A ORGANIZATIONAL CHART

An organizational chart provides an overview of the enterprise structure. **HOPEX Business Process Analysis** allows you to design your organizational charts using the same tools and methods as applied to processes.

**HOPEX Business Process Analysis** organizational charts contain the following descriptive objects:

- Org-Units, which are generally elements defining the enterprise structure, such as Sales Department.
- Sites that are geographical locations pivotal to the organization, such as headquarters, plants, etc.

### *Organizational chart example*



## Creating an Organizational Chart

To create an *Organizational Chart* from the **Process Design** navigation pane:

1. Select **Organization > Org-Units** and **All Org-Units** tab.  
The list of existing actors appears.
2. Right click on an org-unit and select **New > Org-Unit Organizational Chart**.

The corresponding organizational chart opens. It is automatically initialized with the component org-units of the described org-unit.



## Drawing an Organizational Chart

### Searching for Objects

To simultaneously add all the org-units involved in your processes that were not automatically inserted at diagram initialization:

1. In the query tool, select the **Org-Unit** object and click the **Find** button



The result dialog box appears.

2. Select the desired org-units holding the <Shift> key down.
  - ☺ When you click on an object while holding down the Ctrl key, you add it to the list of selected objects if it was not previously selected, or you remove it from the selection if it was.
3. Drag-and-drop the selected objects from the result dialog box into the diagram.
  - ☺ When an org-unit appears in a diagram, you can describe it with a new organizational chart using its pop-up menu.
4. Draw the links between these org-units.
  - 🔍 Note that certain links might already exist.

When you create a link between two org-units, always drag from the org-unit higher in the hierarchy down to the subordinate. Once the link is drawn, an arrowhead indicates the direction of the hierarchy.

### Specifying org-unit properties

To specify the properties of an org-unit:

1. Open the **Characteristics** property page of the Org-Unit.
2. In the **Org-Unit-Type** list box, select the org-unit type.

There are several types of org-units:

- "Vendor"
- "Institution"
- "Company"
- "Public Department"
- "Structure" (for example, Sales Management).
- "Function" (for example, Sales Engineer)
- "Accountable" (for example, Sales Manager)
- "Generic": corresponds to a role to be played during a project (Writer, Requester,...).

🔍 You can also specify its details (company name, e-mail address, telephone number, etc.).

## Associating a person with an actor

You can connect **Person (System)** with an Org-Unit.

☛ A person (System) represents a person in the enterprise. This person can be assigned a login and a role (or a profile depending on the connection mode). The login provides access to the HOPEX Application. The role (or the profile) defines the access to product functions and repositories. A system person, if assigned a login, has a specific desktop in each database, and can connect to this desktop from any workstation in a given environment.



The name of the persons linked to the org-unit appear in the org-unit frame.


To associate a **Person (System)** with an Org-Unit:

1. Expand the **Responsibility** section of the **Characteristics** property page of the Org-Unit.

☛ To display the **Responsibility** section, open the **Options** window and check that **Business Process and Architecture Modeling > System Person Management** is activated.

2. (Option) In the **Owner** field, select the **Person (System)** which is the owner of the entity represented by the org-unit.
3. (Option) In the **Org-Unit member** tab, select the concerned **Person (System)**.

## Associating a site with an org-unit

You can also add **sites**  where the org-units are located.

📖 A site is a geographical location of an enterprise. Examples: Boston subsidiary, Seattle plant, and more generally the headquarters, subsidiaries, plants, warehouses, etc.

---

## Consulting reports associated with org-units

**HOPEX Business Process Analysis** provides several reports about org-units.

To view these reports:

1. Open the **Report** property page of the Org-Unit.  
The list of available reports is proposed.

## Consulting the Org-Unit Structure report

**HOPEX Business Process Analysis** proposes a report in the form of a matrix which presents:

- The selected org-unit, its type and the associated persons
- The selected org-unit, its parent Org-Unit and the associated persons


To consult the Org-Unit Structure report

- 1 Open the **Report > Structure** property page of the Org-Unit.


## Consulting the Org-Unit Job Description report

**HOPEX Business Process Analysis** proposes a report which presents:

- The selected org-unit type
- the organizational processes and operations in which these org-units intervene.


 *RACI is the acronym of Responsible, Accountable, Consulted, Informed.*

## Consulting the RACI Matrix of Org-Units

 *For more details on the use of RACI, see "[Generating a RACI matrix from a organizational process](#)", page 116.*

**HOPEX Business Process Analysis** proposes a report in the form of a matrix which presents:

- the selected org-unit and sub-org-units
- the organizational processes and operations in which these org-units intervene.

 *RACI is the acronym of Responsible, Accountable, Consulted, Informed.*

To consult the RACI matrix:


- 1 Open the **Report > RACI** property page of the Org-Unit.

To generate the matrix to search for org-units in depth, you must use report "Org-Unit and Sub-Org-Unit RACI Matrix (BPMN)". For more details, see "[Launching an RACI matrix from an object](#)", page 123 (operation identical to business processes).

## PROCESS RESPONSIBILITIES

From an organizational process or a business process, you can:

- define process control responsibilities
- view org-units concerned by the organizational processes connected to this process

 *RACI is the acronym of Responsible, Accountable, Consulted, Informed.*

### Defining process control responsibilities

Business processes are managed by persons. The business process steering team therefore comprises a list of persons whose individual roles in the team can be indicated.

To specify organizational process control responsibilities:

1. Open the organizational processes **Characteristics** property page and expand the section **Responsibility**.
2. Select one of the following tabs to create or connect the persons (system) involved in process control:
  - "Organizational process Designer"
  - "Organizational Process Contributor"
3. Select **Organizational Process Owner**.

### Generating a RACI matrix from a organizational process










From an organizational process you can generate a matrix presenting:

- organizational processes connected to current process or to its sub-processes
- operations of these organizational sub-processes
- org-units concerned by these organizational processes and operations

To generate an RACI matrix from a organizational process:

1. Right-click the business process and select **Report Discovery**.
2. In the list of available reports, click **Process Analysis**.
3. From the "Business Process RACI Matrix (BPMN)" report, click **Launch a new report**.

4. In the generated report, select report chapter "Business Process RACI Matrix (BPMN)".  
You obtain a result like this:

	Finance Department	Customer Satisfaction Department	Sales Department	Sales Rep
 Deliver Vacation Business				
 Invoice Customer	 (A)			
 Vacation Package Booking			 (A)	
 Vacation Package Delivery		 (A)		
 Vacation Request Formalization			 (A)	

➤ To generate a matrix to search for organizational processes and operations in depth, you must use report "Business Process and Sub-Process RACI Matrix (BPMN)".

## ORGANIZATIONAL PROCESS AND OPERATION RESPONSIBILITIES (RACI)

**HOPEX Business Process Analysis** specifies the responsibility level of the various org-units:

- on an operation
- on an organizational process. The proposed responsibility levels are as follows:

Responsibility	Meaning
Responsible	Org-unit responsible for the operation or process
Responsible	Org-unit monitoring progress of the operation or process and taking decisions. There is only one "Accountable" org-unit for each action.
Responsible/Accountable	Org-unit executing the operation or process, informs on progress and takes decisions. There is only one "Accountable" org-unit for each action.
Consulted	Org-unit consulted as first priority before an action or decision.
Informed	Must be informed after an action or decision.

☛ *RACI is the acronym of Responsible, Accountable, Consulted, Informed.*

### **Prerequisites to using RACI**

One option is used to display the information about **RACI**.

To activate this option:

1. In the workspace, open the **Options** window.
2. In the left tree, select **Business Process and Architecture Modeling:**
3. Select the **Managing RACI (BPMN) / Automatic synchronization of RACI by means of participants** check boxes.
- 4.

## Defining responsibilities


### Organizational Processes Responsibilities

To indicate the responsibility of an org-unit in an organizational process:

1. In the organizational process **Characteristics** property page, expand the **Responsibility** section.
2. Select one of the following tabs to create or connect the persons (system) involved in process control:
  - "Organizational process Designer"
  - "Organizational Process Contributor"
3. Then select **Organizational Process Owner**.
4. In the **Org Unit** section, click the **Connect** button.
5. In the dialog box that opens, select **Candidate Org-Units (RACI)** and

click the **Find** button .

A dialog box proposes the list of org-units that execute the operation or the process via a participant.

 An org-unit can be connected directly to an operation or process or indirectly via a participant. An RACI candidate org-unit is an org-unit assigned to a participant.

6. Select the org-units that interest you and click **Relier**.  
The org-units appear in the properties dialog box of the operation or process.
7. For each of these, in the **RACI** drop-down list, select a responsibility level from the four proposed.
  - **Consulted** (C)
  - **Responsible** (R)
  - **Responsible/Accountable** (R/A)
  - **Informed** (I)
  - **Accountable** (A)


### Operations responsibilities

To indicate the responsibility of an org-unit in an operation:

1. In the operation **Characteristics** property page, expand the **Actors** section.
2. Click the **Connect** button.
3. In the dialog box that opens, select **Candidate Org-Units (RACI)** and

click the **Find** button .

A dialog box proposes the list of org-units that execute the operation or the process via a participant.



 An org-unit can be connected directly to an operation or process or indirectly via a participant. An RACI candidate org-unit is an org-unit assigned to a participant.

4. Select the org-units that interest you and click **Relier**.  
The org-units appear in the properties dialog box of the operation or process.

5. For each of these, in the **RACI** drop-down list, select a responsibility level from the four proposed.

- **Consulted** (C)
- **Responsible** (R)
- **Responsible/Accountable** (R/A)
- **Informed** (I)
- **Accountable** (A)

The selected responsibility level appears with an icon corresponding to context:

Icon	Meaning
	Indicates that responsibility is deduced from the participant. The icon appears when the selected org-unit is: - assigned to the participant, and - declared with <b>Responsible</b> responsibility (default responsibility).
No icon	There is no icon when the selected org-unit is: - assigned to the participant, and - declared with responsibility other than <b>Responsible</b> (default responsibility).
	The icon appears when the selected org-unit is not assigned to the participant.

## Org-units displayed in a participant

The list of org-units displayed in the header of the shape of a participant groups:

- org-units attached to the participant but with no responsibility in the process or operations executed by the participant. These org-units are declared in the properties of the participant.  
 ➤ For more details on org-units connected to a participant, see ["Assigning an org-unit to a participant", page 43.](#)
- org-units attached to the participant but with a responsibility in the process or operations executed by the participant. The name of the org-units is followed by a letter corresponding to their responsibility. These org-units are declared in the properties of the participant.  
 ➤ For more details, see ["Responsibilities of org-units of a participant", page 121.](#)
- org-units not attached to the participant but with a responsibility in the process or operations executed by the participant. These org-units are declared in the properties of at least one process or operation executed by the.  
 ➤ For more details, see ["Organizational Processes Responsibilities", page 119.](#)



## Responsibilities of org-units of a participant

To indicate responsibility of each of the org-units attached to a participant in the different operations or organizational processes it executes:

1. Open the **RACI** property page of the participant.  
The analysis report is displayed carrying the letter representing the responsibility of the org-unit in the process or operation:
  - (A) for Accountable
  - (R) for Responsible
  - (R/A) for Responsible/Accountable
  - (C) for Consulted
  - (I) for Informed

### 1. RACI Management Matrix

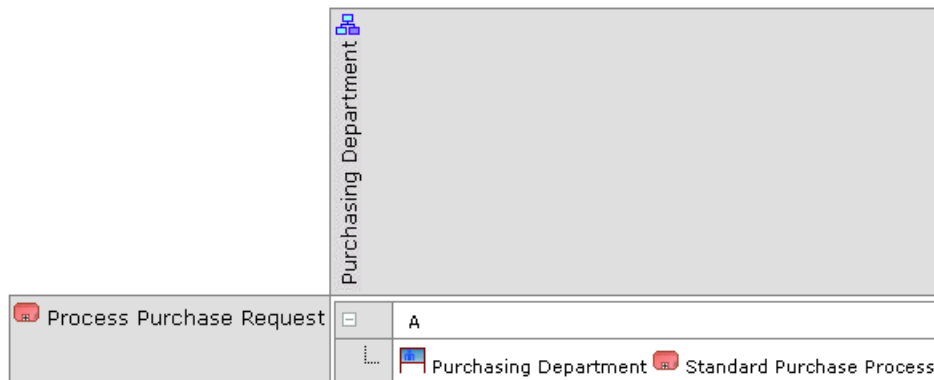
Purchasing Department	
Process Purchase Request	A
Process Purchase Order	R

In the example above, the "Purchasing Department" assigned to the participant to which the analysis relates, executes the "Process Purchase Request" process and is Accountable for "Process Purchase Order".

2. Click .

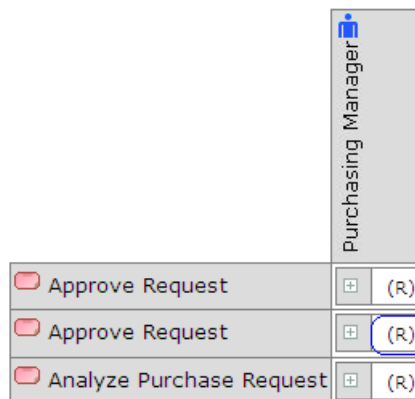
The context of responsibility of the org-unit is indicated. You can view:

- the name of the participant to which the org-unit is assigned
- the name of the process that is owner of the participant




To define the responsibility level of an org-unit related to an operation or organizational process:

1. Open the **RACI** property page of the participant.
2. Click on the corresponding cell in the matrix.



A selection dialog box opens.

3. Click the arrow at the right to display the list of responsibility levels.
4. Select the level that interests you.
5. Click **OK** in the selection dialog box.
6. Click button  on the right to refresh the report.

## Using RACI Matrices

**HOPEX Business Process Analysis** allows you to generate reports in the form of matrices which identify and analyze data of your repository so as to have a clearer view of the information.

☛ For more details on the use of analysis reports, see the **HOPEX Common Features** guide.

### Launching an RACI matrix from an object

When you launch an RACI matrix from an organizational process, the list of sub-processes is automatically deduced from the links between org-units and organizational processes/operations.

The following are reports available from an organizational process:


- **Organizational Process RACI Matrix (BPMN)**  
This matrix queries organizational sub-processes and operations located under the organizational process.
- **Organizational Process and sub-processes RACI Matrix (BPMN)**  
This matrix drops n levels to retrieve sub-processes and operations located under the organizational process.

☛ The principle is the same with org-units and business processes.

☛ To generate a matrix to search for organizational processes and operations in depth, you must use report ["Business Process and Sub-Process RACI Matrix \(BPMN\)"](#), page 192.

To access this type of matrix:

1. Right-click the process and select **Report Discovery**.
2. Click **Process Analysis** and select an RACI report that references sub-objects.
3. Open the report properties page via the **Customize and Launch New Report** button.  
The report properties page opens and the report is accessed in the **Reports** tab.

☛ Click button  on the right to refresh the report if you have modified objects or parameters of the report.

### Creating an RACI with objects of your choice

The "RACI Management (BPMN) report allows you to create a matrix which displays:

- org-units in columns
- operations or organizational processes in rows

☛ Cells present RACI values: R for Responsible, A for Accountable, C for Consulted, I for Informed.

☛ For more details, see ["Managing RACI \(BPMN\)"](#), page 188.



# THE CUSTOMER JOURNEY



The **HOPEX Customer Journey** module is used to represent the acquisition process of a product or a service by a specific customer. Mapping a customer journey provides an overview of customer expectations, painpoints encountered, and the resources used at each step of the journey. Last but not least, touchpoints, which are the points of interaction between the customer and the company, are used to measure and improve overall customer satisfaction.

As customer journey mapping is created with **HOPEX Customer Journey** in tabular input mode only, the **HOPEX Customer Journey** module is therefore only available with the **HOPEX Web Front-End** module.

Representing a customer journey will allow you to easily identify these critical points. **HOPEX Customer Journey** is used to describe solutions for improvement and to assess them at different dates.

The points covered here are:

- ✓ ["Presentation of the HOPEX Customer Journey Module", page 126](#)
- ✓ ["Managing the Components of a Customer Journey", page 132](#)
- ✓ ["Assessment of a customer journey", page 145](#)
- ✓ ["The reports available on a customer journey", page 152](#)

# PRESENTATION OF THE HOPEX CUSTOMER JOURNEY MODULE

Associated with **HOPEX Business Process Analysis**, the **HOPEX Customer Journey** module supports the methodology and the tools that are used to describe and improve the acquisition process of your products and services.

The methodology embedded in the **HOPEX Customer Journey** module is based on the features of the **HOPEX Suite** to describe and manage the different project phases and steps in the customer journey.

Last but not least, the **HOPEX** suite assessment tool is used to record, over time, an assessment of the steps in the customer journey. The consolidated results of these assessments are visible in the customer journey diagrams. Standard reports are also available to facilitate analysis of the journey and help with identifying a solution for improvement.

This presentation is based on the example of a travel agency that offers different types of holidays to different types of customers.

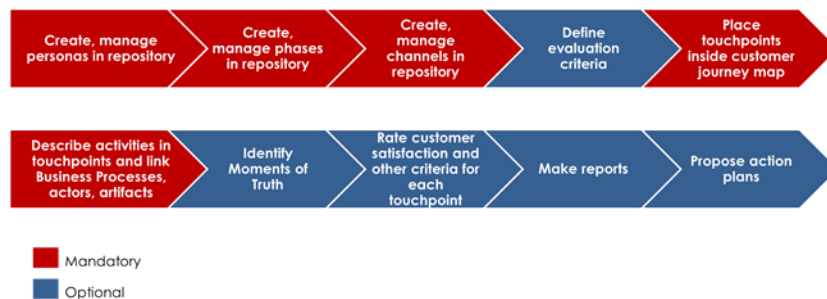
The **HOPEX Customer Journey** module is introduced here by :

- ["Description of a Customer Journey", page 126](#)
- ["Assessing a customer journey", page 131](#)

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## Description of a Customer Journey


To be able to benefit, at the end of your customer journey representative work, from the analysis facilities offered by **HOPEX Customer Journey**, we recommend you follow the methodological steps shown in the diagram below.




## Defining persona and business lines

This consists of preparatory work identifying the different types of customers according to their needs and what they bring to the company.


The purpose of this phase is to identify the *persona* as well as the *business lines*.

 A *persona* corresponds to a customer segment targeted by the experience of the client journey. The resources implemented to give customers the ability to interact with the enterprise and its environment, to acquire the expected results, are supported by the interaction channels.

 A *business line* is a high level classification of main enterprise activities. It corresponds for example to major product segments or to distribution channels. It enables classification of enterprise processes, organizational units or applications that serve a specific product and/or specific market.

Using our example of the travel agency, we are interested in the young adult segment. The business line preferred for this population is "Sports holidays".


You must begin by assessing the *customer expectations* for each *persona*.


 A *customer expectation* is an enterprise result expected by the *persona* at the end of the journey.


For example, a population of young adults can expect, with a sports holiday, a wide range of activities in an exceptional setting for a reasonable price.


From a methodological point of view, we suggest you proceed as follows:

1. Identify the customer segments,
2. Define, via the hierarchy, the *persona groups* and the *persona* associated with each segment,
 

 For more details, see "[Defining persona hierarchy](#)", page 132. and "[Creating a persona](#)", page 132.
3. Identify the org-units that correspond to the segments,
 

 For more details, see "[Entering the org-units associated with a persona](#)", page 133.
4. Create *customer expectations* for a given *persona*,
 

 For more details, see "[Specifying the expectations of a persona](#)", page 133.
5. Create the *business lines*.
 

 For more details, see "[Creating a business line](#)", page 134.

## Defining the customer journey

Each *customer journey* corresponds to a specific *persona* . So, when the *persona* are identified, you can create *customer journeys*.

☛ If you wish, you can also create the customer journey first and the persona second.



A customer journey is used to describe and organize all interactions between the enterprise and a persona for a given result.

We can, for example, build the customer journey that corresponds to a "sports holiday" for a "young adult" persona.

☛ For more details, see ["Creating a customer journey", page 134.](#)

## Defining the phases of a customer journey

A *customer journey* is described by a number of sequenced *phases*.



A customer journey phase is a time or experience-bound period within a Customer Journey.

In the example "sports holiday", we identify three phases: the "selection of holidays", the "qualification of holidays" selected and the holiday "reservation".

☛ For more details, see ["Defining the customer journey phases in tabular input mode", page 136.](#)

## Defining the steps in a customer journey

The customer journey *steps* are closely linked to the business line. The customer journey *steps* are organized to most closely represent reality. They are essential because the assessments deal with each of the steps of a customer journey.



A customer journey step is the basic elementary advancement unit of a customer via a customer journey phase.

In the "reservation" phase of the holiday, we can identify the following steps: "Validate the order", "Complete the customer information", "Proceed with payment".

Finally, the resources used at each *step* of the customer journey are represented by *channels* .



A channel is used to identify the enterprise resources used by a persona to achieve a step. For example, a channel can be a phone or internet connexion.

In our example for selling sports holidays, the resources made available to customers are advertising brochures, web applications and a support service to answer customer questions.

To describe the steps of a customer journey, we suggest you proceed as follows:

1. Define the customer journey *steps* associated with each phase.

☛ For more details, see ["Creating the customer journey steps in tabular input mode", page 137.](#)

2. Describe the sequences that link the steps.

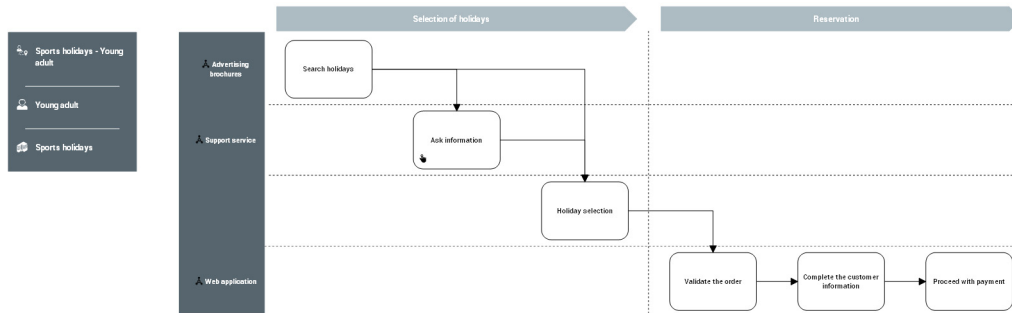
☛ For more details, see ["Organizing the customer journey steps in tabular input mode", page 138.](#)



### 3. Link the steps to the *channels* concerned.

For more details, see *"Defining the channels in a customer journey"*, page 139.

At this stage, the diagram that you are building with **HOPEX Business Process Analysis** looks like the figure below.



## Understanding customer expectations and painpoints

Each customer journey *step* can be linked to:

- one or more customer expectations.

An external org-unit is an external entity that exchanges flows with the enterprise. Example: customer, supplier, government office.

The expectations of young adults for a sports holiday can concern the context of the holiday or activities offered.

For more details, see *"Adding persona expectations to customer journey mapping"*, page 140.

- one or more *painpoints*.

A painpoint describes the difficulties encountered by a persona when carrying out a step in the customer journey.

The painpoints of a group of young adults can concern the painpoint of agreeing, prices that are too high or the possibilities of accessing the vacation site.

For more details, see *"Defining customer painpoints"*, page 141.

## Identifying the touchpoints

The objective is to identify the organizational elements that are used during the customer journey and that could have an impact on customer satisfaction.

A touchpoint describes an interaction between a persona and an enterprise.

The touchpoints between the customers and the travel agency are by telephone and by email. A support center can thus be put in place.

For more details, see *"Creating a touchpoint in a customer journey"*, page 142.

Each **touchpoint** can be linked to:

- one or more **business opportunities**.



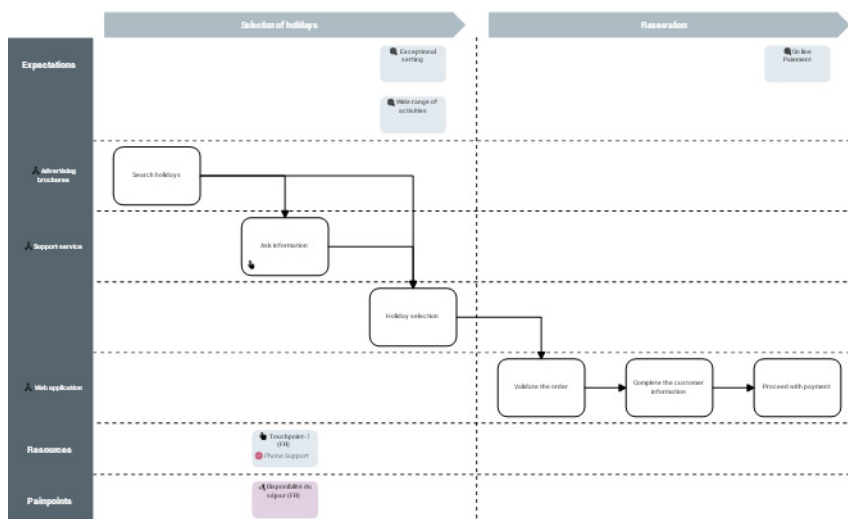
*An opportunity characterizes an improvement action for one of the composite elements of the customer journey (steps, touchpoint).*

To be able to offer another holiday if the holiday selected is no longer available constitutes a business opportunity.



*For more details, see "Defining the business opportunities of a customer journey", page 142.*

- one or more **painpoints**.



## Identifying moments of truth



*A moment of truth is a decisive step for the remainder of the customer journey. Either customers believe that they cannot obtain what they are searching for under the desired conditions and they are not satisfied; Or, on the contrary, they believe that they have found what they are looking for and continue the journey.*

A reservation that is too late constitutes a moment of truth. The sports holiday is completed or, on the contrary, it was canceled due to low staff numbers.



*For more details, see "Identifying a moment of truth", page 143.*

Following this last description step of your customer journey, you obtain a diagram that looks like this.

---

## Assessing a customer journey

Customer satisfaction can be assessed at each *step* of the customer journey on a list of criteria by a number of people on different dates.



*A customer journey step is the basic elementary advancement unit of a customer via a customer journey phase.*



*For more details, see "Assessment of a customer journey", page 145.*

The assessment criteria are presented in a questionnaire specific to each customer journey.

The results of the assessments filled in for the steps of a customer journey are then consolidated and accessible from:

- reports available on a customer journey,  
 *For more details, see "The reports available on a customer journey", page 152.*
- the shape of the steps in the diagram of the customer journey which is different depending on the results of the assessment,
- the **Assessment > All Assessed Customer Journeys** folder,
- the properties page of the customer journey in the **Assessment** tab.

## MANAGING THE COMPONENTS OF A CUSTOMER JOURNEY


The following points are covered here:

- "Describing persona and persona groups", page 132,
- "Using Business Lines", page 134,
- "Building a customer journey", page 134,
- "Describing the steps of a customer journey", page 137,
- "Client expectations and painpoints", page 140,
- "The touchpoints and the business opportunities of a customer journey", page 141,
- "Creating Action Plans", page 143.


---

### Describing persona and persona groups

This phase consists of identifying the different customer segments according to their needs and what they bring to the company.

 *A persona corresponds to a customer segment targeted by the experience of the client journey. The resources implemented to give customers the ability to interact with the enterprise and its environment, to acquire the expected results, are supported by the interaction channels.*


### Defining persona hierarchy

 *A persona group is grouping of personas according to similar objectives on several customer journeys.*

To create a persona:

1. Open the **Customer journey** navigation window.
2. Select **Customers > Persona Groups**.  
The Persona Group tree appears in the edit area.
3. Click on the tree root to display its pop-up menu and select **New > Persona Group**.  
The **Creation of a Persona Group** window appears.
4. Enter the name of the group.  
"Sports clientele" and "Young clientele", for example.
5. Click **OK** to close this dialog box.  
The persona group that you have just created appears in the tree of the Persona Group.

### Creating a persona


 *A persona corresponds to a customer segment targeted by the experience of the client journey. The resources implemented to give customers the ability to interact with the enterprise and its environment, to acquire the expected results, are supported by the interaction channels.*

You can create a persona from a persona group or from of the persona tree.

You can create a report from the persona tree.

1. Open the **Customer journey** navigation window.
2. Select **Customers > Persona**.  
The Persona tree appears in the Edit Area.
3. Right-click the tree root to open its pop-up menu and select **New > Persona**.  
The **Creation of a Persona** page appears.
4. Enter the name of the persona.  
"Young adults", for example. This persona can be connected to two persona groups: "Sports clientele" and "Young clientele".
5. Click **OK** to close this dialog box.  
The persona you have just created now appears in the persona tree.

## Specifying the expectations of a persona


 *An external org-unit is an external entity that exchanges flows with the enterprise. Example: customer, supplier, government office.*

To create a customer expectation from a persona:

1. Open the properties window of the persona that interests you.
2. In the **Customer Journey** tab, expand the **Customer Expectations** section.
3. Click **New**.  
The **Creation of a Client Expectation** window appears.
4. Enter the name of the customer expectation.
5. Click **OK**.  
The customer expectation is added to the list of persona expectations.

## Entering the org-units associated with a persona

A persona can be associated with **Org-Units** explicitly described in your repository.

 *An org-unit represents a person or a group of persons that intervenes in the enterprise business processes or information system. An org-unit can be internal or external to the enterprise. An internal org-unit is an organizational element of enterprise structure such as a management, department, or job function. It is defined at a level depending on the degree of detail to be provided on the organization (see org-unit type). Example: financial management, sales management, marketing department, account manager. An external org-unit is an external entity that exchanges flows with the enterprise. Example: customer, supplier, government office.*

To define that an org-unit embodies a persona:

1. Open the properties window of the persona that interests you.
2. In the **Customer Journey** tab, expand the **Persona Realization** section.
3. Click the **New** button.  
The window for business agent realization opens.
4. Select the org-unit that is associated with the persona and click **OK**.  
The business agent realization appears in the properties page of the persona.

## Using Business Lines

### Creating a business line



A business line is a high level classification of main enterprise activities. It corresponds for example to major product segments or to distribution channels. It enables classification of enterprise processes, organizational units or applications that serve a specific product and/or specific market.

To create a business line:

1. Open the **Customer journey** navigation window.
2. Select **Customers > Business Lines**.  
The business line tree appears in the edit area.
3. Click on the tree root to display its pop-up menu and select **New > Business Line**.  
The **Creation of a Business Line** window appears.
4. Enter the Name.
5. Click **OK** to close this dialog box.  
The business line appears in the business line tree.

### Connecting a business line to a customer journey

Customer journeys connected to a business line are accessible from the **Characteristics** tab of the business line.

For more details, see "[Connecting a customer journey to a business line](#)", page 135.

## Building a customer journey



A customer journey is used to describe and organize all interactions between the enterprise and a persona for a given result.

A customer journey is associated with a persona. Therefore, a customer journey can be created in three different ways:

- from a persona or a persona group,
- from a customer journey group,
- directly from the **Customer Journey** navigation pane.

### Creating a customer journey

To create a customer journey directly:


1. Open the **Customer Journey** navigation pane.
2. Select **Customer Journeys > All Customer Journeys**.  
A list of customer journeys is displayed in the edit area.
3. Click on the tree root to display its pop-up menu and select **New > Customer Journey**.  
The **Creation of a Customer Journey** window appears.
4. Enter the Name.

5. Click **OK** to close this dialog box.  
The customer journey appears in the customer journey tree.

### **Connecting a customer journey to a persona**

To connect a persona to a new customer journey from the customer journey tree:


1. Select the line of the new customer journey.
2. Click in the **Persona** column.
3. Select the persona that interests you.

 The persona associated with a customer journey is accessible in the **Characteristics** tab of the customer journey.


### **Connecting a customer journey to a business line**

To connect a business line to a customer journey

1. Open the properties window of the customer journey in question.
2. Select the **Characteristics** tab and expand the **Business Lines** section.
3. Click **Connect**.  
Select the business line that interests you.

 The customer journey is accessible in the **Characteristics** tab of the business line.

## **Creating a customer journey group**

 A customer journey group consolidates the journeys that comply with similar criteria.



To create a customer journey group

1. Open the **Customer journey** navigation window.
2. Select **Customer Journey > All Customer Journey groups**.  
A list of customer journey groups is displayed in the edit area.
3. Click on the tree root to display its pop-up menu and select **New > Customer Journey group**.  
The **Creation of a Customer Journey Group** window appears.
4. Enter the name of the group.  
"Sports holidays" and "cruises"<sup>2</sup>, for example.
5. Click **OK** to close this dialog box.  
The Customer Journey group that you have just created appears in the tree of the Customer Journey Group.

Using the **Characteristics** tab of the customer journey properties window, you can then connect the customer journey to the group.

## **Creating a customer journey mapping**


Customer journey mapping can only be created and updated in tabular input mode.

  Tabular input is available with the **HOPEX Web Front-End** module. For more information on using tabular input, see the "Entering a diagram in tabular mode" in the **HOPEX Common Features** guide.

To create a customer journey mapping:

1. In the navigation pane, right-click on the customer journey concerned to display its pop-up menu.  
*☛ If a mapping already exists for the selected customer journey, its name appears in the pop-up menu of the object.*
2. Select **New > Customer Journey Map**.  
 The UI of the table input mode opens in the edit area. The tabs available are **Phases** and **Steps**.

## Defining the customer journey phases in tabular input mode

 A customer journey phase is a time or experience-bound period within a Customer Journey.

A customer journey is described by several sequenced phases.

*☛ The list of phases of a customer journey is accessed from the **Characteristics** properties window, in the **Phases** section.*



Diagram of a customer journey connected to a persona and a business line with phases

## Creating a customer journey phase in tabular input mode

To create a phase in tabular input mode for a customer journey:

1. Click the **Phase** tab.
2. Click **New**.  
 The new phase appears in the list of journey phases.
3. Click on the name of the phase to update it.  
 If you are in **Auto Refresh** mode, the diagram is automatically updated, otherwise click **Refresh Diagram** to display the new phase in the diagram.

## Ordering the customer journey phases in tabular input mode

By default, the phases are ordered in the order of creation.

To modify the order of a customer journey using its diagram:

1. Click the **Phase** tab to access the list of diagram phases.
2. Select the phase whose order you want to modify and click in the **Order** column.
3. Modify the value of the order of the phase.

*☛ If you enter an order number that already exists, the order of creation remains the same in the diagram.*



### Create several customer journey phases simultaneously

To simultaneously create several ordered phase for a customer journey:

1. Click the **Multiple Creation** button.  
A creation window appears.

2. Enter the **Number of phases** you wish to create.
3. If you wish to create phases with steps, specify the **Number of Steps** that you wish to create for each phase.  
 *The steps created in the same phase are sequenced.*
4. Click **OK**.

## Describing the steps of a customer journey

A customer journey step is the basic elementary advancement unit of a customer via a customer journey phase.

A customer journey is described by several sequenced steps.

The list of steps of a customer journey is accessed from the **Characteristics** properties window, in the **Phases** section.

You can, for example, proceed as follows:

1. ["Creating the customer journey steps in tabular input mode", page 137,](#)
2. ["Organizing the customer journey steps in tabular input mode", page 138,](#)
3. ["Defining the channels in a customer journey", page 139.](#)

## Creating the customer journey steps in tabular input mode

### Create a customer journey step

To create a step in tabular input mode for a customer journey:

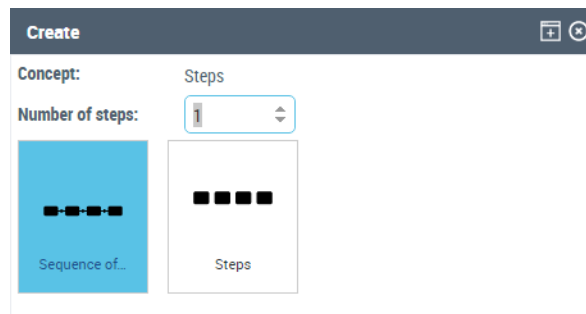
1. Click the **Step** tab.
2. Click **New**.  
The **Choose Object Type** window appears.

3. Select **Steps** and click **OK**.  
The new step appears in the list of journey phases.
4. Click on the name of the step to update it.  
The step created appears in the diagram outside of the phase area.


### Create several steps simultaneously

To create several steps in tabular input mode simultaneously:

1. Click on the step starting from which you wish to create the other steps.
2. Click the **Multiple Creation** button.  
A creation window appears.



3. Enter the **Number of Steps** you wish to create.
4. Choose **Sequenced Steps** or **Independent Steps**.
5. Click **OK**.

 The steps are created but are not connected to a phase.


## Organizing the customer journey steps in tabular input mode

By default, steps are not associated with phases and they are not sequenced.

### Defining the sequencing of a customer journey

To define the sequencing order of the steps of a customer journey, you must specify the list of predecessors at each step.

To specify the predecessor of a step of a customer journey from its diagram:


1. Click the **Step** tab to access the list of diagram steps.
2. Select the step concerned and click **OK**.  
A window opens with the list of steps of the diagram that can be connected.
3. Select the step concerned.  
 You can select several steps.
4. Click outside of the selection pane of the steps.  
The organization of the steps in the diagram are automatically updated. Connections are created between each other.

### Specify the phase of a customer journey step

To specify that a customer journey step is performed within the context of a journey phase:

1. Click the **Step** tab to access the list of diagram steps.
2. Select the step that you want to connect to a phase and click **Phase**.  
Use the down arrow to easily access the list of customer journey phases.
3. Select a phase in the list proposed.  
The step is moved to the swimlane that corresponds to the phase.


### Defining the channels in a customer journey

 A channel is used to identify the enterprise resources used by a persona to achieve a step. For example, a channel can be a phone or internet connexion.

The channels of a customer journey are also linked to the steps of the journey that uses them.

To create a customer journey channel in tabular input mode

1. Click the **Step** tab to access the list of diagram steps.
2. Select the step that you want to connect to a channel and click **Channel**.

 Use the down arrow to easily access the list of customer journey channels and connect the step to a channel that already exists.

3. Click the right facing arrow and select the **Create Channel** command.  
The **Creation of Channel** window appears.
4. Enter the Name.
5. Click **OK** to close this creation window.  
The channel is created and appears in the list. The step is automatically moved to the line that corresponds to the channel.

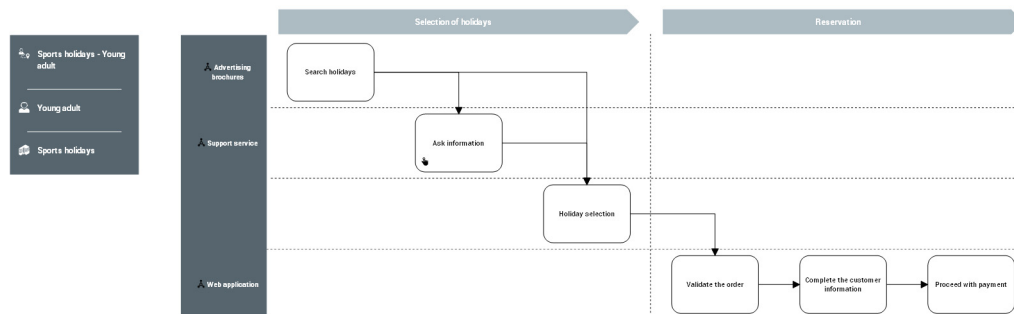
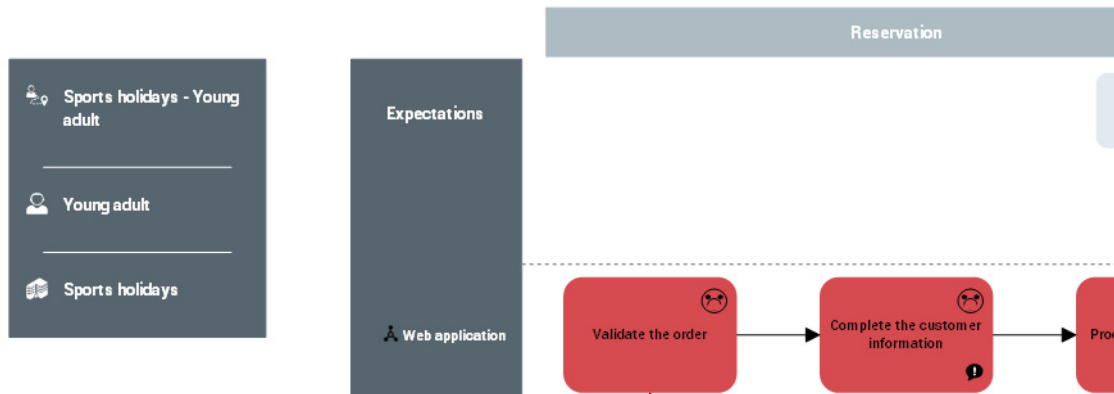


Diagram of customer journey with steps and channels

## Client expectations and painpoints

The expectations and painpoints are specific to each persona with respect to a customer journey step.



### Adding persona expectations to customer journey mapping

An external org-unit is an external entity that exchanges flows with the enterprise. Example: customer, supplier, government office.

The expectations of a customer journey are also connected to personas and they must also be connected to the steps in the customer journey that use them.

☛ The list of expectations of a customer journey is accessed from the **Characteristics** properties window, in the **Phases** section.


☛ The list of expectations of a persona is accessed from the **Customer Journey** properties window of the persona, in the **Customer Expectations** section.

☛ For more details, see "[Specifying the expectations of a persona](#)", page 133.

To specify that a new customer expectation is connected to a customer journey:


1. Click the **Step** tab to access the list of steps in the customer journey.
2. Select the step that you wish to connect to an expectation and click in the **Expectations**.  
A window appears with the list of customer expectations connected to the mapping of the customer journey.  
☛ To complete the list of expectations proposed, click **Connect**.
3. Click **Add** to create a new expectation.  
The new customer expectation appears in the list of customer journey expectations.
4. Change the name of the customer expectation.
5. Select the expectations that you want to connect to the step and click on the outside of the selection window pane.  
The customer expectations selected appear in the swimlane of the step.

## Defining customer painpoints

 A *painpoint* describes the difficulties encountered by a persona when carrying out a step in the customer journey.


To specify that a new painpoint is connected to a customer journey:

1. Click the **Step** tab to access the list of steps in the customer journey.
2. Select the step that you wish to connect to an expectation and click in the **Painpoints** column.  
A selection window appears with the list of painpoints connected to the mapping of the customer journey.

 To complete the list of painpoints proposed, click **Connect**.

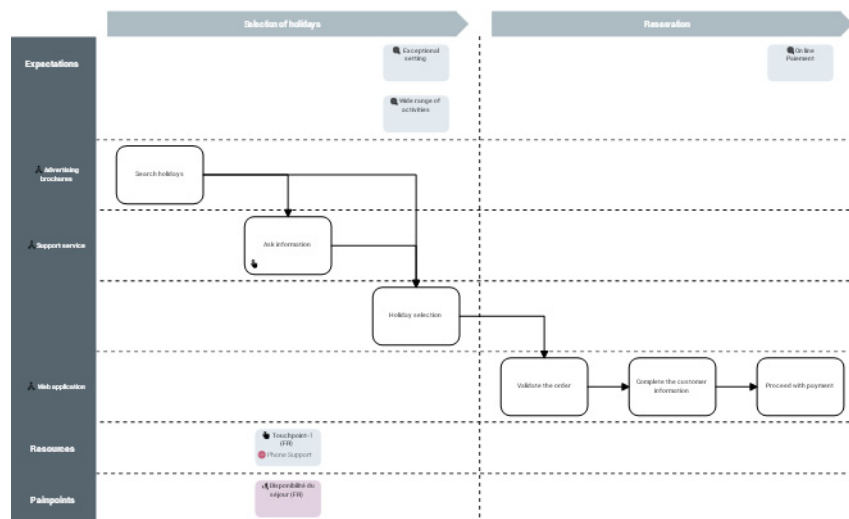
3. Click **Add** to create a new painpoint.  
The new painpoint appears in the list of customer journey painpoints.
4. Specify the name of the painpoint.
5. Select the painpoints that you want to connect to the step and click on the outside of the selection window pane.  
The painpoints selected appear in the swimlane of the step.

## The touchpoints and the business opportunities of a customer journey

 A *touchpoint* describes an interaction between a persona and an enterprise.

A touchpoint is used to identify the organizational elements, used during the customer journey, that could have an impact on customer satisfaction. A touchpoint is connected on the one hand to a step and its channels and painpoints, and on the other hand to business improvement opportunities.

In the diagram, the touchpoints, the channels and the painpoints and the business opportunities are in the same swimlane as the customer journey step.



## Creating a touchpoint in a customer journey



*A touchpoint describes an interaction between a persona and an enterprise.*

To create a touchpoint in a customer journey:

1. Click the **Step** tab to access the list of steps in the customer journey.
2. Select the step that you want to connect to a touchpoint and click in the **Touchpoint** column.  
A selection window appears with the list of touchpoints connected to the mapping of the customer journey.  
*☛ To complete the list of touchpoints proposed, click **Connect**.*
3. Click **Add** to create a new touchpoint.  
The new touchpoint appears in the list of touchpoints of the customer journey.
4. To change the name of the touchpoint.
5. Select the touchpoints that you want to connect to the step and click on the outside of the selection window pane.  
The touchpoints selected appear in the swimlane of the step.  
The step shape is modified.



*Step connected to a touchpoint*

☛ The list of touchpoints of a customer journey is accessed from the **Characteristics** properties window, in the **Touchpoint** section.

☛ The list of painpoints connected to a customer journey is accessed from the **Characteristics** tab, in the **Painpoints** section.

☛ For more details on painpoints, see ["Defining customer painpoints", page 141](#).

## Defining the business opportunities of a customer journey



*An opportunity characterizes an improvement action for one of the composite elements of the customer journey (steps, touchpoint).*

To specify that a new business opportunity is connected to a customer journey:

1. Click the **Step** tab to access the list of steps in the customer journey.
2. Select the step that you wish to connect to a business opportunity and click in the **Opportunity** column.  
A window appears with the list of business opportunities connected to the mapping of the customer journey.  
*☛ To complete the list of painpoints proposed, click **Connect**.*
3. Click **Add** to create a new business opportunity.  
The new business opportunity appears in the list of customer journey opportunities.
4. Specify the name of the business opportunity.

5. Select the business opportunity that you want to connect to the step and click outside of the selection window pane.  
The business opportunities selected appear in the swimlane of the step directly under the touchpoints of the step and are automatically connected.

☛ The list of business opportunities connected to a customer journey is accessed from the **Characteristics** tab, in the **Business Opportunities** section.

## Identifying a moment of truth

📖 A moment of truth is a decisive step for the remainder of the customer journey. Either customers believe that they cannot obtain what they are searching for under the desired conditions and they are not satisfied; Or, on the contrary, they believe that they have found what they are looking for and continue the journey.

To specify the steps of a customer journey that constitute moments of truth:

1. Click the **Step** tab to access the list of steps in the customer journey.
2. Select the **Moment of Truth** column.  
Check boxes appear on each row of the column.
3. Select the check box that corresponds to the step you wish to specify as a moment of truth.  
The step shape is modified.



Step declared as a moment of truth

☛ In the **Characteristics** tab of the properties window for the selected steps, the **Moment of Truth** check box is also checked.

---

## Creating Action Plans

Following the identification of possible improvements to a customer journey, it is possible to create an action plan from a touchpoint.

📖 An action plan comprises a series of actions, its objective being to reduce risks and events that have a negative impact on company activities.

To create an action plan from a customer journey touchpoint:

1. Click the **Step** tab to access the list of steps in the customer journey.
2. Select the step to which the touchpoint concerned is connected.
3. Click the **Action plan** column.  
A selection window appears with the list of action plans connected to the mapping of the customer journey.

☛ To complete the list of touchpoints proposed, click **Connect**.

4. Click **Add** to create a new action plan.  
The new action plan is created in the list of action plans of the customer journey.
5. Change the name of the action plan.
6. Select the action plans that you want to connect to the step and click outside of the selection window pane.  
The action plans selected appear in the swimlane of the step.

☛ The list of action plans of a customer journey is accessed from the **Characteristics** properties window, in the **Plans** section.

☛ For more information on managing action plans, see ["Action Plans with HOPEX Business Process Analysis", page 171](#).



## ASSESSMENT OF A CUSTOMER JOURNEY

The objective of the **HOPEX Customer Journey** module is to describe your customer journeys with a view to improving efficiency. By performing assessments, you can acquire valuated information and compare it.

With **HOPEX Customer Journey**, assessments are made using questions attached to channels. It is therefore possible to measure improvements made through the implementation of touchpoints on the sensitive steps of the journey.

**HOPEX Customer Journey** is based on assessment functionalities to define the questions and obtain the assessments of the steps of your customer journeys.

The following points are covered here:

- ["Defining questions for the assessment of a customer journey", page 145,](#)
- ["Assessing a customer journey", page 146,](#)
- ["Consolidating results and assessments", page 148.](#)


---


### Defining questions for the assessment of a customer journey

With **HOPEX Customer Journey**, you assess the tools used by the persona for a customer journey. As a result, the questions are connected to the channels of the customer journey steps. The assessment of the customer journey takes place via questions that concerns each channel-step pair.

#### Creating Questions





To create a question:

1. Open the **Customer journey** navigation window.
2. Select **Assessment > All Questions**.  
A tree with the list of Channels appears.
3. Click on the channel that interests you to display its pop-up menu and select **New > Question**.  
The **Creation of a Question** window appears.
4. Specify the **Local Name** of the question.  
 *The local name of the question is not visible to the questionnaire respondent.*
5. Specify the **Title**, which represents the question as it appears in the customer journey assessment questionnaire.
6. If necessary, specify:
  - The **Mandatory Element** field (indicates the mandatory or optional nature of the answer to this question).
  - The **Delegation Allowed** field (specifies if the answer to this question can be assigned to another person by delegation).
7. The **Type** of question is **ComboList**.

8. Create the possible answers.  
 For more details, see ["Entering possible answer values", page 168](#).
9. Click **OK**.

## Entering possible answer values

To create a possible answer value for a question:

1. Open the dialog box of the question that interests you.
2. In the **Possible Answer Value** section, click **New**.  
A possible answer value creation window opens.
3. Enter the **Name** of the value.
4. Indicate the color associated with the answer value.  
You have two possibilities:
  - Specify a **MetaPicture** if you have one.  
 The MetaPicture enables association of an image with an answer value.
  - Specify **RGBColor**.
5. In the **Answer Value** field, specify a strictly positive integer value that will be used to calculate the value of the assessment.  
 The lowest note corresponds to a very poor assessment and the highest note corresponds to an excellent assessment.  
 For more details on calculating assessment values, see ["Consolidation rules", page 148](#)  
 You must create at least two possible answer values.
6. Click **OK**.

---

## Assessing a customer journey

When the questions have been defined, the customer journey can be assessed.

### Access the customer journeys for the assessments


Access to the customer journey is different depending on what you want to do:

To access the list of customer journeys that have never been assessed:

- 】 Select **Assessment > Non Assessed Customer Journeys**.

To consult the results of the assessment consolidation of a customer journey:

- 】 Select **Assessment > All Assessed Customer Journeys**.

 For more details on calculating assessment values, see ["Consolidation rules", page 148](#)

To assess a customer journey that has already been assessed:

- 】 Select **Customer Journeys > All Customer Journeys**.

## Answering questions for the assessment of a customer journey

To assess a customer journey for the first time:

1. Open the **Customer journey** navigation window.
2. Select **Assessment > Customer Journey Non Assessed**.  
The list of non-assessed customer journeys is displayed.

☛ To access a customer journey that has already been assessed, select **Customer Journeys > All Customer Journeys**.

3. Select the customer journey that interests you and click **Assess**.  
The properties dialog box for the window appears.
4. Answer the question and click **OK**.

### Selection of holidays

#### Ask information

Phone Service

Quality: ■ Good ▼

### Reservation

#### Complete the customer information

Web application

Rapidity: 5 ▼

#### Proceed with

Web appli

Rapidity: ■ Satisfactory  
■ Very slow  
■ Quite slow

#### Validate the order

Web application

Rapidity: 5 ▼

☛ To assess a customer journey that has already been assessed: open the **Customer journey** navigation pane, select **Assessment > All Assessed Customer Journeys** and click **Assess**.

## Consolidating results and assessments

### Consolidation rules

Each answer to a question is associated with a percentage calculated using:

- the value defined in the **Answer Value** field of the chosen answer,
- the maximum value of possible answers,
- the minimum value of possible answers.

☛ For more details on the values associated with answers, see ["Entering possible answer values", page 168](#).

In this way, the value of the answer that corresponds to the best assessment equals 100% and the value of the answer that corresponds the least equals 1%.

For example, if the best answer to the question "Rapidity of the web application" is "Satisfactory" associated with a value equal to 11, the "Very slow" assessment is associated with a value equal to 1 and the intermediate assessment "Quite slow" is associated with 3, then the value of the "Quite slow" assessment equals 20%.

### Overview

The assessment results presented in the diagrams, the lists and properties pages are in general the values of the latest assessment.

Only the reports present average results. The calculation rules for averages are always the same irrespective of the object:

- the average value of the assessments of an object is the average of the assessment values of the object for a given period.

For example, if for the question "Rapidity of web application" the first answer was "Satisfactory" (value 100%) and a second answer was "Too slow" (value 1%), then the average value of assessments equals 50%.

### Value of the latest assessment of a question

The value of the latest assessment of a question is used to calculate the values of the last assessment of the steps for which the answers were given.

The value of the latest assessment of a question is the value of the percentage calculated for the answer during the latest assessment.

In the example of the question concerning "Rapidity of the web application", if the response "Satisfactory" was chosen during the latest assessment, then the value of the latest assessment of this question is 100%.

### ***Value of the latest assessment of a step***

Each of the questions associated with a channel are asked for all steps that use the channel.

For example, the web application channel is used for all the steps in the "Holiday reservation" phase.

The questions on the "Application web" channel can deal with its "Rapidity" and its "Conviviality"

The value of the latest assessment of a step is used to calculate the assessment values of a channel if answers were given.

The value of the last assessment of a step is the average of the values of the latest assessment of each of the questions relating to the step.

For example, the value of the "Proceed to payment" step is the average calculated using the value of the latest assessment given to the "Rapidity" and to "Conviviality".

### ***Value of the latest assessment of a channel***

The value of the latest assessment of a channel is the average of the values of the latest assessment of each of the steps connected to the channel.

### ***Value of the latest assessment of a customer journey***

The value of the latest assessment of a customer journey is used to calculate the assessment values of a customer journey group and a persona.

The value of the latest assessment of a customer journey is the average of the values of the latest assessment of each of the steps in the customer journey.

### ***Value of the latest assessment of a customer journey group***

The value of the latest assessment of a customer journey group is the average of the values of the latest assessment of the customer journey of the group.

### ***Value of the latest assessment of a Persona***

The value of the latest assessment of a persona is used to calculate the assessment values of a persona group.

The value of the latest assessment of a persona is the average of the values of the latest assessment of the customer journeys connected to the persona for a given period of time.

### ***Value of the latest assessment of a Persona Group***

The value of the latest assessment of a persona group is the average of the values of the latest assessment of the group persona.

## Consolidated results

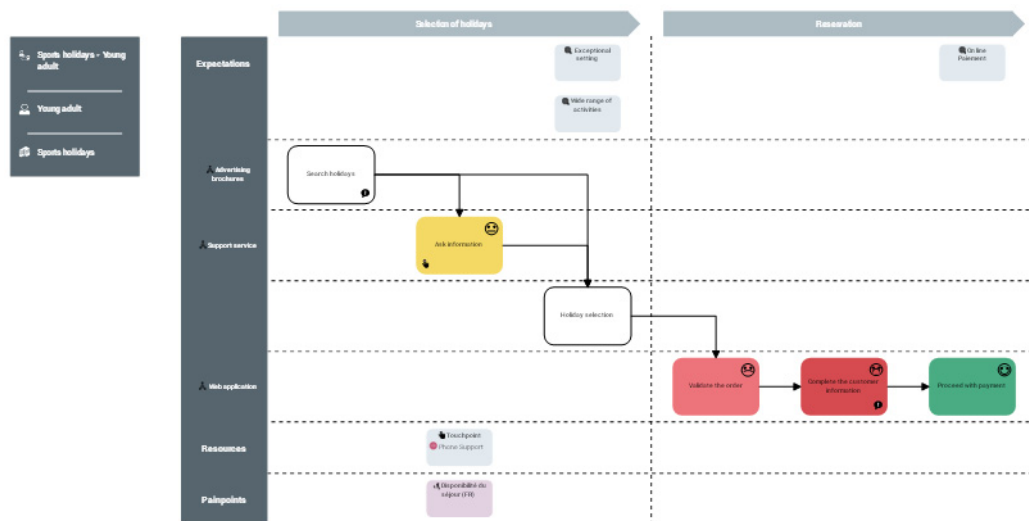
The consolidated results on the customer journey are presented in:

- diagrams,  
 ➤ For more details, see ["Representation of consolidated results in the diagrams", page 150.](#)
- lists,  
 ➤ For more details, see ["Representation of consolidated results in the lists", page 151.](#)
- dedicated reports.  
 ➤ For more details, see ["The reports available on a customer journey", page 152.](#)

### Representation of consolidated results in the diagrams

After assessment of a customer journey, the shape of the steps in the customer journey diagram is modified to present the results of the latest assessment of steps.

➤ For more details on calculating the value of the assessment, see ["Value of the latest assessment of a step", page 149](#)



Mapping a journey after assessment

Journey step	Comment
	Customer satisfaction very low
	Customer satisfaction low
	Customer satisfaction neutral
	Customer satisfaction high
	Customer satisfaction very high
	Customer satisfaction not assessed

*Presentation of the shape of steps differs according to the consolidated result of assessments.*

### **Representation of consolidated results in the lists**

After assessment of a customer journey, the consolidated results of the latest assessment appears in the lists. For example:

- In the **Assessment > All Assessed Customer Journeys** folder,
- In the properties page for the customer journey in the **Assessment** tab.

➡ For more details on calculating the value of the assessment, see ["Value of the latest assessment of a step", page 149](#)

## THE REPORTS AVAILABLE ON A CUSTOMER JOURNEY

This paragraph presents the list of reports available from a customer process.

- ["Global satisfaction", page 152](#)
- ["Improved scope", page 154](#)

---

### Global satisfaction

This report presents the results of the satisfaction of persona with the various customer journeys.

#### ***Report parameters***

Parameter	Parameter type	Constraints
Assessment values	"All assessment values" or "Latest assessment values"	Mandatory
From Date	Date	Today's date by default.
To	Date	Today's date by default.

#### ***Persona satisfaction***

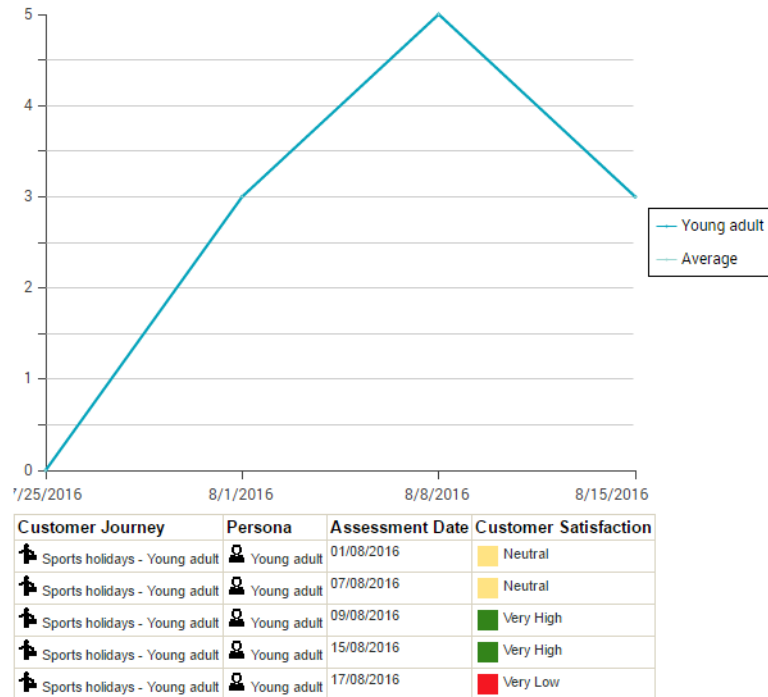
The first chapter presents a summary view of the satisfaction of persona with the customer journey for given dates.

- The x-axis carries the dates of the assessment period.
- The y-axis carries the value of the latest assessment of persona.  
The table under the curve indicates the value of the latest assessment of each persona at different dates.

☛ For more details on calculating the satisfaction of a persona, see ["Value of the latest assessment of a Persona", page 149](#).

- The figure presents a curve by persona and a curve that presents the average.





## Satisfaction of customer journey groups

The table is organized as follows:

- Each row is associated with a customer journey group assessed between the two dates given as a parameter.
  - The group expands to show the results of the customer journeys to which they are connected.*
- Each column is associated with a persona
- The cells present the satisfaction of the persona with the corresponding journey group (or with the customer journey itself).

*For more details on calculating the satisfaction of the persona for a customer journey, see "Value of the latest assessment of a customer journey", page 149 and "Value of the latest assessment of a customer journey group", page 149.*

### 2. Customer Journey Group satisfaction

	Young adult	Single pizza eater
1 Take away		High
Order pizza		High
Game day		
Ordering pizzas for a game event		

## Improved scope

This report presents the assessment results with respect to the resources associated with the touchpoints.

### ***Report parameters***

Parameter	Parameter type	Constraints
Assessment values	"All assessment values" or "Latest assessment values"	Mandatory
From Date	Date	Mandatory, today's date by default.
To	Date	Mandatory, today's date by default.

### ***Assessment of the scope***

The first chapter of this report presents a bubble chart that is used to assess the efficiency of the touchpoints with respect to the assessment period.

- Each bubble represents a touchpoint.
- The size of the bubble represents the number of customer journeys that use the touchpoint resource.
- The color of the bubble represents the average value of the assessment of the resource for the steps assessed.
- The x-axis shows the number of touchpoints to which the resource is connected.
- The y-axis presents the average value of the assessment of the resource for the steps assessed.

☛ *The x-axis presents the same information as the colour of a bubble. Thus, the red bubbles are at the bottom of the diagram and the green bubbles are on top.*












The table under the bubble diagram specifies the value of the latest assessment of each person at different dates.

➡ For more details on calculating the satisfaction of a persona, see ["Value of the latest assessment of a customer journey", page 149](#).

Customer Journey	Persona	Assessment Date	Customer Satisfaction
🏃 Sports holidays - Young adult	👤 Young adult	01/08/2016	🟡 Neutral
🏃 Sports holidays - Young adult	👤 Young adult	07/08/2016	🟡 Neutral
🏃 Sports holidays - Young adult	👤 Young adult	09/08/2016	🟢 Very High
🏃 Sports holidays - Young adult	👤 Young adult	15/08/2016	🟢 Very High

The latest table of the report details the data presented in the bubble diagram.

- Each row is associated with a resource (if appropriate connected to a number of touchpoints).
- The first column specifies the average value of the assessment of the resource for the steps assessed.
- The second column specifies the number of touchpoints to which the resource is connected.
- The third column specifies the number of customer journeys to which the resource is connected.
- The name of the customer journey that uses the resource is specified in the fourth column.
- The fifth column specifies the percentage of steps noted as moments of truth that use the resource.
- The last column draws up the list of channels to which the resource is connected.

	Customer satisfaction value average▲	Number of touchpoints▲	Number of customer journey▲	Parcours client	Percentage of moment of truth	Canaux concernés
 Planning Mgt	55.0	1.0	1.0	 Order pizza		 Phone
 Store Manager	65.0	2.0	1.0	 Order pizza	50.0 %	 Phone
 Welcome client	75.0	1.0	1.0	 Order pizza	100.0 %	 Phone

➡ For more details on calculating the satisfaction a persona for a customer journey, see ["Consolidation rules", page 148](#).

# MANAGING QUALITY



**HOPEX Business Process Analysis** offers functions that simplify creation and maintenance of a quality system conforming to ISO 9000 standards. You can:

- Draw up your organizational processes graphically using organizational process diagrams.
- Enter the characteristics specific to the quality problem.
- Synchronize your processes and the various chapters or themes of the quality repository on which you are based (ISO 9001 standard, 2015 edition, etc.).
- Generate a quality manual automatically

## Prerequisites to Use of Quality

An option is used to display the properties dedicated to the management of processes quality.

To activate this option:

1. In the workspace, open the **Options** window.
2. In the left tree, select **Business Process and Architecture Modeling:**
3. Select the check box **Quality Modeling**.

## ORGANIZATIONAL PROCESS PROPERTIES

In the properties dialog box of an organizational process, the **Quality** tab allows you to:

- enter quality characteristics specific to processes.
- indicate to which section of which repository the process you are describing refers. In this way, the processes are associated with chapters or themes so as to indicate their field of application.

### Indicating Organizational Process Quality Characteristics

In the **Details** sub tab (Quality tab), you can enter characteristics relating to quality issues.

The screenshot shows a software interface for defining quality characteristics. At the top, there's a 'Quality' dropdown menu. Below it, the 'Details' sub-tab is selected. The form contains several fields: 'Process Frequency', 'Organizational Process Type', 'QA Organizational Process', and 'Organizational Process Class', each with a dropdown arrow. Below these are 'Application Date' and 'End of Validity Date', each with a calendar icon. At the bottom, there are two expandable sections: 'Texts' and 'Chapter', each with a plus icon.

### Organizational process types and classes

Two **types of organizational process** are managed:

- "General" organizational processes: involve the entire enterprise or organization.
- "Specific" organizational processes: specific to a part of the enterprise or to a product.

**Organizational process classes** proposed are:

- "Normal" organizational processes: describe the typical operations of the enterprise.
- "Urgent" organizational processes: describe a fast track such as providing speedier service to a customer.
- "Special" organizational processes: used for exceptional events such as accidents.

## Other organizational process characteristics

The **QA-Organizational Process** field allows you to specify if the procedure forms part of the Quality Assurance (external) or Quality System (internal) documentation of the organization.

*This option concerns the 1994 version of ISO 9001 standard.*

The **Frequency of the process** can be:

- "On Request" (the process is applied when the event that triggers it occurs).
- Daily, Weekly, Monthly, Twice a Month, Quarterly, or Annually.

The **Application date** and **End of validity date** of the process can also be indicated.

*The application and validity end dates are displayed using the Windows default format. You can change this format in the Regional Settings properties dialog box (short date).*

*To enter a date beyond the year 2000, you should select short date format of type dd/MM/yyyy with four characters for the year.*

## Entering the texts of an organizational process

The **Quality** property page of an organizational process includes a **Texts** section that allows you to enter different types of text (standard): "Application domain", "process object", "references", "definitions", etc.

## Specifying Context of the Quality Approach

The **Quality** property page of an organizational process includes a **Chapters** section that allows you to specify the standard on which you are based for your quality approach or certification.

*To have access to data relating to the standard ISO 9001 2015, you must have imported the "ISO" Solution Pack. For more details, see "Importing a Solution Pack ins HOPEX" in HOPEX Administration guide.*

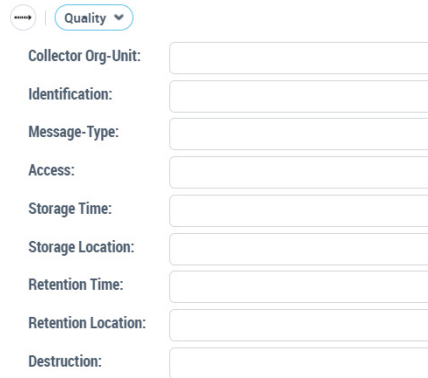
The subtabs **ISO 9001** and **Other chapters** correspond to different repositories serving as the basis for your quality approach:

- **ISO 9001**  
This sub-tab presents the 20 chapters (or requirements) of the ISO 9001 standard.
- **Other chapters**  
This sub-tab concerns you if you are using another standard for your quality approach or certification. The chapters that you may have created will appear here.

*To create new chapters you must use the explorer.*

## MESSAGE FLOW PROPERTIES

The **Quality** properties page allows you to specify characteristics of a message flow related to quality.



Quality ▾

Collector Org-Unit:

Identification:

Message-Type:

Access:

Storage Time:

Storage Location:

Retention Time:

Retention Location:

Destruction:

The **Message-Type** list box enables characterization of the message flow: "External Data", "Quality Record" or "Instruction".

The other fields allow you to enter additional indications for messages of "Quality record" type that are particularly important in documentation of your quality system. Here you can define the controls needed for identification, storage, retention time, etc.



*According to the ISO 9000 standard, a "Record" is a "document stating results achieved or providing evidence of activities performed". It can document traceability and provide evidence of the verification, preventive action, and corrective action. It can consist of a form, report, list of actions, etc. It can be written or saved on any data carrier. Generally records need not be under revision control.*



# ASSESSMENTS WITH HOPEX BUSINESS PROCESS ANALYSIS



Questionnaires are used to obtain an assessment of the execution and performance of business and organizational processes.

**HOPEX Business Process Analysis** uses assessment features to carry out assessments of your business and organizational processes based on answers to standard questionnaires. In this way you can improve their real and perceived quality.

☛ *To access assessment examples described in this guide, you must have imported data specific to process assessments, see [Connecting to HOPEX Business Process Analysis](#).*

The following points are covered here:

- ✓ [Assessment principles](#)
- ✓ [Assessing a process with HOPEX Business Process Analysis](#)

# ASSESSMENT PRINCIPLES

## Concepts Overview

Assessment is carried out using assessment questionnaires. In **HOPEX Business Process Analysis**, these questionnaires are accessible directly. Results are then aggregates according to predefined rules to present results so they can be used.

Assessments relate to process execution and performance.



*An assessment is a mechanism used to receive feedback (qualitative or quantitative) from an identified population on identified objects. The assessment is then supplemented by results analysis tools.*



*An assessment questionnaire is a list of questions relating to a particular object and addressed to persons questioned.*

The results of these assessments are then presented in reports. For more details, see [Execution and Performance Heatmap](#).

## Criteria assessed with HOPEX Business Process Analysis

These characteristics relate to attribute values linked to process performance and execution.

### **List of characteristics linked to process execution:**

- **Specification**: assessment of quality of description of the object in the repository.
- **Knowledge**: assessment of knowledge of the object by stakeholders.
- **IT Support**: assessment of application support of the object.
- **Execution**: this characteristic is a global assessment of object execution. It is calculated from assessment of object specification, knowledge and support.

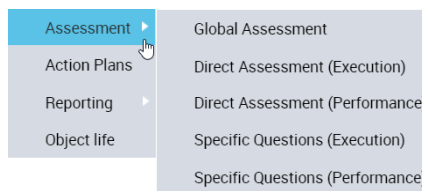
### **List of characteristics linked to process performance:**

- **Effectiveness**: characterizes effectiveness of object operation
- **Business Value**: characterizes business value of the object.
- **Risk**: characterizes risks concerning the object.
- **Performance**: this characteristic is a global assessment of process performance. It is calculated from assessment of process business value, effectiveness and risk.

# ASSESSING A PROCESS WITH HOPEX BUSINESS PROCESS ANALYSIS

## Accessing the Process Assessment with HOPEX Business Process Analysis

The properties pages of an organizational process (or a business process), enables access to different forms of **Assessment**.



The following choices are available:

- **Global Assessment:** to attribute values to the assessment criteria of the process.  
See [Global assessment](#).
- **Direct Assessment (Execution)** and **Direct Assessment (Performance):** enables expert users to assess the execution and performance criteria for a process in its different use contexts.  
See [Direct Assessment](#).
- **Specific Questions (Execution)** and **Specific Questions (Performance):** to add questions to existing assessment questionnaires.  
See [Specific questions](#).

Completed assessments are used to obtain summary reports.

☛ For more details on this summary report, see [Execution and Performance Heatmap](#).

## Global assessment

The **Assessment > Global assessment** property page of an organizational process allows an expert user to specify values of attributes linked to assessed characteristics.

The screenshot shows a web interface for 'Assessment - Global Assessment'. It contains two main sections: 'Execution' and 'Performance'. Each section has four attributes with corresponding dropdown menus.

Section	Attribute	Value
Execution	Design :	Very Poor
	Knowledge :	Very Well Known
	IT Support :	Good
	Execution :	Good
Performance	Efficiency :	Very High
	Business Value :	Very Low
	Risk :	High
	Performance :	Low

## Direct Assessment

You can create new assessments to globally assess an organizational process on all the organizational contexts to which it is connected (i.e. entities).

This is an "expert view" assessment.

### Creating direct assessments (Execution)

To create a direct execution campaign:

1. Open the **Assessment > Specific Questions (Execution)** property page of the process that interests you.

2. Click the **Evaluate** button.  
The assessment questionnaire page appears.

Create new evaluation - Direct answers

Diagram

Description

Map and description of the process is exhaustive and up to date in process repository ?

Process stakeholders are well aware of their requested contribution to the process ?

The process is executed as it is described in process repository ?

Interactions with other processes are identified, listed and qualified ?

Maps and documentation of the processes is available to process stakeholders and to the other persons of the company ?

Operation

How does this process enable you to reach objectives assigned to you ?

Are your clients (internal or external) satisfied of process course ?

Are your clients (internal or external) satisfied of process results ?

Do you often observe malfunction during process execution ?

Identify the degree to which this process is supported by application functionalities ?

Attachments

Measure Date

Date: \* 12/19/2019

3. Select the contexts in which the process is to be assessed, then click Next.  
*The contexts are available only if there is more than one.*
4. Specify the values for the questionnaire characteristics:
5. (Optional) Add **Attachments**.
6. Check the **Assessment Date**.
7. Click **OK**.  
An assessment is created.

## Creating direct assessments (Performance)

You create an assessment of the performance of your process in the same way as for an execution assessment (see [Creating direct assessments \(Execution\)](#)).

The standard questionnaire for the performance appears.

**Create new evaluation - Direct answers**

**Business Value**

Performance indicators are defined and updated according to company objectives ?

What is process contribution to company objectives ?

Evaluate the process direct or indirect business value for the company ?

Identify the degree to which this process meets business needs ?

How flexible the process is to satisfy changing business / user requirements ?

How does this process enable you to reach objectives assigned to you ?

**Efficiency**

Potential improvement (Cost) ?

Potential improvement (Quality) ?

Potential improvement (Delay) ?

Potential improvement (Complexity) ?

Are your clients (internal or external) satisfied of process course ?

Are your clients (internal or external) satisfied of process results ?

**Risks**

What is the impact to the process if sustaining applications was not present ?

Are risks associated to process execution identified ?

## Specific questions

You can add new questions to your questionnaires for your processes.  
Your question then appears in the associated questionnaire in the corresponding section: "Process execution" or "Process performance".

Process Execution

This is my question:

☒ OK

☐ NO

☐ N/A

**OK/NO/NA** specific question type

## Creating a specific question (Execution)

To create a specific execution question:

1. Open the **Assessment > Specific Questions (Execution)** property page of the process that interests you.
2. Click the **New** button.  
The question creation page appears.

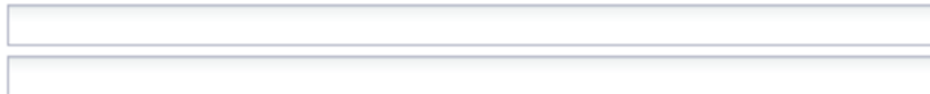
3. Specify the **Local Name** of the question.
  - ☛ The local name of the question is not visible to the questionnaire respondent.
4. Select the **Type** of question enabling specification of the answer format.
  - ☛ Depending on the **Type** of question, an **Answer** section appears. Answers of "Multiple answers" type require manual creation of answers. For more details, see [Question Types](#).
5. Specify the **Title**, which represents the question as it appears in the questionnaire.
6. You can indicate:
  - The **Mandatory Element** field (indicates the mandatory or optional nature of the answer to this question).
  - The **Delegation Allowed** field (specifies if the answer to this question can be assigned to another person by delegation).
7. Click **OK**.

## Question Types

The question types that can be used to directly enter an answer are listed below.

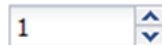
- **Text**: to enter the text.
- **String**: to enter a string of characters in a field.
  - ☛ If you must display your answer in more than one field/row, select the **Multiple Answer Type** value.
- **Multiple Answer Type**: to display several answer fields for the same question.

Example of use: to enter an address you may need several fields.

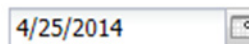


☛ This type of answer requires creation of answer values. For more details, see [Entering possible answer values](#).

- **Signed Number**: to enter a negative or positive number
- **Timespan**: to enter a timespan
- **Floating**: to enter a floating point number.
- **Percentage**: to enter a percentage.
- **Integer**: to enter a short integer.




- **Date**: to enter a date using a calendar




The types of questions used to select a value using predefined suggestions are listed below.

- **OK/NO/NA:** provides a drop-down list containing three values:
  - OK
  - NO
  - N/A (Not Applicable)

- **Drop-down List:** to select a value from a drop-down list.

 This type of answer requires creation of answer values. For more details, see [Entering possible answer values](#).

- **Radio button (:** to display vertical radio buttons in the answer.

 This type of answer requires creation of answer values. For more details, see [Entering possible answer values](#).

## Entering possible answer values

You must specify the answer values possible if you have defined the following question types:

- multiple answer
- drop-down lists
- radio buttons (vertical)



In this case, an **Internal Default Value** field and a **Possible Answer Value** section open automatically in the question creation page.

For more details on managing questionnaires, see [Creating Possible Answer Values](#).

### Creating Possible Answer Values

In this case, an **Internal Default Value** section opens automatically in the question creation page.

To create a possible answer value:

1. In the **Possible Answer Value** section, click **New**.  
A possible answer value creation window opens.
2. In the **Answer Value** field, specify a value.  
This value can be used by quotation rules.
3. Indicate the color associated with the answer value.  
You have two possibilities:
  - Specify a **MetaPicture** if you have one.  
The MetaPicture enables association of an image with an answer value.
  - Specify **RGBColor**.

4. Click **OK**.  
You must create at least two possible answer values.

### Defining an answer value by default in the event of a non-answer

You can allocate an internal default value for the drop-down list and radio button type questions. This value is used if the respondent omits to answer a question.

To specify an internal value by default:

1. In the properties page for the question, specify the **Internal Default Value** field.

### Creating a specific question (Performance)

You create a question specific to the performance of your process in the same way as you do for an execution assessment (see [Creating a specific question \(Execution\)](#)).


The question then appears in the direct assessment questionnaire (Performance).



# ACTION PLANS WITH HOPEX BUSINESS PROCESS ANALYSIS



**HOPEX Business Process Analysis** allows you to specify, implement and follow up *action plans* defined for managing, for example, a Customer Journey.

 *An action plan comprises a series of actions, its objective being to reduce risks and events that have a negative impact on company activities.*


The following points are covered here:

- ✓ ["Managing Action Plans with HOPEX Business Process Analysis", page 171](#)
- ✓ ["Managing actions with HOPEX Business Process Analysis", page 172](#)

---

## Managing Action Plans with HOPEX Business Process Analysis

An *Action plan* can be set up, for example, for improvement of a Customer Journey.


 *An action plan comprises a series of actions, its objective being to reduce risks and events that have a negative impact on company activities.*

### Creating Action Plans with HOPEX Business Process Analysis

To create an action plan from the **Transformation** navigation pane:

1. Select **Corrective Action Plans > Action Plans**.
2. Select **My Action Plans** tab.
3. Click **New**.  
The new action plan appears in the list.
4. Change the name of the action plan.

You can also create or connect an action plan from the **Action Plans** property page of an organizational process, for example. The object used to connect the action plan appears in the **Scope** section of the **Characteristics** property page of the action plan.

 To create an action plan from a Customer Journey, see ["Creating Action Plans", page 143](#).

## Characterizing Action Plans

☛ For more details on action plans characteristics, see chapter "Supplementing Action Plan Information" in the **HOPEX Common Features** guide.

## Action Plans execution with HOPEX Business Process Analysis

During the execution, an action plan takes different states. Passage between states is submitted for the approval of the action plan owner or the action plan approver.

☛ For more details on an action plan execution, see the, chapter "Action plan execution" in the **HOPEX Common Features** guide.

With **HOPEX Business Process Analysis**, actions can be created as long as the action plan is not closed.

☛ For more details, see "Managing actions with HOPEX Business Process Analysis", page 172.

Having specified the characteristics of a new action plan, the creator can: **Send** the action plan to the "Approver" user.

The action plan "Approver" user can: **Reject** or **Start** the action plan.

When the action plan actions are closed, the "Owner" user must **Close** the action plan.

After having consulted action plan follow-up reports, the "Approver" user can: **Close** or **Reopen** the action plan for complementary actions.

### Preparing the action plan progress follow-Up

Action plan progress is specified at periodic dates by the action plan responsible user.

**HOPEX Business Process Analysis** offers the opportunity to regularly remind the action plan owner user by email to update the progress of his action plan using a steering calendar.

☛ For more details on an action plan execution, see the, chapter "Action plan execution" in the **HOPEX Common Features** guide.

---

## Managing actions with HOPEX Business Process Analysis

With **HOPEX Business Process Analysis**, the action plan **Owner** can propose and assigning **actions** corresponding to the execution of the action plan.

📖 An action is included in an action plan and represents a transformation or processing in an organization or system.

To create actions, the action plan status must be "In progress", that is it has been validated by the "Approver" user.

☛ For more details on the actions management, see "Managing action" chapter in guide **HOPEX Common Features**.

# HOPEX BUSINESS PROCESS ANALYSIS REPORTS



## **HOPEX Business Process Analysis**

offers analysis and follow-up of implementation of the business architecture evolutions of your enterprise. **HOPEX** Suite uses reports to group sets of repository objects and study their interactions.

☛ *For more details on operation of reports, see the **HOPEX Common Features** guide, "Generating Reports".*

Report templates proposed as standard by **HOPEX Business Process Analysis** offer various analysis presentation possibilities.

The following points are covered here:

- ✓ ["Managing Processes", page 176.](#)
- ✓ ["Exchange Balance", page 178.](#)
- ✓ ["Process Analysis", page 181.](#)
- ✓ ["Risk Management", page 203.](#)

## MANAGING PROCESSES

This paragraph presents the list of reports available from a process.

- ["Process Support Table", page 176](#)
- ["Geographical Process Support Table", page 177](#)

### Process Support Table














This report describes which business applications support processes, and for which org-units.


Cells contain offerings of the business process which:

- contain the product of the column,
- have as source or target a business process participant assigned to the org-unit in the row.

This report also displays the business or organizational processes that are source or target of the offering.

 For more details on the use of products and offerings, see the **HOPEX Business Process Analysis** guide.

	Quotation	Contract
 Private Car Renter		
 World@Hand Employee		
 HR Manager		
 Employer		
 World@Hand Vendor	  External Vendor --> Short Term Procurement   Short Term Procurement	  External Vendor --> Short Term Procurement   Short Term Procurement

 This matrix is displayed in the **Products x Markets** tab of the business process.

### Report parameters

Parameter	Parameter type	Constraints
Object	Business processes	At least one object mandatory.
Object	Org Unit	At least one object mandatory.

---

## Geographical Process Support Table

This report describes which business applications support processes, and for which geographical sectors.

### ***Report parameters***

Parameter	Parameter type	Constraints
Site	Site	At least one Site mandatory.
Object	Business processes	At least one Process mandatory.

## EXCHANGE BALANCE

### Exchange Balance Between Organizational Processes

The exchange balance between functional processes report controls consistency of exchange design. A comparison of all incoming and outgoing exchanges defined inside and outside functional processes identifies elements missing in the design, or those that are unnecessary.

**Legend:**

- The incoming information element is managed around the balanced item.
- The incoming information element is managed inside the balanced item.
- The incoming information element is managed both around and inside the balanced item.
- The outgoing information element is managed around the balanced item.
- The outgoing information element is managed inside the balanced item.
- The outgoing information element is managed both around and inside the balanced item.
- The around exchange is coming in the balanced item.
- The inside exchange is coming in the balanced item.
- The around exchange is going out the balanced item.
- The inside exchange is going out the balanced item.

**Exchange Balance**

Balanced Items	Information Elements	Around Exchanges	Inside Exchanges
Conduct Combat Assessment	Re-strike Recommendation		Recommend Restrike            Re-strike Recommendation

This report enables consistency check of exchanges defined within the organizational process with exchanges sent and received from the exterior.

Different icons are used to symbolize exchange type: message, flow or interaction. These icons enable identification that exchanges between interior and exterior are balanced.

This report is presented in the form of a table, rows of which are organizational processes defined as parameters.

#### ***Report parameters***

Parameter	Parameter type	Constraints
Object	Organizational Process	At least one object mandatory.

















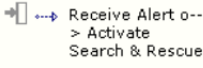
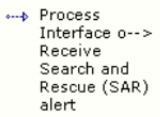





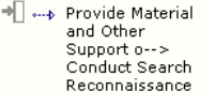
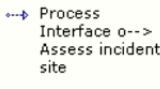


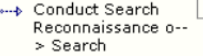


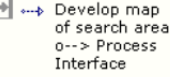





## Value Stream Exchange Balance

Like report "Exchange Balance Between Organizational Processes", page 178, this report checks consistency of design of exchanges between value streams.

The following table shows for each operational activity the balance between around and inside information elements incoming or outgoing the operational activity.

### Legend:

-  The incoming information element is managed around the balanced item.
-  The incoming information element is managed inside the balanced item.
-  The incoming information element is managed both around and inside the balanced item.
-  The outgoing information element is managed around the balanced item.
-  The outgoing information element is managed inside the balanced item.
-  The outgoing information element is managed both around and inside the balanced item.
-  The around exchange is coming in the balanced item.
-  The inside exchange is coming in the balanced item.
-  The around exchange is going out the balanced item.
-  The inside exchange is going out the balanced item.

Exchange Balance			
Balanced Items ▾	Information Elements	Around Exchanges	Inside Exchanges
 Activate Search & Rescue (  Activate Search & Rescue )	 SAR Alert	 Receive Alert  Receive Alert o--> Activate Search & Rescue	 Process Interface o--> Receive Search and Rescue (SAR) alert  Receive Search and Rescue (SAR) alert
 Conduct Search Reconnaissance (  Conduct Search Reconnaissance )	 Area identified to recon	 Provide Material and Other Support  Provide Material and Other Support o--> Conduct Search Reconnaissance	 Process Interface o--> Assess incident site  Assess incident site
	 Search sites identified and prioritized	 Conduct Search Reconnaissance o--> Search  Search	 Develop map of search area  Develop map of search area o--> Process Interface
 Demobilize / Redeploy (  Demobilize / Redeploy )	 Victim not found	 Search  Search o--> Demobilize / Redeploy	

### Report parameters

Parameter	Parameter type	Constraints
Object	optional	At least one object mandatory.

---

## Exchange Balance Between Business Processes

Like report "[Exchange Balance Between Organizational Processes](#)", page 178, this report checks consistency of design of exchanges between business processes.

### *Report parameters*

Parameter	Parameter type	Constraints
Object	Business processes	At least one object mandatory.

---

## Value steps Exchange Balance

Like report "[Exchange Balance Between Organizational Processes](#)", page 178, this report checks consistency of design of exchanges between value steps.

### *Report parameters*

Parameter	Parameter type	Constraints
Object	Value step	At least one object mandatory.

---

## Exchange Conformity Between Businesses

The report on conformity of exchanges between businesses checks that exchanges between businesses are consistent with exchanges in processes that describe how its elements behave.

### *Report parameters*

Parameter	Parameter type	Constraints
Object	Business function	At least one object mandatory.

## PROCESS ANALYSIS

This paragraph presents the list of reports available from a process.

- "Business Process Automation", page 181
- "Process Supervision", page 184
- "Automated Process Supervision", page 184
- "Process Functional Analysis", page 185
- "BPMN Business Process", page 186
- "BPMN Value chain", page 186
- "BPMN Organizational Process", page 187
- "Support of Processes by Applications Table (Statistics)", page 187
- "Managing RACI (BPMN)", page 188
- "Business Process RACI Matrix (BPMN)", page 190
- "Business Process and Sub-Process RACI Matrix (BPMN)", page 192
- "Organizational Process RACI Matrix (BPMN)", page 192
- "Organizational Process and sub-processes RACI Matrix (BPMN)", page 193
- "Org-Unit RACI Matrix (BPMN)", page 193
- "Org-Unit and owned org-units RACI Matrix (BPMN)", page 193
- "Business Process Products x Markets Matrix (BPMN)", page 193
- "Products x Markets Matrix (BPMN)", page 194
- "Business Process Contextualization Matrix (BPMN)", page 195
- "Contextualization Matrix (BPMN)", page 195
- "Execution and Performance Heatmap", page 195
- "Org-Unit Analysis", page 199
- "Site Analysis", page 202

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### Business Process Automation

This report enables detection of potential improvements in the information system in its support of human resource activities.

The human activity analyzed comprises the set of operations executed by one or several org-units. This set can be defined in different ways:

- Processes or processes folder: in this case, processes are used to find all operations contained in the processes that implement them.
- Operations: a set of operations can be given directly. This set can also be specified by a query or a query instance (for example all operations using at least two IT services).
- Org-units or org-units folder: in this case the set of operations is built from the operations executed by these org-units.

## Comparison of exchanges at process and IT levels

This report explains how the information system can be improved related to the processes it uses.

Search criteria are based on information exchanges carried out at process level that are not delegated to IT services.

### Application Scope

The scope constraining the set of analyzed applications.

This scope is optional, so if no scope is set, the analysis report retrieves all applications helping performing the operations.

Parameter Values		
#	Name	Value
1	Application Scope	Maintenance Vehicle System

### Process and IT Service Exchanges Comparison

This report shows where the IT system can be improved and justify the selection by the business process using the IT system.  
The search criteria is based on information exchange performed at a process level that is not delegated to IT services.

Each row of the table below shows a couple of operations exchanging information whereas the supporting IT services are not exchanging information at all.

Source operation	Target operation	Diagram list
Body problem overview	Breakdown determination: Is Car Repairable?	<div>Diagram list</div> <div>Name</div> <div>Breakdown Analysis (World@Hand::MEGA Notation Diagrams::Car Rental Business) - Flowchart with IT Services</div> <div>Breakdown Analysis (World@Hand::MEGA Notation Diagrams::Car Rental Business) - Flowchart</div>
Determine problem type	Retrieve breakdown body information	<div>Diagram list</div> <div>Name</div> <div>Car Repair (World@Hand::MEGA Notation Diagrams::Car Rental Business) - Flowchart with IT Services</div> <div>Car Repair (World@Hand::MEGA Notation Diagrams::Car Rental Business) - Flowchart</div>

This report functions on organizational process operations, successively processing the following points:

1. analysis of the content of messages, message flows or shared objects exchanged directly or indirectly between operations,
2. analysis of services used by operations,
3. verification that exchanges between services are consistent with contents.

## Querying IT services

IT services that can be used by process operations are found using common functionalities attached to services and operations.

All process operations are displayed so as to list those that are supported by IT services, those that could be supported using existing services, and those that require design of new services.

#### IT Services Research

IT Services that can be used by the process operations are retrieved using the common functionalities attached to both the IT services and the operations.  
All process operations are shown to demonstrate those that are using IT services, those that might use existing IT services and those that they need new IT service designs.

Operation	Expected functionalities	Related services
Body problem overview	Input a Breakdown Analysis	Breakdown Analysis Report Form
Breakdown determination: Is Car Repairable?	Input a Breakdown Determination	Breakdown Determination Form
Determine problem type		Repair Order Scheduler
Engine problem overview	Input a Breakdown Analysis	Breakdown Analysis Report Form
Fix tire problem		
Prepare estimate, task and vehicle loan		Estimate Form
Prepare invoice	Input a Car Repairing Invoice	Invoice Form
	Print Car Repairing Invoice	

### Report parameters

Parameter	Parameter type	Constraints
Human activity	Process, operation or org-unit.	At least one object mandatory.
Scope?	Application	Not mandatory.

Application scope indicates the scope restricting all applications analyzed. This scope is optional. If it has not been mentioned, the analysis report finds all applications used to execute operations.

## Process Supervision

This report finds indicators and dashboards dedicated to business or functional processes.

### Procurement - Business Process Monitoring



[Add a comment]

#### 1. Indicators Evaluating the Business Processes



[Add a comment for this chapter]

	Aggregated Status	Indicator Name	Indicator Value	Indicator Status
<b>CRITICAL</b>				
Procurement Business Process		Business Partner Satisfaction	50	Unsatisfactory
		Supplier Diversity	17	Operational
Short Term Procurement				
Purchase Goods & Services				
Contract Negotiation	Critical	Contract Savings	1.5m	Operational
		Budget Attainment	30	Critical
		Contract Document Quality	65	Warning
		Manage Contract Expiration	10	Operational
		Contract Under Negotiation	25	Operational
		Contract to Auditor	3	Warning
Quotation Requisition	Unsatisfactory	Supplier Quality	92	Operational
		Performing Time / Processing Time	52	Unsatisfactory
Purchase Goods & Services	Unsatisfactory	Performing Time / Processing Time	52	Unsatisfactory
Quotation Requisition & Contract Negotiation	Unsatisfactory	Performing Time / Processing Time	52	Unsatisfactory
Contract Negotiation	Critical	Contract Savings	1.5m	Operational
		Budget Attainment	30	Critical
		Contract Document Quality	65	Warning
		Manage Contract Expiration	10	Operational
		Contract Under Negotiation	25	Operational
		Contract to Auditor	3	Warning

### Report parameters

Parameter	Parameter type	Constraints
Object	Business processes optional	At least one object mandatory.

## Automated Process Supervision

Like report "Process Functional Analysis", page 185, this report contains indicators and dashboards dedicated to supervision of system processes.

**Report parameters**

Parameter	Parameter type	Constraints
Object	System process	At least one object mandatory.

---

## Process Functional Analysis

This report is designed to compare a group of processes providing functionalities with a set of expected functionalities (defined in functional scope).

The functional scope determines which functionalities are expected to achieve a given objective. It comprises functionalities that can be defined from processes or businesses. We therefore find all linked functionalities.

**Report parameters**






Parameter	Parameter type	Constraints
Functional scope	Business, process, functionalities, operation	At least one object mandatory.
Process analyzed	Business, process, operation	At least one object mandatory.

☛ The "Process analyzed" parameter indicates the group of processes compared to the functional scope. It can also be applied to business functions or processes.

## BPMN Business Process

This report describes a business process, its structure, its exchanges with other processes and with external participants, as well as detail of the products it supplies.

### Products

Source	Offering	Destination
 External Vendor (EN)	 External Vendor --> Short Term Procurement	 Short Term Procurement
	<b>Product</b>	<b>Product type</b>
	 Contract	
	 Quotation	

### The process is implemented with

Process type	Implementation	
Functional Process	Purchase Goods & Services	The <b>Purchase Goods &amp; Services functional process</b> describes how the <b>Short Term Procurement business</b> organizational, regional or system consideration.
Organizational Process	Goods Purchasing	
Organizational Process	Goods and Services Procurement	
Organizational Process	Purchase Goods & Services	The Purchase Goods & Services organizational process describes how the United States office is running the Short Term Procurement ERP.
System Process	Purchase Goods & Services (ERP)	

### Implementation context

	Implemented element	Implementation context	Implementing element
Contextualization	Purchase Goods & Services		Purchase Goods & Services (ERP)
Contextualization	Purchase Goods & Services	United States	Purchase Goods & Services
Contextualization	Purchase Goods & Services	United Kingdom	Goods Purchasing

### Report parameters

Parameter	Parameter type	Constraints
Object	Business processes	One object mandatory.

## BPMN Value chain

Like report "[BPMN Business Process](#)", [page 186](#), this report describes an organizational process, its template and its participants, as well as the value steps for which each participant is responsible. This analysis also presents exchanges, systems used to support value steps and the risks encountered during process execution.



**Report parameters**

Parameter	Parameter type	Constraints
Object	optional	One object mandatory.

---

**BPMN Organizational Process**

Like report ["BPMN Business Process"](#), page 186, this report describes an organizational process, its template and its participants, as well as the activities for which each participant is responsible. This analysis also presents exchanges, systems used to support activities and the risks encountered during process execution.

**Report parameters**

Parameter	Parameter type	Constraints
Object	Organizational Process	One object mandatory.

---

**Support of Processes by Applications Table (Statistics)**

This report describes which business applications support business or organizational processes.

An organizational process is considered as supported by an application if this process or one of its sub-processes or one of their operations is connected to this application or to one of its sub-applications or to one of their application services.

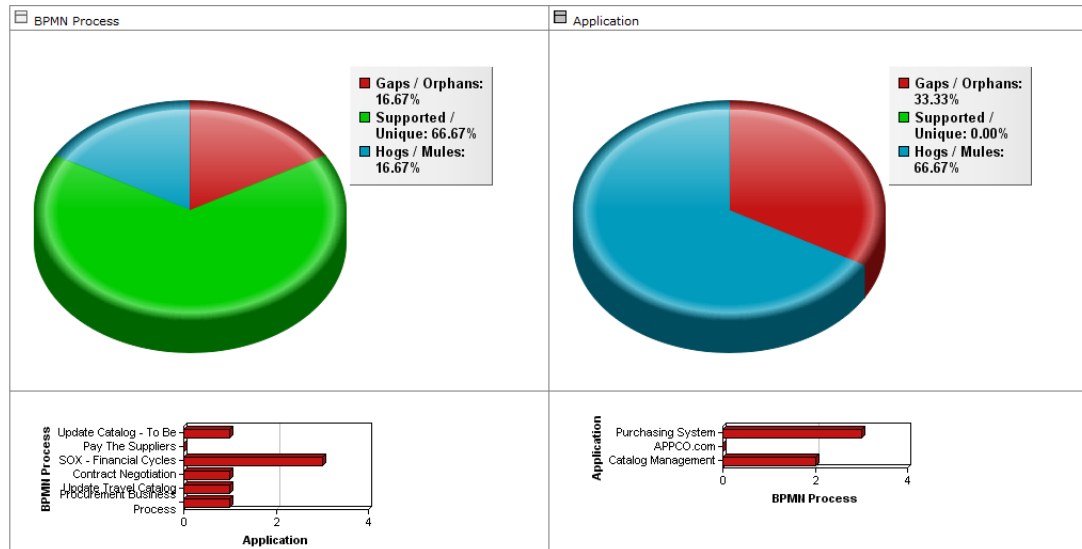
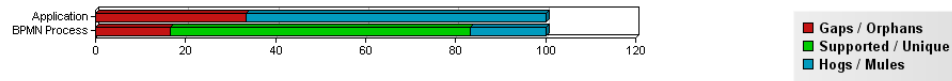
A business process is considered as supported by an application if this business process or one of its sub-processes or one of their organizational processes or one of their sub-processes or one of their operations is connected to this application or to one of its sub-applications or to one of their application services.

In a report of this type, applications are broken down into several categories:

- A process can be supported by zero (Orphan), one (Unique) or several (Mule) applications.
- An application can support zero (Gap), one (Supported) or several (Pivot) processes.

The number of components of each category is presented:

- as stacked bars.
- as pie charts.



### Report parameters

Parameter	Parameter type	Constraints
Processes	Business processes	At least one object mandatory.
Application	Application	At least one object mandatory.

## Managing RACI (BPMN)

This report displays a matrix with org-units in columns and organizational processes operations in rows.

For more details on managing RACI, see ["Consulting reports associated with org-units", page 114.](#)


Cells of this matrix are filled with a letter representing responsibility of the org-unit in the process (or operation):

- (A) for Accountable
- (R) for Responsible
- (R/A) for Responsible/Accountable
- (C) for Consulted
- (I) for Informed

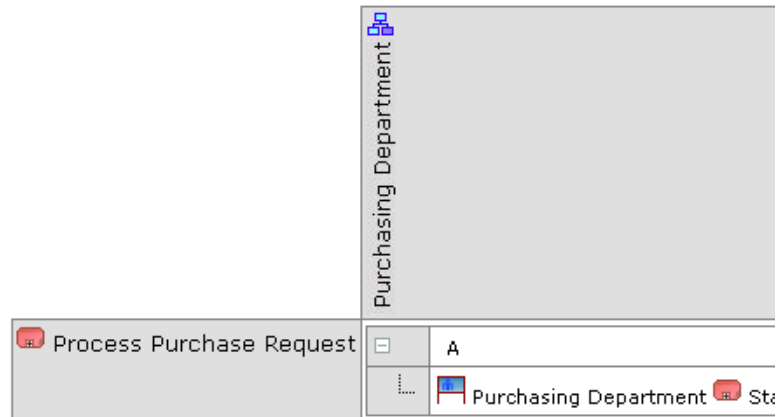
	Finance Department	Customer Satisfaction Department	Sales Department	Sales Rep.
Deliver Vacation Business				
Invoice Customer	(A)			
Vacation Package Booking			(A)	
Vacation Package Delivery		(A)		
Vacation Request Formalization			(A)	

This value can be automatically proposed when a participant assigned to the org-unit executes the operation or organizational process. It can be modified or confirmed by the user.

A warning is displayed when the org-unit executing an operation or responsible for a process is not connected via an intermediary participant to this operation or process.

If you click button , the context of the responsibility of the org-unit is indicated. You can view:

- the name of the participant to which the org-unit is assigned
- the name of the process that is owner of the participant



### Report parameters

Parameter	Parameter type	Constraints
Org-unit (in columns)	Org Unit	At least one object mandatory.
Process (in rows)	Organizational process or operation	At least one object mandatory.

## Business Process RACI Matrix (BPMN)

This report is a matrix presenting the RACI value of org-units presented in columns related to operations and/or organizational processes presented in rows.


The org-units and organizational processes presented are directly connected to business processes specified as parameters.

➡ To generate a matrix to search for organizational processes and operations in depth, you must use report ["Business Process and Sub-Process RACI Matrix \(BPMN\)"](#), page 192.

Cells of this matrix are filled with a letter representing responsibility of the org-unit in the process (or operation):

- (A) for Accountable
- (R) for Responsible
- (R/A) for Responsible/Accountable
- (C) for Consulted
- (I) for Informed

	Finance Department	Customer Satisfaction Department	Sales Department	Sales Rep
Deliver Vacation Business				
Invoice Customer	(A)			
Vacation Package Booking			(A)	
Vacation Package Delivery		(A)		
Vacation Request Formalization			(A)	

If you click button , the context of the responsibility of the org-unit is indicated. You can view:

- the name of the participant to which the org-unit is assigned
- the name of the process that is owner of the participant

	Purchasing Department	
Process Purchase Request	A	
	Purchasing Department	Standard Purchase Process

### Report parameters

Parameter	Parameter type	Constraints
Object	Business process	At least one object mandatory.

## Business Process and Sub-Process RACI Matrix (BPMN)



Like report "[Business Process RACI Matrix \(BPMN\)](#)", [page 190](#), this report describes a matrix presenting the RACI value of org-units presented in columns related to operations and/or organizational processes presented in rows.

The org-units and organizational processes presented are connected to business processes with a depth level specified in parameters.

### Defining matrix depth level

You can choose to increase object query depth.

To define depth level of the matrix:


1. Open the properties of the report.
2. Select the **Parameters** tab.
3. In the **Levels** field, indicate the value that interests you.  
 *If you enter value "2", the matrix will query sub-sub-processes of the selected process. Beyond value "3", the matrix will query all processes located below the selected process, whatever the level.*
4. Click **Apply**.  
 The report is accessible in the **Reports** Tab.  
 *If you modify setting values, remember to refresh the generated report.*

### Report parameters

Parameter	Parameter type	Constraints
Object	Business process	At least one object mandatory.
Level	Integer	

## Organizational Process RACI Matrix (BPMN)

Like report "[Business Process RACI Matrix \(BPMN\)](#)", [page 190](#), this report describes a matrix presenting the RACI value of org-units presented in columns related to organizational processes presented in rows.

 *To generate a matrix to search for organizational processes and operations in depth, you must use report "[Organizational Process and sub-processes RACI Matrix \(BPMN\)](#)", [page 193](#).*

---

## Organizational Process and sub-processes RACI Matrix (BPMN)

Like report "[Business Process and Sub-Process RACI Matrix \(BPMN\)](#)", page 192, this report describes a matrix presenting the RACI value of org-units presented in columns related to operations and/or organizational processes presented in rows.

---

## Org-Unit RACI Matrix (BPMN)

Like report "[Business Process RACI Matrix \(BPMN\)](#)", page 190, this report describes a matrix presenting the RACI value of org-units presented in columns related to operations and organizational processes presented in rows.

This report automatically specifies matrix rows and columns with objects connected to objects specified as parameters.

☛ To generate a matrix to search for organizational processes and operations in depth, you must use report "[Business Process and Sub-Process RACI Matrix \(BPMN\)](#)", page 192.

---

## Org-Unit and owned org-units RACI Matrix (BPMN)

Like report "[Business Process and Sub-Process RACI Matrix \(BPMN\)](#)", page 192, this report describes a matrix presenting the RACI value of org-units presented in columns related to operations and/or organizational processes presented in rows.

The second parameter of this report indicates the number N of the depth level of search for sub-org-units. If this number is not indicated, the complete hierarchy of sub-org-units is specified.

The report searches for all sub-org-units of the given org-unit given as parameter to N levels and adds this org-unit. It presents in columns the org-units found, and in rows the operations or organizational processes associated with these org-units, with the RACI value in the cell.

---

## Business Process Products x Markets Matrix (BPMN)

This report presents products of offers of business process displayed in columns.





Or-units of business process external participants are displayed in rows.

Cells contain offerings of the business process which:

- contain the product of the column,
- have as source or target a business process participant assigned to the org-unit in the row.

This report also displays the business or organizational processes that are source or target of the offering.

☛ For more details on the use of products and offerings, see the guide **MEGA Process BPMN Edition**, "Representing Product Offerings" chapter.

	Quotation	Contract
Private Car Renter		
World@Hand Employee		
HR Manager		
Employer		
World@Hand Vendor	 External Vendor --> Short Term Procurement  Short Term Procurement	 External Vendor --> Short Term Procurement  Short Term Procurement

☛ This matrix is displayed in the **Products x Markets** tab of the business process.

### Report parameters

Parameter	Parameter type	Constraints
Object	Business process	At least one object mandatory.

## Products x Markets Matrix (BPMN)

Like report "[Business Process Products x Markets Matrix \(BPMN\)](#)", page 193, this report presents offerings proposed via products to external org-units presented in columns.

### Report parameters

Parameter	Parameter type	Constraints
Market	Org Unit	At least one market mandatory.
Product	Product	At least one product mandatory.



---

## Business Process Contextualization Matrix (BPMN)

This report is a matrix presenting functional processes of the business process in columns, and organizational processes of the business process in rows. When an organizational process is the implementation of a functional process in a particular context, this is displayed in the cell.

If a contextualization exists between a functional process and an organizational process, it is presented in the corresponding cell.

➤ For more details on the use of contextualizations, see the guide **MEGA Process BPMN Edition**, "Defining Contextualizations" chapter.

### Report parameters

Parameter	Parameter type	Constraints
Object	Business process	At least one object mandatory.

---

## Contextualization Matrix (BPMN)

Like report ["Business Process Contextualization Matrix \(BPMN\)", page 195](#), this report enables identification of contextualizations representing the implementation of organizational processes (specified as parameters and presented in rows) between functional processes (presented in columns).

### Report parameters

Parameter	Parameter type	Constraints
Organizational process	Organizational process	At least one process mandatory.
Functional process	Functional process Activity	

---

## Execution and Performance Heatmap

This report presents, in the form of a matrix, the assessment results of processes.

### Assessed criteria

These characteristics relate to attribute values linked to process performance and execution.

***List of characteristics linked to process performance:***

- **Business Value:** characterizes business value of the object.
- **Effectiveness:** characterizes effectiveness of object operation
- **Risk:** characterizes risks concerning the object.
- **Performance:** this characteristic is a global assessment of process performance. It is calculated from assessment of process business value, effectiveness and risk.

***List of characteristics linked to process execution:***

- **Specification:** assessment of quality of description of the object in the repository.
- **Knowledge:** assessment of knowledge of the object by stakeholders.
- **Support:** assessment of application support of the object.
- **Execution:** this characteristic is a global assessment of object execution. It is calculated from assessment of object specification, knowledge and support.

The results of this report can have two origins:

- the values of attributes linked to the characteristics assessed on objects directly specified as "expert view" by the user  
 ➤ For more details, see ["Expert view assessment", page 198.](#)
- the questionnaires results aggregation that enable to get a value for each attribute connected to assessed characteristics of each object ((**Performance**, **Execution**, for example).  
 ➤ For more details, see ["Assessment by questionnaire", page 198.](#)

## Report presentation

This report is broken down into three parts:

- The first part details the performance assessment heatmaps.

### 2. Performance Heatmaps

[Add a comment for this chapter]

Performance View

Performance x Execution								Business value x Risk							
	N/A	Inefficient	Insufficient	Medium	Good	Very Good	Sum		N/A	Very High	High	Medium	Low	Very Low	Sum
N/A	0	0	0	0	0	0	0.0	N/A	0	0	0	0	0	0	0.0
Very High	1	1	1	1	1	1	6.0	Very High	0	0	0	0	0	0	0.0
High	2	2	2	2	2	2	12.0	High	1	1	1	1	1	1	6.0
Medium	0	0	0	0	0	0	0.0	Medium	2	2	2	2	2	2	12.0
Low	0	0	0	0	0	0	0.0	Low	0	0	0	0	0	0	0.0
Very Low	0	0	0	0	0	0	0.0	Very Low	0	0	0	0	0	0	0.0
Sum	3.0	3.0	3.0	3.0	3.0	3.0		Sum	3.0	3.0	3.0	3.0	3.0	3.0	

Efficiency View

Efficiency x Business value								Efficiency x Risk							
	N/A	Very Low	Low	Medium	High	Very High	Sum		N/A	Very High	High	Medium	Low	Very Low	Sum
N/A	0	0	0	0	0	0	0.0	N/A	0	0	0	0	0	0	0.0
Very High	0	0	0	0	0	0	0.0	Very High	1	1	1	1	1	1	6.0
High	0	0	0	0	0	0	0.0	High	1	1	1	1	1	1	6.0
Medium	2	2	2	2	2	2	12.0	Medium	2	2	2	2	2	2	12.0
Low	0	0	0	0	0	0	0.0	Low	0	0	0	0	0	0	0.0
Very Low	0	0	0	0	0	0	0.0	Very Low	0	0	0	0	0	0	0.0
Sum	2.0	2.0	2.0	2.0	2.0	2.0		Sum	4.0	4.0	4.0	4.0	4.0	4.0	

- The second part details the execution assessment heatmap.  
*The values used for these reports can be obtained in different ways. For more details, see "Expert view assessment", page 198 and "Assessment by questionnaire", page 198.*
- The final part presents geographical distribution of org-units on sites.

## Report parameters

Parameter	Parameter type	Constraints
Object	Business process Organizational process	At least one object mandatory.

## Expert view assessment

In the properties of an organizational process or a business process, the **Assessment** tab allows an expert user to specify values of attributes linked to assessed characteristics.

Properties of Investment Purchase Process (Assessment - Global Assessment)

General Characteristics **Assessment** Operations Flows & Roles Risks Sta

**EXECUTION**

Design : Poor ▼

Knowledge : Medium ▼

IT Support : Very Good ▼

Execution : Good ▼

**PERFORMANCE**

Efficiency : Low ▼

Business Value : Very Low ▼

Risk : Medium ▼

Performance : Low ▼

## Assessment by questionnaire

☛ To access assessment by questionnaire, you must have acquired the **MEGA Assessment** module.

Assessment is carried out using assessment questionnaires. Assessment questionnaires are sent to the appropriate addressees using customizable deployment modes. Results are then aggregates according to predefined rules to present results so they can be used.

☛ For more details on the interface and assessment functions of **MEGA**, see the **MEGA Assessment** guide.

## Questionnaires

☛ To access assessment examples described in this guide, you must have imported data specific to process assessments.

Questionnaires relate to characteristics to be assessed for all processes determined as objects of assessment.

Performance		Assessed Characteristics			Possible Answers					
		Efficiency	Business value	Risk	0	1	2	3	4	5
Business value										
performance indicators are defined and updated according to company objectives.	CPP	x			N/A	No	-	Partially		Yes
What is process contribution to company objectives?	MPP		x	x	N/A	Very Low	Low	Medium	High	Very High
Evaluate the process direct or indirect business value for the company			x		N/A	Very Low	Low	Medium	High	Very High
Identify the degree to which this process meets business needs.	BPM		x			Very Low	Low	Medium	High	Very High
How flexible the process is to satisfy changing business / user requirements.	BPM	x				Not at all	Insufficiently	Medium	Flexible	Very Flexible
How does this process enable you to reach objectives assigned to you?		x				Not at all	-	Partially	-	Fully
Efficiency										
Potential improvement (Cost)	MPP	x			-	Very High	High	Medium	Low	Very Low
Potential improvement (Quality)	MPP	x	x		-	Very High	High	Medium	Low	Very Low
Potential improvement (Delay)	MPP	x			-	Very High	High	Medium	Low	Very Low
Potential improvement (Complexity)	MPP	x		x	-	Very High	High	Medium	Low	Very Low
Are your clients (internal or external) satisfied of process course?		x			-	Not at all	Dissatisfied	Partially Satisfied	Satisfied	Very satisfied
Are your clients (internal or external) satisfied of process results?			x		-	Not at all	Dissatisfied	Partially Satisfied	Satisfied	Very satisfied
Risks										
What is the impact to the process if sustaining applications was not present?	APM			x	N/A	Very High	High	Medium	Low	Very Low
Are risks associated to process execution identified?				x	-	No		Partially	-	Yes
Does risks identified on the process often happen?				x	N/A	Very Often	Often	Sometimes	Rarely	Never
Comments and Attachments										
You can add a comment to justify your answers								Text		
Fill free to add attachments justifying your answers						Business Documents				

## Org-Unit Analysis

This report details the organizational structure, the responsibilities and the sites associated to the org-units specified as parameters.

This report is broken down into three parts:

- The first part details organizational structure of each org-unit specified as parameter. In this part, the org-units analyzed are listed with their type, parent, sub-org-units, persons involved in execution of the tasks associated with the org-unit, including other information related to these















persons. This part also displays statistical data: number of org-units, number of persons.

	Org-Unit Type	Business Person															
 Logistics Department	Structure																
 Car Rental Department	Structure																
 Car Maintenance Department	Structure	<table><tr><th>Name ▾ ▴</th><th>E-mail</th></tr><tr><td>George Edouard</td><td><a href="mailto:George.Edouard@organization.com">George.Edouard@organization.com</a></td></tr></table>		Name ▾ ▴	E-mail	George Edouard	<a href="mailto:George.Edouard@organization.com">George.Edouard@organization.com</a>										
Name ▾ ▴	E-mail																
George Edouard	<a href="mailto:George.Edouard@organization.com">George.Edouard@organization.com</a>																
 Auto Repair Service Manager	Function	<table><tr><th>Name ▾ ▴</th><th>E-mail</th></tr><tr><td>Jack Kcaj</td><td><a href="mailto:Jack.Kcaj@organization.com">Jack.Kcaj@organization.com</a></td></tr><tr><td>Thomas Masoht</td><td><a href="mailto:Thomas.Masoht@organization.com">Thomas.Masoht@organization.com</a></td></tr></table>		Name ▾ ▴	E-mail	Jack Kcaj	<a href="mailto:Jack.Kcaj@organization.com">Jack.Kcaj@organization.com</a>	Thomas Masoht	<a href="mailto:Thomas.Masoht@organization.com">Thomas.Masoht@organization.com</a>								
Name ▾ ▴	E-mail																
Jack Kcaj	<a href="mailto:Jack.Kcaj@organization.com">Jack.Kcaj@organization.com</a>																
Thomas Masoht	<a href="mailto:Thomas.Masoht@organization.com">Thomas.Masoht@organization.com</a>																
 Garage Technician	Function	<table><tr><th>Name ▾ ▴</th><th>E-mail</th></tr><tr><td>Andrew Gilmore</td><td><a href="mailto:andrew.gilmore@oganization.Com">andrew.gilmore@oganization.Com</a></td></tr><tr><td>Jack Filston</td><td><a href="mailto:jack.filston@organization.Com">jack.filston@organization.Com</a></td></tr><tr><td>Mathew Wehtam</td><td><a href="mailto:Mathew.Wehtam@organization.com">Mathew.Wehtam@organization.com</a></td></tr><tr><td>Philéas Phog</td><td><a href="mailto:phileas.phog@organization.Com">phileas.phog@organization.Com</a></td></tr><tr><td>René Dupont</td><td><a href="mailto:rene.dupont@oganization.Com">rene.dupont@oganization.Com</a></td></tr><tr><td>Steve Maglow</td><td><a href="mailto:steve.maglow@oganization.Com">steve.maglow@oganization.Com</a></td></tr></table>		Name ▾ ▴	E-mail	Andrew Gilmore	<a href="mailto:andrew.gilmore@oganization.Com">andrew.gilmore@oganization.Com</a>	Jack Filston	<a href="mailto:jack.filston@organization.Com">jack.filston@organization.Com</a>	Mathew Wehtam	<a href="mailto:Mathew.Wehtam@organization.com">Mathew.Wehtam@organization.com</a>	Philéas Phog	<a href="mailto:phileas.phog@organization.Com">phileas.phog@organization.Com</a>	René Dupont	<a href="mailto:rene.dupont@oganization.Com">rene.dupont@oganization.Com</a>	Steve Maglow	<a href="mailto:steve.maglow@oganization.Com">steve.maglow@oganization.Com</a>
Name ▾ ▴	E-mail																
Andrew Gilmore	<a href="mailto:andrew.gilmore@oganization.Com">andrew.gilmore@oganization.Com</a>																
Jack Filston	<a href="mailto:jack.filston@organization.Com">jack.filston@organization.Com</a>																
Mathew Wehtam	<a href="mailto:Mathew.Wehtam@organization.com">Mathew.Wehtam@organization.com</a>																
Philéas Phog	<a href="mailto:phileas.phog@organization.Com">phileas.phog@organization.Com</a>																
René Dupont	<a href="mailto:rene.dupont@oganization.Com">rene.dupont@oganization.Com</a>																
Steve Maglow	<a href="mailto:steve.maglow@oganization.Com">steve.maglow@oganization.Com</a>																
 Car Park Manager	Function																

- The second part describes responsibilities of org-units. It presents detail of operations executed by the org-units and the processes for which it is responsible. This part also displays statistical data: maximum, minimum

and average value of operations executed per org-unit, as well as equivalent values for assigned processes.

Min. responsibilities per org-unit : 0  
Max. responsibilities per org-unit : 55  
Average number of responsibilities per org-unit : 6,5










Name ▾	Org-Unit Type ▾	Responsibilities
 Catalog Manager Michel Starbrook  The catalog manager is in charge of updating the catalog in compliance with	Function	 Update Catalog - As Is  Update Catalog - To Be  Integrate New Negotiated Travel Option  Integrate Regional Book into Global Catalog  Remove Obsolete Travel Options  Review All Travel Options Validity Dates  Design Text Content  Integrate New Negotiated Travel Options  Integrate Regional Book into Global Catalog  Remove Obsolete Travel Options  Review All Travel Options Validity Dates
 CIO Laurent Valrent	Function	
 CIO - America Andrew Sketch	Function	

- The final part presents geographical distribution of org-units on sites.

### 3. Org-Unit Geographical Distribution



[Add a comment for this chapter]

Name ▾	Sites
 Catalog Manager  The catalog manager is in charge of updating the catalog in compliance with	
 CIO	
 CIO - America	 California
 Clock-In Correspondent	
 Controller  The controller, based at Head Office, audits company accounts and acts as advisor on tax optimization.	
 Customer Service Representative  The Customer Service Representative coordinates customer support pre-sale, during the journey and thereafter if claims arise.	
 Designer  The designer is responsible for the graphical layout of the catalog including position of text and graphics. He's also responsible for creating appropriate graphics to illustrate promotions.	 Agency Site

## Report parameters

Parameter	Parameter type	Constraints
Org-units analyzed	Org Unit	Not mandatory. If no value is given, all org-units are analyzed.

☛ Org-units can be distributed in sub-groups. In this case, statistical values are calculated for each of these.

---

## Site Analysis

This report details the geographical structure of the enterprise.

### ***Report parameters***

Parameter	Parameter type	Constraints
Sites analyzed	Site	Not mandatory. If no value is given, all sites are analyzed.

☛ *Sites can be distributed in sub-groups. In this case, statistical values are calculated for each of these.*



# RISK MANAGEMENT

This paragraph presents the list of reports available from a BPMN process, on condition of having access to the facilities of **HOPEX** concerning risk management.

- ["Absolute Risks Heatmap", page 203](#)
- ["Matrix of Risks Incurred by Org-Units", page 203](#)
- ["Matrix of Risks Concerning Sites", page 204](#)

---

## Absolute Risks Heatmap

This report inventories risks incurred by a set of processes.

Each risk linked to a capability is associated with a level of **Severity** (**Negligible**, **Significant**, **Critical** or **Strategic**) and a level of **Likelihood** (**Low**, **Moderate**, **Probable** or **Frequent**).

This report presents, in the form of a matrix, distribution of risks associated with a list of capabilities related to criteria.

### 2. Absolute Risk Map Report Chapter

[Add a comment for this chapter]

	Insignificant	Significant	Critical	Strategic
High	0	1	1	0
Medium High	0	0	1	2
Medium	1	3	1	1
Low	0	1	0	0

### Report parameters

Subject of this report type is a set of processes.

---

## Matrix of Risks Incurred by Org-Units

This report inventories risks incurred by a set of org-units.

***Report parameters***

Parameter	Parameter type	Constraints
Org-units exposed to risks	Org-Units	At least one object mandatory.
Scope of analyzed risks	Risk	Not mandatory. If no value is given, all risks are analyzed.

**Matrix of Risks Concerning Sites**

This report inventories risks incurred by a set of sites.

***Report parameters***

Parameter	Parameter type	Constraints
Sites exposed to risks	Sites	At least one object mandatory.
Scope of analyzed risks	Risks	Not mandatory. If no value is given, all risks are analyzed.

## DATA MANAGEMENT

This paragraph presents the list of reports available from a BPMN process, on condition of having access to the facilities of **HOPEX** concerning data management.

- ["Recommendation of Entities to be Managed", page 205](#)
- ["Data Models X Associated Elements Matrix", page 205](#)
- ["Data Model Implementation", page 206](#)
- ["Entities and Associations X Data Model Matrix", page 206](#)

---

### Recommendation of Entities to be Managed

Implementation of a process requires management of certain information entities. This information is described either by linking a set of terms to the process, or by associating a data model.

This report is broken down into three parts:

- **Recommended Notions List**, these notions are related to processes analyzed, requiring their storage and management,
- **Recommended Data Models List**, these data models are associated with processes analyzed,
- **Recommended Data Models (Details) List** provides detailed information on data models associated with processes analyzed.

#### *Report parameters*

Parameter	Parameter type	Constraints
Processes	business processes	At least one object mandatory.

---

### Data Models X Associated Elements Matrix

This tool analyzes objects described by data models.

This report is broken down into three parts:

- **Data Models X Associated Elements Matrix**, this part presents all data models cross-referenced with repository described objects (of which

the list is specified as parameter). All data model data is displayed in the report.

- **Recommended Data Models List**, this part presents data models analyzed cross-referenced with repository described objects. All data model data is displayed in the report.
- **All Data Models X Selected Elements**, this part presents repository data models cross-referenced with analyzed described objects. The distinction between objects owned and used enables addition of further information to data modeled by the data model.

### ***Report parameters***

Parameter	Parameter type	Constraints
Data models	Data models	At least one object mandatory.
Associated elements	Application, process, etc.	At least one object mandatory.

---

## **Data Model Implementation**

This report concerns follow-up of correspondence setting between data models. It provides details of correspondence at the level of entities, their attributes and associations. The charts enable display of the rate of progress of correspondences already established.

This report is broken down into two parts:

- **Data Models to be Implemented**,
- **Data Models to be Implemented**

### ***Report parameters***

Parameter	Parameter type	Constraints
Data models	Data models	At least one object mandatory.

---

## **Entities and Associations X Data Model Matrix**

This tool analyzes entities and associations according to data models.

This report is broken down into three parts:

- **Entities and Associations X Data Model Matrix**, data models analyzed are cross-referenced with entities (DM) and associations (DM)

analyzed. The distinction between objects owned and used is displayed in the report.

- **Repository Entities and Associations X Data Model Matrix**, data models analyzed are cross-referenced with all entities (DM) and associations (DM) of the repository. The distinction between objects owned and used enables enhancement of data modeled by the data model analyzed.
- **Entities and Associations X Repository Data Model Matrix**, repository data models analyzed are cross-referenced with entities and associations. The distinction between objects owned and used enables addition of further information to data modeled by the data model.

### ***Report parameters***

Parameter	Parameter type	Constraints
Data models	Data models	At least one object mandatory.



## ANNEXE3 - HOPEX BUSINESS PROCESS ANALYSIS WORKFLOW



This chapter presents **HOPEX Business Process Analysis** workflow diagrams.

- ✓ [HOPEX Business Process AnalysisReview Workflow](#)
- ✓ [Organizational process review workflow](#)

# HOPEX BUSINESS PROCESS ANALYSIS REVIEW

## WORKFLOW

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### Roles on Objects

#### Object owners

The **Owner** is responsible for the following tasks:

- Risk identification
- Replying to questionnaires,
- Defining and implementing action plans
- Validating modifications made by the **Business Architect** in the context of objects review workflows.

Owners exist for:

- Organizational Process
- Value chain
- Business processes
- Organizational units

➡ To specify the owner of a process for example, open the properties of the process, select the **Characteristics** tab and complete the **Owner** field.

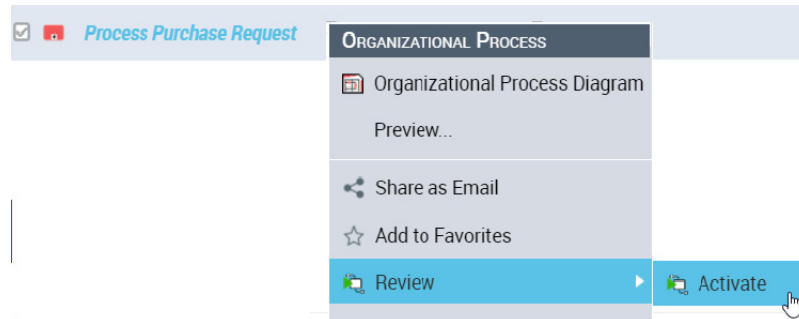
#### Business architect

The business architect is the main user of the solution. Intervenes on the process architecture at each project phase.

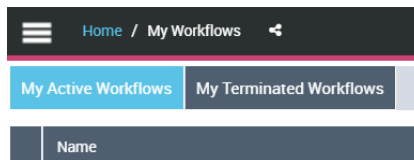


## Activating Process validation Workflow

Commands enabling activation of the different steps of a workflow are accessed from the object itself.



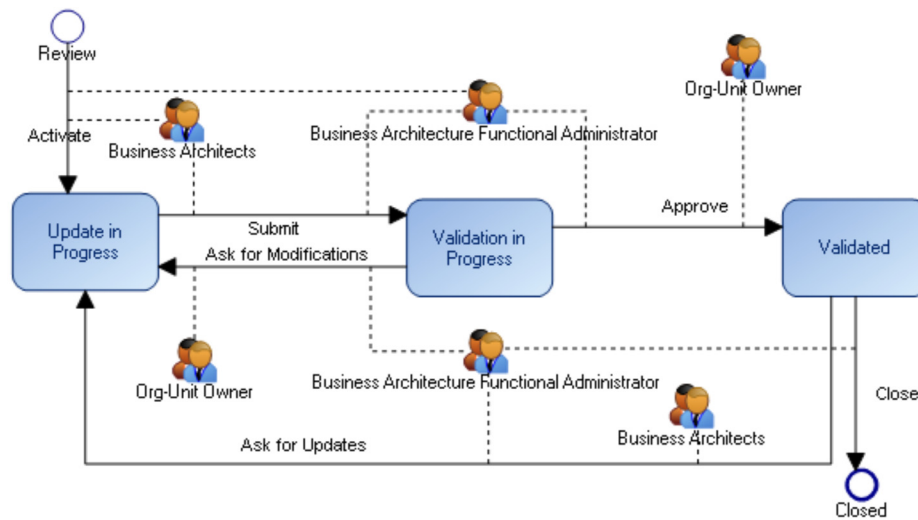
Depending on the status of the workflow associated with the object, the object appears in the desktop of the user who must intervene to modify or validate it.



## ORGANIZATIONAL PROCESS REVIEW WORKFLOW

### Review workflow steps

The steps of the organizational process review process are described diagram below.



### Organizational Process Review Workflow Mails

#### Submit review request

<b>From</b>	Business architect
<b>To</b>	Organizational process owner
<b>Subject</b>	Organizational process to be validated - [Organizational process name]
<b>Content</b>	Sir, Madam, Please validate organizational process: [Organizational process name] To access the application and execute this task, [click here] Comment: [Comment]

## Request modification

<b>From</b>	Organizational process owner
<b>To</b>	Business architect
<b>Subject</b>	Organizational process to be reviewed - [Organizational process name]
<b>Content</b>	Sir, Madam, Please review organizational process: [Organizational process name] Comment: [Comment]

## Notify validation

<b>From</b>	Organizational process owner
<b>To</b>	Business architect
<b>Subject</b>	Organizational process validated - [Organizational process name]
<b>Content</b>	Sir, Madam, This organizational process has been validated: [Organizational process name] Comment: [Comment]

