

# Oracle Fusion Cloud HCM and SCM

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**Extending Redwood Applications  
for HCM and SCM Using Visual  
Builder Studio**

24C



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Extending Redwood Applications for HCM and SCM Using Visual Builder Studio

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# Get Help

There are a number of ways to learn more about your product and interact with Oracle and other users.

## Get Help in the Applications

Use help icons  to access help in the application. If you don't see any help icons on your page, click your user image or name in the global header and select Show Help Icons.

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You can get support at [My Oracle Support](#). For accessible support, visit [Oracle Accessibility Learning and Support](#).

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## Learn About Accessibility

For information about Oracle's commitment to accessibility, visit the [Oracle Accessibility Program](#). Videos included in this guide are provided as a media alternative for text-based topics also available in this guide.

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Thanks for helping us improve our user assistance!



# 1 Overview of Redwood Application Extensions

## Overview of Redwood Application Extension

Redwood applications provide a comprehensive set of features designed to meet a wide range of business requirements. But you can still make changes to your application to best fit your specific business needs.

The primary objectives of this guide are to:

- Help you understand how effectively you can leverage Oracle Visual Builder Studio (VB Studio) functionalities within the Redwood application, thereby streamlining your experience.
- Guide you on how to identify the extensible elements of a page and the corresponding tools to use.

Refer to [VB Studio documentation](#) for detailed instructions on using specific VB Studio features.

## Terminology

Here are some terms to familiarize yourself with before you start extending your pages:

### Common

These terms are common across Oracle Fusion Cloud Human Capital Management (HCM) and Oracle Fusion Cloud Supply Chain & Manufacturing (SCM).

- **Advanced Mode:** An advanced interface in VB Studio where more technical users are presented with all features to tailor Oracle Cloud Applications.
- **Autocomplete:** Generic term to designate the functionality to default and validate field values. It's product agnostic.
- **Built-in Rule:** An Oracle-delivered rule, including localization rules, available for a page.
- **Business Rules:** A feature of Express Mode in VB Studio used to personalize Redwood pages including defaulting and validating field values. Business Rules is page-based.
- **Customization and Extension:** Changes made by a functional administrator at design time that apply at the site level.
- **Dynamic Container:** A predefined area in a page used to display various types of content. A container can be extended to rearrange the existing content, and to add new content.
- **Express Mode:** A simple-to-use interface in VB Studio where functional administrators are presented with only the capabilities they need to tailor Oracle Fusion Cloud Applications pages.
- **Extension Rule:** A rule created within your extension. It corresponds to custom rules in Transaction Design Studio.
- **Initial Field Values and Field Values**
  - Initial Field Value is stored in the database. The initial field value doesn't change for a transaction.
    - Note that the initial field values are page and region-specific. For example, in HCM in the Change and Correct Employment Details processes, the initial field values are available for the assignment attributes but not for salary attributes.

- Field value is the value cached in a page, which may already have been modified by a rule or user.
- Initial field values and field values can be used in conditions and rule logic.
- For example, an HR Specialist reduces an employee's working hours from 40h to 20h. In this case,
  - Initial field value is 40
  - Field value is 20
- **Page Property:** A property value used to control application page behavior. A functional administrator can modify the property value at design time in VB Studio. Each page property has a designated name, description, and type established by Oracle, which can be a number, string, boolean, or array.
- **Personalization:** Changes made by end users to pages at runtime that apply only to themselves and persist for that user each time they sign in to the application. Personalization includes changes based on user behavior (such as changing the width of a column in a table), changes the user chooses to save, such as search parameters, or composer-based personalization, where an end user can redesign aspects of a page.
- **UI Element:** An action button, tab, filter, sort by, table, or any other element of a Redwood page that can be extended depending on the use of the page property. Refer to the page property label and description to understand the role of a page property on a page and the possible values it can take.
- **VB Studio:** VB Studio is a robust application development platform designed to effectively plan and manage work throughout all stages of the application development lifecycle.

## HCM

These terms are specific to HCM.

- **Autocomplete Rules:** A feature of HCM Experience Design Studio used to default and validate field values in responsive pages. Autocomplete Rules is based on business object.
- **Built-in Rule:** An Oracle-delivered rule, including localization rules, available for a page. It corresponds to delivered rules in Transaction Design Studio.
- **Business Rules:** A feature of VB Studio used to control the display of regions and fields on a page. It's the Redwood equivalent of Transaction Design Studio for responsive pages.
- **HCM Experience Design Studio:** The HCM Application extensibility tool to extend responsive pages, which includes Transaction Design Studio and Autocomplete Rules.
- **Transaction Design Studio:** A feature of HCM Experience Design Studio used to control the display of responsive pages.

## Types of Changes

The types of change you can make depend on the pages you're changing.

- **Configuration:** For most of the Redwood pages, the configuration is done in the setup tasks under the Setup and Maintenance work area. For example, you can enable a descriptive flexfield (DFF) on the Manage Descriptive Flexfields page.
- **Application Extension:** These changes are made using VB Studio. For example, you want to show a new descriptive flexfield on a specific page only for a specific country.

## What's Extensible in Redwood Pages

The types of modifications you can make to a Redwood page in VB Studio depends on the page you're modifying. The changes listed in this guide may not be universally available for all Redwood pages.



**Note:** All setup tasks to configure pages that aren't in Redwood, whether global or specific to a product such as Manage Common Lookups and Manage Descriptive Flexfields, remain unchanged unless otherwise specified.

## Considerations for Extending HCM Redwood Pages

- Extensibility is disabled for any dynamic components used in HCM Redwood pages. You must remove any changes made to the layout prior to release 23D.
- The existing validation rules with error from Autocompletes Rules will work in HCM Redwood pages for Change Assignment and Correct Employment Details processes. This won't require modification in existing rules.
  - All rules for all other pages built on the underlying business objects for this page must be disabled when you enable the Redwood page. Note that disabling rules on a business object will disable Autocomplete for both the Redwood and Responsive pages.

### Related Topics

- [Examples of Configuration and Extension, and the Tools to Use](#)

## Express Mode in VB Studio

Redwood applications leverage Express mode in VB Studio to empower your business users to configure processes and ensure data quality. Express mode has 2 key components: Business Rules and Page Properties.

- **Business Rules** includes these sub components:
  - **Configure Fields and Regions** is used to:
    - Leverage delivered best practices, or to create your own rules based on various criteria, such as country and business unit.
    - Make fields and regions required or optional, read-only or editable, and show or hide fields and regions depending on specific criteria.
    - Default field values.
  - **Validate Field Values** is used to ensure data quality.
- **Page Properties** are used to configure Redwood pages to best fit your business needs, for example, hide the evaluation panel in Connections.

Note that default field values and validate field values rules aren't mutually exclusive and can be used both for the same fields to ensure data quality and consistency while improving the user experience. Likewise, defaulting rules and rules to control the display of fields and regions can be combined such as defaulting a date and making the field read-only.

To learn about key terms and concepts in Express mode, refer to the VB Studio documentation.

**Note:** If Express mode isn't available, that means the page isn't ready to be extended in this release.

### Related Topics

- [What Can You Do with Visual Builder Studio in Express Mode?](#)

# Comparison of Express Mode, HCM Experience Design Studio, and Page Composer

Here’s a comparison between Express mode in VB Studio, the HCM Experience Design Studio, and Page Composer.

Our goal is to empower you to make informed decisions and embrace the new possibilities that the HCM Redwood application unlocks for your business.

With the new Express mode in VB Studio, you can apply the same changes previously made in HCM Experience Design Studio and Page Composer, while also introducing a set of new features that improve your productivity. Here are the features available in Express mode.

**Note:** Transaction Design Studio, Autocomplete Rules, and Page Composer only apply to responsive pages and can't be used in the context of Redwood pages.

Category	Extensibility Feature	Express Mode	HCM Experience Design Studio and Page Composer
Control Display			
	Build rule conditions	Build advanced conditions using operators between criterion or a grouping of criterion	Build simple conditions using the AND operator between criterion
	Make a field read-only or editable	Yes New	No
	Make a field required and hidden	Yes New  This can be utilized for all employment flows, for example, where values are copied from the previous assignment to the new one and aren't required to be shown to users.	No
	Make a field required or optional	Yes	Yes
	Hide or show a field	Yes	Yes
	Hide or show DFFs and EFFs	Yes	Yes
	Hide or show UI elements (action button, message, and so on)	Yes	Yes

Category	Extensibility Feature	Express Mode	HCM Experience Design Studio and Page Composer
	Configure guided journeys	Yes	Yes
	Evaluate rules	Yes	Yes
	Rename a region	Yes User Interface Text	Yes
	Reorder regions	Yes Available in Advanced mode If the capability is enabled in the page using page properties or dynamic container.	Yes Page Composer
	Reorder fields	Yes Partially Reordering flexfields for all pages is supported from the setup tasks. Reordering flexfields for only a specific page isn't currently supported.	Yes Page Composer
	Hide or show KFFs	Not currently supported	Yes
	Default field values	Yes Page-specific	Yes
	Validate field values with warning and error	Yes Page-specific	Yes
Usability			
	Activate or deactivate all rules	Yes New	No
	Identify overridden regions (blue dot)	Yes New	No
	Identify overridden attributes (blue dot)	Yes	Yes
	Filter rule, region, and field names	Yes New	No

Category	Extensibility Feature	Express Mode	HCM Experience Design Studio and Page Composer
	Filter rules by region and field with overrides	Yes New	No
	Filter region and field in a rule	Yes New	No
	Only display regions and attributes with overrides	Yes New	No
	Identify number of overrides per region	Yes New	No
	Identify all rules applying to a field or a region	Yes New	No
	Prevent customers to override factory settings	Yes	Yes

*Related Topics*

- [Control Your Display with Business Rules](#)

## Examples of Configuration and Extension, and the Tools to Use

You can configure and extend Redwood applications using different tools.

Let's look at some of the key things you can do with these tools.

### Modify the UI

Use these tools and work areas to modify the UI:

- VB Studio: Extend application page components for certain applications.
- User Interface Text: Edit text that appears on multiple pages.
- Structure: Configure the Navigator and the icons on the home page for navigation.

Here are some changes that you can make to pages, and the corresponding tools or work areas to use.

Task	Subtask	Example	Tool, Setup Task, or Feature	VB Studio Mode	Where to go in VB Studio	Additional Information
Add your own content	Enable guided journey at the page level	Show analytics about a worker's career and salary's progression at the page level on the Employment Info page.	VB Studio	Express	Oracle-delivered page properties	<i>Guided Journeys Configuration Using Page Properties</i>
Add your own content	Enable guided journey at the section level	Show the Seniority Dates policies in the Seniority Dates section on the Employment Info page.	VB Studio	Express	Oracle-delivered page properties	<i>Guided Journeys Configuration Using Page Properties</i>
Add your own content	Add company policies, link to resources, and so on on a page	Publish respective employee announcement by country on the Review Employee Resources page.	VB Studio	Advanced	Oracle-delivered dynamic container	<i>Add Your Own Content Using Dynamic Container</i>
Add your own content	Embed BI report		VB Studio	Express	Oracle-delivered dynamic container	
Add your own content	Enable nudges		VB Studio	Express	Oracle-delivered page properties	
Add your own content	Display the same content on a page or global header for all pages		Not Supported			
Add your own content	Add a message, text, link, action button, and so on in the page or global header		Not Supported			
Add your own content	Embed OTBI report		Not Supported			
Align terminology with your organizational language	Change the content of a Redwood message, page title, and so on		User Interface Text			<i>How You Modify User Interface Text</i>
Align terminology with your organizational language	Change a UI text across all pages, such as to change "employee" to "associate" on all pages where the term "employee" is used		User Interface Text			<i>How You Modify User Interface Text</i>
Align terminology with your organizational language	Translate UI text into a language supported by Oracle		User Interface Text			<i>How You Modify User Interface Text</i>

Task	Subtask	Example	Tool, Setup Task, or Feature	VB Studio Mode	Where to go in VB Studio	Additional Information
Control field display	Show a field	Show the Candidate Email field in the Job Application Preview Key Info for the HR specialist only in the Activity Recruiting Center.	VB Studio	Express	Business Rules	<i>Field and Region Display Control</i>
Control field display	Show a field	Show pronoun in Person Profile panel in Connections.	VB Studio	Express	Oracle-delivered page properties	<i>Customization of Processes Using Page Properties</i>
Control field display	Show descriptive flexfields (DFF) segments	Show people DFF by specific segment for specific roles in the Biographical Info region.	VB Studio	Express	Business Rules	<i>Field and Region Display Control</i>
Control field display	Show extensible flexfield (EFF) contexts	Show the Additional Work Location Info context to capture consultants' work location in the Change Assignment process.	VB Studio	Express	Business Rules	<i>Field and Region Display Control</i>
Control field display	Change a field style (font)	Show the percentage of salary increase in bold and red when it's more than 10%.	Not Supported			
Control field display	Validate a field value	Validate proposed salary basis based on Full Time or Part Time status or Salaried or Hourly value	VB Studio	Express	Business Rules	<i>Validate Field Values</i>
Control field display	Default a field value	Default action reason based on action	VB Studio	Express	Business Rules	<i>Field and Region Display Control</i>
Control field display	Show additional attributes on a page	Show additional bank account attributes on the Payment Method Details page	VB Studio	Express	Business Rules	<i>Control Display of Additional Attributes in Personal Payment Method Details</i>
Control sections display	Hide and show sections	Hide Disabilities for Mexico and France employees on the Personal Details page.	VB Studio	Express	Business Rules	<i>Field and Region Display Control</i>

Task	Subtask	Example	Tool, Setup Task, or Feature	VB Studio Mode	Where to go in VB Studio	Additional Information
Control sections display	Hide and show sections	Hide the Salary History section for a specific business unit in the My Compensation page.	VB Studio	Express	Business Rules	<i>Field and Region Display Control</i>
Control sections display	Make a section required	Make the Payroll section required for France in the Promote and Change Position process.	VB Studio	Express	Business Rules	<i>Field and Region Display Control</i>
Extend UI elements	Reorder tabs	Reorder tabs in Journeys.	VB Studio	Express	Oracle-delivered page properties	<i>Customization of Processes Using Page Properties</i>
Extend UI elements	Hide or show Sort By	Hide a sorting option in Team Learning.	VB Studio	Express	Oracle-delivered page properties	<i>Customization of Processes Using Page Properties</i>
Configure page header	Configure fields displayed in the page header	Show the payroll relationship number or the person number in the page header on the Payment Methods page.	VB Studio	Express	Oracle-delivered page properties	
Control field display	Show a field	Show the account number reverification field on the Payment Methods page	VB Studio	Express	Oracle-delivered page properties	<i>Customization of Processes Using Page Properties</i>
Control icon display	Display add or edit icons	Show the add and edit icons in the National Identifier section, or the edit icon in the Biographical Info section when an employee views his or her own record on the Personal Details page.	VB Studio	Express	Oracle-delivered page properties	<ul style="list-style-type: none"> <li>Show Add Icon in the National Identifiers Section on the Me &gt; Personal Details Page - Set to true to display the national identifier add icon when an employee is viewing their own record.</li> <li>Show Edit Icon in the National Identifiers Section on the Me &gt; Personal Details Page - Set to true</li> </ul>

Task	Subtask	Example	Tool, Setup Task, or Feature	VB Studio Mode	Where to go in VB Studio	Additional Information
						to display the national identifier edit icon when an employee is viewing their own record. <ul style="list-style-type: none"> <li>Show Edit Icon in the Biographical Info Section on the Me &gt; Personal Details Page - Set to true to display the biographical info edit icon when an employee is viewing their own record.</li> </ul>

## Set Up Visual Builder Studio

Before you can start working with Visual Builder Studio to extend your Redwood applications, a systems administrator must complete some initial setup. For instructions, see [Set Up VB Studio to Extend Oracle Cloud Applications](#).



# 2 Working with Configure Fields and Regions

## Field and Region Display Control

You can use Configure Fields and Regions to control field and region display and default field values.

Configure Fields and Regions enables you to:

- Maintain valid data and ensure data quality by reducing errors.
- Build more efficient processes that end users can trust by offering a simple user experience, without having to understand the complexity of policies.
- Make work faster, easier, and more manageable by showing only the relevant, most appropriate content that in turn drives engagement and productivity.

Here's a recap of what you can control at the field and region levels.

Capability	Field	Region
Optional or required	•	• For processes such as Promote and Change Position
Hide or show	•	•
Editable or read-only	•	Not Applicable
Default field values	•	Not Applicable

Business rules offers a user-friendly extensibility tool, enabling professionals and administrators to make changes without the need for extensive programming skills.

### Using Conditions, Simple Expression, Advanced Expression and JavaScript (JS)

You can build simple rules using the condition builder to define when to trigger the defaulting or validation rules.

Use simple expressions to default a value with another field value, or to transform data before assigning the value to a field.

Use advanced expressions in conditions, if:

- The available operators aren't sufficient to write the rule logic.
- You need to transform data. Note that the use of JS in advanced expression is strictly limited to data transformation like substring, day of, and so on.

**Note:** If the **Configure Fields and Regions** button isn't available, that means that the feature isn't supported for the page as yet.

Let's learn how to do these actions conditionally:

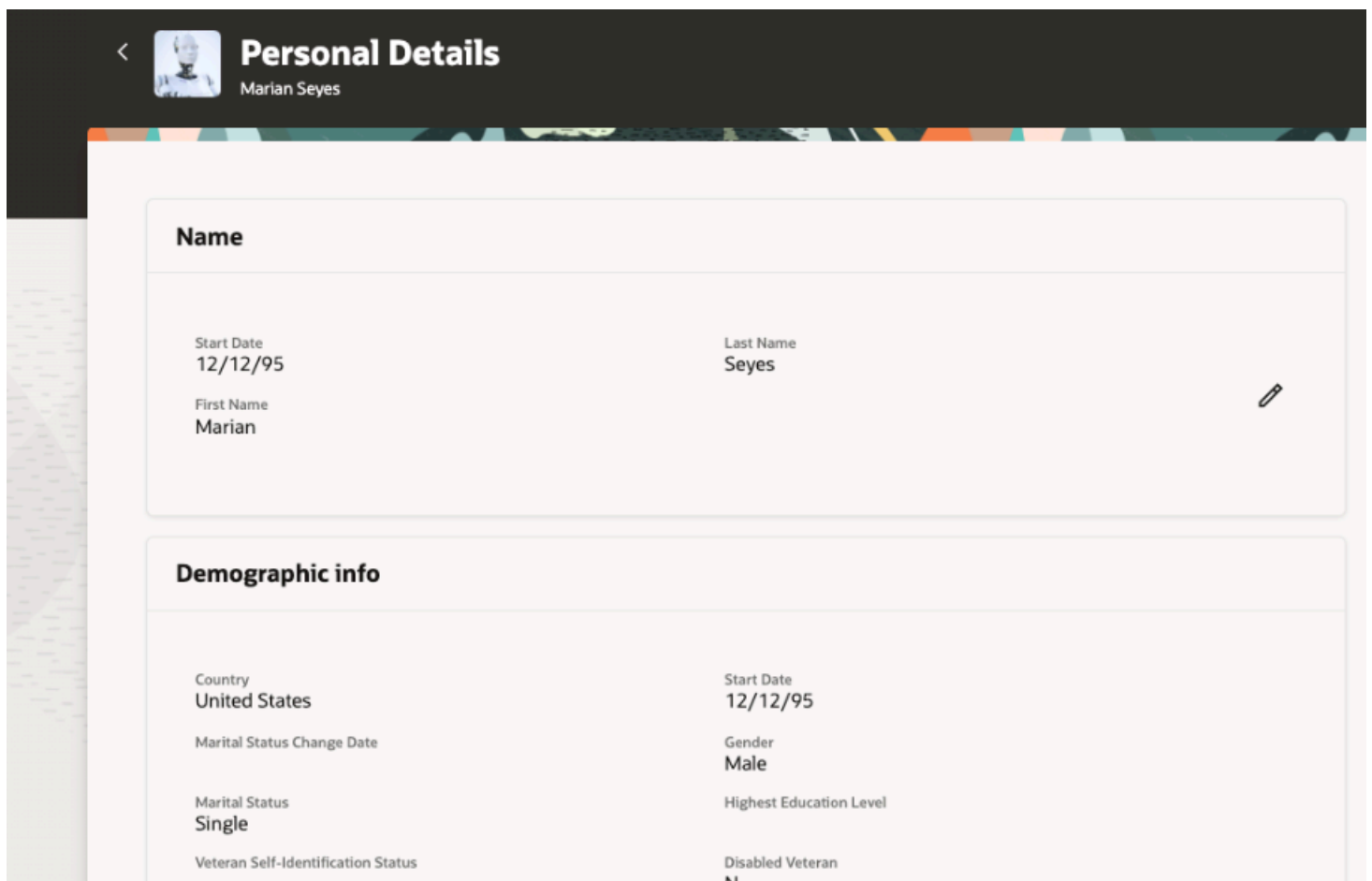
- Hide or show a region
- Hide or show a field
- Make a field read-only
- Hide or show a developer flexfield (DDF) segment
- Hide or show an extensible flexfield (EFF) context

#### Related Topics

- [Control Your Display with Business Rules](#)
- [Understand What Will Be Shown at Runtime](#)
- [Set a Default Value for a Field](#)

## Hide or Show a Region

In this example, you hide the Disabilities region on the Personal Details page for employees in Mexico and France.

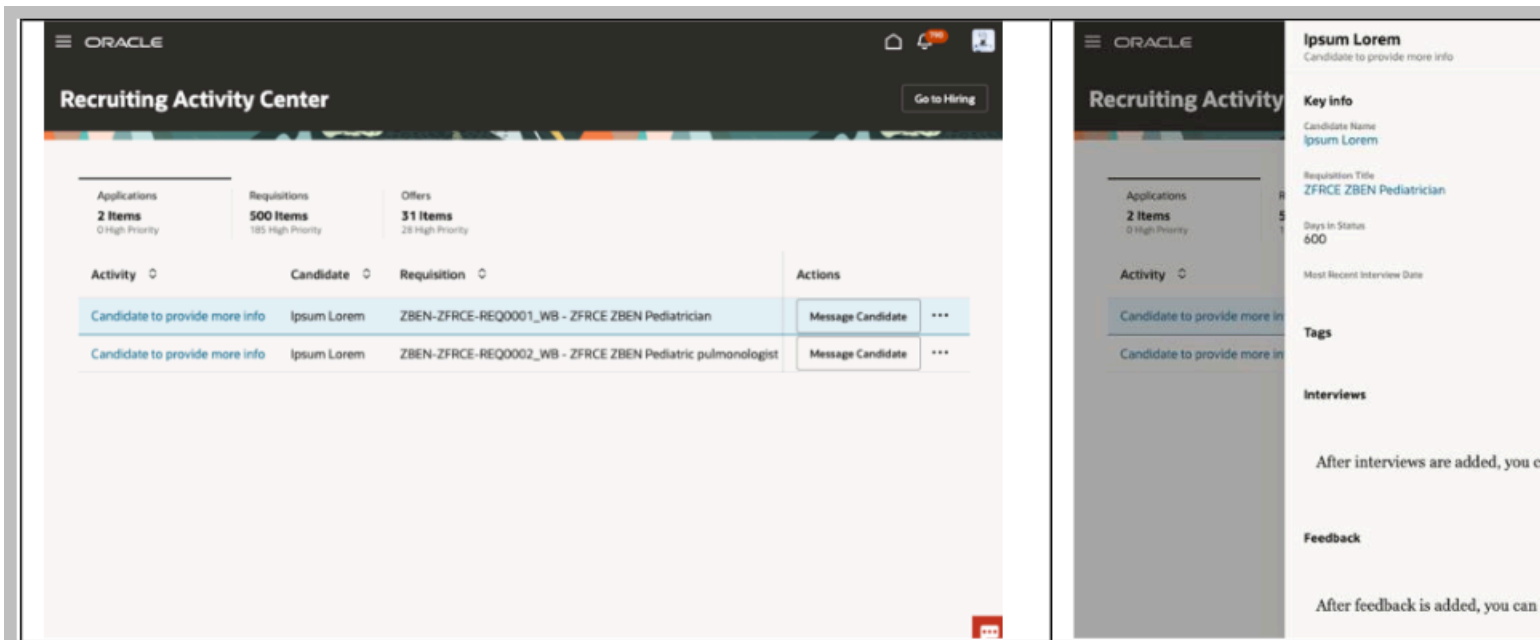


Let's look at the steps to hide the region from business rules.

1. Create or edit a rule.
2. Select **France** and **Mexico** in the **Country** list to define the population for which the rule applies.
3. Search or navigate to the Disability region and set the **Hidden** property to **Hidden** in the Regions and Fields filter.

## Hide or Show a Field

In this example, you show the Candidate Email field in the Job Application Preview Key Info in the Recruiting Activity Center for the HR Specialist only.



Let's look at the steps to show the field from business rules.

1. Create or edit a rule.
2. Select **Human Resource Specialist** in the **User Roles** list to define the population for which the rule applies.
3. Search or navigate to the **Candidate Email** field and set the **Hidden** property to **Visible** in the Regions and Fields filter. Note that the read-only property is specific to some pages and fields and may not be available for all fields on the same page.

## Make a Field Read-Only

In this example, you make the Business Unit field read-only in the When and why step of the Promote and Change Position process.

Promote and Change Position

## When and why

Pramesh Soman, 10030.Software Development Snr Manager

**Information** X

The selected position has existing incumbents

When does the promotion start?  
10/8/23

Whats the way to promote? Required

Why do you want to promote?

How do you want to do this action?  
Move to other position

Business Unit  
Vision Corporation Enterprise

Position  
1001.Operations Vice President

Cancel Continue Submit

Let's look at the steps to make the field read-only from business rules.

1. Create or edit a rule.
2. Define the population for which this rule applies.
3. Search or navigate to the **Business Unit** field and set the **Read Only** property to **Read Only** in the Regions and Fields filter. Note that the read-only property is specific to some pages and fields and may not be available for all fields on the same page.

## Hide or Show a Developer Descriptive Flexfield Segment

In this example, you hide the developer descriptive flexfield (DDF) segment on the Assignment step of the Promote and Change Position process.

Let's look at the steps to hide the DDF flexfield segment from business rules.

1. Create or edit a rule.
2. Define the population for which the rule applies.
3. Search or navigate to the **Business Unit** field and set the **Hidden** property to **Hidden** in the Regions and Fields filter. Note that descriptive flexfields (DFF) and developer flexfields (DDF) are configured similarly as any other fields in business rules.

## Hide or Show an Extensible Flexfield Context

In this example, you show the Assignment Extra Information context in the Additional Assignment Info step of the Promote and Change Position process.

Promote and Change Position

## Additional assignment info

Pramesh Soman, 10030.Software Development Snr Manager

Info Group  
Assignment Extra Information

Assignment Extra Information

Grade Retention Info

### ADP Global Payroll

Type of Transfer

Personnel Area

Employee Group

Company Code

Personnel Subarea

Employee Subgroup

Cancel Continue Submit

Not all context codes are displayed for the Additional Assignment Info and Additional Person Info in their respective Business Rules pages. To view all context codes, you need to **Refresh and Deploy Offline** for each EFF using the Manage Extensible Flexfields page.

Let's look at the steps to show the extensible flexfield context from business rules.

1. Create or edit a rule.
2. Define the population for which the rule applies.
3. Search or navigate to the **Assignment Extra Information** context and set the **Hidden** property to **Visible** in the Regions and Fields filter.

# 3 Working with Field Validations

## Validate Field Values

You can author validation rules (warning and error) only in HCM Redwood pages for a limited list of pages, regions, and fields:

- Global Human Resources
  - Additional Person Info
  - Departments
  - Change Assignment for the following regions only:
    - When and Why
    - Assignment
    - Additional Assignment Info
    - Salary
  - Correct Employment Details accessible from Employment Info supporting the same capabilities and regions as Change Assignment

You can typically use field value validation in these cases:

- **Additional Person Info (EFFs)**
  - Validate the format of a segment to be alphanumeric and exactly composed of 11 characters.
- **Change Assignment and Correct Employment Details**
  - Additional Assignment Info
    - Validate Additional Assignment Info data against existing data in the same single row EFF context.
  - Salary
    - Validate proposed salary basis based on Full Time or Part Time status or Salaried or Hourly value or other assignment attributes.
- **Departments**
  - Validate that Department Set and Location should match.
  - Enforce valid combinations of Department Name and department descriptive flexfield segments.

**Note:** Though this feature is visible for all HCM and SCM Redwood pages yet only the 4 HCM pages listed above are supported.

## Using Fields to Author Your Conditions or Rule Logic, or Both

Fields including initial field values are available at different places in Business Rules when they have been enabled for a region:

- Conditions
- Simple or advanced expressions to write the rule logic, or default a field value, or both

**Note:** Fields that can be used in the conditions, both simple and advanced expressions are limited to the fields and direct attributes available in the page and that are listed in the Regions and Fields section.

## Using Conditions, Simple Expression, Advanced Expression and JavaScript (JS)

You can build simple rules using the condition builder to define when to trigger the defaulting or validation rules.

Use simple expressions to default a value with another field value, or to transform data before assigning the value to a field.

Use advanced expressions in conditions, if:

- The available operators aren't sufficient to write the rule logic.
- You need to transform data. Note that the use of JS in advanced expression is strictly limited to data transformation like substring, day of, and so on.

## Author Validation Messages

You can author validation messages that are displayed at runtime. When you author your messages, ensure that you select at least one target field.

The target field should be:

- A field part of your rule logic.
- A field part of the region where you expect to see the validation message.
- If you are validating a combination of fields part of different regions, it's recommended that you select all fields as target fields.

**Note:** Error and warning are the only two levels of severity supported in business rules for HCM Redwood pages and are page-specific.



# 4 Implementing Defaulting and Validation Rules for HCM Redwood Pages

## Guidelines for Implementing Defaulting and Validation Rules

The implementation guidelines in this topic apply to the supported fields for HCM Redwood pages.

### Additional Person Info

This table lists the supported attributes, implementation recommendations, and exceptions, if any for the Additional Person Info page.

Supported fields	Implementation guidelines
<ul style="list-style-type: none"> <li>conditions</li> <li>field value defaulting</li> <li>field value validation</li> </ul>	
<ul style="list-style-type: none"> <li>Any segment part of a single or multi-rows context</li> <li>Initial field values</li> </ul>	<ul style="list-style-type: none"> <li>Defaulting and validation rules with error only are supported within the same Person EFF context.</li> </ul>

### Change Assignment and Correct Employment Details

This table lists the supported regions, attributes, implementation recommendations, and exceptions, if any for the Change Assignment and Correct Employment Details processes.

Region	Conditions	Field value defaulting	Field value validation	Implementation guidelines
When and Why	<ul style="list-style-type: none"> <li>When and why attributes</li> </ul>	<ul style="list-style-type: none"> <li>Action Reason</li> <li>Action</li> <li>Business Unit</li> </ul>	<ul style="list-style-type: none"> <li>Not supported</li> </ul>	
Assignment	<ul style="list-style-type: none"> <li>When and why attributes</li> <li>Assignment attributes</li> <li>Initial field values</li> </ul>	Aren't supported for defaulting: <ul style="list-style-type: none"> <li>FTE</li> <li>Key flexfields</li> </ul>	<ul style="list-style-type: none"> <li>Not supported</li> </ul>	
Additional Assignment Info (PerAssignmentEITCategory)	<ul style="list-style-type: none"> <li>When and why attributes</li> <li>Assignment attributes</li> </ul>	<ul style="list-style-type: none"> <li>Additional Assignment Info, single or multi-rows context</li> </ul>	<ul style="list-style-type: none"> <li>Additional Assignment Info, single or multi-rows context</li> </ul>	<ul style="list-style-type: none"> <li>Refer to Working with Extensible Flexfields to view all context</li> </ul>

Region	Conditions	Field value defaulting	Field value validation	Implementation guidelines
	<ul style="list-style-type: none"> <li>Additional Assignment Info, single or multi-rows context</li> </ul>			codes in business rules
Salary	<ul style="list-style-type: none"> <li>Assignment attributes</li> </ul>	<ul style="list-style-type: none"> <li>Proposed Salary Basis</li> </ul>	<ul style="list-style-type: none"> <li>Adjustment Amount</li> <li>Adjustment Percentage</li> <li>Next Salary Review Date</li> <li>Proposed Salary Basis</li> <li>Salary Amount</li> </ul>	<ul style="list-style-type: none"> <li>Proposed Salary Basis field must be initialized with the Salary Basis ID, not Name.</li> <li>Initial field values on salary fields aren't supported.</li> </ul>

## Departments

This table lists the supported attributes, implementation recommendations, and exceptions, if any for the Departments page.

Conditions	Field value defaulting	Field value validation	Implementation guidelines
<ul style="list-style-type: none"> <li>ActiveStatus</li> <li>Departments Descriptive Flexfields</li> <li>InternalAddressLine</li> <li>LocationId</li> <li>Name</li> <li>SetCode</li> <li>Title</li> </ul>	<ul style="list-style-type: none"> <li>Departments Descriptive Flexfields</li> <li>InternalAddressLine</li> <li>LocationId Name</li> <li>Title</li> </ul>	<ul style="list-style-type: none"> <li>Departments Descriptive Flexfields</li> <li>InternalAddressLine</li> <li>LocationId</li> <li>Name</li> <li>Title</li> </ul>	These aren't currently supported: <ul style="list-style-type: none"> <li>Defaulting in edit and duplicate flows</li> <li>Attachments</li> <li>Initial field values</li> <li>Defaulting and validation for extensible flexfields</li> </ul>

# 5 Working with Page Properties

## Customization of Processes Using Page Properties

Functional administrators use page properties in Oracle Visual Builder Studio (VB Studio) to extend Redwood pages.

These page properties play a crucial role in extensibility and are used for various purposes, for example, for reordering tabs in Journeys, showing or hiding panels in Connections, or configuring guided journeys. The ability to write expression to conditionally render an element, such as displaying the person pronoun for specific roles only is supported in Express mode.

You can access the list of available page properties for a particular page by navigating to the **Page Properties** pane in the Designer. If the **Page Properties** pane displays the message "We didn't find any extendable page properties on this page", that means that HCM hasn't yet delivered page properties for the page.

It's worth noting many page properties that have been already delivered across various Redwood pages ensuring a diverse range of options to tailor the application to your specific needs.

- Adding your own content to a page or region
- Configuring guided journeys
- Enabling nudges
- Controlling page elements such as sort by, tabs, and field display in some cases

## Connections Profile Extension

Connections enables worker relationships, experiences, and engagement by helping colleagues find each other for easier collaboration.

By default, cards such as About Me or Organization are visible but the person pronoun in the Person Profile card is hidden.

### Hide or Show a Card

Page properties control any card display in Connections. For example, to hide the Experience card deselect the check box of the associated page property **showExperienceCard**.

**Note:** Sometimes a page may not show up in the Page Designer. You can use the Play mode to test your page. Refer to the *Troubleshooting and FAQs* section of the Extending Oracle Cloud Applications with Visual Builder Studio guide for more information.

### Show Person Pronoun in Person Profile

You must configure the Person Name Styles before making the person pronoun in the Connections Profile visible. The person pronoun is stored in a Person Name Information field.

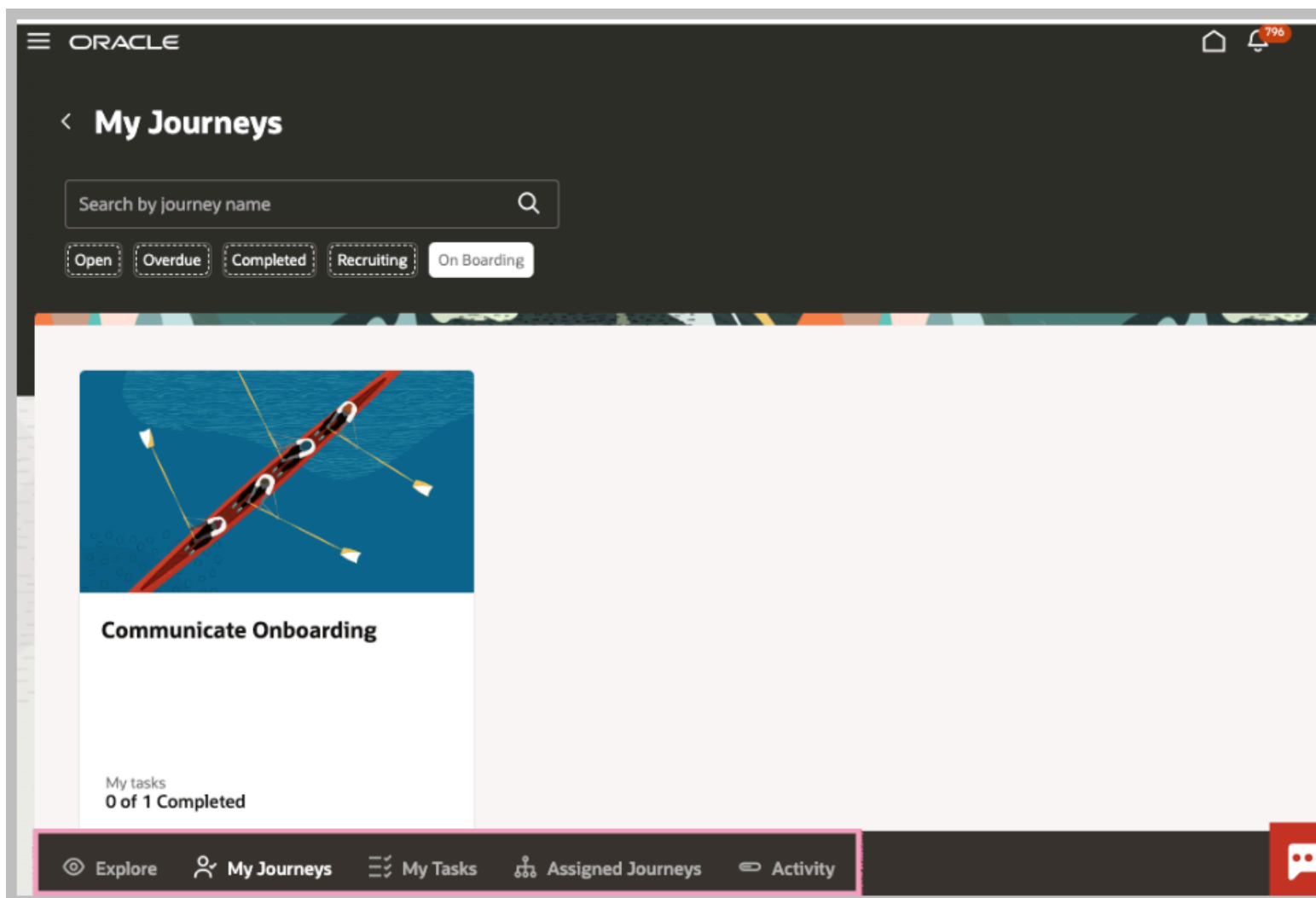
Note that to display the person pronoun in the Connections Profile:

- Store the person pronoun in a Person Name Information 15 to Name Information 30.
- If you need to show the person pronoun in multiple countries, make sure to use the same Person Name Information field for all countries. In this example, Person Name Information 16 is used for all countries.

On the Person Name Styles setup page, add the pronoun to all required countries. After setting the Person Name Styles, you can set the **pronounNameAttribute** page property with the technical name of the Person Information Name where the person pronoun is stored, for example, NameInformation16.

## Control Display of Tabs in My Journeys

In this example, you reorder tabs in My Journeys page using page properties with an array type.



A unique page property is used when tabs are extensible. They control these attributes.

- Display and ordering of each tab that gets displayed, by default. In Journeys, the page property used is **listOfTab**. The default list of tabs shown are Explore, My Journeys, My Tasks, Assigned Journeys, and Activity. The tabs can be reordered or removed by modifying the array.
- The page property description provides you the values expected by the array:
  - {"id": "explore", "icon": "oj-ux-ico-view"}
  - {"id": "myJourneys", "icon": "oj-ux-ico-due-diligence"}
  - {"id": "myTasks", "icon": "oj-ux-ico-progress-list"}
  - {"id": "orgJourneys", "icon": "oj-ux-ico-building"}
  - {"id": "activity", "icon": "oj-ux-ico-progress-linear"}



Let's look at the steps to reorder or remove tabs.

1. Click **+** to add the tabs you want to show in the page using the values provided in the description.
2. Drag and drop to reorder the tabs.
3. Click the delete icon to remove a tab.

## Control Display of Additional Attributes in Personal Payment Method Details

In this example, you enable additional bank account attributes on the Payment Method Details page using page properties.

A unique page property is used for each extensible attribute. These page properties control the visibility of the respective attribute.

The page property description provides information on the purpose and the valid values for the page property. For example, if you want to enable account number reverification field, use the page property "verifyAccountNumber". Let's look at the steps to enable additional attributes.

1. Select the page property corresponding to the attribute that you want to enable.
2. Set the value for the page property.



# 6 Adding Your Own Content in Redwood Pages

## Add Your Own Content in Redwood Pages

Depending on the page and need, you can find different ways to add your own content.

## Guided Journeys Configuration Using Page Properties

A guided journey lets administrators embed tutorials, company policies, and best practices at the page or section level to help users complete tasks more efficiently.

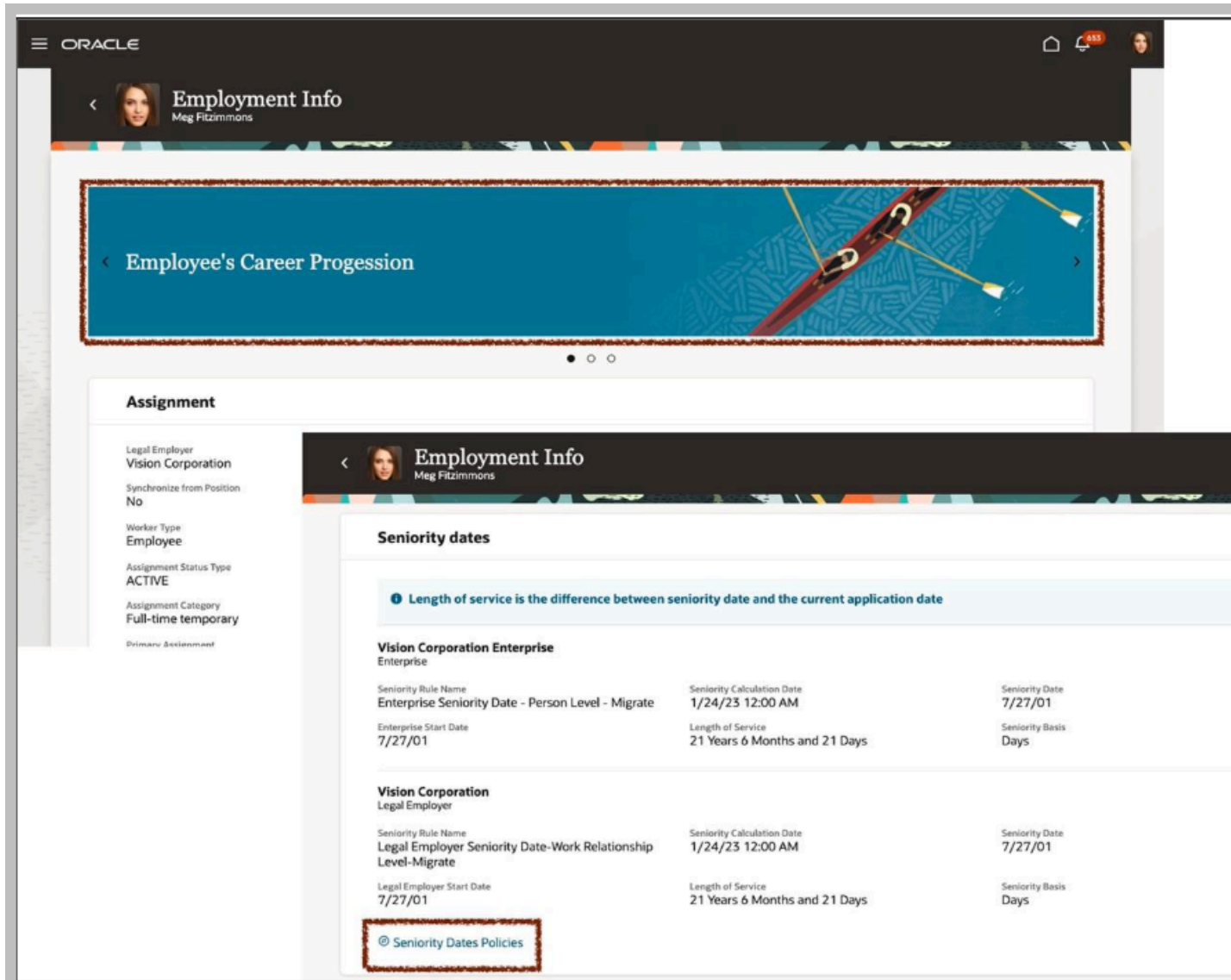
Guided journeys helps your users in doing their HR transactions efficiently by providing guidance such as tutorials, company policies, and best practices using guided journey tasks.

A journey is a collection of tasks that can facilitate a business process, such as analytics, documents, embedded learning, external URLs, manual tasks, questionnaires, reports, and videos.

For example, you want to configure a page-level guided journey for the Employment Info page and a section-level guided journey for the Seniority Dates section. When your HR specialists navigates to the page, they can access:

- Analytics about the worker's career and salary's progression at the page level.

- Policies based on the worker's seniority date at the Seniority date section level.



Use the **Manage Administrator Profile Values** task in the Setup and Maintenance work area to ensure that the `ORA_PER_JOURNEYS_ENABLED` and `ORA_PER_GUIDED_JOURNEYS_ENABLED` profile options are set to Y at the site level. These profile options enable journeys.

You find guided journey code and task codes at **My Client Groups > Employment > Checklist Template** and select the template of the guided journey category you want to use for your page.

To enable guided journeys on your Redwood-enabled pages, navigate to the **Page Properties** section in the Page Designer and find the following page properties with these descriptions:

- Page-Level Journey Page Property - Controls the display of the guided journey at the page level. Set it with the guided journey code available in the checklist template.
- Page-Level Journey Task Page Property- Controls the display of the guided journey tasks at the page level. Set it with the task codes available in the checklist template. Use the comma as separator to display many tasks.



- **Section-Level Journey Page Property**- Controls the display of the guided journey in the <section name> section. Set it with the guided journey code available in the checklist template.
  - Where section name is the region in the page where you want to enable a guided journey.
- **Section-Level Journey Task Page Property**- Controls the display of the guided journey .tasks in the <section name> section, where section name is the region on the page where you want to enable a guided journey. Set it with the task codes available in the checklist template. Use a comma as separator to display many tasks.

In the **Page Properties** section, select each page property to set the guided journey code and task codes.

Enter the default value for the following page properties:

- EI\_GUIDED\_JOURNEY - Controls the display of the guided journey at the page-level:
- ["EMPLOYEE'S\_CAREER\_PROGRESSION","EMPLOYEE'S\_SALARY\_PROGRESSION"] - Controls the display of the guided journey tasks at the page-level:
- EI\_GUIDED\_JOURNEY - Controls the display of the guided journey tasks at the section-level:

For the guided journey tasks, the sequence in which the tasks are listed in the guided journey (checklist) template defines the sequence displayed in the page and section.

**Note:** If the page properties associated with guided journeys aren't available that means that the feature isn't supported for the page as yet.

#### Related Topics

- [Overview of Journeys](#)
- [Control Your Display with Business Rules](#)

## Nudges Configuration Using Page Properties

Nudges remind managers and employees to perform important tasks such as scheduling check-ins, assigning goals and so on.

You can configure nudges to be displayed as cards on pages. When a nudge recipient clicks the card, they are navigated to the specific page where they can complete the task.

You can do these actions:

- Define nudges as transaction cards for your employees and specify the criteria for triggering these nudges.
- Optionally, assign a priority for each nudge. Nudges will be displayed in the order of importance.

This feature ensures that managers and employees perform important tasks in a timely manner. Nudges remind them to act on pending tasks and provide easy navigation to the relevant pages of the application.

For example, some organizations may require managers to perform timely check-ins with their employees. By configuring a nudge, you can remind a manager who wants to view the salary history of an employee that a check-in is overdue. When the manager opens the Employment Info page, a nudge is displayed to schedule a check-in. On clicking the nudge, the manager is directed to the Check-Ins page where a check-in can be scheduled.

To enable nudges in your pages, navigate to the **Page Properties** section in the Page Designer and find the following page property:

- **renderNudges:** This variable controls the rendering of the nudges on this page. Set it to on or off to show and hide nudges respectively.

**Note:** If the page property associated with nudges isn't available that means that the feature isn't supported for the page as yet.

#### Related Topics

- [Overview of Nudges](#)
- [Control Your Display with Business Rules](#)

## Add Your Own Content Using Dynamic Container

You can configure your processes using a dynamic container. Dynamic containers can be utilized in a page for two main purposes:

- **Adding your own content:** With dynamic containers, you can add various types of content to configure your Redwood applications according to your specific needs. Common examples of content include text, images, forms, videos, and more.
- **Reordering regions:** Dynamic containers enable you to rearrange the layout of regions on the page, providing flexibility in organizing the content and optimizing the user experience.

It's important to note that these are the only two scenarios where you need to navigate to the Advanced mode to extend your page. Working with dynamic containers may require users with some technical skills.

**Note:** If dynamic containers aren't available, that means the feature isn't supported for the page as yet.

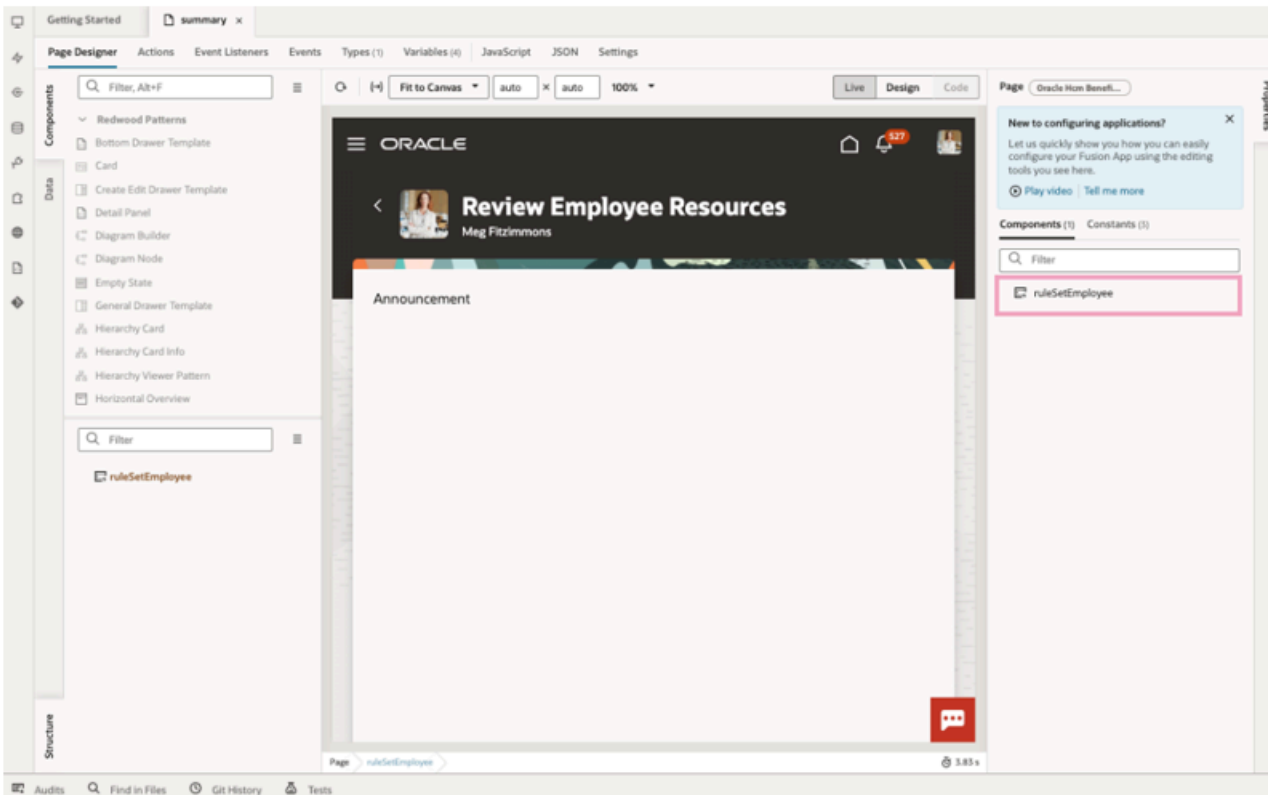
#### Related Topics

- [Customize Dynamic Containers](#)
- [Re-Ordering a Container's Content](#)

## Add Your Own Content in Review Employee Resources

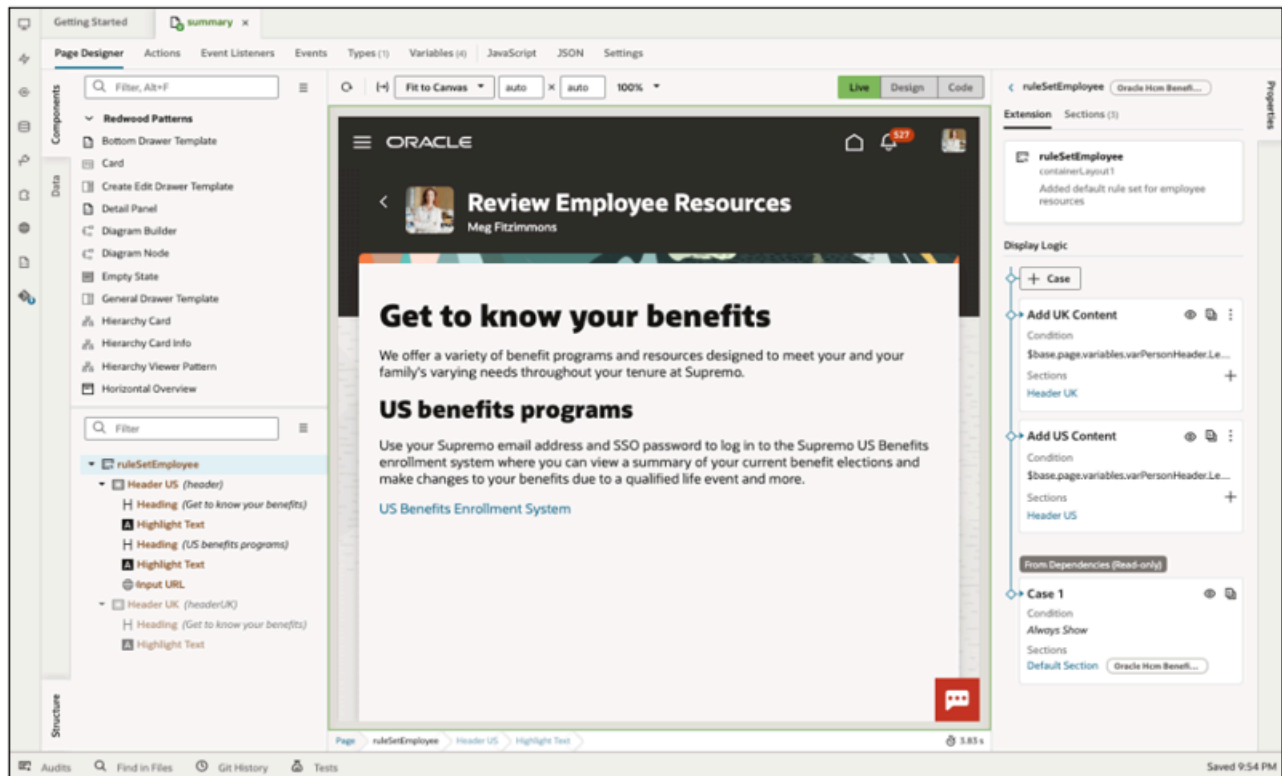
Review Employee Resources is an Oracle Cloud Benefits page where you can add text, documents for policies or procedures, or instructional videos, specific to your enterprise.

By default, the page shows an empty page built with a dynamic container to add your own content.



1. Go to Advanced mode in VB Studio.

2. Click the **ruleSetEmployee** dynamic container in the **Structure** view to add your own content.



- Case 1 is Oracle-delivered. It's in read-only format.
- Refer to the VB documentation to create your own cases, sections, and conditions to show the right content to the right population.

*Related Topics*

- [Customize Dynamic Containers](#)

# 7 Modifying User Interface Text

## How You Modify User Interface Text

User Interface Text is the tool that helps ensure the terminology of your application aligns with the language used within your organization.

If you modify the terminology, such as the page title directly in Oracle Visual Builder Studio (VB Studio), a message is displayed that the customization component doesn't exist for the page. This indicates that VB Studio isn't the appropriate tool for changing your terminology; however, you can still use User Interface Text for this purpose.

### *Related Topics*

- [Tools for Changing Text](#)



## 8 FAQs

### Branding

#### How can I update the branding of the Redwood pages?

Using the Themes page, you can update the branding of your Redwood pages.

*Related Topics*

- [Overview of Configuring Themes and Home Page Settings](#)

### Express Mode and Business Rules

#### How do I know what's extensible in a page?

Configuration is page specific. When you access a Redwood page in Oracle Visual Builder Studio (VB Studio), you can extend it using business rules.

*Related Topics*

- [Express Mode in VB Studio](#)

#### What should I do if Express mode isn't available for my page?

The coverage of VB Studio in Express mode pages is still evolving and is expected to evolve further in the future.

**Note:** Please refrain from making any alterations, even if the Advanced mode option is available for such pages. It's important to note that only changes related to VB Studio in Express mode are supported.

#### Why can't I see business rules for my page?

If you can't see business rules for your page, it means it isn't supported for the page as yet.

## What should I do if the change I need to do on a Redwood page isn't supported?

If the desired change isn't covered in the guide, then use the Customer Connect forum to post queries. Our development team will review and provide guidance.

Use this URL to post your questions on Customer Connect-<https://community.oracle.com/customerconnect/categories/hcm-visual-builder-studio-for-hcm>

## Why do I see the Start Preparing button on the business rules page?

You will see the **Start Preparing** button on the Business Rules page when creating a new rule after selecting Configure Business Rules.

This is to prompt you to migrate any existing layouts from layout(-x).json to metadata-rules(-x).json. This applies to all dynamic layouts in the extension, occurring only once. Click the **Start Preparing** button to load all rules and conditions.

## Delivered Rules for HCM Redwood Pages

### Which release are delivered rules available in business rules?

Delivered rules, such as best practices or localization rules, are introduced as of 24A and are page specific.

## VB Studio

### How do I enable VB Studio?

To learn more about enabling VB Studio, go to [Oracle Help Center](#) > your apps service area of interest > Books > Configuration and Extension.

Before you can start working with VB Studio, a systems administrator must set up the requisite environment.

### Which role is required to access VB Studio?

You must be granted the Human Capital Management Application Administrator role.



## Page Composer and Transaction Design Studio

### Can I customize Redwood pages using Page Composer?

No, you can use Page Composer only for responsive pages.

You need to use Express mode in VB Studio to configure Redwood pages.

### Should I move all my changes from Page Composer to VB Studio?

All extensibility changes done in a responsive page must be done in the Redwood page using Express mode.

### Will configuration done in Transaction Design Studio or Page Composer be available in Redwood pages?

No, you must manually create all rules in business rules for the equivalent Redwood page similar to the rule in Transaction Design Studio.

Similarly, any configuration done using Page Composer must be recreated in the Redwood page using Express mode in VB Studio.

### Do I need a sandbox or Customization Set Migration (CSM) tools for Redwood pages?

No, you won't need these tools. You will be managing extensibility changes as well as deployment or rollbacks using VB Studio.

## Support

### Does Oracle only support changes done in Express mode?

Yes, only changes done in Express mode in VB Studio are supported.

## Migration and Patching

Is there any documentation on Express Mode or Business Rules migration from one instance to another?

Migration from one instance to another is handled within VB Studio. For more information refer to [Set Up the Project to Deploy to Other DEV and TEST Instances](#) documentation.