Oracle

Global Human Resources Cloud
Implementing Global Payroll

Release 13 (update 18B)
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Preface

This preface introduces information sources that can help you use the application.

Using Oracle Applications

Using Applications Help

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. Not all pages have help icons. You can also access Oracle Applications Help.

Watch: This video tutorial shows you how to find help and use help features.

You can also read Using Applications Help.

Additional Resources

- Community: Use Oracle Cloud Customer Connect to get information from experts at Oracle, the partner community, and other users.
- Guides and Videos: Go to the Oracle Help Center to find guides and videos.
- Training: Take courses on Oracle Cloud from Oracle University.

Conventions

The following table explains the text conventions used in this guide.

<table>
<thead>
<tr>
<th>Convention</th>
<th>Meaning</th>
</tr>
</thead>
<tbody>
<tr>
<td>boldface</td>
<td>Boldface type indicates user interface elements, navigation paths, or values you enter or select.</td>
</tr>
<tr>
<td>monospace</td>
<td>Monospace type indicates file, folder, and directory names, code examples, commands, and URLs.</td>
</tr>
<tr>
<td>&gt;</td>
<td>Greater than symbol separates elements in a navigation path.</td>
</tr>
</tbody>
</table>

Documentation Accessibility

For information about Oracle’s commitment to accessibility, visit the Oracle Accessibility Program website.

Videos included in this guide are provided as a media alternative for text-based help topics also available in this guide.
Contacting Oracle

Access to Oracle Support
Oracle customers that have purchased support have access to electronic support through My Oracle Support. For information, visit My Oracle Support or visit Accessible Oracle Support if you are hearing impaired.

Comments and Suggestions
Please give us feedback about Oracle Applications Help and guides! You can send an e-mail to: oracle_fusion_applications_help_ww_grp@oracle.com.
1 About This Guide

Guide Overview

This guide identifies and describes payroll setup tasks for Oracle Global Payroll.

Objectives

This guide supports the implementation team in understanding the following concepts, and the associated requisite setup tasks:

- Payroll concepts
- Geographies and Addresses
- Payroll objects
- Elements, fast formulas, and balances
- Payroll calculation components
- Banking setup and payment methods
- Security profile, auditing, and data validations

For more in-depth information about related tasks, in addition to this guide, the implementation team must refer to the specific resources mentioned in the Other Documents section.

Audience

This guide provides practical end-to-end guidance for Oracle Global Payroll implementation teams. It is assumed that you have working knowledge of the basic principles of payroll and you are familiar with the customary payroll terminology. It is also assumed that you have consulted the following two guides:

- Getting Started with Your Oracle Global Human Resources Cloud Implementation guide to complete your initial setup
- Implementing Global Human Resources guide to complete the related prerequisite tasks required for payroll implementation

Refer the Oracle Applications Cloud Using Functional Setup Manager guide to have a detailed understanding of the Functional Setup Manager and the implementation tasks.

Before you start implementing Global Payroll, it’s imperative that:

- You have the Payroll license
- You have completed the initial setup of the Oracle Fusion application
- You have completed implementing Global Human Resources and the HR-specific tasks required for payroll implementation and processing. For example, setting up requisite jurisdictions for tax reporting.

While this guide is primarily intended for the implementation team, it can also be useful for users who run payroll processes after implementation.
Organization and Format
This guide provides step-by-step information to help you understand payroll concepts, implementation task order, and setup tasks necessary for you to implement Oracle Global Payroll. Specific information regarding the requisite tasks can be found in relevant sections of this document. At the end of each topic are links to related topics. These links help you find additional information available on the Oracle Applications Help.

Other Documents
For more information about generic and related tasks, you must refer to the guides at docs.oracle.com/cloud/latest/globalcs_gs/docs.htm.
2 **Getting Started**

**Setup and Maintenance**

Oracle Functional Setup Manager provides an integrated, end-to-end process for functional administrators to manage the implementation and maintenance of Oracle Applications Cloud.

Functional Setup Manager offers the following:

- Standardized application configuration and setup experience
- Feature opt-in for a best fit configuration
- Flexible processes for managing setup:
  - Setup by functional areas for an adopt-as-you-go approach
  - Implementation projects to manage setup
  - Upload file to enter setup data in bulk
- Guided task list for end-to-end setup requirements
- Export and import services for setup data migration between environments
- Comprehensive reporting on setup data

**Enabling Offerings**

**Opting into New Functional Areas: Procedure**

You can review and adopt new functional areas for your enabled offerings by either:

- Selecting the **Opt In Features** button on the Offerings page for an offering, then selecting the appropriate functional areas you want to implement.

- If you have already implemented the offering, then you can modify the feature selection. Navigate to the Setup and Maintenance work area; select the appropriate offering from the Setup page, and then click **Change Feature Opt In**. Select the appropriate functional areas you want to implement.

**Opting in to Features: Procedure**

To opt in to a feature:

1. First opt in to the functional area containing the feature.
2. Click the **Features** icon to open the Edit Features page.
3. Locate the feature you want to implement on the Edit Features page. If needed, click **Help** to get more details on the functionality that each feature supports.
4. Depending on the feature type, a check box (for Yes/No features) or a Features icon (for single and multiple choice features) displays in the Enable column. Select Enable for the Yes/No feature to be implemented, or click the Features icon and select the choices you want to implement for the corresponding feature. Click Save and Close.

5. Click Done when complete.

Enabling Offerings: Explained

Offerings and their functional areas are presented in an expandable and collapsible hierarchy to facilitate progressive decision making regarding whether or not you want to implement them. An offering or its functional areas can either be opted into or not opted into for implementation. Implementation managers decide which offerings to enable for implementation. Although all of the functional areas that represent core functionality of an offering are automatically enabled for implementation when a parent offering is enabled for implementation, you can select which of the optional functional areas are enabled. You can identify which functionality is already opted into by looking at the check box in the Enable column.

Related Topics
- Configuring Offerings

Configuring Offerings: Procedure

Enable offerings to modify functionality so that it matches the services you plan to implement. You need the Configure Oracle Fusion Applications Offering privilege (ASM_CONFIGURE_OFFERING_PRIV) to enable offerings.

Enable Offerings

To enable offerings, follow these steps:

1. Click Navigator > My Enterprise > Offerings work area.
2. In the Offerings page, select the offering you want to implement.
3. Click the Opt In Features button.
4. In the Opt In page, select the Enable check box for the offering.
5. Review functional area hierarchy. Select the Enable check box to opt into functional areas as applicable to your business operations.
6. Click the Features icon in the Features column for the functional area you enabled to opt into and enable applicable features.
   - Depending on the feature type, a check box for Yes or No features or a Features icon for single and multiple choice features is displayed in the Enable column.
   - To enable a feature, select the check box for Yes or No types or click Features and select the appropriate choices for single and multiple choice features.
7. Click Done when you’re finished to return to the Opt In page.
8. Click Done to return to the Offerings page.

Repeat the same steps for each offering you want to implement or if you must change the opt-in configuration of any functional areas or features of an enabled offering.

Related Topics
- Configuring Offerings
Setup Tasks

Signing In and Accessing Setup Tasks: Procedure

When your test environment is ready, Oracle sends an e-mail to the person designated as the administrator when you signed up for the service. This e-mail includes the link to your service, a temporary password, and instructions on how to access an offering-specific Welcome Note on My Oracle Support (support.oracle.com). You must read this note and follow the instructions before signing in.

Implementation users perform the key setup tasks to start your implementation. As part of your initial setup, add an implementation user, and give them their login credentials and the url for your Oracle Applications. Before you generate task lists, implementors and application users can access setup tasks by searching for the task in the Setup and Maintenance Overview page. After task lists have been generated, users can access their assigned tasks or the task lists for the offerings included in their project. For example, the Define Common Applications Configuration task list for each offering includes the Define Implementation Users tasks.

The following procedure assumes that the administrator has not yet configured an offering and set up task lists.

1. Access your Oracle Cloud Application Services from the link provided by Oracle.
2. Sign in using the administrator user account and password provided by Oracle based on your activation request. Initial sign-in prompts you to reset your password.
3. Access tasks as follows:
   a. Go to Navigator > more... > Tools > Setup and Maintenance.
   b. On the Overview page, click the All Tasks tab.
   c. Search for the task by entering the name in the Search field.
   d. Click Search.
   e. In the search results, perform the task by clicking its name.

Related Topics

- Define Implementation Users Tasks: Points to Consider
- Creating Data Roles for Implementation Users: Procedure

Generating the Setup Task List for HCM: Procedure

To start an implementation of Oracle HCM Cloud Service, you must have an application implementation consultant role. Select an offering to implement and generate the setup tasks. The Service Administrator creates this user. Instructions for how to create this user are included in the post-provisioning notification.

Payroll Managers and Application Implementation Consultants use the Setup and Maintenance work area to open the setup pages associated with the Oracle HCM Cloud Service features. The Setup and Maintenance work area is also known as the Functional Setup Manager.
Generating the Setup Task List

This figure illustrates the offering in which each HCM feature is located.

<table>
<thead>
<tr>
<th>Workforce Deployment</th>
<th>Oracle Fusion Human Capital Management</th>
</tr>
</thead>
<tbody>
<tr>
<td>Workforce Predictions</td>
<td>Global Human Resources</td>
</tr>
<tr>
<td>Workforce Management</td>
<td>Global Payroll and Localizations</td>
</tr>
<tr>
<td>Time and Labor</td>
<td>Global Payroll Interface</td>
</tr>
<tr>
<td>Absence Management</td>
<td>Workforce Reputation Management</td>
</tr>
</tbody>
</table>

<table>
<thead>
<tr>
<th>Workforce Development</th>
<th>Performance Management</th>
</tr>
</thead>
<tbody>
<tr>
<td>Talent Review</td>
<td>Goal Management</td>
</tr>
<tr>
<td></td>
<td>Succession Management</td>
</tr>
</tbody>
</table>

<table>
<thead>
<tr>
<th>Compensation Management</th>
<th>Compensation</th>
<th>Incentive Compensation</th>
<th>Benefits</th>
<th>Total Compensation Statement</th>
</tr>
</thead>
</table>

<table>
<thead>
<tr>
<th>Span Business Processes</th>
<th>Fast Formula</th>
<th>Profile Management</th>
</tr>
</thead>
<tbody>
<tr>
<td></td>
<td></td>
<td>Workforce Directory Management</td>
</tr>
</tbody>
</table>

The following procedure identifies how to generate the setup tasks. The documentation in this list is in the Oracle Applications Cloud Using Functional Setup Manager guide.

1. Sign in to Oracle Cloud Services.
   - Using the Oracle Cloud Services URL, sign in to Oracle Cloud Services as a user with the application implementation consultant role.
   - The Welcome page appears.

2. Go to the Setup and Maintenance work area.
   - Select Setup and Maintenance under the Tools category in the Navigator to go to the Setup and Maintenance work area.

   - On the Getting Started with Oracle Fusion Applications page, view all Oracle Fusion Applications offerings.

4. Analyze implementation requirements of the offerings.
   - Drill down on the Oracle HCM offering of your choice to view a description, documents, and reports related to the offering on the Documents page.

5. Configure offerings.
   - On the Configure Offerings page, configure the offerings of your choice to fit your business requirements.
Expand any offering to find its optional offerings, called Optional Functional Areas. Select all that apply to your organization.

Use the Select Feature Choices page to review optional or alternative business processes. Select all that apply to your enterprise. If you select the Payroll functional area, you must select the appropriate countries as feature choices.

**Note:** To use the Enterprise Structures Configurator, you must Select the Enterprise Structures Guided Flow feature on the Configure Offerings page. This feature is selected by default. Use the feature to set up enterprise structures.

   - Create a new implementation project on the Manage Implementation Projects page to generate setup tasks for a selected offering.

7. Review the generated setup task list.
   - The task list includes the tasks that are relevant to the offerings and optional functional areas that you selected. The most common requirements across all offerings are listed first. Next, the common tasks across product families are shown. Next are common tasks across product offerings. Tasks that are specific to product functionality are listed last.

You can expand the task lists to see the tasks that they contain. For more information about the Functional Setup Manager, see the Oracle Applications Cloud Using Functional Setup Manager guide.

### Implementation Tasks

The table below gives you the list of the task areas you can use to complete your implementation and the roles associated with them.

<table>
<thead>
<tr>
<th>Task Area</th>
<th>Role</th>
<th>Work Area</th>
</tr>
</thead>
<tbody>
<tr>
<td>Defining Enterprise Structures</td>
<td>Application Implementation Consultant</td>
<td>Setup and Maintenance</td>
</tr>
<tr>
<td>Defining Features by Country or Territory</td>
<td>Application Implementation Consultant</td>
<td>Setup and Maintenance</td>
</tr>
<tr>
<td>Manage Currencies</td>
<td>Application Implementation Consultant</td>
<td>Setup and Maintenance</td>
</tr>
<tr>
<td>Defining Elements, Balances, and Formulas</td>
<td>Application Implementation Consultant</td>
<td>Setup and Maintenance</td>
</tr>
<tr>
<td>Managing Data Security</td>
<td>IT Security Manager</td>
<td>Setup and Maintenance</td>
</tr>
<tr>
<td>Define Payroll Business Definitions</td>
<td>Application Implementation Consultant</td>
<td>Setup and Maintenance</td>
</tr>
<tr>
<td>Define Pay Frequency</td>
<td>Application Implementation Consultant</td>
<td>Setup and Maintenance</td>
</tr>
<tr>
<td>Define Earnings and Deductions Definitions</td>
<td>Application Implementation Consultant</td>
<td>Setup and Maintenance</td>
</tr>
<tr>
<td>Define Events</td>
<td>Application Implementation Consultant</td>
<td>Setup and Maintenance</td>
</tr>
</tbody>
</table>
Getting Started

<table>
<thead>
<tr>
<th>Task Area</th>
<th>Role</th>
<th>Work Area</th>
</tr>
</thead>
<tbody>
<tr>
<td>Define Payment Methods</td>
<td>Application Implementation Consultant</td>
<td>Setup and Maintenance</td>
</tr>
<tr>
<td>Define Payroll Costing</td>
<td>Application Implementation Consultant</td>
<td>Setup and Maintenance</td>
</tr>
<tr>
<td>Define Object Groups</td>
<td>Application Implementation Consultant</td>
<td>Setup and Maintenance</td>
</tr>
<tr>
<td>Define Payroll Flow Patterns</td>
<td>Application Implementation Consultant</td>
<td>Setup and Maintenance</td>
</tr>
<tr>
<td>Managing Personal Payroll Information</td>
<td>Payroll Coordinator</td>
<td>Payroll Administration, Payroll Calculation, and Payment Distribution</td>
</tr>
</tbody>
</table>

Related Topics
- Getting Started with an Implementation: Overview
- Entering Setup Data Using Assigned Tasks: Explained
- Creating an Implementation Project: Procedure
- Offering Related Documents: Explained

HCM Data Roles

Role Provisioning and Deprovisioning: Explained

You must provision roles to users. Otherwise, they have no access to data or functions and can't perform application tasks. This topic explains how role mappings control role provisioning and deprovisioning. Use the Manage Role Provisioning Rules or Manage HCM Role Provisioning Rules task to create role mappings.

Role Provisioning Methods
You can provision roles to users:
- Automatically
- Manually
  - Users such as line managers can provision roles manually to other users.
  - Users can request roles for themselves.

For both automatic and manual role provisioning, you create a role mapping to specify when a user becomes eligible for a role.

Role Types
You can provision data roles, abstract roles, and job roles to users. However, for Oracle HCM Cloud users, you typically include job roles in HCM data roles and provision those data roles.
Automatic Role Provisioning

Users acquire a role automatically when at least one of their assignments satisfies the conditions in the relevant role mapping. Provisioning occurs when you create or update worker assignments. For example, when you promote a worker to a management position, the worker acquires the line manager role automatically if an appropriate role mapping exists. All changes to assignments cause review and update of a worker’s automatically provisioned roles.

Role Deprovisioning

Users lose automatically provisioned roles when they no longer satisfy the role-mapping conditions. For example, a line manager loses an automatically provisioned line manager role when he or she stops being a line manager. You can also manually deprovision automatically provisioned roles at any time.

Users lose manually provisioned roles automatically only when all of their work relationships are terminated. Otherwise, users keep manually provisioned roles until you deprovision them manually.

Roles at Termination

When you terminate a work relationship, the user automatically loses all automatically provisioned roles for which he or she no longer qualifies. The user loses manually provisioned roles only if he or she has no other work relationships. Otherwise, the user keeps manually provisioned roles until you remove them manually.

The user who’s terminating a work relationship specifies when the user loses roles. Deprovisioning can occur:

- On the termination date
- On the day after the termination date

If you enter a future termination date, then role deprovisioning doesn’t occur until that date or the day after. The Role Requests in the Last 30 Days section on the Manage User Account page is updated only when the deprovisioning request is created. Entries remain in that section until they’re processed.

Role mappings can provision roles to users automatically at termination. For example, a terminated worker could acquire the custom role Retiree at termination based on assignment status and person type values.

Reversal of Termination

Reversing a termination removes any roles that the user acquired automatically at termination. It also provisions roles to the user as follows:

- Any manually provisioned roles that were lost automatically at termination are reinstated.
- As the autoprovisioning process runs automatically when a termination is reversed, roles are provisioned automatically as specified by current role-provisioning rules.

You must reinstate manually any roles that you removed manually, if appropriate.

Date-Effective Changes to Assignments

Automatic role provisioning and deprovisioning are based on current data. For a future-dated transaction, such as a future promotion, role provisioning occurs on the day the changes take effect. The Send Pending LDAP Requests process identifies future-dated transactions and manages role provisioning and deprovisioning at the appropriate time. These role-provisioning changes take effect on the system date. Therefore, a delay of up to 24 hours may occur before users in other time zones acquire their roles.
Creating HCM Data Roles for Global Payroll Implementation Users: Procedure

If you have licensed the Oracle Fusion Global Payroll Cloud Service, then you create the following HCM data roles:

- PayrollAdmin_ViewAll
- PayrollMgr_ViewAll

This topic explains how to create these roles using the Assign Security Profiles to Role task.

Creating the PayrollAdmin_ViewAll Data Role

If you’re already on the Manage Data Roles and Security Profiles page, then follow this procedure from step 2. Otherwise, sign in as the TechAdmin user and follow these steps:

1. In the Setup and Maintenance work area, go to the following:
   - Functional Area: Users and Security
   - Task: Assign Security Profiles to Role

2. In the Search Results section of the Manage Data Roles and Security Profiles page, click **Create**.
3. Complete the fields on the Create Data Role: Select Role page as shown in the following table.

<table>
<thead>
<tr>
<th>Field</th>
<th>Value</th>
</tr>
</thead>
<tbody>
<tr>
<td>Data Role Name</td>
<td>PayrollAdmin_ViewAll</td>
</tr>
<tr>
<td>Job Role</td>
<td>Payroll Administrator</td>
</tr>
</tbody>
</table>

4. Click **Next**.
5. In the sections of the Create Data Role: Security Criteria page, select the predefined security profiles shown in this table.

<table>
<thead>
<tr>
<th>Section</th>
<th>Security Profile</th>
</tr>
</thead>
<tbody>
<tr>
<td>Organization</td>
<td>View All Organizations</td>
</tr>
<tr>
<td>Position</td>
<td>View All Positions</td>
</tr>
<tr>
<td>Legislative Data Group</td>
<td>View All Legislative Data Groups</td>
</tr>
<tr>
<td>Person</td>
<td>View All People</td>
</tr>
<tr>
<td>Document Type</td>
<td>View All Document Types</td>
</tr>
<tr>
<td>Payroll</td>
<td>View All Payrolls</td>
</tr>
<tr>
<td>Payroll Flow</td>
<td>View All Flows</td>
</tr>
</tbody>
</table>


Creating the PayrollMgr_ViewAll Data Role

Follow these steps:

1. In the Search Results section of the Manage Data Roles and Security Profiles page, click **Create**.
2. Complete the fields on the Create Data Role: Select Role page as shown in the following table.

<table>
<thead>
<tr>
<th>Field</th>
<th>Value</th>
</tr>
</thead>
<tbody>
<tr>
<td>Data Role Name</td>
<td>PayrollMgr_ViewAll</td>
</tr>
<tr>
<td>Job Role</td>
<td>Payroll Manager</td>
</tr>
</tbody>
</table>

3. Click **Next**.
4. In the sections of the Create Data Role: Security Criteria page, select the predefined security profiles shown in this table.

<table>
<thead>
<tr>
<th>Section</th>
<th>Security Profile</th>
</tr>
</thead>
<tbody>
<tr>
<td>Organization</td>
<td>View All Organizations</td>
</tr>
<tr>
<td>Position</td>
<td>View All Positions</td>
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<tr>
<td>Legislative Data Group</td>
<td>View All Legislative Data Groups</td>
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<tr>
<td>Person</td>
<td>View All People</td>
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<td>Document Type</td>
<td>View All Document Types</td>
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<tr>
<td>Payroll</td>
<td>View All Payrolls</td>
</tr>
<tr>
<td>Payroll Flow</td>
<td>View All Flows</td>
</tr>
</tbody>
</table>

5. Click **Review**.
6. On the Create Data Role: Review page, click **Submit**.
7. On the Manage Data Roles and Security Profiles page, search for the PayrollMgr_ViewAll data role to confirm that it exists.

**Related Topics**
- Creating HCM Data Roles for Implementation Users: Explained
Security Profiles

HCM Security Profiles: Explained

Security profiles identify instances of Human Capital Management (HCM) objects. For example, a person security profile identifies one or more Person objects, and a payroll security profile identifies one or more Payroll objects. This topic describes how to create and use security profiles and identifies the HCM objects that need them. To manage security profiles, you must have the IT Security Manager job role.

Use of HCM Security Profiles

You include security profiles in HCM data roles to identify the data that users with those roles can access. You can also assign security profiles directly to abstract roles, such as employee. However, you’re unlikely to assign them directly to job roles, because users with same job role usually access different sets of data.

HCM Object Types

You can create security profiles for the following HCM object types:

- Person
  - Managed Person
  - Public Person
- Organization
- Position
- Legislative Data Group (LDG)
- Country
- Document Type
- Payroll
- Payroll Flow

Two uses exist for the person security profile because many users access two distinct sets of people.

- The Managed Person security profile identifies people you can perform actions against.
- The Public Person security profile identifies people you can search for in the worker directory.

This type of security profile also secures some lists of values. For example, the Change Manager and Hire pages include a person list of values that the public person security profile secures. The person who’s selecting the manager for a worker may not have view access to that manager through a managed person security profile.

Security Criteria in HCM Security Profiles

In a security profile, you specify the criteria that identify data instances of the relevant type. For example, in an organization security profile, you can identify organizations by organization hierarchy, classification, or name. All criteria in a security profile apply. For example, if you identify organizations by both organization hierarchy and classification, then only organizations that satisfy both criteria belong to the data instance set.
Access to Future-Dated Objects

By default, users can’t access future-dated organization, position, or person objects.

To enable access to future-dated:

- Organizations, select the Include future organizations option in the organization security profile
- Positions, select the Include future positions option in the position security profile
- Person records, select the Include future people option in the person security profile

Security Profile Creation

You can create security profiles either individually or while creating an HCM data role. For standard requirements, it’s more efficient to create the security profiles individually and include them in appropriate HCM data roles.

To create security profiles individually, use the relevant security profile task. For example, to create a position security profile, use the Manage Position Security Profile task in the Setup and Maintenance or Workforce Structures work area.

Security profiles that provide view-all access are predefined.

Reuse of Security Profiles

Regardless of how you create them, all security profiles are reusable.

You can include security profiles in other security profiles. For example, you can include an organization security profile in a position security profile to secure positions by department or business unit. One security profile inherits the data instance set defined by another.

Related Topics

- Predefined HCM Security Profiles: Explained
- Creating HCM Data Roles and Security Profiles: Points to Consider

Creating Payroll Security Profiles: Examples

These examples illustrate different methods you can use to provide access to payrolls for members of the Payroll department. You first organize your payroll definitions into appropriate payroll security profiles using the Manage Payroll Security Profiles task. Then you use the Assign Security Profiles to Role task to select the security profiles included in an HCM data role that you provision to a user.

Payroll Period Type

Using a payroll security profile to organize payroll definitions by payroll period type is the most common example. You create one security profile for monthly payrolls, another for semimonthly payrolls, and so on.

Regional Assignments

You can use payroll security profiles to group payrolls by the regions of the target employees’ work areas. For example, you can create one for Canadian facilities and another for European facilities.
Individual Contributors

Your company requires that payroll managers access only the payroll definitions that they manage. In this scenario, the payroll security profile includes only those payrolls.

FAQ for Payroll Data Roles

How do I provision HCM data roles to users?

On the Create Role Mapping page, create a role mapping for the role.

Select the Autoprovision option to provision the role automatically to any user whose assignment matches the mapping attributes.

Select the Requestable option if any user whose assignment matches the mapping attributes can provision the role manually to other users.

Select the Self-Requestable option if any user whose assignment matches the mapping attributes can request the role.
3 Understanding Payroll Concepts

Enterprise Structures

Enterprise Structures: Overview

Oracle Fusion Applications have been designed to ensure your enterprise can be modeled to meet legal and management objectives. The decisions about your implementation of Oracle Fusion Applications are affected by your:

- Industry
- Business unit requirements for autonomy
- Business and accounting policies
- Business functions performed by business units and optionally, centralized in shared service centers
- Locations of facilities

Every enterprise has three fundamental structures that describe its operations and provide a basis for reporting.

- Legal
- Managerial
- Functional

In Oracle Fusion, these structures are implemented using the chart of accounts and organization hierarchies. Many alternative hierarchies can be implemented and used for reporting. You are likely to have one primary structure that organizes your business into:

- Divisions
- Business Units
- Departments

Align these structures with your strategic objectives.
This figure illustrates a grid with Business Axis, representing the enterprise division, Legal Axis representing the companies, and the Functional Axis representing the business functions.

Legal Structure

The figure illustrates a typical group of legal entities, operating various business and functional organizations. Your ability to buy and sell, own, and employ comes from your charter in the legal system. A corporation is:

- A distinct legal entity from its owners and managers.
- Owned by its shareholders, who may be individuals or other corporations.
Many other kinds of legal entities exist, such as sole proprietorships, partnerships, and government agencies.

A legally recognized entity can own and trade assets and employ people in the jurisdiction in which the entity is registered. When granted these privileges, legal entities are also assigned responsibilities to:

- Account for themselves to the public through statutory and external reporting.
- Comply with legislation and regulations.
- Pay income and transaction taxes.
- Process value added tax (VAT) collection on behalf of the taxing authority.

Many large enterprises isolate risk and optimize taxes by incorporating subsidiaries. They create legal entities to facilitate legal compliance, segregate operations, optimize taxes, complete contractual relationships, and isolate risk. Enterprises use legal entities to establish their enterprise's identity within the laws of each country in which their enterprise operates.

The figure illustrates:

- A separate card represents a series of registered companies.
- Each company, including the public holding company, InFusion America, must be registered in the countries where they do business.
- Each company contributes to various divisions created for purposes of management reporting. These are shown as vertical columns on each card.

For example, a group might have a separate company for each business in the United States (US), but have its United Kingdom (UK) legal entity represent all businesses in that country.

The divisions are linked across the cards so that a business can appear on some or all of the cards. For example, the air quality monitoring systems business might be operated by the US, UK, and France companies. The list of business divisions is on the Business Axis.

Each company's card is also horizontally striped by functional groups, such as the sales team and the finance team. This functional list is called the Functional Axis. The overall image suggests that information might, at a minimum, be tracked by company, business, division, and function in a group environment. In Oracle Fusion Applications, the legal structure is implemented using legal entities.

Management Structure

Successfully managing multiple businesses requires that you segregate them by their strategic objectives, and measure their results. Although related to your legal structure, the business organizational hierarchies do not have to be reflected directly in the legal structure of the enterprise. The management structure can include divisions, subdivisions, lines of business, strategic business units, profit, and cost centers. In the figure, the management structure is shown on the Business Axis. In Oracle Fusion Applications, the management structure is implemented using divisions and business units as well as being reflected in the chart of accounts.

Functional Structure

Straddling the legal and business organizations is a functional organization structured around people and their competencies. For example, sales, manufacturing, and service teams are functional organizations. This functional structure is represented by the Functional Axis in the figure. You reflect the efforts and expenses of your functional organizations directly on the income statement. Organizations must manage and report revenues, cost of sales, and functional expenses such as research and development and selling, general, and administrative expenses. In Oracle Fusion Applications, the functional structure is implemented using departments and organizations, including sales, marketing, project, cost, and inventory organizations.
Legal Entities

A legal entity is a recognized party with rights and responsibilities given by legislation.

Legal entities have the following rights and responsibilities to:

- Own property
- Trade
- Repay debt
- Account for themselves to regulators, taxation authorities, and owners according to rules specified in the relevant legislation

Their rights and responsibilities may be enforced through the judicial system. Define a legal entity for each registered company or other entity recognized in law for which you want to record assets, liabilities, expenses and income, pay transaction taxes, or perform intercompany trading.

A legal entity has responsibility for elements of your enterprise for the following reasons:

- Facilitating local compliance
- Minimizing the enterprise’s tax liability
- Preparing for acquisitions or disposals of parts of the enterprise
- Isolating one area of the business from risks in another area. For example, your enterprise develops property and also leases properties. You could operate the property development business as a separate legal entity to limit risk to your leasing business.

The Role of Your Legal Entities

In configuring your enterprise structure in Oracle Fusion Applications, the contracting party on any transaction is always the legal entity. Individual legal entities:

- Own the assets of the enterprise
- Record sales and pay taxes on those sales
- Make purchases and incur expenses
- Perform other transactions

Legal entities must comply with the regulations of jurisdictions, in which they register. Europe now allows for companies to register in one member country and do business in all member countries, and the US allows for companies to register in one state and do business in all states. To support local reporting requirements, legal reporting units are created and registered.

You are required to publish specific and periodic disclosures of your legal entities' operations based on different jurisdictions' requirements. Certain annual or more frequent accounting reports are referred to as statutory or external reporting. These reports must be filed with specified national and regulatory authorities. For example, in the United States (US), your publicly owned entities (corporations) are required to file quarterly and annual reports, as well as other periodic reports, with the Securities and Exchange Commission (SEC), which enforces statutory reporting requirements for public corporations.

Individual entities privately held or held by public companies do not have to file separately. In other countries, your individual entities do have to file in their own name, as well as at the public group level. Disclosure requirements are diverse. For example, your local entities may have to file locally to comply with local regulations in a local currency, as well as being included in your enterprise's reporting requirements in different currency.

A legal entity can represent all or part of your enterprise’s management framework. For example, if you operate in a large country such as the United Kingdom or Germany, you might incorporate each division in the country as a separate legal
entity. In a smaller country, for example Austria, you might use a single legal entity to host all of your business operations across divisions.

What's a legal employer?

A legal employer is a legal entity that employs workers. You define a legal entity as a legal employer in the Oracle Fusion Legal Entity Configurator.

The legal employer is captured at the work relationship level, and all assignments within that relationship are automatically with that legal employer. Legal employer information for worker assignments is also used for reporting purposes.

Legislative Data Groups

Legislative data groups are a means of partitioning payroll and related data. At least one legislative data group is required for each country where the enterprise operates. Each legislative data group is associated with one or more payroll statutory units. Each payroll statutory unit can belong to only one legislative data group.

Payroll-related information, such as elements, is organized by legislative data group. Each legislative data group:

- Marks a legislation in which payroll is processed.
- Is associated with a legislative code, currency, and its own cost allocation key flexfield structure.
- Is a boundary that can share the same set up and still comply with the local laws.
- Can span many jurisdictions as long as they are within one country.
- Can contain many legal entities that act as payroll statutory units.

Payroll Statutory Units

Payroll statutory units are legal entities that are responsible for paying workers, including the payment of payroll tax and social insurance. A payroll statutory unit can pay and report on payroll tax and social insurance on behalf of one or many legal entities, depending on the structure of your enterprise. For example, if you are a multinational, multiple company enterprise, then you register a payroll statutory unit in each country where you employ and pay people. You can optionally register a consolidated payroll statutory unit to pay and report on workers across multiple legal employers within the same country. You associate a legislative data group with a payroll statutory unit to provide the correct payroll information for workers.

Planning Legal Reporting Units: Points to Consider

Each of your legal entities has at least one legal reporting unit. Some legal reporting units can also be referred to as establishments. You can define either domestic or foreign establishments. Define legal reporting units by physical location, such as sales offices. For example, set up legal reporting units to represent your company and its offices for tax reporting.

Planning Legal Reporting Units

Plan and define your legal reporting units at both the local and national levels if you operate within the administrative boundaries of a jurisdiction that is more granular than country. For example, your legal entity establishes operations in a country that requires reporting of employment and sales taxes locally as well as nationally. Therefore, you need more than
one legally registered location to meet this legal entity’s reporting requirements in each local area. Additionally, legal entities in Europe operate across national boundaries, and require you to set up legal reporting units for the purposes of local registration in each country. There can be multiple registrations associated with a legal reporting unit. However, only one identifying registration can be defined by the legal authority used for the legal entity or legal reporting unit and associated with the legal reporting unit.

What's a tax reporting unit?

Use a tax reporting unit to group workers for the purpose of tax and social insurance reporting. A tax reporting unit is the Oracle Fusion Human Capital Management (HCM) version of the legal reporting unit in Oracle Fusion Applications.

To create a tax reporting unit, you use the Oracle Fusion Legal Entity Configurator to define a legal entity as a payroll statutory unit. When you identify a legal entity as a payroll statutory unit, the application transfers the legal reporting units that are associated with that legal entity to Oracle Fusion HCM as tax reporting units. You can then access the tax reporting unit using the Manage Legal Reporting Unit HCM Information task.

If you identify a legal entity as a legal employer, and not as a payroll statutory unit, you must enter a parent payroll statutory unit. The resulting legal reporting units are transferred to Oracle Fusion HCM as tax reporting units, but as children of the parent payroll statutory unit that you entered, and not the legal entity that you identified as a legal employer.

Payroll Statutory Units, Legal Employers, and Tax Reporting Units: How They Work Together

When you set up legal entities, you can identify them as legal employers and payroll statutory units, which makes them available for use in Oracle Fusion Human Capital Management (HCM). Depending on how your organization is structured, you may have only one legal entity that is also a payroll statutory unit and a legal employer, or you may have multiple legal entities, payroll statutory units, and legal employers.

Legal Employers and Payroll Statutory Unit

Payroll statutory units enable you to group legal employers so that you can perform statutory calculations at a higher level, such as for court orders or for United Kingdom (UK) statutory sick pay. In some cases, a legal employer is also a payroll statutory unit. However, your organization may have several legal employers in one payroll statutory unit. A legal employer can belong to only one payroll statutory unit.

Payroll Statutory Units and Tax Reporting Units

Payroll statutory units and tax reporting units have a parent-child relationship, with the payroll statutory unit being the parent.

Tax Reporting Units and Legal Employers

Tax reporting units are indirectly associated with a legal employer through the payroll statutory unit. One or more tax reporting units can be used by a single legal employer, and a tax reporting unit can be used by one or more legal employers. For example, assume that a single tax reporting unit is linked to a payroll statutory unit. Assume also that two legal employers are associated with this payroll statutory unit. In this example, both legal employers are associated with the single tax reporting unit.

Use the Manage Legal Reporting Unit HCM Information task to designate an existing legal reporting unit as a tax reporting unit. If you create a new legal reporting unit that belongs to a legal employer (that is not also a payroll statutory unit), you
select a parent payroll statutory unit and then, when you run the Manage Legal Reporting Unit HCM Information task, you designate it as a tax reporting unit and select the legal employer.

Related Topics
- HCM Organization Models: Examples

HCM Organization Models for Payroll: Examples

These examples illustrate different models for human capital management (HCM) organizations that include a legislative data group (LDG). This example includes LDGs, which aren’t an organization classification, to show how to partition payroll data by associating them with a payroll statutory unit.

Simple Configuration

This example illustrates a simple configuration that does not include any tax reporting units.

Note the following:
- The legal employer and payroll statutory units are the same, sharing the same boundaries.
- Reporting can only be done at a single level. Countries such as Saudi Arabia and the United Arab Emirates (UAE) might use this type of model, as these countries report at the legal entity level.
This figure illustrates a simple configuration where the enterprise has only one legal entity, which is both a payroll statutory unit and a legal employer.

Multiple Legal Employers and Tax Reporting Units

This example illustrates a more complex configuration. In this enterprise, you define one legal entity, InFusion US as a payroll statutory unit with two separate legal entities, which are also legal employers. This model shows multiple legal employers that are associated with a single payroll statutory unit. Tax reporting units are always associated with a specific legal employer (or employers) through the payroll statutory unit.

The implication is that payroll statutory reporting boundaries vary from human resources (HR) management, and you can categorize the balances separately by one of the following:

- Payroll statutory unit
- Legal employer
- Tax reporting unit

This configuration is based on tax filing requirements, as some tax-related payments and reports are associated with a higher level than employers. An example of a country that might use this model is the US.
One Payroll Statutory Unit and Two Tax Reporting Units

This model makes no distinction between a legal employer and a payroll statutory unit. You define tax reporting units as subsidiaries to the legal entity.

In this enterprise, legal entity is the highest level of aggregation for payroll calculations and reporting. Statutory reporting boundaries are the same for both payroll and HR management. An example of a country that might use this model is France.
This figure illustrates an example of an organization with one legal entity. The legal entity is both a legal employer and a payroll statutory unit and that has two tax reporting units.

One Payroll Statutory Unit with Several Tax Reporting Units

In this model, the enterprise has one legal entity. Legal employers and tax reporting units are independent from each other within a payroll statutory unit, because there is no relationship from a legal perspective. Therefore, you can run reporting on both entities independently.

Using this model, you wouldn’t typically:

- Report on tax reporting unit balances within a legal employer
- Categorize balances by either or both organizations, as required

An example of a country that might use this model is India.
This figure illustrates an enterprise with one legal entity that is a payroll statutory unit and a legal employer. The tax reporting units are independent from the legal employer.

Multiple Payroll Statutory Units with Several Tax Reporting Units

In this model, the enterprise has two legal entities. The legal employers and tax reporting units are independent from each other within a payroll statutory unit, because there is no relationship from a legal perspective. Therefore, you can run reporting on both entities independently.

Using this model, you wouldn’t typically:

- Report on tax reporting unit balances within a legal employer
- Categorize balances by either or both organizations, as required
An example of a country that might use this model is the United Kingdom (UK).

This figure illustrates an enterprise with two legal entities, and legal employers and tax reporting units are independent from each other.

Payroll Employment Hierarchy Profile Option: Critical Choices

You can use profile options to specify the values you want to display for each level of the payroll employment hierarchy. The hierarchy appears in the View Person Process Results pages. You can specify up to three values at each level to help identify
the record. For example, you might select legal employer name and job name to identify assignment records, and assignment name and number to identify assignment records.

Depending on the employment model used in your enterprise, you can use the following levels to set up your payroll employment hierarchy:

- Payroll relationship
- Assignments

To define profile option settings and values, select the Manage Payroll Employment Hierarchy Profile Option Values task in the Setup and Maintenance work area.

**Profile Options for the Payroll Relationship Level**

The following table lists the profile option codes and available profile values at the site level for the payroll relationship level of the payroll employment hierarchy.

<table>
<thead>
<tr>
<th>Profile Option Codes</th>
<th>Profile Values</th>
</tr>
</thead>
<tbody>
<tr>
<td>PAY_EMP_HIERARCHY_REL_DESC_1</td>
<td>Payroll Relationship Number</td>
</tr>
<tr>
<td>PAY_EMP_HIERARCHY_REL_DESC_2</td>
<td>Payroll Statutory Unit Name</td>
</tr>
<tr>
<td>PAY_EMP_HIERARCHY_REL_DESC_3</td>
<td>Payroll Relationship Type</td>
</tr>
</tbody>
</table>

**Profile Options for the Assignment Level**

The following table lists the profile option codes and available profile values at the site level for the assignment level of the payroll employment hierarchy.

<table>
<thead>
<tr>
<th>Profile Option Codes</th>
<th>Profile Values</th>
</tr>
</thead>
<tbody>
<tr>
<td>PAY_EMP_HIERARCHY ASG_DESC_1</td>
<td>Assignment Name</td>
</tr>
<tr>
<td>PAY_EMP_HIERARCHY ASG_DESC_2</td>
<td>Assignment Number</td>
</tr>
<tr>
<td>PAY_EMP_HIERARCHY ASG_DESC_3</td>
<td>Employment Category</td>
</tr>
<tr>
<td></td>
<td>Grade Name</td>
</tr>
<tr>
<td></td>
<td>Job Name</td>
</tr>
<tr>
<td></td>
<td>Legal Employer Name</td>
</tr>
<tr>
<td></td>
<td>Location Name</td>
</tr>
<tr>
<td></td>
<td>Position Name</td>
</tr>
</tbody>
</table>

**Overriding Site-level Values with User-level Values**

You can override site-level values at the user level. For example, you might use position as the default value and override it with job for the payroll administrator who manages records for a group of workers who are not assigned to positions.
Payroll Employment Model

Payroll Employment Model: Explained

In the payroll employment model, each person has a payroll relationship to a payroll statutory unit (PSU), and one or more assignments to a payroll and other employment structures. Some element entries, typically deductions, are held at the payroll relationship level, and others at lower employment levels.
Comparing the HR and Payroll Employment Models

The following figure contrasts the HR employment model and the payroll employment model in an example where two legal employers belong to one PSU. In this example, David Ellis has two assignments. The resulting structure creates two work relationships in the HR model and one payroll relationship in the payroll model.

Related Topics

- Employment Level for Elements: Critical Choices
FAQ for Payroll Employment Model

How do I diagnose payroll employment model setup issues?

After creating enterprise structures, you can run the Payroll Employment Model Setup Validation test if you have access to the Diagnostic Dashboard. This test checks whether legal employers are associated with a legislative data group. Select Run Diagnostic Tests from the Setting and Actions menu in the global area.

Payroll Relationships

Payroll Relationships: Explained

A payroll relationship represents the association between a person and a payroll statutory unit (PSU), which is the legal entity responsible for employee payment. Payroll relationships group a person’s employment assignment records based on the payroll statutory calculation and reporting requirements. Payroll relationships facilitate the capture and extraction of HR and payroll-related data sent to a third party, such as a payroll provider for payroll processing.

Payroll processing always occurs at the payroll relationship level. When you display the payroll process results for a person, you first select the person’s payroll relationship record and then drill down to view details.

Payroll relationships aggregate balances at the payroll relationship level. Within a payroll relationship, payroll processes can aggregate balances for multiple assignment records. Balances don’t span payroll relationships.

Creation of Payroll Relationship Records

For the rehire process to automatically create a payroll relationship record, you must have a mapping between the system person type and the payroll relationship type. The table below shows the payroll relationship type values that are supported.

<table>
<thead>
<tr>
<th>Payroll Relationship Type</th>
<th>Description</th>
</tr>
</thead>
<tbody>
<tr>
<td>Standard</td>
<td>Person types mapped to this payroll relationship type are included in payroll runs.</td>
</tr>
<tr>
<td>Element Entry Only</td>
<td>Person types mapped to this payroll relationship type have only element entries created for them and are excluded from payroll processing.</td>
</tr>
</tbody>
</table>

Relationship mapping rules, which map system person types to payroll relationship types, can vary by country or territory. For example, the table below shows the mapping between system person types and payroll relationship types, that are applicable for Canada.

<table>
<thead>
<tr>
<th>System Person Type</th>
<th>Payroll Relationship Type</th>
</tr>
</thead>
<tbody>
<tr>
<td>Contingent Worker</td>
<td>Element Entry Only</td>
</tr>
<tr>
<td>Employee</td>
<td>Standard</td>
</tr>
</tbody>
</table>
### System Person Type vs Payroll Relationship Type

<table>
<thead>
<tr>
<th>System Person Type</th>
<th>Payroll Relationship Type</th>
</tr>
</thead>
<tbody>
<tr>
<td>Nonworker Paid</td>
<td>Standard</td>
</tr>
<tr>
<td>Nonworker Unpaid</td>
<td>Element Entry Only</td>
</tr>
<tr>
<td>Retiree</td>
<td>Element Entry Only</td>
</tr>
</tbody>
</table>

For Canada, Contingent Worker type, Retiree, and Nonworker Unpaid type are excluded from payroll processing.

The mapping rules are predefined for legislations provided by Oracle. You cannot create your own payroll relationship types and you must use the values that are predefined in the application.

A payroll relationship cannot end while there are active employment assignments. When all employment assignments are ended for a payroll relationship, it could either remain active or become end dated. It depends on the legislation and the payroll relationship rules applicable for the legislation. For example:

- For the US, relationships that remain active enables future rehire within the same payroll relationship and PSU.
- For the UK, for a relationship that gets terminated, a new payroll relationship is created within the same payroll relationship and PSU, for the rehire.

**Related Topics**

- [Element Duration Dates in Payroll Relationships: Explained](#)
- [Setting End Dates for Terminations: Examples](#)

## Payroll Relationship Rules: Explained

The payroll relationship rule determines what happens when you terminate the last active employment assignment record for a payroll relationship. The rule also determines whether the application creates a payroll relationship when you add a new assignment record for an employee. This topic describes the following predefined rules that localizations can use.

### Lifetime Rule

When a work assignment is terminated, the associated payroll relationship continues to remain active. When you create an assignment, the application searches for an active payroll relationship of the same type and for the same payroll statutory unit (PSU). If found, the new assignment is attached to the existing active payroll relationship. If not, a new payroll relationship is generated.

### Continuous Period of Service Rule

When a work assignment is terminated, the associated payroll relationship becomes inactive and is terminated. Subsequently, when you create an assignment, the application searches for an active payroll relationship of the same type and for the same PSU. If a payroll relationship exists, date validation occurs to determine whether to use the existing payroll relationship or to create a new one. The application compares the start date of the new assignment to the last standard earnings date of the existing payroll relationship. If the start date is before the last standard earnings date, the application uses the existing payroll relationship, otherwise, it creates a new one.
**Independent Rule**

When a work assignment is terminated, the associated payroll relationship becomes inactive and is terminated. When you create an assignment, a new payroll relationship is created. Each payroll relationship is associated with one work assignment.

**Related Topics**
- Terminations: How They Affect Payroll Processing

**FAQ for Payroll Relationships**

**When should I change payroll relationship rules?**

You should not need to change payroll relationship rules after implementation. If there are any updates to payroll relationship rules after employment records already exist, those updates will affect only newly created employment records. If employment records already exist, it is best not to change payroll relationship rules to ensure that new and existing employment records have the same rules.

**Earnings and Deductions**

**Define Earning and Deduction Definitions: Overview**

The Define Earning and Deduction Definitions task list in the Setup and Maintenance work area contains the tasks required to set up elements and payroll components. Your implementation may include a few predefined elements, usually for legislative tax deductions. Use the Manage Elements task to create additional elements and the associated objects required to support their processing. The objects vary depending on the element classification and category.

**Manage Element Classifications**

Elements are grouped into primary classifications that control their sequence of processing and the balances they feed. Secondary classifications are subsets of the primary classifications, which you may use to manage wage basis rules for deductions and taxes.

The primary classifications and some secondary classifications are predefined. You can’t remove or change predefined classifications.

**What you can do:**

- Create additional balances that the primary classifications feed.
- Create secondary classifications for some countries or territories.
- Specify costing setup options and frequency rules for element classifications. The default frequency rule is always each period.
Manage Elements

Use the Manage Elements task to review elements and to create new ones. When you create an element, your selection of the element classification and category determines the questions on a predefined template. Submitting the template generates an element, which you can edit, as required.

You must create at least one element eligibility record for all predefined and newly created elements.

The following figure shows the tasks involved.

**Note:** Make sure you set the country extension to Payroll using the Manage Features by Country or Territory task before you create elements for payroll processing. This setting ensures that you use the appropriate element templates.

Creating certain elements also creates component groups, calculation value definitions, and other calculation information. For example, creating involuntary deductions and pension deductions creates these additional objects for some countries and territories. Use the relevant tasks in the Define Earning and Deduction Definitions task list to review the objects generated for each element.

Payroll components are associated with a set of rates and rules used for calculation or reporting. These components conform to manage calculation value definitions.

What you can do:

- Review the tables that hold the rates and other values used to calculate deduction and exemption amounts.
- Modify some value definitions. For example, you might enter a default payee for pension payments.
- Create new calculation ranges, if required
Manage the calculation information for elements that generate payroll components, such as involuntary deductions and statutory deductions.

What you can do:

- Review the calculation information supplied for your country or territory, such as the wage basis rules and calculation factors
- Create new calculation factors, if required.

Component groups are predefined categories of calculation components managed by component group rules.

What you can do:

- View rules for component groups.
- Modify the rules, such as wage basis rules, for some deductions

After setup, you add calculation components to personal calculation cards by loading data, such as time cards, or using the Manage Calculation Cards task in the Payroll Calculation work area. In most countries, hiring a worker creates a statutory deduction card automatically.

Add Eligibility Rules For Predefined Elements

The task list includes this task as a reminder. Use the Manage Elements task to define at least one element eligibility record for every predefined and newly created element.

Note: Make sure you create an eligibility record for the statutory deduction elements like Tax, before you start hiring workers.

Element eligibility determines who can receive entries of the element. Do the following:

1. Create a name for the element eligibility record. Use a naming convention similar to the element’s to easily identify the record, for example, when you set up costing for the element’s eligibility record.
2. Restrict who can receive entries of the element by specifying eligibility criteria. For elements applicable to all workers, create eligibility without specifying any criteria.

Manage Rate Definitions

Define any rates that are based on calculated payroll balances, such as an employee’s average salary during the last three months. You can use rate definitions in absence plans and formulas.

You can define rates to be:

- Monetary, such as a pay rate, or non-monetary, such as an absence accrual rate defined in days or hours
- Based on a combination of elements, or a single element

Related Topics

- Elements: Explained
- Element Eligibility: Explained
- Defining Voluntary and Pre-statutory Deductions: Procedure
- Payroll Calculation Information: Explained
- Creating Earnings Elements for Payroll: Worked Example
Elements: How They Hold Payroll Information for Multiple Features

Elements are building blocks that help determine the payment of base pay, benefits, absences, and other earnings and deductions. You associate your elements with salary bases, absence plans, and the benefits object hierarchy to determine how you will use the elements.

This table provides some examples of how you can use elements.

<table>
<thead>
<tr>
<th>Element Usage</th>
<th>Examples of Elements</th>
</tr>
</thead>
<tbody>
<tr>
<td>Base Pay Management</td>
<td>Annual Salary Basis</td>
</tr>
<tr>
<td></td>
<td>Monthly Salary Basis</td>
</tr>
<tr>
<td></td>
<td>Hourly Salary Basis</td>
</tr>
<tr>
<td>Absence Management</td>
<td>Absence Payment</td>
</tr>
<tr>
<td></td>
<td>Leave Liability</td>
</tr>
<tr>
<td></td>
<td>Discretionary Disbursement</td>
</tr>
<tr>
<td></td>
<td>Final Disbursement</td>
</tr>
<tr>
<td>Benefits</td>
<td>Health Care Deduction</td>
</tr>
<tr>
<td></td>
<td>Savings Plan Deduction</td>
</tr>
<tr>
<td></td>
<td>Employee Stock Purchase Deduction</td>
</tr>
<tr>
<td>Time and Labor</td>
<td>Regular Hourly Earnings</td>
</tr>
<tr>
<td></td>
<td>Overtime Earnings</td>
</tr>
<tr>
<td></td>
<td>Shift Earnings</td>
</tr>
<tr>
<td>Payroll</td>
<td>Regular Standard Earnings</td>
</tr>
<tr>
<td></td>
<td>Bonus Earnings</td>
</tr>
<tr>
<td></td>
<td>Tax Deduction</td>
</tr>
<tr>
<td></td>
<td>Involuntary Deduction</td>
</tr>
</tbody>
</table>

Base Pay Management

To manage base pay, you attach an earnings element to each base pay earnings, and assign a salary basis (hourly, monthly or annual) to each worker. When a manager or compensation specialist enters a base pay amount for a worker, the application writes the amount to an element entry using the element input value associated with the worker’s salary basis. Payroll processing uses the element entry to generate payment amounts.
Absence Management

You can manage worker absences and corresponding entitlements. You can create absence types based on predefined absence patterns, and associate them with absence plans. You can associate an absence element with an absence plan to transfer the following information for payroll processing:

- Payments for absent time, for example, during maternity or long term sickness.
- Accrual disbursement at the end of absence plan year
- Accrual disbursement when plan enrollment ends
- Absence liability amounts

You can process the payments in Oracle Fusion Global Payroll or use HCM extracts to transfer the information to a third-party payroll application for processing.

Benefits

Attach elements at various levels in the benefits object hierarchy to create deductions and earnings that you can process in a payroll run to calculate net pay.

Time and Labor

Create elements for use in time cards, and calculate payroll or gross earnings based on the time card entries transferred to payroll. You transfer the element input values to your time provider. For example, for Oracle Fusion Time and Labor, you run processes which create dependent payroll attributes and time card fields for element input values. You can automate the routine import of time card entries to payroll using predefined flows.

Payroll

For Oracle Fusion Global Payroll, you define earnings and deduction elements, such as bonus and overtime earnings and involuntary deductions. These elements incorporate all the components required for payroll processing, including formulas, balances, and formula result rules.

Related Topics

- Defining Payroll Elements for Payroll Interface: Worked Example
- Defining Payroll Elements for an Absence Accrual Plan: Worked Example
- Creating Earnings Elements for Payroll: Worked Example
- Creating Elements for Time Card Entries: Procedure

Object Groups

Object Groups: Explained

Use object groups to define subsets of objects for processing or reporting. You can manage object groups from the Payroll Calculation work area. To load a batch of object groups, use the batch loader in the Payroll Administration, Data Exchange, or Checklist work area.
There are four types of object groups:

- Element
- Payroll Relationship
- Work Relationship

**Element Groups**

Element groups limit the elements processed for payroll, reporting, or cost distribution purposes.

There are two usages for an element group:

<table>
<thead>
<tr>
<th>Element Group</th>
<th>Usage</th>
</tr>
</thead>
<tbody>
<tr>
<td>Run group</td>
<td>Specifies the elements to use in a process.</td>
</tr>
<tr>
<td>Distribution group</td>
<td>Defines the grouping of elements to distribute element costing results.</td>
</tr>
</tbody>
</table>

All element groups are static. You select the element classifications to add and then include or exclude additional elements from the group. Or you can select specific elements to include without using element classifications.

**Payroll Relationship Groups**

Payroll relationship groups limit the persons processed for payroll, data entry, and reporting.

To define the group:

- Specify a payroll definition. Every group is limited to the payroll relationships assigned to a single payroll that you select.
- Optionally, further define the group statically or dynamically:
  - Statically
    - Select the payroll relationships and assignments to include in or exclude from the group.
  - Dynamically
    - Use a fast formula of type Payroll Relationship Group. The formula contains the criteria to establish the payroll relationships and assignments included in the group. Then you can individually select additional payroll relationships and assignments to include in or exclude from the group.

**Work Relationship Groups**

Work relationship groups limit the persons processed for human resources and reporting. For example, you can use work relationship groups in your user-defined extracts.

You can define the group statically or dynamically:

- Statically
  - Select the work relationships and assignments to include in or exclude from the group.
- Dynamically
Use a fast formula of type Work Relationship Group. This formula contains the criteria to establish the work relationships and assignments included in the group. Then you can individually select additional work relationships and assignments to include in or exclude from the group.

**Related Topics**

- Writing a Fast Formula Using Expression Editor: Worked Example
- Restricting Payroll Processing: Critical Choices
Implementing Global Payroll

To implement payroll, you must first understand payroll feature choices and concepts. You can then plan your payroll implementation using the Oracle Functional Setup Manager. Functional Setup Manager enables rapid and efficient planning, configuration, implementation, deployment, and ongoing maintenance of the application through administration.

Payroll Feature Choices

As part of feature choices for payroll processing you:

- Select the correct country extension setting for each of your countries and territories on the Manage Features by Country or Territory page. The country extension setting ensures that certain payroll-related features, such as element templates, work correctly in your implementation.
- Select the Payroll Costing Options to cost your payroll and the appropriate subledger accounting rules.
- Select the appropriate precision for the currency of each country or territory where you are processing payroll.
- Set the currency of each country or territory where you are sending payroll data to a third-party payroll provider. However, don’t select that country or territory as a feature choice. Select the Payroll Interface extension on the Manage Features by Country or Territory page.

Related Topics

- Define Payroll: Overview
- What’s the difference between precision, extended precision, and minimum accountable unit for a currency?
- Functional Setup Manager for Oracle Global Payroll: Explained

Geography Structures

This topic describes geography structures and the tasks you can perform using geography structures.

A geography structure is a hierarchical grouping of geography types for a country. The following table describes the geography structure for the United States.

<table>
<thead>
<tr>
<th>Level</th>
<th>Geography Type</th>
</tr>
</thead>
<tbody>
<tr>
<td>1</td>
<td>State</td>
</tr>
<tr>
<td></td>
<td></td>
</tr>
<tr>
<td>2</td>
<td>County</td>
</tr>
</tbody>
</table>
You can use the geography structure to relate geography types for a country and define geography types for a country.

**Relate Geography Types for a Country**

You can determine how a country’s geographies are hierarchically related by creating the hierarchy of the geography types in the geography structure. When you define a country’s structure, the geography type Country is implicitly at the highest level of the geography structure with level as 1. The subsequent geography types that you add after country are numbered in sequence.

You must add a geography type as a level in the country structure before you can define a geography for that geography type in a country. For example, before defining the state of California, the State geography type must be added to the United States country structure. To quickly create country structure, you can copy a structure from another country and modify the geography types for the country.

**Define Geography Types for a Country**

You can use any of the master reference geography types to create your geography structure. If required, you can create a geography type, before adding it to the country structure. Each geography type is added at a lower level to the current lowest level.

> **Note:** You cannot delete geography types that have associated geography data. You can only delete the lowest level geography type of the country structure.

You can use a geography type that you create within the country structure for other country structures as well.

**Geography Validations**

Geography validation determines the geography mapping and validation for a country’s address styles, as well as the overall geography validation control for a country.

The **No Styles Format** address style format is the default address style format for a country. By defining the mapping and validation for this format you will ensure that validations can be performed for any address in the country. After the **No Styles Format** is defined you can set up additional mapping for specific address styles.

For each address style format, you can define the following:

- Map to attribute
- Enable list of values
- Tax validation
- Geography validation
- Geography validation control
Map to Attribute

For every address style format, you can map each geography type to an address attribute. For example, you can map the State geography type to the State address attribute for the United States, or map the State geography type to the County address attribute for the United Kingdom. The geography types that appear are based on how the country structure is defined. The list of address attributes that appear are based on address formats delivered with the application, or your customer defined address formats.

Note: You only need to map geography types that you want to use for geography or tax validation purposes.

Enable List of Values

Once a geography type is mapped to an attribute, then you can specify whether the geography type will appear in a list of values during address entry in user interfaces. It is very important to review carefully if you want to enable a list of values. You should only enable a list of values if you have sufficient geography data imported or created for that geography. If the setup for master geography data is incomplete, then the geography data is either not imported or created. As a result, the list of values for the address attribute does not list any geography data.

Once you have enabled a list of values for an address attribute, you can only select the geography data available for the geography type. This means that if a specific geography value is not available in the geography hierarchy, you can’t create an address with a different geography value.

Tax Validation

You can also specify whether a geography type will be included in tax validation. For example, for the United States North America address style format you specify that County, State, and City are used for tax validation. This will mean that when a transaction involves an address with the North America address style, the address must have the correct county, state, and city combination based on the geography hierarchy data, to be considered valid for tax calculation.

Geography Validation

You must set up geography validation for those geography elements that you plan to use in your sales territories. Setting up validation also helps users fill in missing address information, and validate addresses during entry. For example, you can have users select states or other address elements from lists to ensure accuracy during entry, and you can have the application fill in missing values. For example, when the user enters a Postal Code, the application can retrieve the city and state.

You can specify whether a geography type will be included in geography validation. For example, when the user enters a United States address using the North America address style format, the address must have the correct country, state, and postal code combination based on geography hierarchy data to be considered geographically valid.

If an address element is mapped to a geography type, but not selected for geography validation usage, then during address entry suggested values will be provided for the address element, but the address element will not be validated.

You need to verify that the default mapping between Geography Type and Map to Attribute is valid in the Geography Mapping and Validation region and update it if required when you define geography validation. Oracle recommends that you use the following valid mapping for the countries that GBG | Loqate supports:

<table>
<thead>
<tr>
<th>Country Name</th>
<th>Country Code</th>
<th>Geography Type</th>
<th>Map to Attribute</th>
</tr>
</thead>
<tbody>
<tr>
<td>United Arab Emirates</td>
<td>AE</td>
<td>• Country</td>
<td>• Country</td>
</tr>
<tr>
<td></td>
<td></td>
<td>• Emirate</td>
<td>• State</td>
</tr>
<tr>
<td></td>
<td></td>
<td>• Municipality</td>
<td>• City</td>
</tr>
<tr>
<td>Country Name</td>
<td>Country Code</td>
<td>Geography Type</td>
<td>Map to Attribute</td>
</tr>
<tr>
<td>--------------</td>
<td>--------------</td>
<td>---------------</td>
<td>------------------</td>
</tr>
<tr>
<td>Australia</td>
<td>AU</td>
<td>Area</td>
<td>Additional Address Attribute 2</td>
</tr>
<tr>
<td>Belgium</td>
<td>BE</td>
<td>Country</td>
<td>Country</td>
</tr>
<tr>
<td></td>
<td></td>
<td>State</td>
<td>State</td>
</tr>
<tr>
<td></td>
<td></td>
<td>City</td>
<td>City</td>
</tr>
<tr>
<td></td>
<td></td>
<td>Postcode</td>
<td>Postal code</td>
</tr>
<tr>
<td>Brazil</td>
<td>BR</td>
<td>Country</td>
<td>Country</td>
</tr>
<tr>
<td></td>
<td></td>
<td>Estado</td>
<td>State</td>
</tr>
<tr>
<td></td>
<td></td>
<td>Municipio</td>
<td>City</td>
</tr>
<tr>
<td></td>
<td></td>
<td>CEP</td>
<td>Postal code</td>
</tr>
<tr>
<td>Canada</td>
<td>CA</td>
<td>Country</td>
<td>Country</td>
</tr>
<tr>
<td></td>
<td></td>
<td>Province</td>
<td>Province</td>
</tr>
<tr>
<td></td>
<td></td>
<td>City</td>
<td>City</td>
</tr>
<tr>
<td></td>
<td></td>
<td>Postal Code</td>
<td>Postal code</td>
</tr>
<tr>
<td>Switzerland</td>
<td>CH</td>
<td>Country</td>
<td>Country</td>
</tr>
<tr>
<td></td>
<td></td>
<td>Kanton</td>
<td>State</td>
</tr>
<tr>
<td></td>
<td></td>
<td>Bezirk</td>
<td>County</td>
</tr>
<tr>
<td></td>
<td></td>
<td>Gemeinde</td>
<td>City</td>
</tr>
<tr>
<td></td>
<td></td>
<td>PLZ</td>
<td>Postal code</td>
</tr>
<tr>
<td>Germany</td>
<td>DE</td>
<td>Country</td>
<td>Country</td>
</tr>
<tr>
<td></td>
<td></td>
<td>Bundesland</td>
<td>State</td>
</tr>
<tr>
<td></td>
<td></td>
<td>Bezirk</td>
<td>County</td>
</tr>
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<td></td>
<td></td>
<td>Stadt</td>
<td>City</td>
</tr>
<tr>
<td></td>
<td></td>
<td>PLZ</td>
<td>Postal code</td>
</tr>
<tr>
<td>Spain</td>
<td>ES</td>
<td>Country</td>
<td>Country</td>
</tr>
<tr>
<td></td>
<td></td>
<td>Autonomia</td>
<td>Additional address attribute 1</td>
</tr>
<tr>
<td></td>
<td></td>
<td>Provincia</td>
<td>Province</td>
</tr>
<tr>
<td></td>
<td></td>
<td>Municipio</td>
<td>City</td>
</tr>
<tr>
<td></td>
<td></td>
<td>Codigo Postal</td>
<td>Postal code</td>
</tr>
<tr>
<td>France</td>
<td>FR</td>
<td>Country</td>
<td>Country</td>
</tr>
<tr>
<td></td>
<td></td>
<td>Region</td>
<td>Additional address attribute 1</td>
</tr>
<tr>
<td></td>
<td></td>
<td>Department</td>
<td>State</td>
</tr>
<tr>
<td></td>
<td></td>
<td>Commune</td>
<td>City</td>
</tr>
<tr>
<td></td>
<td></td>
<td>Settlement</td>
<td>Additional address attribute 2</td>
</tr>
<tr>
<td></td>
<td></td>
<td>Postcode</td>
<td>Postal code</td>
</tr>
<tr>
<td>Great Britain</td>
<td>GB</td>
<td>Country</td>
<td>Country</td>
</tr>
<tr>
<td></td>
<td></td>
<td>County</td>
<td>State</td>
</tr>
<tr>
<td></td>
<td></td>
<td>Posttown</td>
<td>City</td>
</tr>
<tr>
<td>Country Name</td>
<td>Country Code</td>
<td>Geography Type</td>
<td>Map to Attribute</td>
</tr>
<tr>
<td>--------------</td>
<td>--------------</td>
<td>----------------</td>
<td>------------------</td>
</tr>
<tr>
<td></td>
<td></td>
<td>• Postcode</td>
<td>• Postal code</td>
</tr>
<tr>
<td>Netherlands</td>
<td>NL</td>
<td>• Country</td>
<td>• Country</td>
</tr>
<tr>
<td></td>
<td></td>
<td>• Provincie</td>
<td>• Province</td>
</tr>
<tr>
<td></td>
<td></td>
<td>• Gemeente</td>
<td>• County</td>
</tr>
<tr>
<td></td>
<td></td>
<td>• Settlement</td>
<td>• City</td>
</tr>
<tr>
<td></td>
<td></td>
<td>• Postcode</td>
<td>• Postal code</td>
</tr>
<tr>
<td>Portugal</td>
<td>PT</td>
<td>• Country</td>
<td>• Country</td>
</tr>
<tr>
<td></td>
<td></td>
<td>• District</td>
<td>• State</td>
</tr>
<tr>
<td></td>
<td></td>
<td>• Municipality</td>
<td>• County</td>
</tr>
<tr>
<td></td>
<td></td>
<td>• Parish</td>
<td>• City</td>
</tr>
<tr>
<td></td>
<td></td>
<td>• Postcode</td>
<td>• Postal code</td>
</tr>
<tr>
<td>Sweden</td>
<td>SE</td>
<td>• Country</td>
<td>• Country</td>
</tr>
<tr>
<td></td>
<td></td>
<td>• Lan</td>
<td>• State</td>
</tr>
<tr>
<td></td>
<td></td>
<td>• Kommun</td>
<td>• County</td>
</tr>
<tr>
<td></td>
<td></td>
<td>• By</td>
<td>• City</td>
</tr>
<tr>
<td></td>
<td></td>
<td>• Postnr</td>
<td>• Postal code</td>
</tr>
<tr>
<td>United States</td>
<td>US</td>
<td>• Country</td>
<td>• Country</td>
</tr>
<tr>
<td></td>
<td></td>
<td>• State</td>
<td>• State</td>
</tr>
<tr>
<td></td>
<td></td>
<td>• County</td>
<td>• County</td>
</tr>
<tr>
<td></td>
<td></td>
<td>• City</td>
<td>• City</td>
</tr>
<tr>
<td></td>
<td></td>
<td>• Zip Code</td>
<td>• Postal code</td>
</tr>
</tbody>
</table>

**Note:** For either the tax or geography validation, do not skip more than one consecutive level unless you are certain that the selected geography types can uniquely identify geographies. For example, the United States country structure is: State, County, City, and Postal Code, and you want to select just State and Postal Code for geography or tax validation. However, for the combination of California and 94065, the city can be either Redwood Shores or Redwood City. In this case, you should also select at least the City geography type for geography or tax validation.

**Geography Validation Control**

You can select the geography validation level for a country. Validation will check if the entered address maps to the geography hierarchy data available for the country, and the geography validation control determines whether you can save an address that did not pass validation during address entry. For example, if the validation level is Error, then an address cannot be saved if the values do not match the geography hierarchy data.

These are the geography validation levels you can choose:

- **Error** - only completely valid addresses can be saved, with all mandatory address elements entered.
- **No Validation** - all addresses can be saved including incomplete and invalid addresses.

Regardless of the result of validation, the validation process will try to map any address attribute to a geography of the country, and store any mapping it could establish based on the available data. This is called Geography Name Referencing and it is executed as part of validation. The result of this referencing is used in several business processes in the application to map an address to a specific geography or zone.

The Geography Dimension value in territories is derived from sell-to addresses of sales accounts. To use geography dimensions in territories, you must validate the geography elements in the addresses, such as state, city, and postal code.
You can validate the address by enabling geography validation for each country using the Manage Geographies task. Perform the following in the Manage Geographies task:

- Enable at least one level in the geography hierarchy for geography validation.
- Enable geography validation for all geography levels that you intend to use for territory definition for each country.
- If needed, enable a list of values containing specific geography elements. This will help users search and select appropriate geography values during addresses entry and eliminate all possibilities of wrong address entry.

You can set geography validation control to Error in the Manage Geography Validation page. This ensures that users can only use valid geography elements in addresses.

**Note:** If you have already created addresses before setting up geography validation for a country, you must enable geography validation and then execute the Run Maintain Geography Name Referencing task for that country. This validates all your geography elements.

### Changing Address Style and Address Validation Settings

Use the Manage Features by Country or Territory task to control address style and level of address validation for the countries or territories you configure. The values you can set depend on the combination of the country or territory and the selected country extension. For example, for Canada, you can change the address style from its default value only when you set the country extension to Human Resources or None. You can’t change the address style from its default value when you set the country extension to Payroll or Payroll Interface.

#### Address Styles

The address style you select determines which address attributes are available and maintained in the application. The combination of address style and address validation determines the level of validation.

Depending on the country or territory and the country extension you select, you have one or both of the following address style options. Each address style provides its own validation:

- **Postal Address**
  
  This address style provides the fundamental set of address attributes for a country or territory. In some cases, this style adds supplemental attributes. For some countries and territories, this address style might include general address attributes that are not relevant, such as State or Postal Code.

- **Supplemental Taxation and Reporting Address**
  
  Defined for country extensions, this address style can add validation or attribute changes in the application. For example, this style may add specific validation of postal codes, such as requiring a specific number of characters in a specific sequence.

Use the Manage Features by Country or Territory task to see what is delivered for your country. Each country has a default address style and the choice of the country extension determines whether you can change the default address style.

### Validation Based on Country Extension

For example, for Canada, the default is Supplemental Taxation and Reporting Address. However, the address style and address validation depends on the country extension, as shown in the following table.
For Canada, if you have chosen to install Human Resources, the value for the Address Style can be modified to either format. If you have chosen to install either Payroll Interface or Payroll, the value for the Address Style can't be modified. It must be set to Supplemental Taxation and Reporting Address. Validations are implemented to enforce that requirement.

**Changing Address Styles**

For most of the predefined countries and territories, the application enforces the address style, preventing you from making changes. However, when the address style is not enforced, such as a customer-configured legislation, changing address styles can affect validation rules. This might lead to address data integrity and validation issues.

For example, for Canada, if you initially implement Human Resources using the Postal Address style and then later change the country extension to Payroll, you must also change the address style to Supplemental Taxation and Reporting Address. As a result, you must update your existing address data to resolve validation errors.

> **Note:** The Supplemental Taxation and Reporting Address style, once selected, impacts both the Person and HCM Locations address styles. Ensure to test any changes you make to address style or validation for a country or territory before you implement them in a production environment. If you provide data to a third party, such as a payroll or benefit provider, statutory recipients, or financial institutions, you must test the changes. Changes to validation or address styles may result in missing data or unrecognized data.

> **Tip:** You can use the Manage Address Formats task to review and configure how addresses appear in the application.

**Disabling Address Validation**

Disabling address validation disables any country-specific programmatic validation rules created for a specific country or territory. You can disable address validation on the Manage Features by Country or Territory page.

A country or territory might have rules defined using the Manage Geographies task for validating address structure, format, or values. Disabling address validation does not have any impact on the validations you have set up on the Manage Geographies page.

For some countries, the application prevents you from disabling the programmatic validation. For other countries and territories, when you disable address validation, any existing validation rules for the selected address style, remains in place.

> **Note:** For Canada, when Payroll is the selected country extension, you cannot disable the address validation.

For example, suppose you have chosen Human Resources with address validation enabled. During data conversion, you want to temporarily bypass address validation rules to load a batch of worker data. You can achieve this by deselecting the Address Validation check box before loading your data. After loading the batch, if the address validation remains disabled, any new address data you enter later, could be potentially invalid. Errors may occur in subsequent processes and reports. As a result, you must re-enable address validation and update your existing address data to resolve validation errors.
Related Topics

- Managing Geography Structures, Hierarchies, and Validation: Worked Example
- How can I diagnose issues with address data in Oracle Fusion Global Human Resources?

Country Extensions

Selecting Country Extensions: Critical Choices

Select the correct country extension setting for each of your countries and territories on the Manage Features by Country or Territory page. The country extension setting ensures that certain payroll-related features, such as element templates, work correctly in your implementation. By default, each country’s extension is set to Human Resources or None, which means no payroll product is selected. If you plan to use payroll or any predefined payroll interface extracts for a country or territory, you must set its country extension to the appropriate payroll setting.

The options available for selection for some countries or territories may be restricted. The full list is as follows:

- Payroll
- Payroll Interface
- Human Resources or None

Setting the country extension to Payroll ensures that all payroll features function correctly. The other product settings you select control the functions of payroll-related features when you aren’t using Global Payroll. The following sections explain the available three options.

Payroll

Setting the country extension to Payroll has the following implications:

- When creating elements, the element templates generate formulas and other associated items that are required for costing or payment processing in Global Payroll.
- The new-hire process includes country-specific features, such as automatic generation of calculation cards for statutory deductions and validation of address formats.
- Payroll definitions require associated organization payment methods. You must select payment methods that include a payment source.
- Defining payment sources requires source banks in Oracle Fusion Financials.

Payroll Interface

Setting the country extension to Payroll Interface has the following effects:

- The element templates for creating regular and supplemental earnings elements generate associated objects, such as input values, formulas, and balances. These objects are required for including employee data in the Calculate Gross Earnings process. For all other elements, the simplified element templates create only the element and no associated objects.
- The new hire process includes country-specific validation.
- Validations on payroll objects are less restrictive to support sending employee bank information as follows:
  - No requirement for organization payment methods in payroll definitions
No requirement for payment sources in organization payment methods
No dependency on source banks in Financials

Human Resources or None
Setting the country extension to Human Resources or None has the following effects:

- The element templates for creating earnings and deductions elements generate only the elements and no associated objects, such as input values, formulas, or balances.
  You can configure these elements to meet your specific business requirements, such as adding input values and formulas to a compensation element.
- Certain countries or territories have additional country-specific validation.
- Validations on payroll objects are less restrictive, as with the Payroll Interface setting.

Related Topics
- Setting Up Reconciliation for Payments: Procedure
- Payroll Legislative Data: Explained

Selecting Country Extensions: Worked Example
This example demonstrates how to configure payroll-related features for countries and territories in an enterprise.

The Vision enterprise has employees in several countries with different payroll arrangements:

- In the United States and United Kingdom, the enterprise pays employees using Oracle Fusion Global Payroll.
- In France, the enterprise extracts and sends payroll-related data to third-party payroll provider using Payroll Interface extract definitions.
- In China, the enterprise stores only HR data in Oracle Fusion Applications and doesn’t require any data for payroll purposes.

The following table summarizes the key decisions to consider while deciding on the product usage for a country.

<table>
<thead>
<tr>
<th>Decisions to Consider</th>
<th>In This Example</th>
</tr>
</thead>
<tbody>
<tr>
<td>Do your plans include processing payrolls within Oracle Fusion for any country?</td>
<td>Yes, using Global Payroll in the US and UK</td>
</tr>
<tr>
<td>Do your plans include extracting or transferring payroll-related data to a third-party provider for any country?</td>
<td>Yes, using Payroll Interface extracts in France</td>
</tr>
<tr>
<td>Do your plans include processing only HR details?</td>
<td>Yes, using Global HR in China</td>
</tr>
</tbody>
</table>

Setting the Extension
1. From the Setup and Maintenance work area, search for the Manage Features by Country or Territory task, and then click Go to Task.
2. In the **Selected Extension** list, select the country extension for the countries as shown in this table. The following table lists the country names and the product usage that you can select for this scenario.

<table>
<thead>
<tr>
<th>Country</th>
<th>Extension</th>
</tr>
</thead>
<tbody>
<tr>
<td>United States</td>
<td>Payroll</td>
</tr>
<tr>
<td>United Kingdom</td>
<td>Payroll</td>
</tr>
<tr>
<td>France</td>
<td>Payroll Interface</td>
</tr>
<tr>
<td>China</td>
<td>Human Resources or None</td>
</tr>
</tbody>
</table>

3. Click **Save**, and then click **Done**.
5 Understanding Migration and Loading of Payroll Setup Data

Payroll Data Loading

You can load payroll data for initial migration or mass data entry using the payroll batch loader, predefined processes, and web services. You can also automate the regular import of time cards, absence entries, and benefit enrollments using predefined flows.

This overview outlines your options to meet the following data loading requirements:

- Loading setup data
- Exporting and importing setup data between test and production environments
- Ongoing data loading

Loading Setup Data

You can use HCM Data Loader during implementation to migrate HCM setup data, including element entries and salaries. However, for most payroll-related setup data and worker data, as shown in the following table, use the payroll batch loader. You can load the data from a spreadsheet or a file.

<table>
<thead>
<tr>
<th>Payroll Setup Data</th>
<th>Worker Data</th>
</tr>
</thead>
<tbody>
<tr>
<td>Balances in balance groups</td>
<td>Assigned payrolls</td>
</tr>
<tr>
<td>Elements</td>
<td>Bank details for personal payment methods</td>
</tr>
<tr>
<td>Formula globals</td>
<td>Element entries</td>
</tr>
<tr>
<td>Object groups</td>
<td>Initial balance values</td>
</tr>
<tr>
<td>Payroll definitions</td>
<td></td>
</tr>
<tr>
<td>User-defined tables</td>
<td></td>
</tr>
</tbody>
</table>

Use the Batch Loader task in the Payroll Administration, Data Exchange, or Checklist work area to perform the following actions:

1. Enter the data in a workbook format that’s specific to the object type or create a batch from a file using a transformation formula.
2. Save your entries to staging tables.
3. Validate the data in staging tables.
4. Submit the Transfer Batch flow to load the data to the application tables. For initial balance values, use the Load Initial Balances flow instead.
Exporting and Importing Setup Data Between Environments

Typically, you initially migrate data to a test environment. After successful testing, you can move the data to your production environment using one of the following tasks:

- Use the Manage Configuration Packages task in the Setup and Maintenance work area to export and import a configuration package.
- Use the Create Batch for an Object process in the Payroll Administration work area to select specific objects, such as elements or formulas, to migrate.

Ongoing Data Loading

You can use the payroll batch loader and predefined batch processes to load element entries and other payroll data on an ongoing basis. You can automate the submission of the flows using the Flow Actions web service.

Specific flows exist for loading payroll-related data for payroll processing, such as the Load Absence Batches process, where you specify the interface type and XML file containing the data to load.

To import data from a third-party payroll provider, such as processed payroll data or payslips, you can use the HCM Data Loader.

Related Topics

- Implementation Project Based Export and Import: Explained
- Migrating Objects Using the Payroll Batch Loader: Procedure
6 Understanding Prerequisite Payroll Setup Tasks

Prerequisite Tasks for Payroll Setup

The Define Payroll task list in the Setup and Maintenance work area contains most of the setup tasks required for payroll processing. However, first you must complete the required common application configuration tasks. You may have already done some of these tasks because other HCM applications require them. Revisit tasks to address payroll-specific requirements, such as creating tax reporting units.

Perform the prerequisite tasks in the following task lists within Define Common Applications Configuration for Human Capital Management:

- Define Geographies for HCM
- Define Enterprise Structures for HCM
- Define Features by Country or Territory

Define Geographies for HCM

Verify predefined geographies and load any additionally required local geographies.

Define Enterprise Structures for HCM

Complete tasks in the task lists shown in the following table.

<table>
<thead>
<tr>
<th>Task List</th>
<th>Action</th>
</tr>
</thead>
<tbody>
<tr>
<td>Define Legal Jurisdictions and Authorities for HCM</td>
<td>• Create a legal jurisdiction if not already created or predefined for your country or territory.</td>
</tr>
<tr>
<td></td>
<td>• Create a legal authority for each government body you interact with.</td>
</tr>
<tr>
<td></td>
<td>• Create addresses for legal entities and legal authorities.</td>
</tr>
<tr>
<td>Define Legal Entities for HCM</td>
<td>• Create a legislative data group for each country or territory you operate in, to partition your payroll data.</td>
</tr>
<tr>
<td></td>
<td>• Create at least one legal entity designated as a payroll statutory unit (PSU) for each legislative data group.</td>
</tr>
<tr>
<td></td>
<td>• Associate each PSU with a legislative data group.</td>
</tr>
<tr>
<td></td>
<td>• Optionally, create calculation cards for statutory deductions for each PSU, if supported for your country or territory.</td>
</tr>
<tr>
<td>Define Legal Reporting Units for HCM</td>
<td>• Create any additional legal reporting units that you need under a PSU and designate them as tax reporting units.</td>
</tr>
<tr>
<td></td>
<td>• Optionally, create calculation cards for statutory deductions for each tax reporting unit, if supported for your country or territory.</td>
</tr>
<tr>
<td>Define Business Units for HCM</td>
<td>Create business units that you can use to perform one or more business functions.</td>
</tr>
</tbody>
</table>
Define Chart of Accounts for Enterprise Structures
Define Accounting Configurations for HCM

Create charts of accounts, ledgers, and accounting calendars. When you create a bank for a payment source, you must select a legal entity that’s assigned to a ledger for the associated legislative data group. Payroll costing also requires these financial components.

Define Features by Country or Territory
Review and update the selected features for countries and territories you operate in. These settings control the availability of payroll-related features, such as element templates, and address style and address validation rules used in processes and reports.

Related Topics
• Payroll Statutory Units, Legal Employers, and Tax Reporting Units: How They Work Together
• Legislative Data Groups: Explained
• Payroll Legislative Data: Explained
• Selecting Country Extensions: Critical Choices

Payroll Setup Tasks for Financials
Payroll integrates with Oracle Fusion Financials. You must set up components in Financials, such as charts of accounts and ledgers, before you can set up banks to process payments, associate a ledger to a payroll definition, and run processes to distribute costing results.

Complete the following setup tasks in the Setup and Maintenance work area for the chart of accounts and ledgers. The application implementation consultant job role can perform the following tasks.

Chart of Account Setup Tasks
Complete the following tasks to set up your chart of accounts information. Later, you associate the chart of accounts to a ledger.

<table>
<thead>
<tr>
<th>Task</th>
<th>Action</th>
</tr>
</thead>
<tbody>
<tr>
<td>Manage Chart of Accounts Value Sets</td>
<td>Create new or review existing value sets, which you will associate with a key flexfield segment.</td>
</tr>
<tr>
<td>Manage Chart of Accounts Structures</td>
<td>Create account structures that specify the segments to include, their order, and the value sets that will validate the data entered in the segments. Oracle Fusion General Ledger predefines the Accounting key flexfield.</td>
</tr>
</tbody>
</table>
### Understanding Prerequisite Payroll Setup Tasks

<table>
<thead>
<tr>
<th>Task</th>
<th>Action</th>
</tr>
</thead>
<tbody>
<tr>
<td>Manage Chart of Accounts Structure Instances</td>
<td>Create account structure instances, which you will use to record transactions and maintain account balances.</td>
</tr>
<tr>
<td>Manage Chart of Accounts Value Set Values</td>
<td>Create groups of values, which you will assign to a key flexfield segment.</td>
</tr>
<tr>
<td>Manage Account Hierarchies</td>
<td>Search, create, and edit hierarchical groupings of accounts.</td>
</tr>
<tr>
<td>Manage Accounting Calendars</td>
<td>Set up accounting calendar period details. Determine the total number, frequency, and duration of the accounting periods.</td>
</tr>
</tbody>
</table>
| Manage Account Combinations                      | 1. Create account combinations if the structure instance of your chart of accounts flexfield doesn’t allow dynamically created account combinations  
2. Create accounts for each account combination used in payroll. As a best practice, use the same account numbers for your payroll and general ledger accounts.  
3. If you reconcile payments in Oracle Fusion Cash Management, create an account combination for reconciliation differences. |

### Ledger Setup Tasks

You perform the following tasks as part of the accounting configuration setup for Global Payroll.

<table>
<thead>
<tr>
<th>Task</th>
<th>Action</th>
</tr>
</thead>
<tbody>
<tr>
<td>Manage Primary Ledgers</td>
<td>Create a ledger with a chart of accounts, accounting calendar, currency and subledger accounting method.</td>
</tr>
</tbody>
</table>

> **Note**: If you are creating bank information, you must create a primary ledger.

<table>
<thead>
<tr>
<th>Task</th>
<th>Action</th>
</tr>
</thead>
<tbody>
<tr>
<td>Assign Legal Entities</td>
<td>Add the legal entities that use the ledger.</td>
</tr>
<tr>
<td></td>
<td>The Manage Legal Entity HCM Information task associates the payroll statutory units for legal entities to the legislative data group.</td>
</tr>
</tbody>
</table>
| Specify Ledger Options                           | 1. Complete all the fields for the General Information and Accounting Calendar, and Subledger Accounting sections.                  
2. In the Period Close section, select the Retained Earnings Account you will use for payroll.  
3. In the Journal Processing Intercompany subsection, select the option to launch AutoReverse after the open period. |
| Assign Balancing Segment Values to Legal Entities| Assign specific balancing segment values to each legal entity before assigning values to the ledgers. By specifying this information, you can more easily identify legal entities during transaction processing and reporting |
| Assign Balancing Segment Values to Ledger        | Optionally, assign specific primary balancing segment values to the primary and secondary ledgers to represent transactions for nonlegal entities, such as adjustments. |
| Manage Reporting Currencies                      | Review and update reporting currencies.                                                                                                                                                     |
### Task and Action

<table>
<thead>
<tr>
<th>Task</th>
<th>Action</th>
</tr>
</thead>
<tbody>
<tr>
<td>Reporting currencies maintain and record subledger and general ledger journal entries in additional currencies.</td>
<td></td>
</tr>
<tr>
<td>Review and Submit Accounting Configuration</td>
<td>Submit your configuration.</td>
</tr>
<tr>
<td>Open First Period</td>
<td>Open the first period when you are ready to process transactions for the ledger.</td>
</tr>
<tr>
<td></td>
<td>After you open the first period, use the Manage Accounting Periods in General Ledger to open and close periods, and to specify the target period that concludes the series of calendar periods.</td>
</tr>
</tbody>
</table>

### Related Topics

- Payroll Costing Components: How They Work Together
- Ledgers: Points to Consider
- Payroll Setup Tasks for Subledger Accounting: Procedure
- Assigning Legal Entities and Balancing Segments: Examples
- Chart of Accounts Structure and Instances: Critical Choices

### Payroll Cost Allocation Key Flexfield Setup

The cost allocation key flexfield creates a structure for financial accounting of your payroll costs. The flexfield captures the account codes you use to create accounting entries, and to report and track your labor costs. When planning how to create a key flexfield structure, consider the following choices:

- Structure of the cost allocation key flexfield
- Value sets for the segments
- Cost hierarchy levels enabled to populate each cost account segment
- Required and optional segments
- Segments required for the offset account
- Number of structure instances of the cost allocation key flexfield

**Note:** After you create your flexfield, you can generate database items for use in your formulas and extracts by submitting the Generate Flexfield Database Items process from the Payroll Checklist or Payroll Administration work area.

### Structure of the Cost Allocation Key Flexfield

Decide what structure to use for the cost allocation key flexfield. You use the Manage Cost Allocation Key Flexfield task in the Setup and Maintenance work area.
The structure of the flexfield defines the segments to include, their order, and the value sets to validate the data entered in the segments. Using the predefined Cost Allocation key flexfield to create the structure, you specify:

- Segment labels, the row headings that correspond to the cost hierarchy levels
- Column headings, which correspond to the segment of your account structure

Tip: As a best practice, create a structure based on the structure of the Accounting flexfield used for the chart of accounts that receives the payroll costing entries. Use a similar sequence of segments and naming conventions to facilitate setup.

The structure you deploy generates a reference table on the costing setup pages. The following figure illustrates how the column heading and segment label make the company account information available for entry on the Manage Costing of Payroll page.

The following table lists questions to consider before you create the cost allocation key flexfield structure.

<table>
<thead>
<tr>
<th>Decision</th>
<th>Description</th>
</tr>
</thead>
<tbody>
<tr>
<td>How many cost allocation key flexfield segments does your Accounting flexfield include?</td>
<td>You must create a segment for each corresponding segment of the Accounting flexfield.</td>
</tr>
<tr>
<td>Do you need to reserve segments for future use?</td>
<td>You can’t update the flexfield structure. You can create segments for later use, such as new lines of business, and display them as needed.</td>
</tr>
<tr>
<td>Do you capture context sensitive information for legislative purposes?</td>
<td>Create additional segments to capture context sensitive costing, such as separate liability accounts maintained for each state and state tax.</td>
</tr>
<tr>
<td>Do you capture information used by other applications?</td>
<td>Create additional segments, for example, to record the breakdown of costs of a project for reporting purposes.</td>
</tr>
</tbody>
</table>
Value Sets for the Segments

Decide whether to use existing value sets or to create new value sets.

You associate each segment to a value set created using the Manage Payroll Costing Value Sets task in the Setup and Maintenance work area. For example, you might reuse an existing value set that you defined for your accounting flexfield, or create a subset of those values, which only apply to payroll.

**Tip:** Consider creating a single value when several accounts use the same value. For example, you might use a value set with a single value of zeros as a placeholder for account segments, such as future use segments.

The following figure shows an additional segment added to the structure that doesn’t have a corresponding segment in the Accounting flexfield, and the value sets associated to each segment.

![Key Flexfield and Value Sets Diagram]

Cost Hierarchy Levels

Consider which level of the cost hierarchy is the primary source of values for that segment and which levels should receive overrides. These decisions control which cost account segments the application displays on the costing setup pages.

The following table includes examples of the segment labels you might specify for costing.

<table>
<thead>
<tr>
<th>Segment</th>
<th>Example</th>
</tr>
</thead>
<tbody>
<tr>
<td>Payroll</td>
<td>Select Payroll for segments that seldom change for the people assigned to the payroll, such as company, line of business, and future use segments.</td>
</tr>
<tr>
<td></td>
<td><strong>Tip:</strong> To report costing by business unit, set up payrolls for persons in a single business unit. Specify a segment at the payroll level to record the account information for the business unit.</td>
</tr>
<tr>
<td>Element Eligibility</td>
<td>Select Element Eligibility for natural accounts.</td>
</tr>
<tr>
<td></td>
<td>You also use this level for cost center segments needed for balance sheet accounts, such as deduction elements which are usually created at the payroll relationship level.</td>
</tr>
</tbody>
</table>

| Department       | Select Department for cost centers.                                    |
### Understanding Prerequisite Payroll Setup Tasks

<table>
<thead>
<tr>
<th>Segment</th>
<th>Example</th>
</tr>
</thead>
<tbody>
<tr>
<td>Job or Position</td>
<td>Select Job to compare and roll-up costs based upon job category. Select Position if you are using position management at your enterprise, to better track the cost of turnover to the enterprise. Costing at these levels requires higher maintenance to set up and manage the costing in diverse and complex organizations.</td>
</tr>
<tr>
<td>Person</td>
<td>Select Person to cost at the payroll relationship and assignment level, and for elements at each of these levels. You might select Person to enable allocation of wages when costs are shared by several cost centers. You might need to override the activity or natural account segment that is usually enabled at the element level.</td>
</tr>
<tr>
<td>Element Entry</td>
<td>Select Element Entry to override all other levels, with one exception. Costing at the element entry level is overridden by the segments defined for the Priority account for that element. You might select the segment for cost center at the element entry level to cover situations where a person works at another cost center for a payroll period.</td>
</tr>
</tbody>
</table>

### Required and Optional Segments

Determine which segments to make required based on whether you want to place in a suspense account a costing result with a blank value for a segment. When you set up costing, if you don’t specify a value for a cost account segment on any level of the costing hierarchy, the resulting calculation is determined by two factors:

- Segment is required or optional
- Suspense account is defined

If you define a segment as:

- Optional, regardless of whether you define a suspense account, the costing result displays a blank (null) value in the segment
- Required, and the suspense account is defined, the costing result is placed in a suspense account
- Required, and the suspense account is not defined, the calculation displays an error, and the person’s results are not costed

### Segments Required for the Offset Account

Decide which segments of the offset account require costing.

The offset account balances the cost account. It uses the segments of the cost account unless you specify a different value for the corresponding segment. For example, if the only difference between your cost and offset accounts is the natural account segment, for the element eligibility segment label, you would select the natural account for the offset account.
Number of Structure Instances
You create structure instances of your cost allocation key flexfield that you then associate to legislative data groups. Structure instances share the same set, arrangement, and properties of the cost allocation key flexfield structure. If a legislative data group requires different value sets for the flexfield segments, create a separate instance for that legislative data group.

Related Topics
- Payroll Setup Tasks for Costing Accounts: Critical Choices
- Costing of Elements: Critical Choices
- Payroll Costing Components: How They Work Together
- Cost Hierarchy: Explained
- Generating Flexfield Database Items: Explained

Setting Up Reconciliation for Payments
Oracle Fusion Global Payroll integrates with Oracle Fusion Cash Management and Oracle Fusion General Ledger. This integration facilitates the setup of banks, branches, and bank accounts, and the reconciliation of bank statements with payment transactions.

An administrator or implementor with the appropriate privileges performs the tasks shown in the following table in the Setup and Maintenance work area:

<table>
<thead>
<tr>
<th>Application</th>
<th>Setup Steps</th>
<th>Task</th>
</tr>
</thead>
<tbody>
<tr>
<td>General Ledger</td>
<td>Create an account combination for the reconciliation differences account.</td>
<td>Manage Account Combinations</td>
</tr>
<tr>
<td>Cash Management</td>
<td>Set up transaction codes that map to the payment method transaction codes used in payroll.</td>
<td></td>
</tr>
<tr>
<td></td>
<td>• Manage Cash Transaction Type Mapping</td>
<td></td>
</tr>
<tr>
<td></td>
<td>• Manage Bank Statement Transaction Codes</td>
<td></td>
</tr>
<tr>
<td>Cash Management</td>
<td>Create reconciliation rules.</td>
<td>• Manage Bank Statement Reconciliation Tolerance Rules</td>
</tr>
<tr>
<td></td>
<td>• Manage Bank Statement Reconciliation Matching Rules</td>
<td>• Manage Bank Statement Reconciliation Rule Sets</td>
</tr>
<tr>
<td>Payroll</td>
<td>1. Create liability, cash clearing, and cash accounts for your payment sources.</td>
<td>Manage Costing of Payment Sources</td>
</tr>
<tr>
<td></td>
<td>2. Specify the option Transfer to General Ledger.</td>
<td></td>
</tr>
</tbody>
</table>

This topic covers the steps for setting up the following objects:
- Reconciliation differences account
Setting Up Reconciliation Differences Account

If you reconcile payment costs before posting the costing results to Oracle Fusion General Ledger, set up a reconciliation differences account in General Ledger using the Manage Account Combinations task. The reconciliation differences accounts in Cash Management records discrepancies between the bank statement and the transferred payment files, such as over and under payments.

Setting Up Payroll Transactions Codes

If you cost your payments, set up and map transaction codes in Cash Management for the organization payment methods.

<table>
<thead>
<tr>
<th>Task</th>
<th>Action</th>
</tr>
</thead>
</table>
| Manage Bank Statement Transaction Codes | 1. Review the transaction and statement codes that your enterprise currently uses  
                                          2. Create transaction codes for the transaction types that support your organization payment methods |
| Manage Cash Transaction Type Mapping | 1. Map transaction types to payment types used for the organization payment methods that support costing of payments.  
                                          2. Identify the organization payment methods for payroll accounts, such as payroll liability, cash, and cash clearing accounts. |

Setting Up Reconciliation Rules

Payroll processes transfer your payment entries to Cash Management for manual or automatic reconciliation with bank statements, and cost the unreconciled and reconciled payments to the appropriate account, such as the cash clearing and cash accounts.

If you reconcile transactions automatically, in Cash Management complete the tasks listed in the following table.

<table>
<thead>
<tr>
<th>Task</th>
<th>Action</th>
</tr>
</thead>
<tbody>
<tr>
<td>Manage Bank Statement Reconciliation Tolerance Rules</td>
<td>Create tolerance rules based on date, amount, or percentage that prevent or warn you when reconciliation exceeds a defined tolerance.</td>
</tr>
<tr>
<td>Manage Bank Statement Reconciliation Rule Sets</td>
<td>Assign a group of matching rules and tolerance rules to a bank account for reconciling bank statement lines with transactions.</td>
</tr>
<tr>
<td>Manage Bank Accounts</td>
<td>Specify the Reconciliation Differences account you set up in Oracle Fusion General Ledger.</td>
</tr>
</tbody>
</table>
Setting Up Payroll Accounts

Create a liability and cash account. Create a cash clearing account to track payments such as checks, where a delay exists between the date the payment is issued and the date it clears. Use the Manage Costing of Payments task in the Setup and Maintenance work area or in the Accounting Distribution work area of Oracle Fusion Global Payroll.

> **Note:** When you set up the accounts, it’s best practice to enter the same account information that you use for the cash and cash clearing account that you created in General Ledger.

**Related Topics**

- Organization Payment Methods: Explained
- Creating Accounts: Points to Consider
- Payroll Setup Tasks for Subledger Accounting: Procedure
- Reconciling Payroll Payments: Procedure
7 Setting Up Payroll Fundamentals

Payroll Business Definitions

Payroll Business Definitions: Explained

An integral part of the payroll setup is defining payroll business definitions. Use the Define Payroll Business Definitions task in the Define Payroll tasks list to create lookups, value sets, and descriptive flexfields that you need to support payroll.

Lookups

Lookups are lists of values in applications. You define a list of values as a lookup type consisting of a set of lookup codes, each code’s translated meaning, and optionally a tag. End users see the list of translated meanings as the available values for an object.

When managing lookups, you need to understand the following.

- Using lookups in applications
- Configurable levels
- Accessing lookups
- Enabling lookups
- The three kinds of lookups: standard, common, and set enabled

Use lookups to provide validation or a list of values for a user input field in a user interface.

Value Sets

A value set is a group of valid values that you assign to a flexfield segment to control the values that are stored for business object attributes.

An end user enters a value for an attribute of a business object while using the application. The flexfield validates the value against the set of valid values that you configured as a value set and assigned to the segment.

For example, you can define a required format, such as a five digit number, or a list of valid values, such as green, red, and blue.

Descriptive Flexfields

Use descriptive flexfields to add customer-defined attributes to business object entities, and define validation for them.

All the business object entities that you can use in the application are enabled for descriptive flexfields. However, configuring descriptive flexfields is an optional task.

Configuring descriptive flexfields involves managing the available flexfields registered with your Oracle Applications Cloud database and configuring their flexfield-level properties, defining and managing descriptive flexfield contexts, and configuring global and context-sensitive segments.
Extensible Flexfields
Extensible flexfields are like descriptive flexfields, with some additional features.

Unlike descriptive flexfields, the columns corresponding to extensible flexfields segments are part of specific tables, separate from the base application table. Unlike descriptive flexfield contexts, the set of attributes in an extensible flexfield context remains constant and doesn’t differ by context value.

An extensible flexfield describes an application entity, with the run time ability to expand the database that implementation consultants can use to define the data structure that appears in the application.

Extensible flexfields support one-to-many relationships between the entity and the modified attribute rows.

To get a list of predefined extensible flexfields, open the Setup and Maintenance work area, and use the Manage Extensible Flexfields task.

The following aspects are important in understanding extensible flexfields:

- Usages
- Categories
- Pages
- Security
- Protected Extensible Flexfield Data

Related Topics
- Defining Value Sets: Critical Choices
- Flexfields and Value Sets: How They Work Together
- Managing Descriptive Flexfields: Points to Consider
- Extensible Flexfields: Explained
- Lookups: Explained

Profile Options
Profile Options: Explained

Use profile options to manage user preferences and control the general function of applications. For example, you can control user preferences involving language, date, time, currency, and other similar general settings.

You can create a profile option and also determine the level at which that profile option takes effect. You can also define the profile values for the profile option. The profile values appear on the Manage Administrator Profile Values page when you select the profile option.

Creating a Profile Option

1. In the Setup and Maintenance work area, open the panel tab and click Search to search for the Manage Profile Options task.
2. On the page, click Actions > New.
3. On the Create Profile Option page, fill all the fields with relevant details with specific attention to the following:

- Use the SQL Validation field to provide an SQL statement that displays the permissible profile values to be used. Using an SQL statement, you can select the values from another table and display them as a list of values.

  For example, to display the values Yes and No from a lookup table, you can use the following SQL statement:

  ```sql
  select MEANING, LOOKUP_CODE from FND_LOOKUPS where LOOKUP_TYPE='YES_NO'
  ```

  As a result, on the Manage Administrator Profile Values page, the profile values Yes and No are available for selection for that profile option.

- You can specify a date range to keep the profile option active during that period. Beyond the specified duration, the profile option automatically becomes inactive. If you no longer require the profile option, you must manually delete it from the Manage Profile Options page.

4. Click Save and Close.

5. On the Manage Profile Options page, search for the newly created profile option and from the results, select it.

6. In the Profile Option Levels section, do the following:

   - In Enabled, select the levels at which you want to enable the profile option.

     **Note:** You can enable a profile option at multiple levels, but a higher-level profile value overrides a lower-level value. Therefore, enable them only at the required levels.

   - In Updatable, select the profile level at which you want implementors to have update privileges. Leave the check box deselected if you don't want the implementors to modify the profile values (they appear in read-only mode).

7. Click Save and Close.

To edit a profile option that you created, search for it and edit the necessary details.

**Note:** While creating and editing profile options and profile categories, you can translate the details to the preferred languages without changing the language session of the application. To specify the translations in all the enabled language rows, use the Translation Editor option. Once the updates are made, users can view the translated text for the specific details.

**Related Topics**

- Hierarchy in Profile Levels: Explained
- Setting Profile Option Values: Procedure
- Using the Translation Editor: Procedure

Pay Frequency
Frequency and Annualization Factor on Salary Basis: Points to Consider

Frequency on the salary basis defines the time period of a worker's quoted base pay. The annualization factor is the multiplication factor that converts base pay at the selected frequency to an annualized amount.

Selecting Base Pay Frequency

To match the salary basis frequency to the payroll frequency, select **Payroll period** frequency on the salary basis. Be sure to define the associated payroll element and assign workers to payrolls. A worker who has multiple assignments on different payroll frequencies requires a different salary basis associated with each assignment.

Selecting the Annualization Factor

The following table shows the default factors supplied for the available frequency options. You can override the supplied default values.

<table>
<thead>
<tr>
<th>Frequency</th>
<th>Default Annualization Factor</th>
</tr>
</thead>
<tbody>
<tr>
<td>Annually</td>
<td>1</td>
</tr>
<tr>
<td>Monthly</td>
<td>12</td>
</tr>
<tr>
<td>Hourly</td>
<td>No default. Enter the number of hours in a work year to multiply by the hourly rate to calculate the annualized salary for this salary basis.</td>
</tr>
<tr>
<td>Payroll Period</td>
<td>Not available. The period type is linked to a worker's payroll.</td>
</tr>
</tbody>
</table>

The annualized amount:

- Shows how much a worker would be paid over a year, at the current rate
- Appears on compensation transaction pages

Related Topics

- Periodicity Conversion: Explained

Pay Frequency Components: How They Work Together

Pay frequency components together provide the flexibility to implement complex time-related objects used in payroll definitions, payroll processes, and payroll tasks that use start and end dates. This topic explains how the following pay frequency components work together to provide payroll functionality for your organization. Each of the following components requires its own setup and implementation:

- Consolidation Groups
- Payroll Definitions
- Time Definitions
Consolidation Groups

Use consolidation groups to process the results from more than one payroll run in a single action or process the results for one payroll in separate actions. With consolidation groups, you produce one set of results per payment method for several payrolls, one set of reports, and one set of costing results. For example, you may submit a regular payroll run and a supplementary payroll run for the same payroll period. If the regular run and supplementary run both belong to the same consolidation group, use a single consolidation group to process all the results for the post-run processing. Optionally, you can enter a different consolidation group for the supplementary payroll run and use it to process the post-run results for the supplementary payroll separately from the regular payroll.

Payroll Definitions

Payroll definitions are essential to your payroll implementation because they indicate the payment frequency and processing schedule. Payroll definitions associate employees with the payroll run through payroll relationships.

Time Definitions

Time definitions can be static periods of unusual length based on a given static date, or they can create dates based on dynamic variables. You can specify dynamic variables for a time span, a retrieval date, or a more complex definition type to use with a user-defined date. The application uses time definitions in many areas, including payroll periods, payroll employment management, balance dimensions, retroactive and proration events, element start and end dates, and overtime periods.

Run Types

Run types control the elements and payment types to process in a payroll run. Two predefined run types, Regular and Supplemental, group the other run types and determine their processing sequence. The predefined Regular and Supplemental run types include the two component run types described in this table.

<table>
<thead>
<tr>
<th>Run Type Component</th>
<th>Description</th>
</tr>
</thead>
<tbody>
<tr>
<td>Process Separately</td>
<td>Generates a separate payroll calculation for each element entry marked to process separately.</td>
</tr>
<tr>
<td></td>
<td>After processing separate processes:</td>
</tr>
<tr>
<td></td>
<td>• Includes element run results with normal payroll run results in a single payment.</td>
</tr>
<tr>
<td></td>
<td>• Excludes element run results in regular tax calculation on the normal run, for example, to use supplemental tax rates.</td>
</tr>
<tr>
<td>Separate Payment</td>
<td>Creates a separate payment for each element entry marked to pay separately.</td>
</tr>
</tbody>
</table>

For each of the component run types, you can specify payment methods that override the default payment methods for the payroll definition. You can also select the element classifications processed by runs of this type, and exclude specific elements from these classifications.

Statutory and Earning Periods: Explained

When you create a payroll definition, you generate a payroll earnings calendar based on the first period end date. The calendar assigns each payroll period a period name that includes the period number. In some countries the statutory tax
year doesn’t coincide with the dates generated for the earnings calendar. These countries also use a statutory calendar with statutory period numbers. The statutory calendar ensures that the payroll run uses the correct period for taxation purposes.

Statutory frequencies are defined in months and weeks and map to the payroll definition frequencies. For example, a biweekly calendar is based on a weekly statutory calendar. A quarterly payroll calendar is based on a monthly statutory calendar. Typically, countries that support semimonthly payroll periods don’t use statutory periods.

When you submit a payroll calculation, such as a QuickPay process, you select a payroll period. The calculation uses the process date for the selected payroll period to identify the statutory period. The process date is the payroll run date on the payroll definition.

If your country uses a statutory calendar, you can view period numbers and start and end dates on the Person Process Results page and statement of earnings.

FAQ for Pay Frequency

When would I close a payroll period?

Closing a payroll period can prevent unexpected changes to recurring entries. Payroll periods aren’t like General Ledger periods. Closing payroll periods is not necessary.

Why can't I find my organization payment method when creating other payroll objects?

When updating an object’s organization payment method, the effective start date of the organization payment method must be on or before the effective date of the change. For example, to create a payroll definition effective on 4/1/2012 with a default organization payment method, the organization payment method must have an effective start date on or before 4/1/2012. You can only select an organization payment method that has an effective start date on or before the date you are creating or updating the object.

Consolidation Groups

Consolidation Groups: Explained

A consolidation group enables you to process the results of more than one payroll runs in a single action. It is a grouping of payroll runs within the same period for the same payroll. You can produce one set of results, one set of reports, and one set of costing groups. These are runs you make in addition to your regular payroll runs. For example, you can use a consolidation group to make supplemental payments to a group of employees who left the organization.

You can specify a default consolidation group for each payroll definition.

Use the Manage Consolidation Groups task in the Payroll Calculation work area to create consolidation groups.

To create a consolidation group:

1. Select the Manage Consolidation Groups task in the Payroll Calculation work area.
2. On the Manage Consolidation Groups page, click Add Row.
3. Enter a Name and select a Legislative Data Group. Adding the Description is optional, but it is useful to provide.
4. Click Save.

Consolidation Group Usage: Examples

You create consolidation groups by selecting the Manage Consolidation Groups task from the Payroll Calculation work area. The following scenarios provide examples of how you can use consolidation groups.

Post-Run Processing

Consolidation groups facilitate separating payroll run results for supplemental processing. For most payroll post-run processing, you can use the consolidation group as an input parameter. You may want the results of a supplemental payroll run to be kept separately from those of the regular payroll process that was already performed. To use a consolidation group to keep supplemental run results separate from the regular payroll runs:

1. Create a new consolidation group used to label the supplemental payroll run.
2. Initiate the supplemental payroll run, specifying the new consolidation group as an input parameter.

Separate Costing and Payment

You can use multiple consolidation groups to control processing. For example, you want to process and pay a particular set of employees separately within a single payroll to keep separate records of payment and costing.

To process employees separately:

1. Create a new consolidation group to specify when running the Calculate Payroll process.
2. Create payroll relationship groups that restrict the employees.

You can use rules to identify them dynamically or you can specify the employees by their payroll relationship numbers.

3. Run the Calculate Payroll process for each payroll relationship group separately. Specify the original consolidation group in the first run and the new consolidation group in the next run.

Reporting

You can use consolidation groups for reporting purposes. For example, you may want to run the Payroll Activity Report for a subset of payrolls.

To process the report for a subset of payrolls:

1. Create a consolidation group to specify the payrolls for which you want to run the report.
2. Run the Payroll Activity Report, specifying the new consolidation group.

Payroll Definitions

Payroll Definitions: Explained

Payroll definitions contain calendar and offset information, which determines when to calculate and cost payments. Use the Manage Payroll Definitions task in the Payroll Calculation work area to specify payment frequency, processing schedule, and
other parameters for a particular payroll. Payroll period types, such as weekly or monthly, determine the interval at which you pay employees.

Create at least one payroll definition for each payroll period type that you use to pay employees. For example, to pay employees semimonthly, create a payroll definition using the semimonthly payroll period type, ensuring that tax calculations and other calculations produce correct results for those employees.

Creating Payroll Definitions

When you create a payroll definition, the application generates the complete payroll schedule based on the payroll period type, any offsets or calendar adjustments, and the number of years that you specify. Each payroll in the schedule is assigned a unique name. After you have saved a payroll definition, you can assign employees to it on the Manage Payroll Relationships page. A common scenario for creating a payroll definition is to replace one that is expired or end-dated.

Each payroll must belong to a consolidation group, which the application requires for processing purposes. Before you can create a payroll definition, the legislative data group and the consolidation group to use for it must already exist.

Modifying Payroll Definitions

When you modify a payroll definition, the application adjusts the payroll schedule based on the values you have modified. A common scenario for modifying an existing payroll definition is to increase the number of years and generate more payroll time periods that configure the payroll calendar.

**Note:** You can configure the payroll calendar by increments of ten or fewer years.

The names of the payrolls in the payroll schedule are unique. You can edit the generated payroll names, but you must ensure they are unique within the payroll definition.

Managing Payroll Definitions: Points to Consider

When you create or modify payroll definitions, the application generates a calendar of payroll periods based on your selections. The choices you make for the following values determine the resulting schedule of payroll periods:

- Effective start date
- First period end date
- Number of years
- Offsets
- Changes to specific dates

**Effective Start Date**

The effective start date is the first date that the payroll definition is available for employee data. The start date must be on or before the earliest date of any historical data that you want to load. For example, for a payroll starting on 01-JAN-2013 with five years of historical payroll data to load, you set the start date of the payroll definition to 01-JAN-2008.

The effective start date does not affect the generated calendar of payroll periods. The start date for the first payroll period is based on the first period end date.

**First Period End Date**

The first period end date is the end date of the first payroll period that the application generates for a payroll definition. The first period end date is typically based on the date of implementation, tax year, benefits enrollments, or a particular payment
cycle. For example, if your weekly payroll work week is Saturday through Friday, and your first payment date is on 06-JAN-2012, you could use 30-DEC-2011 as your first period end date.

Number of Years
The number of years you enter represents how many years of time periods to generate starting from the beginning of the first payroll period, which is determined by the first period end date. This table shows an example for a semimonthly payroll definition.

<table>
<thead>
<tr>
<th>Effective Start Date</th>
<th>First Period End Date</th>
<th>Number of Years</th>
<th>Generated Time Periods</th>
</tr>
</thead>
<tbody>
<tr>
<td>01-JAN-1986</td>
<td>15-JUN-2014</td>
<td>5</td>
<td>01-JUN-2014 to 31-MAY-2018</td>
</tr>
</tbody>
</table>

Once you save a payroll definition, you can later only increase but not reduce its number of years because a calendar of time periods for the payroll was already generated.

⊲ **Note:** The application generates the calendar of payroll periods in increments of ten or fewer years. For example, if you want a 12-year calendar of payroll periods, you first enter 10 years and submit your changes. Then you edit the payroll definition setting the number of years to 12.

Offsets
Depending on the payroll period type, you can elect for your payroll cycle events to occur on specific dates, or to have the application calculate dates based on offsets from period start or end dates.

This table describes the predefined payroll cycle events that you can offset.

<table>
<thead>
<tr>
<th>Date</th>
<th>Meaning</th>
</tr>
</thead>
<tbody>
<tr>
<td>Cutoff Date</td>
<td>Final date that payroll information can be entered for the payroll period.</td>
</tr>
<tr>
<td>Payslip Availability Date</td>
<td>Date on which payees can view payslips.</td>
</tr>
<tr>
<td>Payroll Run Date</td>
<td>Date used by payroll calculation processes to retrieve effective values such as employee details. The process date, if provided when submitting a payroll process, overrides this value. This date is predefined for your country or territory and is typically based on either date earned or date paid that payroll calculation uses as the process date.</td>
</tr>
<tr>
<td>Date Earned</td>
<td>Date on which the application processes element entries for the payroll run. The date earned must be within the effective dates of the payroll period.</td>
</tr>
<tr>
<td>Date Paid</td>
<td>Date the employee is marked as paid. For check payments, this is the date that the check is valid for cash or deposit. For electronic funds transfer (EFT) payments, it is the transfer date.</td>
</tr>
</tbody>
</table>

Dynamic Offsets
When creating a payroll definition, you can use dynamic offsets for payroll cycle events. All of the predefined payroll time periods you can use support dynamically generated dates for offsets. Using dynamic offsets, you can offset each payroll cycle event by a specified number days before or after the start or end date, as shown in this table.
Offset Day Types | Offset Value | Base Date Values
---|---|---
Number of work days | Before | Period Start Date
Number of calendar days | After | Period End Date

For example, you might want to set the cutoff date three work days before the payroll end date. This offset accommodates differences in the number of days in the payroll period and also accounts for weekends and holidays.

**Fixed-Date Offsets**

The predefined Monthly (Calendar) payroll time period supports using both dynamic offsets and fixed-date offsets. Using fixed dates, you can adjust the exact date of each of the payroll cycle events for the first payroll period. Any adjustments that you make are reflected in the payroll calendar for subsequent payroll time periods. For example, if you set the cutoff date as the 25th of the month, then all payroll periods in the calendar will have those offsets.

**Specific Date Adjustments**

Once you generate the payroll time periods, you can further adjust any specific calendar dates, as needed. For example, if you know of a particular bank holiday that falls on a payment date, you might want to adjust the dates manually on the payroll calendar’s time period. You can make these adjustments when creating a payroll definition or any time after then, as long as the time period is in the future. Adjust the dates of an existing time definition on the Time Periods tab on the Manage Payroll Definitions page.

**Related Topics**

- Periodicity Conversion: Explained

**Creating Payroll Definitions: Worked Example**

This example demonstrates how to create two payroll definitions for different payment frequencies that are associated with one consolidation group and one legislative data group.

In this example, the InFusion US company creates payroll definitions for two sets of employees. One set is permanent salaried employees who are paid on a semimonthly basis, and the other is temporary employees that are paid on a monthly basis using time card data.

The business requires that a single monthly costing process uses results from different payroll runs by using the consolidation group name as an input parameter in the costing run. This example creates two payroll definitions with different payment periods with the same consolidation group. Both definitions are effective starting on 1/1/11 and generate payroll time periods covering five years.

**Prerequisites**

1. Ensure that the legislative data group for your payrolls exists, such as InFusion US LDG.
2. Ensure that organization payment methods exist for your payrolls, such as InFusion US Employee Check and InFusion US Employee EFT.
3. Create a consolidation group named InFusion US Employee Group assigned to the InFusion US LDG.
Creating the Payroll Definitions

Create two payroll definitions:

- One to pay permanent employees a flat amount by electronic funds transfer (EFT) on a semimonthly basis. This payroll definition includes dynamically generated offset dates.
- One to pay temporary employees by check using time card data on a monthly calendar basis.

Perform the following steps twice, first using the semimonthly values and then using the monthly values.

1. In the Payroll Calculation work area, click Manage Payroll Definitions.
2. In the Search Results section of the Manage Payroll Definitions page, click the Create icon.
3. Select the InFusion US LDG legislative data group from the list.
4. Enter 1/1/11 as the effective start date you want the payroll to be available for use, and then click Continue.

   In this example, your company hires all employees after the effective start date of this payroll definition, so there is no issue with loading historical employee data.

5. In the Basic Details section, complete the fields as shown in this table, and then click Next.

<table>
<thead>
<tr>
<th>Field</th>
<th>Semimonthly Value</th>
<th>Monthly Value</th>
</tr>
</thead>
<tbody>
<tr>
<td>Name</td>
<td>InFusion US Employee Semimonthly</td>
<td>InFusion US Employee Monthly</td>
</tr>
<tr>
<td>Reporting Name</td>
<td>InFusion US Semimonthly</td>
<td>InFusion US Monthly</td>
</tr>
<tr>
<td>Consolidation Group</td>
<td>InFusion US Employee Group</td>
<td>InFusion US Employee Group</td>
</tr>
<tr>
<td>Period Type</td>
<td>Semimonthly</td>
<td>Monthly (Calendar)</td>
</tr>
<tr>
<td>First Period End Date</td>
<td>6/15/12</td>
<td>6/30/12</td>
</tr>
<tr>
<td>Default Payment Method</td>
<td>InFusion US Employee EFT</td>
<td>InFusion US Employee Check</td>
</tr>
</tbody>
</table>

6. On the Payroll Offsets page, in the Number of Years field, enter 5.

   Note: The application generates the calendar of payroll periods in increments of 10 or fewer years. For example, if you want a 12-year calendar of payroll periods, you first enter 10 years and submit your changes. Then you edit the payroll definition, setting the number of years to 12.

7. For the semimonthly payroll, use dynamic variables to define offsets as shown in this table, and then click Next.

<table>
<thead>
<tr>
<th>Field</th>
<th>Falls Value</th>
<th>Day Type Value</th>
<th>Offset Value</th>
<th>Base Date Value</th>
</tr>
</thead>
<tbody>
<tr>
<td>Cutoff Date</td>
<td>5</td>
<td>Work Days</td>
<td>Before</td>
<td>Period End Date</td>
</tr>
<tr>
<td>Payroll Run Date</td>
<td>3</td>
<td>Work Days</td>
<td>Before</td>
<td>Period End Date</td>
</tr>
</tbody>
</table>

8. For the monthly payroll, use fixed dates to define offsets as shown in this table, and then click Next.
### Field | Value
--- | ---
Fixed Date | Yes
Cutoff Date | 6/25/12
Date Earned | 6/30/12
Payroll Run Date | 6/27/12
Date Paid | 6/30/12

9. On the Payroll Calendar page, adjust payroll days to account for a bank holiday, as shown in this table.

<table>
<thead>
<tr>
<th>Column</th>
<th>Semimonthly Value</th>
<th>Monthly Value</th>
</tr>
</thead>
<tbody>
<tr>
<td>Payroll Run Date</td>
<td>Old Value: 11/28/13</td>
<td>Old Value: 5/27/13</td>
</tr>
</tbody>
</table>

10. Click Next.
11. Review the details of the payroll definition, and then click Submit.

### Time Card Required Option: Critical Choices

If a worker’s pay calculations depend upon the worker submitting time cards, you must indicate that a time card is required at the appropriate employment level. Select the Time Card Required check box for each assignment level that the requirement applies. Don’t select the Time Card Required check box for these scenarios:
- A salaried employee completes project time cards for billing purposes, but isn’t paid based upon those time entries
- An hourly employee is normally paid based on a predefined work schedule and only submits a time card for overtime or when absent

#### Selecting the Time Card Required Option

Your role determines where typically you select the Time Card Required check box:
- HR specialists can select the check box on the Employment Information page of the new hire flow.
- Payroll managers and payroll administrators can select the Manage Payroll Relationship task in the Payroll Calculations or Payroll Administration work areas. The Payment Details section of the Manage Person Details page includes the Time Card Required check box on the Assignment sections.

The following table shows which hours the payroll calculation uses for elements with a calculation rule of hours multiplied by rate.

<table>
<thead>
<tr>
<th>Time Card Required</th>
<th>Hours Used in Calculations</th>
</tr>
</thead>
<tbody>
<tr>
<td>Yes</td>
<td>Time card entries</td>
</tr>
</tbody>
</table>
Time Card Required | Hours Used in Calculations
---|---
No | Work schedule, unless you enter hours as element entries

Related Topics
- Creating Elements for Time Card Entries: Procedure
- Processing Time Entries in Payroll: Explained

Time Definitions

Using Time Definitions for Severance Pay: Example

The following example illustrates how to set up a user-defined time definition and associate it with elements so that payroll administrators can extend the latest entry date for severance payments to employees.

Scenario

The InFusion Corporation makes severance payments, including regular salary, car allowance, and alimony. For most terminated employees, these payments should end on the termination date. However, payroll administrators must be able to make payments for employees who receive severance pay.

Element Duration Dates

When you create an element, you select the latest entry date. The options are predefined time definitions: last standard earnings date, last standard process date, or final close date. Typically, standard earnings elements use the last standard earnings date. However, this option doesn’t support severance payments because you can’t have a last standard earnings date that is beyond the termination date.

Analysis

To support severance payments, InFusion creates a user-defined time definition based on last standard earnings date and selects it as the latest entry date for payments after termination. On the payroll relationship record of terminated employees, the value of the user-defined time definition is the termination date by default, but payroll administrators can edit it to make payments for certain employees.

Resulting Setup

To implement a user-defined time definition for this scenario, InFusion must complete the following setup during implementation:

1. Using the Manage Time Definitions task, create a time definition.

This table lists field names and their respective values for creating a user-defined time definition.

<table>
<thead>
<tr>
<th>Field</th>
<th>Value</th>
</tr>
</thead>
<tbody>
<tr>
<td>Type</td>
<td>User-defined date</td>
</tr>
<tr>
<td>Name</td>
<td>Last Earnings or Severance Date</td>
</tr>
</tbody>
</table>
### Field | Value
--- | ---
Short Name | LastEarnSevDate
User-Defined Date | Last Standard Earnings Date
User-Defined Date Usages | Assigned payroll end date
| Element entry end date
| Payroll assignment end date
| Payroll relationship end date
| Payroll term end date

This creates a time definition based on the last standard earnings date.

2. Using the Manage Elements task, create the Regular Salary, Car Allowance, and Alimony elements.
3. In the Durations area, select **Last Earnings or Severance Date** as the latest entry date for the element.

To extend the payment date for a terminated employee, the payroll administrator then performs the following steps:

1. Using the Manage Payroll Relationship task, search for and select the terminated employee.
2. In the Payroll Details area, select the assignment.
3. In the Element Duration Dates area, in the row for the Last Earnings or Severance Date time definition, change the End Date value to the desired final entry date for payments.

For example, add 6 months of severance pay for an employee who was terminated effective 20 November 2012. Change the End Date value of the Last Earnings or Severance Date time definition to 21 May 2013.

The employee’s element entries for the Regular Salary, Car Allowance, and Alimony elements end on this date.

### Related Topics
- Element Duration Dates in Payroll Relationships: Explained
- Creating Earnings Elements for Payroll: Worked Example
- Defining Payroll Elements for Payroll Interface: Worked Example

### Run Types

#### Run Types: Explained

Run types control the elements and payment types to process in a payroll run. You may specify default payment methods that override the default payment methods on the payroll definition.
Two predefined run types, Regular and Supplemental, group the other run types and determine their processing sequence.

- The regular run type includes:
  - Regular Normal
  - Process Separately
  - Separate Payment

- The supplemental run type includes:
  - Supplemental Normal
  - Process Separately
  - Separate Payment

A Separate Payment run type creates a separate payment for each element entry marked to pay separately.

A Process Separately run type generates a separate payroll calculation for each element entry marked to process separately.

When the separate processes are completed, the element run results are included with the normal payroll run results in a single payment. You use a separate process to exclude element run results in regular tax calculation on the normal run, for example, to use supplemental tax rates. It therefore results in a lower rate for the normal run as well as for the supplemental earnings.

The run types are predefined and you will rarely create additional run types.

**User Defined Tables**

**Creating a User-Defined Table for Matched Row Values: Example**

User-defined tables store date effective list of values that you can use in a formula. Set up your own structured tables to hold data such as wage codes or shift differentials. This example illustrates how to create a user-defined table to store values for workers’ schedules. To create a new table, use the Manage User-Defined Tables task in the Payroll Calculation work area.

**Scenario**

Your organization works on a 10 hour a day, four day a week rotating schedule. The employees work for four consecutive days, 10 hours a day.

**User-Defined Table Components**

The main components of the user-defined table are:

- Basic details
- Columns
- Rows
- Values
Analysis

In this example, the user-defined table contains the schedules available in your organization, as shown in the following figure.

<table>
<thead>
<tr>
<th></th>
<th>Monday - Thursday</th>
<th>Tuesday - Friday</th>
<th>Wednesday - Saturday</th>
<th>Thursday - Sunday</th>
</tr>
</thead>
<tbody>
<tr>
<td>Monday</td>
<td>10</td>
<td>0</td>
<td>0</td>
<td>0</td>
</tr>
<tr>
<td>Tuesday</td>
<td>10</td>
<td>10</td>
<td>0</td>
<td>0</td>
</tr>
<tr>
<td>Wednesday</td>
<td>10</td>
<td>10</td>
<td>10</td>
<td>0</td>
</tr>
<tr>
<td>Thursday</td>
<td>10</td>
<td>10</td>
<td>10</td>
<td>10</td>
</tr>
<tr>
<td>Friday</td>
<td>0</td>
<td>10</td>
<td>10</td>
<td>10</td>
</tr>
<tr>
<td>Saturday</td>
<td>0</td>
<td>0</td>
<td>10</td>
<td>10</td>
</tr>
<tr>
<td>Sunday</td>
<td>0</td>
<td>0</td>
<td>0</td>
<td>10</td>
</tr>
</tbody>
</table>

Resulting User-Defined Table Components

In this example:

- Basic details include:
  - Unit of measure, which is text since the row values are days of the week.
  - Row title, which is Days of the Week.
- Rows contain the name of a day of the week.
- Columns are the schedules, such as Monday - Thursday. The data type for each column is number because they hold a number of hours.
- Values are the number of hours to work each day in each schedule.

Creating a User-Defined Table for a Range of Row Values: Example

This example illustrates how to create a user-defined table to store values for stock option allocations. To create a new table, use the Manage User-Defined Tables task in the Payroll Calculation work area.

Scenario

Each year, your organization offers stock options to its employees. The amount of options depends on years of service and job category of the employee receiving them.
User-Defined Table Components

The main components of the user-defined table are the definition, columns, rows, and values.

- **Basic details**
- **Columns**
- **Rows**
- **Values**

Analysis

In this example, the user-defined table contains stock option allocations by job category and years of service, as shown in the following figure.

<table>
<thead>
<tr>
<th>User-Defined Columns (Job Category)</th>
</tr>
</thead>
<tbody>
<tr>
<td>Executive</td>
</tr>
<tr>
<td>1 - 3</td>
</tr>
<tr>
<td>4 - 5</td>
</tr>
<tr>
<td>6 – 8</td>
</tr>
<tr>
<td>9 - 10</td>
</tr>
<tr>
<td>10 - 15</td>
</tr>
<tr>
<td>16 - 20</td>
</tr>
<tr>
<td>21 - 99</td>
</tr>
</tbody>
</table>

Resulting User-Defined Table Components

In this example:

- **Basic details include**:
  - Unit of measure, which is number since the row values are years.
  - Row title, which is Years of Service.

- **Rows** represent a range of years of service during which employees receive the same number of stock options.

- **Columns** are job categories, and the data type of each column is number because they hold a number of stock options.

- **Values** are the number of stock options awarded to the specified job category during the specified years of service.
User Table Validation Formula Type

The User Table Validation formula type validates entries in user-defined tables. Select the formula in the Formula field for user-defined columns when you create or edit user-defined tables.

For example, you can use this formula type to ensure that entries are:

- Between a specified range
- Not a negative amount

Contexts
The EFFECTIVE_DATE (text) context is used for formulas of this type.

Input Variables
There must be one input variable and it must be called ENTRY_VALUE. The data type is text.

Return Values
The following return values are available to formulas of this type:

<table>
<thead>
<tr>
<th>Return Value</th>
<th>Data Type</th>
<th>Required</th>
<th>Description</th>
</tr>
</thead>
<tbody>
<tr>
<td>FORMULA_MESSAGE</td>
<td>Text</td>
<td>N</td>
<td>Returns a text message for either or both statuses. The message is displayed on the Create User-Defined Table: User-Defined Table Values page.</td>
</tr>
<tr>
<td>FORMULA_STATUS</td>
<td>Text</td>
<td>Y</td>
<td>Returns the value S (success) or E (error).</td>
</tr>
</tbody>
</table>

Sample Formula

This formula checks that the deduction entered in the Union A column of the Union Dues table is between 10.00 and 20.00:

```sql
/* Formula Name: Union A Dues Validation */
/* Formula Type: User Table Validation */
INPUTS ARE entry_value (text)
IF TO_NUMBER(entry_value) < 10.00 OR
TO_NUMBER(entry_value) > 20.00
THEN
    (formula_status = 'e'
    formula_message = 'Error: Union A dues must be between $10.00 and $20.00.'
    )
ELSE
    (formula_status = 's'
    formula_message = ''
    )
RETURN formula_status, formula_message
```
Setting Up Fast Formulas

Using Formulas

Using Formulas: Explained

Fast formulas are generic expressions of calculations or comparisons that you want to repeat with different input variables. Each formula usage summarized in this topic corresponds to one or more formula types, requiring specific formula inputs and outputs. You can use the Manage Fast Formulas task in the Setup and Maintenance work area, or work areas relevant to the formula type, such as Payroll Calculation.

Note: Requirements for specific formula inputs and outputs are explained in separate chapters of the Oracle Global HR Cloud: Using Fast Formula guide.

Calculate Payrolls

You can write payroll calculations and skip rules for elements to represent earnings and deductions.

With fast formulas you can:

- Associate more than one payroll formula with each element to perform different processing for employee assignments with different statuses.
- Define elements and formulas for earnings and deductions with highly complex calculations requiring multiple calls to the database.
- Associate a skip rule formula with an element to define the circumstances in which it’s processed.
- Configure the predefined proration formula to control how payroll runs prorate element entries when they encounter an event, such as a mid-period change in an element entry value.

Validate Element Inputs or User-Defined Tables

Use lookups or maximum and minimum values to validate user entries.

For more complex validations you can write a formula to check the entry. You can also use a formula to validate entries in user tables.

Edit the Rules for Populating Work Relationship or Payroll Relationship Groups

You can define criteria to dynamically populate a payroll relationship group or work relationship group.

When you create a payroll relationship group or work relationship group formula type, you can choose to use an expression editor or a text editor. The expression editor makes it easy to build criteria to define the group. For more complex conditions, such as validations, you can select the text editor.
Writing a Fast Formula Using Formula Text: Worked Example

This example demonstrates how to create a fast formula using the text editor to return the range of scheduled hours for managers and a different range for other workers.

Before you create your formula, you may want to determine the following:

<table>
<thead>
<tr>
<th>Decisions to Consider</th>
<th>In This Example</th>
</tr>
</thead>
<tbody>
<tr>
<td>Is the formula for a specific legislative data group?</td>
<td>No, this is a global formula that can be used by any legislative data group.</td>
</tr>
<tr>
<td>What is the formula type for this formula?</td>
<td>Range of Scheduled Hours</td>
</tr>
<tr>
<td>Are there any contexts used in this formula?</td>
<td>No</td>
</tr>
<tr>
<td>Are there any database item defaults?</td>
<td>Yes, ASG_JOB</td>
</tr>
<tr>
<td>Are there any input value defaults?</td>
<td>No</td>
</tr>
<tr>
<td>What are the return values?</td>
<td>MIN_HOURS, MAX_HOURS, FREQUENCY</td>
</tr>
</tbody>
</table>

Creating a Fast Formula Using the Text Editor to Determine a Manager’s Scheduled Hours

1. On the Overview page in the Setup and Maintenance work area, search for the Manage Fast Formulas Task.
2. Click Go to Task.
3. On the Manage Fast Formula page, click the Create icon to create a new formula.
4. On the Create Fast Formula page, complete the fields as shown in this table.

<table>
<thead>
<tr>
<th>Fields for the Fast Formula</th>
<th>Values for the Fast Formula</th>
</tr>
</thead>
<tbody>
<tr>
<td>Formula Name</td>
<td>Manager Range of Scheduled Hours</td>
</tr>
<tr>
<td>Formula Type</td>
<td>Range of Scheduled Hours</td>
</tr>
<tr>
<td>Description</td>
<td>Manager’s Range of Hours</td>
</tr>
<tr>
<td>Effective Start Date</td>
<td>1-Jan-2010</td>
</tr>
</tbody>
</table>

5. Click Continue.
6. Enter the following formula details in the Formula Text section:

/* DATABASE ITEM DEFAULTS BEGIN */
DEFAULT FOR asg_job IS ''
/* DATABASE ITEM DEFAULTS END */
JOB_1 = ASG_JOB
IF JOB_1 = 'Manager' then
\[
\begin{align*}
\text{MIN\_HOURS} &= 25 \\
\text{MAX\_HOURS} &= 40 \\
\text{FREQUENCY} &= 'H' \\
\text{else} \\
\text{MIN\_HOURS} &= 20 \\
\text{MAX\_HOURS} &= 35 \\
\text{FREQUENCY} &= 'H' \\
\text{return} & \text{ MIN\_HOURS, MAX\_HOURS, FREQUENCY}
\end{align*}
\]

7. Click **Compile**.
8. Click **Save**.

**Related Topics**
- Using Formula Components: Explained
- Formula Operators: Explained

**Writing a Fast Formula Using Expression Editor: Worked Example**

This example demonstrates how to create a fast formula that groups executive workers for reporting and processing. All executive workers are in department EXECT_10000. Once the formula is created, it will be added to the object group parameters so that only those workers in department EXECT_10000 are used in processing.

Before you create your formula, you may want to determine the following:

<table>
<thead>
<tr>
<th>Decisions to Consider</th>
<th>In This Example</th>
</tr>
</thead>
<tbody>
<tr>
<td>Is the formula for a specific legislative data group?</td>
<td>Yes, InVision</td>
</tr>
<tr>
<td>What is the formula type for this formula?</td>
<td>Payroll Relationship Group</td>
</tr>
</tbody>
</table>

**Creating a Fast Formula Using the Expression Editor**

1. On the Payroll Calculation Tasks page, click **Manage Fast Formulas** to open the Manage Fast Formulas page.
2. On the Manage Fast Formula page, click the **Create** icon to create a new formula.
3. On the Create Fast Formula page, complete the fields as shown in this table.

<table>
<thead>
<tr>
<th>Fields for Fast Formula</th>
<th>Values for Fast Formula</th>
</tr>
</thead>
<tbody>
<tr>
<td>Formula Name</td>
<td>Executive Payroll Relation Group</td>
</tr>
<tr>
<td>Type</td>
<td>Payroll Relationship Group</td>
</tr>
<tr>
<td>Description</td>
<td>Executive Workers</td>
</tr>
<tr>
<td>Legislative Data Group</td>
<td>Vision LDG</td>
</tr>
<tr>
<td>Effective As-of Date</td>
<td>1-Jan-2010</td>
</tr>
<tr>
<td>Type of Editor</td>
<td>Expression Builder</td>
</tr>
</tbody>
</table>
4. Click **Continue**.
5. In the Formula Details section, click **Add After** to add a row to enter the fields in this table.

<table>
<thead>
<tr>
<th>Conjunction</th>
<th>Database Item Name</th>
<th>Data Type</th>
<th>Operand</th>
<th>Literal Value</th>
</tr>
</thead>
<tbody>
<tr>
<td>None applicable</td>
<td>DEPARTMENT</td>
<td>Character</td>
<td>=</td>
<td>'EXECT_10000'</td>
</tr>
<tr>
<td>And</td>
<td>SELECT_EMP</td>
<td>Character</td>
<td>=</td>
<td>'YES'</td>
</tr>
</tbody>
</table>

6. Click **Compile**.
7. Click **Save**.

**Related Topics**
- Formula Operators: Explained

## Formula Errors

### Formula Compilation Errors: Explained

Compilation errors display in the Manage Fast Formulas page after you compile the formula. The compiler aborts the compilation process when it encounters an error. Error messages display the line number and type of error encountered.

#### Common Compilation Errors

This table lists the type and description of several common formula compilation errors.

<table>
<thead>
<tr>
<th>Formula Error Type</th>
<th>Description</th>
</tr>
</thead>
<tbody>
<tr>
<td>Syntax Error</td>
<td>The formula text violates the grammatical rules for the formula language. An example is using IF1 instead of IF for an IF statement.</td>
</tr>
<tr>
<td>Incorrect Statement Order</td>
<td>ALIAS, DEFAULT, or INPUT statements come after other statements.</td>
</tr>
<tr>
<td>Misuse of ASSIGNMENT Statement</td>
<td>Occurs when any of these conditions exist:</td>
</tr>
<tr>
<td></td>
<td>• An <strong>ASSIGNMENT</strong> assigns a value to a database item.</td>
</tr>
<tr>
<td></td>
<td>• A context is assigned a value externally to a <strong>CHANGECONTEXTS</strong> statement.</td>
</tr>
<tr>
<td></td>
<td>• The formula assigns a value to a non-context variable within a <strong>CHANGECONTEXTS</strong> statement.</td>
</tr>
<tr>
<td></td>
<td><strong>CHANGECONTEXTS</strong> statements can be used in a formula.</td>
</tr>
<tr>
<td>Formula Error Type</td>
<td>Description</td>
</tr>
<tr>
<td>----------------------------</td>
<td>---------------------------------------------------------------------------------------------------------------------------------------------</td>
</tr>
<tr>
<td>Misuse of ALIAS Statement</td>
<td>You can only use an ALIAS statement for a database item.</td>
</tr>
<tr>
<td>Missing DEFAULT Statement</td>
<td>A database item that specifies defaulting must have a DEFAULT statement.</td>
</tr>
<tr>
<td>Misuse of DEFAULT Statement</td>
<td>A DEFAULT statement is specified for a variable other than an input or database item.</td>
</tr>
<tr>
<td>Uninitialized Variable</td>
<td>The compiler detects that a variable is uninitialized when used. The compiler can’t do this in all cases. This error often occurs when the formula includes a database item that requires contexts that the formula type doesn’t support. The formula treats the database item as a local variable. For example, balance database items require the PAYROLL_REL_ACTION_ID PAYROLL_ASSIGNMENT_ID and CALC_BREAKDOWN_ID contexts. Generally you can only use them in formulas of type Oracle Payroll.</td>
</tr>
<tr>
<td>Missing Function Call</td>
<td>The compiler does not recognize a function call. The combination of return type, function name, and parameter types does not match any available function.</td>
</tr>
<tr>
<td>Incorrect Operator Usage</td>
<td>An instance of a formula operator use doesn’t match the permitted uses of that operator. For example, the + operator has two permitted uses. The operands are both of data type NUMBER, or both of data type TEXT.</td>
</tr>
<tr>
<td>Inconsistent Data Type Usage</td>
<td>The formula uses a formula variable of more than one data type. Or the formula uses a database item or context with the wrong data type. For example, Variable A is assigned a NUMBER value at the start of the formula, but is assigned a TEXT value later in the formula.</td>
</tr>
<tr>
<td>EXIT Statement Not Within WHILE Loop</td>
<td>A condition that eventually becomes false or an EXIT call for exiting the loop doesn’t exist.</td>
</tr>
<tr>
<td>Misuse of Context</td>
<td>The formula uses a variable as a context, or a context as a variable. For example, a formula assigns a value to AREA1 as an ordinary variable, but later uses AREA1 as a context in a GET_CONTEXT call.</td>
</tr>
</tbody>
</table>

### Formula Execution Errors: Explained

Fast formula execution errors occur when a problem arises while a formula is running. The usual cause is a data problem, either in the formula or in the application database.

**Formula Execution Errors**

This table lists the type and description of each formula execution error.

<table>
<thead>
<tr>
<th>Formula Error Type</th>
<th>Description</th>
</tr>
</thead>
<tbody>
<tr>
<td>Uninitialized Variable</td>
<td>Where the formula compiler can’t fully determine if a variable or context is initialized, it generates code to test if the variable is initialized. When the formula executes, this code displays an error if the variable or context isn’t initialized.</td>
</tr>
<tr>
<td>Formula Error Type</td>
<td>Description</td>
</tr>
<tr>
<td>------------------------------------</td>
<td>-------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------</td>
</tr>
<tr>
<td>Divide by Zero</td>
<td>Raised when a numeric value is divided by zero.</td>
</tr>
<tr>
<td>No Data Found</td>
<td>Raised when a non-array type database item unexpectedly fails to return any data. If the database item can’t return data, then it should provide a default value.</td>
</tr>
<tr>
<td></td>
<td>You can do this by creating a default statement. An error in formula function code can also cause this error message.</td>
</tr>
<tr>
<td>Too Many Rows</td>
<td>Raised when a non-array type database item unexpectedly returns more than a single row of data. The cause is an incorrect assumption made about how the data is being accessed.</td>
</tr>
<tr>
<td></td>
<td>An error in the formula function code can also cause this error message.</td>
</tr>
<tr>
<td>NULL Data Found</td>
<td>Raised when a database item unexpectedly returns a NULL data value. If the database item can return a NULL value, then it provides a default value.</td>
</tr>
<tr>
<td></td>
<td><strong>Note:</strong> Some database items can’t return a NULL value. If it can, then you can provide a default value for that database item.</td>
</tr>
<tr>
<td>Value Exceeded Allowable Range</td>
<td>Raised for a variety of reasons, such as exceeding the maximum allowable length of a string.</td>
</tr>
<tr>
<td>Invalid Number</td>
<td>Raised when a formula attempts to convert a nonnumeric string to a number.</td>
</tr>
<tr>
<td>User Defined Function Error</td>
<td>Raised from within a formula function. The error message text is provided as part of the formula error message.</td>
</tr>
<tr>
<td>External Function Call Error</td>
<td>A formula function returned an error, but didn’t provide any additional information to the formula code. The function might have sent error information to the logging destination for the executing code.</td>
</tr>
<tr>
<td>Function Returned NULL Value</td>
<td>A formula function returned a NULL value.</td>
</tr>
<tr>
<td>Too Many Iterations</td>
<td>A single WHILE loop, or a combination of WHILE loops, has exceeded the maximum number of permitted iterations. The error is raised to terminate loops that can never end. This indicates a programming error within the formula.</td>
</tr>
<tr>
<td>Array Data Value Not Set</td>
<td>The formula attempted to access an array index that has no data value. This error occurs in the formula code.</td>
</tr>
<tr>
<td>Invalid Type Parameter for WSA_EXISTS</td>
<td>An invalid data type was specified in the WSA_EXISTS call.</td>
</tr>
<tr>
<td>Incorrect Data Type For Stored Item</td>
<td>When retrieving an item using WSA_GET, the actual data type doesn’t match that of the stored item. This error occurs within the calling formula.</td>
</tr>
<tr>
<td>Called Formula Not Found</td>
<td>The called formula couldn’t be resolved when attempting to call a formula from a formula. This issue could be due to an error in the calling formula, or because of installation issues.</td>
</tr>
</tbody>
</table>

Note: Some database items can’t return a NULL value. If it can, then you can provide a default value for that database item.
### Formula Error Type

<table>
<thead>
<tr>
<th>Formula Error Type</th>
<th>Description</th>
</tr>
</thead>
<tbody>
<tr>
<td>Recursive Formula Call</td>
<td>An attempt was made to call a formula from itself. The call could be made directly or indirectly from another called formula. Recursive formula calling isn't permitted.</td>
</tr>
<tr>
<td>Input Data Has Different Types in Called and Calling Formulas</td>
<td>When calling a formula from a formula, the input data type within the called formula doesn't match the data type specified from the calling formula.</td>
</tr>
<tr>
<td>Output Has Different Types In Called and Calling Formulas</td>
<td>When calling a formula from a formula, the output data type within the called formula doesn't match the data type specified from the calling formula.</td>
</tr>
<tr>
<td>Too Many Formula Calls</td>
<td>When a formula calls another formula in its text so it becomes a hierarchy. The maximum depth of the hierarchy is 10.</td>
</tr>
</tbody>
</table>

### FAQs for Fast Formulas

**When do I run the Compile Formula process?**

When you create or update multiple fast formulas at the same time, run the Compile Formula process on the Submit a Process or Report page from the Payroll Administration work area.

**What's the difference between a formula compilation error and an execution error?**

Compilation errors occur on the Manage Fast Formulas page when you compile the formula. An error message explains the nature of the error. Common compilation errors are syntax errors resulting from typing mistakes. You can view error messages on the dashboard or go to the messages tab directly after the process is run.

Execution errors occur when a problem arises while a formula is running. The usual cause is a data problem, either in the formula or in the application database.
9 Setting Up Balances

Balance Definitions

Payroll Balance Definitions: Explained

Payroll balances show the accumulation of values over a period of time. Payroll processes, such as Calculate Payroll and Calculate Gross Earnings, update the balance values. The values can be amount, hours, or any other numeric value. You manage balance definitions in the Payroll Calculation work area.

Most of the balances you require are predefined, and depending on your country extension, the application creates additional balances automatically when you create elements. You can edit the definition of these generated balances, or create additional balances for calculations or reporting.

Important aspects of balance definitions are:

- Balance Categories
- Units of Measure
- Generated Balances and Database Items
- Base Balances
- Remuneration

Balance definitions also include balance dimensions and balance feeds. Balance groups are collections of balances that you associate with usages to determine the reports, pages, and processes that use the balances in the group.

Balance Categories

Each balance definition has a predefined balance category for quicker processing. Balance categories are specific to a country or territory.

Units of Measure

The predefined units of measure available for selection are Day, Hour (with different combinations of minutes and seconds), Integer, Money, and Number. The unit of measure of the balance must match the unit of measure of the element input values that feed it.

Generated Balances and Database Items

The element template creates a primary feed to a new balance when you create:

- An earnings element in a legislative data group that uses the Payroll Interface country extension
- Any element in a legislative data group that uses the Payroll country extension

You select the type of configuration on the Manage Features by Country or Territory page.

The element template also creates a database item for each balance dimension. You can use the database items in your formulas or HCM extracts to use the value of a balance.
Base Balances

You can specify a base balance when there is a dependent relationship between balances for processing and reporting. For example, Loan Repayment could be the base balance for Loan Repayment Arrears.

Remuneration

Only one balance in each legislative data group is predefined as the remuneration balance. This balance generates payments for employees. For example, the remuneration balance might be Net Pay. This calculated balance is the sum of standard earnings and supplemental earnings minus all the deductions calculated for the run.

Balance Dimensions: Explained

Each payroll balance can have multiple dimensions, which define the specific value to retrieve. Balance dimensions are predefined and typically combine these components:

- Time span, such as run, period-to-date, or fiscal year-to-date
- Employment relationship level, either assignment or payroll relationship
- Context, required for some balances only, such as tax reporting unit, element, or payroll

For example, if you select the Core Assignment Tax Unit Year-to-Date dimension for the Gross Earnings balance, you create the defined balance GROSS_EARNINGS_ASG_TU_YTD. This defined balance accumulates gross earnings for an assignment in a specific tax reporting unit from the beginning of the calendar year-to-date.

Balance Feeds: Explained

You can feed payroll balances by element input values and by run results from all the elements in a classification.

Balance Feeds by Element

Balance feeds by element indicate one or more element input values to add or subtract from a balance. For each balance feed, all input values must use the same unit of measure. For example, you wouldn’t mix money and hours in the same balance feed.

Each element and input value can be the primary feed for one balance only. When you create an element, the element template creates this balance and feed automatically.

Balance Feeds by Classification

Balance feeds defined by primary or secondary element classification or by a subclassification use the input value that has the special purpose of primary output value. The unit of measure of this input value must match the unit of measure of the balance.

If you add a primary classification as a balance feed, you can’t add its children from the secondary or subclassifications. For example, if you use the Supplemental Earnings primary classification as a balance feed, you can’t also use any other children of Supplemental Earnings. Also, you can’t use both secondary classifications and subclassifications in the same balance feed.
Balance Feeds for Initial Balance Loading
You can select elements in the Balance Initialization classification to feed a balance for initialization purposes only. Select one element for each level of the employment hierarchy associated with a dimension that you want to initialize.

Related Topics
- Initial Balance Loading: Explained

Balances in Net-to-Gross Calculations: Points to Consider
You determine which deduction balances the net-to-gross process uses to calculate the gross amount from the desired net amount for an earnings element. You set the default values through the Manage Balance Definitions task. You can also fine-tune which of the enabled balances are included for a specific net-to-gross earnings element.

Enabling Inclusion in Net-to-Gross Calculations
The Manage Balance Definitions task shows which dimensions are enabled for inclusion in net-to-gross calculations. It also shows which of the enabled dimensions are included by default for each new net-to-gross earnings element.

Excluding Balances from a Specific Net-to-Gross Earnings Element
If a balance is enabled but not included, you can still use it in the processing of a specific net-to-gross earnings element. To do so, you add the balance using the Manage Elements task. You can also use this task to exclude balances that are included by default.

Related Topics
- Net-to-Gross Earnings: How They’re Calculated
- Creating a Net-to-Gross Earnings Element: Worked Example

Generating Run Balances: Explained
The payroll calculation process generates run results and values for all balances. Creating or updating balance definitions and balance feeds can impact balance calculations and stored balance values for run balance dimensions.

When stored balance dimensions are no longer accurate, the Run Balance Status column on the Manage Balance Definitions task displays the status of the balance dimensions as invalid. Reports and processes continue to obtain accurate values from the summed run results, but summing run results can slow performance.

To improve performance and accuracy, recalculate the invalid balance values for saved run balance dimensions by submitting the Generate Run Balances process from the Payroll Checklist or Payroll Calculation work areas.

This topic covers:
- Submitting the Generate Run Balances process
- Using Generating Run Balances Examples
Submitting the Generate Run Balances Process
Submit the process before you submit the payroll run or after you create or update these tasks:

- Balance definition using the Manage Balances task, for example to add balance feeds or new balance dimensions
- Balance feeds to an element using the Manage Elements task

When you submit the process, you specify parameters that control which balances to generate as shown in the following table.

<table>
<thead>
<tr>
<th>Flow Submission Parameters</th>
<th>Purpose</th>
</tr>
</thead>
<tbody>
<tr>
<td>Balances to Include</td>
<td>Identifies the set of balances to include when submitting the process:</td>
</tr>
<tr>
<td></td>
<td>• All balances</td>
</tr>
<tr>
<td></td>
<td>• All invalid balances</td>
</tr>
<tr>
<td></td>
<td>• Single balance</td>
</tr>
</tbody>
</table>

*Note:* If you select a single balance, you must specify both a balance and a dimension name.

<table>
<thead>
<tr>
<th>Balance Name</th>
<th>Lists balance names marked as run balances when a single balance is selected.</th>
</tr>
</thead>
<tbody>
<tr>
<td>Dimension Name</td>
<td>Lists run dimensions when a single balance is selected. The list is filtered again when the balance name is selected.</td>
</tr>
</tbody>
</table>

Using Generating Run Balances Examples
There are different ways you can use generate run balances to improve performance and accuracy in your payroll system.

- Updating a balance feed effective date

  Your enterprise stops the transportation allowance element as of January 1. This ends the balance feeds between the element input value and the related balances, such as gross-to-net. It also sets the status of the balance values for completed payroll runs to invalid. You submit the Generate Run Balance process to recalculate the balance values and set the status to valid.

- Adding a new balance feed

  You receive notification January 31 that a non-taxable earning became taxable as of January 1. You add a balance feed to the earnings element so that the input value feeds a taxable pay balance. You submit the Generate Run Balances process and recalculate the balance values for the taxable pay balance.

Balance Groups and Usages
Balance Groups and Usages: Explained

Balance groups represent a collection of balance definitions, which you can use to retrieve balance values for reports, archives, and balance views. You manage balance groups in the Payroll Calculation work area.

Important aspects of balance groups and usages include:

- Balance group level
- Balance definitions
- Restrictions
- Default inclusions category
- Balance group usages
- Matrix and table formats
- Sorting

Balance Group Level

The balance group level (employee or organization) determines the balance dimensions of the balance definitions that you can include in the group.

Balance Definitions

On the Balance Definitions page of a balance group you can see the balances associated with the balance group. The information includes the balance name, balance dimension, balance category, unit of measurement, and legislative data group. A balance category groups together similar balances. It is similar to the element classifications - for each element classification there is a corresponding balance category. You can also use this page to search for and add balance definitions to your own balance groups and to certain predefined balance groups. If you need to add multiple balance definitions at a time, the Select and Add Balance Definitions dialog is used to hold current selected balance definitions while searching for other balance definitions.

Restrictions

Restrictions control which balance definitions you can add to the balance group. Balance group restrictions are a list of balance categories, a list of balance dimensions, or a list of balance categories and dimensions that belong together. Restrictions limit the balances that you can add to the balance group based on a particular category or dimension or a combination of category and dimension. The Included balances restricted by category and the Included balances restricted by dimension check boxes are automatically updated on the Balance Group Details page as you add restrictions on the Restrictions page. For example, the standard earnings category means that the balance group is restricted to all balances based on the standard earnings category. 1) An user can have the balance group without restrictions. 2) "Included Balances Restricted by Category" and "Included Balances Restricted by Dimension" flags are driven by Restrictions setup here.

Note: In some situations you can update a restriction if it's not used by balance definitions and default inclusions. The Edit button on the Restriction page is enabled if the selected row can be updated. A balance group may be defined without restrictions.

Default Inclusions

Default inclusions are combinations of balance categories and dimensions. Any balance definitions you subsequently create, manually or through the element template, that meet those criteria are automatically included in the group.
Balance Group Usages
Balance group usages represent an instance of how a particular balance group is used. Balance group usages also store detailed information about how the balance data is formatted. A balance group should have at least one usage but can also have many balance group usages.

Matrix and Table Formats
A balance group usage can use a matrix or table format. For a matrix format, you select balance dimensions as columns in the matrix and decide their position in the matrix using the Position. The first Position must be 1 and any additional Position numbers must be sequential.

Only the balance dimensions that you select as columns for the matrix are displayed. If you do not specify the balance dimensions as matrix items, they do not display, regardless of what dimensions are contained in the defined balances in the balance group.

If you use the matrix format, you can also select a sorting option for the rows. If you don’t select a sorting option, the rows are returned in random order.

Sorting
Sorting determines the order in which balance types and dimensions display for the balance group usage.

You can select one of the sort methods listed below.

- Name - Sorts balance values by balance name.
- Value - Sorts balances by the actual balance value.
- Static Order - Sorts balance values according to the sequence that you specify in the Sort Items table.

If you select Table, all the balances in the balance group are returned one line at a time in the table format. If you select the Matrix format, you can add balance dimensions and decide their position in the matrix.

Balance Group Usages: Examples
For predefined balance group usages, you can add matrix items to the group and associate them with existing balance groups for use in reports, archives, and views. While you can’t modify existing usages that are predefined, you can modify matrix items that are user-defined.

You can include balance dimensions for multiple time periods in your balance group usage, such as the current payroll run, month-to-date, or year-to-date.

✏️ Note: The report type is the owner of the balance group usage. A usage can have only one report type

<table>
<thead>
<tr>
<th>Report Type</th>
<th>Balance Categories</th>
</tr>
</thead>
<tbody>
<tr>
<td>Global Archive</td>
<td>Archive of current and year-to-date city tax code balances for areas 1, 2 and 3</td>
</tr>
<tr>
<td>Global Balance Views</td>
<td>Earnings default balances for the Balance Views page</td>
</tr>
<tr>
<td>Global Deduction</td>
<td>Balances for involuntary, pre-statutory, social insurance, and tax deductions</td>
</tr>
</tbody>
</table>
**Scenario**

**Rules for Editing Balance Groups and Their Usages: Explained**

The limitations on the changes you can make to balance groups and usages are different for predefined and user-defined groups.

**Balance Group Rules**

This table explains the actions you can take for both predefined and user-defined balance groups.

<table>
<thead>
<tr>
<th>Action</th>
<th>Predefined Balance Group</th>
<th>User-Defined Balance Group</th>
</tr>
</thead>
<tbody>
<tr>
<td>Create balance group</td>
<td>No</td>
<td>Yes</td>
</tr>
<tr>
<td>Edit balance group</td>
<td>No</td>
<td>Yes</td>
</tr>
<tr>
<td>Delete balance group</td>
<td>No</td>
<td>Yes</td>
</tr>
<tr>
<td>Add balance definitions</td>
<td>No, unless the Add button in the table menu is enabled</td>
<td>Yes</td>
</tr>
<tr>
<td>Remove balance definitions</td>
<td>No, unless created by the clients.</td>
<td>Yes</td>
</tr>
<tr>
<td>Add restrictions</td>
<td>No</td>
<td>Yes</td>
</tr>
<tr>
<td>Edit restrictions</td>
<td>No</td>
<td>No</td>
</tr>
<tr>
<td>Action</td>
<td>Predefined Balance Group</td>
<td>User-Defined Balance Group</td>
</tr>
<tr>
<td>-------------------------------</td>
<td>--------------------------</td>
<td>---------------------------------------------</td>
</tr>
<tr>
<td>Delete restrictions</td>
<td>No</td>
<td>Yes</td>
</tr>
<tr>
<td>Edit the balance group level</td>
<td>No</td>
<td>Yes, if the group contains no balance</td>
</tr>
<tr>
<td></td>
<td></td>
<td>definitions, default inclusions or</td>
</tr>
<tr>
<td></td>
<td></td>
<td>dimension restrictions.</td>
</tr>
<tr>
<td>Add default inclusions</td>
<td>No, unless the Add button is enabled</td>
<td>Yes</td>
</tr>
<tr>
<td>Edit default inclusions</td>
<td>No</td>
<td>Yes</td>
</tr>
<tr>
<td>Delete default inclusions</td>
<td>No</td>
<td>Yes</td>
</tr>
</tbody>
</table>

**Balance Groups Usage Rules**

The only change you can make to a predefined balance group usage is to add matrix items.

For a user-defined usage, you can:

- Edit or delete the usage
- Edit the usage details
- Add or delete matrix items
- Create, edit, or delete sorting definitions

⚠️ **Caution:** You can’t change the format type of a usage after you save it. Additionally, you can’t change the sort method unless you delete the existing sort items.

**Creating Balance Groups and Usages: Worked Example**

This example demonstrates how to create a balance group and balance group usage for a user-defined report of voluntary deductions.

**Prerequisite**

If you are creating a user-defined report, create a lookup code for the report in the PAY_BALANCE_REPORT_TYPE lookup.

1. In the Setup and Maintenance work area, go to the Manage Common Lookups task.
2. Search for and select the PAY_BALANCE_REPORT_TYPE lookup type.
3. Add the lookup code, meaning, and description for the user-defined report in the Lookup Codes section.

**Creating a Balance Group**

1. In the Payroll Calculation work area, select **Manage Balance Groups**.
2. Click **Create** to open the Create Balance Group dialog box.
3. Select a legislative data group and enter a name for the balance group.
4. Click **Continue**.
   The Balance Group Details page displays.
5. Select **Employee** as the balance group level.
6. Click **Save**.
7. Select the **Balance Definitions** folder under the Balance Group Overview list.
8. Click **Select and Add**.
9. In the Select and Add: Balance Definitions dialog box, enter the following values.

<table>
<thead>
<tr>
<th>Field</th>
<th>Value</th>
</tr>
</thead>
<tbody>
<tr>
<td>Dimension Name</td>
<td>Relationship Run</td>
</tr>
<tr>
<td>Category</td>
<td>Voluntary Deductions</td>
</tr>
</tbody>
</table>

10. Click **Search**.
11. In the Results section, select the balance definitions that you want to add and then click **OK**.

**Tip:** You can select multiple balance definitions in the Select and Add window. Hold down the Shift key to select a group of consecutive balance definitions. To select individual balance definitions hold down the Control key and select the balance definitions that you want to add to the balance group. Click **Apply** and keep the dialog window open to add the query to search the selected balance definitions. Click **OK** to add the selected balance definitions and close the dialog window.

12. Click **Submit**.
13. Click **Done**.

Create a Balance Group Usage

1. In the Payroll Calculation work area, select **Manage Balance Group Usages**.
2. Click **Create**.
3. In the Create Balance Group Usage dialog box, complete the fields as shown in this table.

<table>
<thead>
<tr>
<th>Field</th>
<th>Value</th>
</tr>
</thead>
<tbody>
<tr>
<td>Legislative data group</td>
<td>Enter the same LDG as the balance group for which you are creating the usage.</td>
</tr>
<tr>
<td>Name</td>
<td>Employee voluntary deduction run balances</td>
</tr>
<tr>
<td>Balance Group</td>
<td>The group you created in the previous task</td>
</tr>
<tr>
<td>Format Type</td>
<td>Table</td>
</tr>
</tbody>
</table>

4. Click **Continue**.

You are returned to the Balance Group Usage Details page.

5. Select the report type (this was the report type that you added as a lookup code to the PAY_BALANCE_REPORT_TYPE lookup).
6. Click **Save**.
7. Select the **Sorting** folder under Balance Group Usage Overview list.
8. From the Actions drop down list on the right, select **Create**.
9. Complete the fields as shown in this table.
Field | Value
--- | ---
Name | Any
Sort Method | Name
Sort By | Balance Type
Order | Ascending

10. Click **Save**.
11. Click **Done**.

Balance Exceptions

Balance Exceptions: Examples

Balance exceptions define the criteria that you want to use in balance exception reports to identify overpayments, underpayments, and trends. This information can help detect the balance adjustments needed to correct payments and identify people in your organization who are leading in specific areas such as sales. The following examples illustrate two different types of balance exceptions that you may want to include in your balance exception reports.

You create reports using the Manage Balance Exceptions task in the Payroll Calculation work area.

Tracking Increases in Commissions

InFusion US plans to train incoming sales staff on productivity techniques. To identify exceptional sales staff in the organization, you can run a report that lists workers whose commissions increased by 25 percent compared to their averages for the previous 3 months. To find out who the sales leaders are, set up a balance exception using the values in the following table.
Tracking Gross Earnings

Before Infusion US certifies its current payroll run, the payroll manager wants to know if gross payments are in line with the previous payroll run. The previous run verified the established levels of earnings that the company wants to maintain for the remainder of the quarter. The table below provides an example of the values you enter to set up a balance exception to find out if gross earnings exceed the gross earnings of the previous period by more than 10 percent:

<table>
<thead>
<tr>
<th>Field</th>
<th>Values</th>
</tr>
</thead>
<tbody>
<tr>
<td>Balance Exception Name</td>
<td>Gross Earnings</td>
</tr>
<tr>
<td>Comparison Type</td>
<td>Previous period</td>
</tr>
<tr>
<td>Comparison Value</td>
<td>1</td>
</tr>
<tr>
<td>Balance Name</td>
<td>Gross Earnings</td>
</tr>
<tr>
<td>Dimension Name</td>
<td>Relationship Period to Date</td>
</tr>
<tr>
<td>Variance Type</td>
<td>Percent</td>
</tr>
<tr>
<td>Variance Operator</td>
<td>Greater than</td>
</tr>
<tr>
<td>Variance Value</td>
<td>10</td>
</tr>
<tr>
<td>Severity Level</td>
<td>1</td>
</tr>
</tbody>
</table>

Comparison Types and Variance Operators for Balance Exceptions: Explained

Use balance exception reports to identify potential overpayments or underpayments. Comparison types define the period that is used to determine whether an exception has occurred. Variance operators enable you to specify the precise range of variance that you want to report on.
Comparison Types
When you’re creating balance exceptions, you must select a comparison type. For example, if you select Average in months as the comparison type and enter 3 in the Comparison Value field, the current month is compared to the average of the previous three months.

Some comparison values are preset and you can’t change them:

- Current month, Current period, Current quarter, and Current year always have a comparison value of 0.
- Previous period and Previous month have a comparison value of 1.

This table lists each comparison type that you can select and explains how it operates as a basis of comparison.

<table>
<thead>
<tr>
<th>Comparison Type</th>
<th>How it Operates as a Basis of Comparison</th>
</tr>
</thead>
<tbody>
<tr>
<td>Average in months</td>
<td>Compares the current month to date with the average of previous months to date. Only available if you have the balance dimensions ASG_MONTH or _PER_MONTH.</td>
</tr>
<tr>
<td>Current month</td>
<td>Compares values to the total for the current month to date. Doesn’t use any previous month as a basis for comparison.</td>
</tr>
<tr>
<td>Current period</td>
<td>Compares values to the total for the current period to date. Doesn’t use any previous period as a basis for comparison.</td>
</tr>
<tr>
<td>Current quarter</td>
<td>Compares values to the total for the current quarter to date. Doesn’t use any previous period as a basis for comparison.</td>
</tr>
<tr>
<td>Current year</td>
<td>Compares values to the total for the current year to date. Doesn’t use any previous period as a basis for comparison.</td>
</tr>
<tr>
<td>Previous month</td>
<td>Uses the previous month as a basis of comparison.</td>
</tr>
<tr>
<td>Previous period</td>
<td>Uses the previous period as a basis of comparison.</td>
</tr>
</tbody>
</table>

Variance Operators
The table that follows describes the variance operators that you can use for your balance exception reports.

The Results column indicates the effect of selecting each variance operator assuming that the following sample data is used:

- Comparison type is previous month
- Balance name is monthly car allowance
- Dimension name is relationship previous month to date
- Previous month amount is 500
- Variance value is 100

<table>
<thead>
<tr>
<th>Variance Operator</th>
<th>Balance Exception Report Output</th>
<th>Results (based on sample data)</th>
</tr>
</thead>
<tbody>
<tr>
<td>Variance, plus or minus</td>
<td>All relationships that either exceed or are less than the previous month amount by the</td>
<td>Returns all relationships with a value less than 400 and greater than 600.</td>
</tr>
</tbody>
</table>
### Using Formula Variance Type

You can write a fast formula using the Balance Exception formula type to return a variance value that you can use for identifying exceptions for a balance. To use this feature, select the **Formula** variance type on the Create Balance Exception page and then select the formula that you created from the Formula ID field.

### Using Balance Variance Type

To reference two balances in the balance exception equation, select the **Balance** variance type on the Create Balance Exception page and then select the Target Balance Name and Target Dimension Name. The context values for Target Dimension Name are inherited from the Dimension Name you select on the left-hand side of the Create Balance Exception page as the first Dimension. No additional contexts are set for Target Dimension Name.

#### Balance Exception Report

<table>
<thead>
<tr>
<th>Variance Operator</th>
<th>Balance Exception Report Output</th>
<th>Results (based on sample data)</th>
</tr>
</thead>
<tbody>
<tr>
<td>Note: This operator applies only for comparison types of 'Previous', like Previous Months or Previous Period, as well as 'Average in Months'.</td>
<td></td>
<td></td>
</tr>
<tr>
<td>Less than</td>
<td>All relationships that are less than the previous month amount by the amount or percentage stated in the variance value.</td>
<td>Returns all relationships with a value of less than 400.</td>
</tr>
<tr>
<td>Less than or equal</td>
<td>All relationships with a current value either equal to or less than the previous month amount by the amount or percentage stated in the variance value.</td>
<td>Returns all relationships with a value of 400 or less.</td>
</tr>
<tr>
<td>Equal</td>
<td>All values that are exactly equal to the higher limit or the lower limit of the variance value.</td>
<td>Returns all relationships with a current value equal to 400 or 600.</td>
</tr>
<tr>
<td>Greater than</td>
<td>All relationships that are greater than the previous month amount by the amount or percentage stated in the variance value.</td>
<td>Returns all relationships with a value of more than 600.</td>
</tr>
<tr>
<td>Greater than or equal</td>
<td>All relationships with a current value either equal to or greater than the previous month amount by the amount or percentage stated in the variance value.</td>
<td>Returns all relationships with a value of 600 or more.</td>
</tr>
<tr>
<td>Does not equal</td>
<td>All relationships with a current value not equal to the previous month amount.</td>
<td>Returns all relationships with a value other than 500.</td>
</tr>
</tbody>
</table>
Creating a Balance Exception Report: Worked Example

This example demonstrates how to create and run a balance exception report. The report compares the total payments you made to your employee population for the current payroll period with the payments you made in the previous period.

Before you create your report, you may want to determine the following:

<table>
<thead>
<tr>
<th>Decisions to Consider</th>
<th>In This Example</th>
</tr>
</thead>
<tbody>
<tr>
<td>Which balance holds the values to compare?</td>
<td>Net Payment</td>
</tr>
<tr>
<td>What period of time should the balances be compared to?</td>
<td>Previous period</td>
</tr>
<tr>
<td>How many periods do you want to compare the balances to?</td>
<td>1</td>
</tr>
</tbody>
</table>

Creating a balance exception report involves creating a balance exception, creating the report, and then running the report.

Creating a Balance Exception

To derive net pay amounts for the previous period:

1. Open the Payroll Calculation work area, and then click **Manage Balance Exceptions** task.
2. Click **Create**.
3. Select the InFusion US legislative data group and click **OK**.
4. Complete the fields as shown in this table:

<table>
<thead>
<tr>
<th>Field</th>
<th>Value</th>
</tr>
</thead>
<tbody>
<tr>
<td>Balance Exception Name</td>
<td>Compare Net Payment Amounts to the Previous Period</td>
</tr>
<tr>
<td>Comparison Type</td>
<td>Previous period</td>
</tr>
<tr>
<td>Comparison Value</td>
<td>1</td>
</tr>
<tr>
<td></td>
<td>For comparison types that begin with Previous, the application enters 1 as the default value and makes it read only.</td>
</tr>
<tr>
<td>Balance Name</td>
<td>Net Payment</td>
</tr>
<tr>
<td>Dimension Name</td>
<td>Relationship Period to Date</td>
</tr>
<tr>
<td>Variance Type</td>
<td>Percent</td>
</tr>
<tr>
<td>Variance Operator</td>
<td>Greater than</td>
</tr>
<tr>
<td>Variance Value</td>
<td>10</td>
</tr>
<tr>
<td>Severity Level</td>
<td>1</td>
</tr>
</tbody>
</table>
5. Click **Submit**.

**Creating a Balance Exception Report**

1. In the Tasks pane, click **Manage Balance Exceptions and Reports**.
2. Click **Create**.
3. Select the InFusion US legislative data group and click **OK**.
4. Complete the fields as shown in this table:

<table>
<thead>
<tr>
<th>Field</th>
<th>Value</th>
</tr>
</thead>
<tbody>
<tr>
<td>Exception Report Name</td>
<td>Compare Net Payment Amounts to the Previous Period</td>
</tr>
<tr>
<td>Consolidation Group</td>
<td>InFusion US Weekly</td>
</tr>
<tr>
<td>Payroll</td>
<td>InFusion US Weekly Payroll</td>
</tr>
</tbody>
</table>

5. Click **Add**.
6. Select the **Compare Net Payment Amounts to the Previous Period** balance exception name and then click **OK**.
7. Click **Submit**.

**Running the Balance Exception Report**

1. In the Tasks pane, click **Submit a Process or Report**.
2. Select the InFusion US legislative data group.
3. Select the **Run Balance Exception Report** flow pattern and then click **Next**.
4. Complete the fields as shown in this table:

<table>
<thead>
<tr>
<th>Field</th>
<th>Value</th>
</tr>
</thead>
<tbody>
<tr>
<td>Payroll Flow</td>
<td>InFusion Weekly Balance Report</td>
</tr>
<tr>
<td>Process End Date</td>
<td>9/7/12</td>
</tr>
<tr>
<td>Balance Exception Report</td>
<td>Compare Net Payment Amounts to the Previous Period</td>
</tr>
<tr>
<td>Payroll</td>
<td>InFusion US Weekly</td>
</tr>
</tbody>
</table>

5. Click **Next**.

When you enter information on the Submit a Process or Report - Flow Interaction page, select Current Flow as the payroll flow and Run Balance Exception Report as the task to ensure the report uses the payroll balances results for the current payroll flow.

6. Click **Next**.
7. Click **Submit**.
8. Click **OK and View Checklist**.
9. In the task list click **Go to Task** for the Run Balance Exception Report.
10. Click the **View Results** link associated with the process number for the report.
11. When the View results page opens, click the report link. The output is in PDF format.

Balance Exception Report

Use the Balance Exception Report to identify potentially incorrect payments or amounts withheld. The report identifies values that vary for the same balance dimension. This variance could indicate overpayments or underpayments.

To run this report, use the Run Balance Exception Report task from the Payroll Calculation or Checklist work area. Before you run this report you must:

Prerequisites

Before you run this report you must:

- Use the Manage Balance Exceptions task from the Payroll Calculation work area to create a balance exception.
- Use the Manage Balance Exceptions and Reports task from the Payroll Calculation work area to create a balance exception report that groups together one or more balance exceptions.

Balance Exceptions

A balance exception determines the criteria you use to identify values that vary for the same balance dimension. The variance could be in terms of incorrect payments or amounts withheld. When you create a balance exception you specify:

- A comparison type and comparison value to define the period that is used to determine the exception.
- A Balance Type and Balance Dimension that specifies the balance value that is evaluated for the exception. You can only select balance dimensions that are compatible with the Comparison Type you specified. For example, if the Comparison Type is Current Period, you will only be able to select balance dimensions of type ‘Period to Date’.
- The variance operator and the variance value to specify the precise range of variance that you want to report on.

For example, you want to determine the monthly car allowance paid to employees in excess of 600 more than the previous month. You can create a balance exception, specifying the attributes as given in the table below.

<table>
<thead>
<tr>
<th>Attributes</th>
<th>Value</th>
</tr>
</thead>
<tbody>
<tr>
<td>Comparison Type</td>
<td>Previous Month</td>
</tr>
<tr>
<td>Comparison Value</td>
<td>1</td>
</tr>
<tr>
<td>Variance Operator</td>
<td>Greater Than</td>
</tr>
<tr>
<td>Variance Value</td>
<td>600</td>
</tr>
<tr>
<td>Balance Type</td>
<td>Monthly Car Allowance</td>
</tr>
<tr>
<td>Balance Dimension</td>
<td>Month-to-Date</td>
</tr>
</tbody>
</table>
You must create an Exception Report Name that you can use to run the Balance Exception Report. For instance, in the above example, you can create an Exception Report Name of Monthly Car Allowances Paid in Excess of the Previous Month.

**Report Parameters**

The parameter values determine which records to include in the report. For example, you can run this report for a specific consolidation group or payroll relationship group. You must predefine these groups before you can use them. Most parameters are self-explanatory, while the following have special meaning in the context of this report.

**Payroll Flow**

The name of the payroll flow you use to run this report. The selected flow uniquely identifies a specific instance of the report execution.

**Process Start Date**

Use this field to specify the first effective date of the payroll process to include in the report. All processes with an effective date same or greater than the Process Start Date are reported.

**Process End Date**

Use this field to specify the last effective date of the payroll process to include in the report. For Payroll Runs this is the ‘Payroll Run Date’. All processes with an effective date equal to or prior to the Process End Date are reported.

> **Note:** For offset payrolls, the effective date of the payroll or QuickPay run could be after the end date of the payroll period. In such cases, you must ensure that your Process End Date must be on or after the effective date of the process you want to include in the report.

**Balance Exception Report**

The name of the Balance Exception Report you use to run this report.

**Payroll**

Select the required payroll name.

**Process Configuration Group**

Use this field to run the report for a specific process configuration group, instead of the default one. A process configuration group is used to set rules for payroll processes, such as passwords or number of threads. You can select a value only if you have a predefined process configuration group.

**Consolidation Group**

Use this field to run the report against a consolidation group. For example, you can use this field to run this report for a subset of payrolls. You can select a value only if you have a predefined consolidation group.

**Location**
Use this field to view the balance results for employees who have at least one assignment for the selected location. The balance values may not necessarily correspond to the location parameter only. It is also dependent on the dimensions and the other associated contexts.

**Payroll Relationship Group**

Use this field to run the report for persons belonging to a specific payroll relationship group. You can specify a value only if you have a predefined payroll relationship group.

> **Note:** Use the Manage Object Groups task to define a payroll relationship group before you can use it here.

You can also provide values to run this report for a specific payroll statutory unit or tax reporting unit.

After you have entered the above details, click **Next**. On the Flow Interaction Page, select the payroll flow as the Current Flow and the Run Balance Exception Report as the task. This ensures that the report uses the payroll balances for the current payroll flow.

**Report Results**

The report provides details of payroll balance results for matching persons, filtered by the defined exception criteria, specified time frame and the selected parameters. The output report includes:

- Payroll Statutory Unit
- Tax Reporting Unit
- Person Number
- Person Name
- Payroll Relationship Number
- Employment Level
- Current Balance
- Variance Value

The report output additionally displays the Previous Balance, Difference, and Difference % columns when the Comparison Type is Previous Period or Previous Month.

**Related Topics**

- Balance Exception Formula Type

**FAQs for Balances**

**Can I calculate balances that go back 12 months?**

Yes. You can use certain balance dimensions to calculate balances based on a 12-month period rolling back from the effective date. The 12-month rolling balance provides a sum total for the balance dimension that you select.
If the balance dimension is used in a payroll run or report, however, it calculates a balance based on the 12-month period prior to the effective date of the run.

For example, let’s say you wanted to retrieve balances for an employee for 12 months. If the effective date is 31-AUG-2015, you can then use a balance dimension to summarize all run results for the period from 01-SEP-2014 to 31-AUG-2015.

What balance dimensions can I use to calculate balances for a 12-month roll back period?

You can use these balance dimensions to calculate balances for a 12-month roll back period:

This table lists the available balance dimension types and balance dimensions.

<table>
<thead>
<tr>
<th>Balance Dimension Type</th>
<th>Balance Dimension</th>
</tr>
</thead>
<tbody>
<tr>
<td>Rolling 12 Month Balance Dimensions</td>
<td>• Relationship Tax Unit Rolling 12 Month</td>
</tr>
<tr>
<td></td>
<td>• Assignment Tax Unit Rolling 12 Month</td>
</tr>
<tr>
<td>Resident City Balance Dimensions</td>
<td>• Term Tax Unit Resident City Month-to-Date</td>
</tr>
<tr>
<td></td>
<td>• Term Tax Unit Resident City Quarter-to-Date</td>
</tr>
<tr>
<td></td>
<td>• Term Tax Unit Resident City Year-to-Date</td>
</tr>
<tr>
<td></td>
<td>• Assignment Tax Unit Resident City Month-to-Date</td>
</tr>
<tr>
<td></td>
<td>• Assignment Tax Unit Resident City Quarter-to-Date</td>
</tr>
<tr>
<td></td>
<td>• Assignment Tax Unit Resident City Year-to-Date</td>
</tr>
<tr>
<td>Statutory Report Code Balance Dimensions</td>
<td>• Relationship Tax Unit Statutory Report Code Run</td>
</tr>
<tr>
<td></td>
<td>• Relationship Tax Unit Statutory Report Code Month-to-Date</td>
</tr>
<tr>
<td></td>
<td>• Relationship Tax Unit Statutory Report Code Quarter-to-Date</td>
</tr>
<tr>
<td></td>
<td>• Relationship Tax Unit Statutory Report Code Year-to-Date</td>
</tr>
<tr>
<td></td>
<td>• Relationship Tax Unit Statutory Report Code Period-to-Date</td>
</tr>
<tr>
<td></td>
<td>• Term Tax Unit Statutory Report Code Run</td>
</tr>
<tr>
<td></td>
<td>• Term Tax Unit Statutory Report Code Month-to-Date</td>
</tr>
<tr>
<td></td>
<td>• Term Tax Unit Statutory Report Code Quarter-to-Date</td>
</tr>
<tr>
<td></td>
<td>• Term Tax Unit Statutory Report Code Year-to-Date</td>
</tr>
<tr>
<td></td>
<td>• Term Tax Unit Statutory Report Code Period-to-Date</td>
</tr>
<tr>
<td></td>
<td>• Assignment Tax Unit Statutory Report Code Run</td>
</tr>
<tr>
<td></td>
<td>• Assignment Tax Unit Statutory Report Code Month-to-Date</td>
</tr>
<tr>
<td></td>
<td>• Assignment Tax Unit Statutory Report Code Quarter-to-Date</td>
</tr>
<tr>
<td></td>
<td>• Assignment Tax Unit Statutory Report Code Year-to-Date</td>
</tr>
<tr>
<td></td>
<td>• Assignment Tax Unit Statutory Report Code Period-to-Date</td>
</tr>
</tbody>
</table>
10 Setting Up Pay Calculation Components

Calculation Information

Payroll Calculation Information: Explained

When you create an element, the application generates the rules and definitions required to calculate an earnings or deduction amount. For all types of elements, these rules and definitions include elements, formulas, and processing rules. This topic explains the additional rules and definitions generated for certain classifications and categories of elements, such as involuntary deductions, absence information, and time card entries.

The following figure shows the relationship between the payroll calculation information held at the legislative data group level and the values you can enter on a personal calculation card.

Note: In some countries or territories you can also create calculation cards for a specific tax reporting unit (TRU) or payroll statutory unit (PSU) to capture information such as an employer’s contribution rate.
Task Summary

The following table summarizes the purpose of each type of calculation information and the task you can use to view or edit it.

<table>
<thead>
<tr>
<th>Calculation Information</th>
<th>Description</th>
<th>Task</th>
</tr>
</thead>
</table>
| Elements                | Elements specify how and when an earnings or deduction should be processed. When you create an element, several related elements are typically created with the same name prefix. You can view the related | Use the Manage Elements task to create elements and to view the generated elements and related items. After creating an element:  
• You must add eligibility rules |
<table>
<thead>
<tr>
<th>Calculation Information</th>
<th>Description</th>
<th>Task</th>
</tr>
</thead>
<tbody>
<tr>
<td>elements and other generated items on the Element Summary page, including:</td>
<td></td>
<td>You may want to add:</td>
</tr>
<tr>
<td>• Status processing rule - specifies the formula that processes the element entries</td>
<td></td>
<td>o Input values</td>
</tr>
<tr>
<td>• Input values - values that can be entered for, or returned from, the calculation</td>
<td></td>
<td>o Status processing rules</td>
</tr>
<tr>
<td></td>
<td></td>
<td>o Frequency rules</td>
</tr>
<tr>
<td></td>
<td></td>
<td>o Subclassifications</td>
</tr>
<tr>
<td></td>
<td></td>
<td>o Balance feeds</td>
</tr>
</tbody>
</table>

**Payroll components**

A payroll component is a group of rates and rules that the payroll run uses to calculate values for earnings and deductions.

When you create elements in certain classifications and categories, such as involuntary deductions, the element template creates a payroll component with the same name.

You can manage payroll components using predefined component groups, which vary by country or territory but may include social insurance, taxes, retirement plans, involuntary deductions, and benefits.

**Wage basis rules**

Wage basis rules determine the earnings that contribute to a deductible amount or, for exemptions, the elements that reduce the amount subject to deduction.

For example, wage basis rules might define which secondary classifications of standard and supplemental earnings are subject to a particular tax.

Rules may vary based on reference criteria such as a worker’s place of residence.

**Calculation value definitions**

Calculation value definitions store calculation rates and rules, which may vary based on other criteria.

For example you can use calculation value definitions to calculate regional income tax rates for employees, which vary based on their income levels.

The calculation value definition controls which calculation values are enterable on a calculation card.

**Calculation factors**

Calculation factors indicate which calculation value definition to use when calculating the amount.

For example, a calculation factor might identify which set of tax rates to use based on the tax code of the employee.

**Note:** You can edit definitions that element templates create, such as adding default calculation values.

Manage Payroll Calculation Information task to view payroll components and their associated rules.

Use the Manage Component Group Rules task to define the rules and references.

Use the Manage Calculation Cards task to enter reference values for workers.

Use the Manage Component Group Rules task to view calculation factors defined for a component group.

Use the Manage Payroll Calculation Information task to create new calculation factors. Normally, you don’t need to create new factors, but if you do, you must also edit
Calculation Information | Description | Task
---|---|---
| If tax rates vary based on a factor such as a person’s filing status, then filing status is defined as a calculation factor reference. Thus, an element may have multiple calculation factors, one for each unique set of rules and references values. | the element’s payroll formula to use the new calculation factors.

Calculation components | Calculation components are individual calculations captured on a calculation card. When an element template creates a payroll component, it also creates calculation components that you can enter on personal calculation cards to enter specific details for the person. | Use the Manage Calculation Cards task to enter calculation components for a person.

Related Topics
- Adding Involuntary Deductions to a Calculation Card: Procedure

Payroll Calculation Information at the Legislative Level: Examples

To understand how the rules and definitions for calculating payroll components work together, let’s examine two common examples: income tax deductions and social insurance deductions.

Each example provides sample values for the following rules and definitions:

- Component group
- References for wage basis rules
- References for calculation factors
- Wage basis rules
- Related elements
- Calculation factors for elements
- Associations for tax reporting

Individual Income Tax Deduction

A particular country or territory has a statutory deduction for an individual income tax. The exemption amount for the tax varies based on the person’s residential status. The earnings classifications included in the wage basis for the tax vary by geographical region. Therefore, references are defined for both the wage basis rules and the calculation factors.

The calculation is a two-step process that calculates the exemption and then calculates the tax amount based on the reduced deductible amount.

- **Component group**: Taxes
- **Component name**: Individual Income Tax Deduction
- **References for wage basis rules**:

<table>
<thead>
<tr>
<th>Reference Name</th>
<th>Reference Value</th>
</tr>
</thead>
<tbody>
<tr>
<td>Geographical Region</td>
<td>Mainland</td>
</tr>
</tbody>
</table>
References for calculation factors:

<table>
<thead>
<tr>
<th>Reference Name</th>
<th>Reference Value</th>
</tr>
</thead>
<tbody>
<tr>
<td>Residential Status</td>
<td>Resident</td>
</tr>
<tr>
<td>Residential Status</td>
<td>Nonresident</td>
</tr>
</tbody>
</table>

Wage basis rules:

<table>
<thead>
<tr>
<th>Geographical Region Reference Value</th>
<th>Primary Classification</th>
<th>Secondary Classification</th>
<th>Use in Wage Basis?</th>
</tr>
</thead>
<tbody>
<tr>
<td>Mainland</td>
<td>Standard Earnings</td>
<td>All secondary classifications selected</td>
<td>Y</td>
</tr>
<tr>
<td>Territory</td>
<td>Standard Earnings</td>
<td>All secondary classifications selected</td>
<td>Y</td>
</tr>
<tr>
<td>Mainland</td>
<td>Supplemental Earnings</td>
<td>Commission</td>
<td>Y</td>
</tr>
<tr>
<td>Territory</td>
<td>Supplemental Earnings</td>
<td>Commission</td>
<td>N</td>
</tr>
<tr>
<td>Mainland</td>
<td>Supplemental Earnings</td>
<td>Personal Use of Company Car</td>
<td>Y</td>
</tr>
<tr>
<td>Territory</td>
<td>Supplemental Earnings</td>
<td>Personal Use of Company Car</td>
<td>N</td>
</tr>
</tbody>
</table>

Related element: Individual Income Tax Processor

The processing rule (a fast formula) associated with this element drives the income tax calculation. It accesses the appropriate calculation factor, based on the resident status reference value and the current step in the calculation process.

Calculation factors for Individual Income Tax Processor element:

<table>
<thead>
<tr>
<th>Resident Status Reference Value</th>
<th>Calculation Step</th>
<th>Calculation Method</th>
<th>Calculation Value Definition</th>
<th>Values</th>
</tr>
</thead>
<tbody>
<tr>
<td>Nonresident</td>
<td>Calculate exemption amount</td>
<td>None</td>
<td>Tax Exemption Amount for Nonresident</td>
<td>4800</td>
</tr>
<tr>
<td>Resident</td>
<td>Calculate exemption amount</td>
<td>None</td>
<td>Tax Exemption for Resident</td>
<td>2000</td>
</tr>
</tbody>
</table>
### Resident Status

<table>
<thead>
<tr>
<th>Reference Value</th>
<th>Calculation Step</th>
<th>Calculation Method</th>
<th>Calculation Value</th>
<th>Values</th>
</tr>
</thead>
<tbody>
<tr>
<td>(None)</td>
<td>Calculate individual income tax</td>
<td>None</td>
<td>Individual Income Tax Rate</td>
<td>0-50000: 3%</td>
</tr>
<tr>
<td></td>
<td></td>
<td></td>
<td></td>
<td>50000-100000: 4%</td>
</tr>
<tr>
<td></td>
<td></td>
<td></td>
<td></td>
<td>Over 10000: 5%</td>
</tr>
</tbody>
</table>

- **Tax reporting units**: All tax reporting units defined for this payroll statutory unit can report this calculation component. You associate calculation components with a specific tax reporting unit on the personal calculation card.

### Social Insurance Deduction

The same country has a statutory deduction for a social insurance tax. Both the employer and the employee contribute to the social insurance tax, but their contribution rates are different. Calculation of the deduction includes several steps:

1. Calculate the base amount for the employee’s contribution.
2. Calculate the base amount for the employer’s contribution.
3. Calculate the employee’s contribution amount.
4. Calculate the employer’s contribution amount.

The following rules and definitions apply to this calculation at the legislative level:

- **Component group**: Social Insurance
- **Component name**: Medical Insurance Deduction
- **References for wage basis rules**: None
- **References for calculation factors**:

<table>
<thead>
<tr>
<th>Reference Name</th>
<th>Reference Value</th>
</tr>
</thead>
<tbody>
<tr>
<td>Contribution Level</td>
<td>Employee</td>
</tr>
<tr>
<td>Contribution Level</td>
<td>Employer</td>
</tr>
</tbody>
</table>

- **Wage basis rules**:

<table>
<thead>
<tr>
<th>Primary Classification</th>
<th>Secondary Classification</th>
<th>Use in Wage Basis?</th>
</tr>
</thead>
<tbody>
<tr>
<td>Standard Earnings</td>
<td>All secondary classifications selected</td>
<td>Y</td>
</tr>
<tr>
<td>Supplemental Earnings</td>
<td>All secondary classifications selected</td>
<td>Y</td>
</tr>
</tbody>
</table>

- **Related elements**: Medical Insurance Calculation element

The processing rule (fast formula) associated with this element drives the social insurance calculation. It accesses the appropriate calculation factor, based on the contribution level reference value and the current step in the calculation process.

- **Calculation factors for Medical Insurance Calculation element**: 
### Calculation Cards

#### Creating Calculation Cards for Deductions at Different Levels: Examples

You can create and manage calculation cards at several different levels, from an individual person to a payroll statutory unit. Use the cards to capture information specific to a person or organization, such as an employee’s tax filing status or an employer’s tax identification number. Calculation card entries override default values defined at other levels. The priority of information, from highest to lowest, is as follows:

1. Personal calculation card (payroll relationship level)
2. Tax reporting unit calculation card
3. Payroll statutory unit calculation card
4. Calculation value definitions (legislative data group level)

**Note:** Not all countries or territories support creating calculation cards for payroll statutory units and tax reporting units. The enterable values at each level also vary by country or territory. The basic steps to create and manage calculation cards are the same at all levels.

Use these examples to understand when you might define calculation cards at each level.

**Personal Calculation Card**

Scenario: An employee qualifies for a special reduced tax rate.

Task: Manage Calculation Cards task in the Payroll Administration work area.
Tax Reporting Unit Card
Scenario: The income tax exemption amount is 2000 USD at the legislative data group level, but a tax reporting unit in a particular state or province uses an exemption amount of 2500 USD. Enter this default value for the tax reporting unit, which can be overridden on personal calculation cards.

Task: Manage Legal Reporting Unit Calculation Cards task in the Setup and Maintenance work area.

Payroll Statutory Unit Card
Scenario: During application setup, the implementation team defines default contribution rates for the payroll statutory unit.

Task: Manage Legal Entity Calculation Cards task in the Setup and Maintenance work area.

Calculation Value Definition
Scenario: You can view the predefined income tax rates for your country, but you cannot edit them.

Task: Manage Calculation Value Definitions task in the Payroll Calculation work area.

If an employer qualifies for a special tax rate, enter these values on a calculation card at the appropriate level.

Related Topics
- Configuring a Personal Calculation Card: Worked Example

Personal Calculation Cards: How Their Entries Fit Together

Personal payroll calculation cards capture information specific to a particular payroll relationship. Payroll runs use this information to calculate earnings and deductions. Actions such as hiring a person or loading data may create some cards automatically. Otherwise, you can create the card manually. You can also add components to cards and enter calculation values, which may override default values. Additionally, you can associate the card with a tax reporting unit.

To view and manage calculation cards use the Manage Calculation Cards task in the Payroll Administration or Payroll Calculation work area.

Card Types
The types of calculation cards you can create and the type of information captured on a card vary by country or territory. Examples include cards for:

- Statutory deductions
- Involuntary deductions
- Time card entries
- Absences
- Benefits and pensions

Additional cards may be available to capture information for reporting purposes.
Card Creation
In countries where all employees are subject to the same set of statutory deductions, the application automatically creates one or more statutory deduction calculation cards when you hire a new employee. In other countries, you must create calculation cards manually.

For other card types, you create calculation cards as needed for each employee. If you load absence, time card, or pension data from another application, the application automatically creates the calculation cards.

Calculation Components and Component Groups
The Calculation Card Overview pane shows a hierarchy of calculation components within component groups. For example, child support, education loan, and alimony are calculation components in the US involuntary deduction component group.

Each component relates to an element, such as an income tax deduction. Adding a calculation component to the card creates an entry for the related element.

A calculation component may have one or more references that define its context, such as the employee’s place of residence or tax filing status.

Click a row in the Calculation Components table to see component details. Use the Component Details section to enter additional values used to calculate the component.

> Note: For some countries, the Manage Calculation Cards page doesn’t include the Calculation Components and Component Details sections. Instead, the layout of the page is specific to the data items required for the country.

Enterable Calculation Values
When you select a calculation component, you may see the Enterable Calculation Values on the Calculation Card tab. Here you can enter specific rates or other values for the person, which may override default values held on a calculation value definition. For example, if an employee qualifies for a special reduced tax rate, you enter the rate as an enterable value on their personal calculation card.

You can’t override values loaded from another application, but you may be able to add values, such as adding additional contributions to a pension deduction.

Tax Reporting Unit Associations
Click the Associations node in the Calculation Card Overview pane to associate a tax reporting unit with the card. Associations determine:

• Which rates and rules held at tax reporting unit level apply to the calculation of the components
• How the calculations are aggregated for tax reporting

Rules about what you can enter here vary by country:

• Typically, all components on a calculation card are associated with the same tax reporting unit by default.
• You may be able to associate individual components with different tax reporting units.
• If a person has multiple assignments, you may be able to associate specific assignments with calculation components.

Related Topics
• Configuring a Personal Calculation Card: Worked Example
• How do I associate calculation components with tax reporting units and assignments on a personal calculation card?

Calculation Value Definitions

Calculation Value Definitions: Explained

A calculation value definition specifies how a value is provided or calculated. The value is not necessarily monetary. Typically, it’s a flat amount or rate, but it could be a date or a text value, such as a tax code, depending on the calculation type. Some definitions hold the values in a table, so that different values apply to different employees.

For example, a graduated tax varies depending on the employee’s earnings balance. The calculation value definition for this tax might contain two rows where you define the tax rate for:

- Earnings under 50,000 USD
- Earnings above 50,000 USD

Predefined Calculation Value Definitions

Each localization provides a set of predefined calculation value definitions used to calculate statutory and involuntary deductions. You can’t edit predefined calculation value definitions.

In addition, when you create the following element types, the element template creates calculation value definitions based on your selections:

- Pensions
- Involuntary deductions
- Absences
- Time cards

Creating or Editing Calculation Value Definitions

Use the Manage Calculation Value Definitions task in the Payroll Calculation area to create or edit calculation value definitions. For example, you can set defaults, turn the values into a range (0 -100), and make them enterable on the calculation card.

Value Definition Groups

When you create a calculation value definition, either select an existing group or create a new one. The group categorizes related calculation value definitions. The predefined set of standard groups is available to all countries or territories.

Examples of value definition groups include:

- City tax information
- Social insurance information

Calculation Factors

Some elements, such as statutory deductions, require a large number of calculation value definitions. They use calculation factors to determine when and how to apply each calculation value definition, based on a reference value.
For example, a calculation factor may direct the payroll process to:

- Use a calculation value definition only if the person lives in Region B.
- Annualize the calculated result to produce the final amount

Use the Manage Payroll Calculation Information task in the Payroll Calculation work area to view and manage calculation factors.

### Calculation Value Definitions: Examples

The following deduction examples, the calculation value depends on where the employee falls in an earnings range. The From and To values of the range can be static or dynamic. Dynamic values are a fraction of the value of a database item, such as gross earnings. These examples also illustrate how to override the default calculation type for selected values in the range.

#### Static Values

The calculation value definition for a regional income tax uses a default calculation type of Flat Rate. However, for the lowest and highest incomes, a flat amount applies. For these two values, the Flat Amount calculation type overrides the default type, and uses a monetary value rather than a percentage. The Basis of Calculation Values field is blank, so the values are static.

The following table shows sample static values for this calculation value definition:

<table>
<thead>
<tr>
<th>From Value</th>
<th>To Value</th>
<th>Calculation Type Override</th>
<th>Rate or Amount</th>
</tr>
</thead>
<tbody>
<tr>
<td>0</td>
<td>199</td>
<td>Flat Amount</td>
<td>0</td>
</tr>
<tr>
<td>200</td>
<td>.999</td>
<td>_</td>
<td>4 (percent)</td>
</tr>
<tr>
<td>1000</td>
<td>1999</td>
<td>_</td>
<td>6 (percent)</td>
</tr>
<tr>
<td>2000</td>
<td>999,999,999</td>
<td>Flat Amount</td>
<td>300</td>
</tr>
</tbody>
</table>

#### Dynamic Values

The calculation value definition for a tax exemption uses a default calculation type of Incremental Rate. The first and last values specify the Flat Amount calculation type, which overrides the default type. The Basis of Calculation Values field specifies the Gross Earnings YTD database item. This means the From and To values represent a percentage of year-to-date gross earnings.

The following table shows sample dynamic values for this calculation value definition:

<table>
<thead>
<tr>
<th>From Value</th>
<th>To Value</th>
<th>Calculation Type Override</th>
<th>Rate or Amount</th>
</tr>
</thead>
<tbody>
<tr>
<td>0</td>
<td>.1</td>
<td>Flat Amount</td>
<td>300</td>
</tr>
<tr>
<td>.1</td>
<td>.2</td>
<td>_</td>
<td>10 (percent)</td>
</tr>
<tr>
<td>.2</td>
<td>.9</td>
<td>_</td>
<td>30 (percent)</td>
</tr>
</tbody>
</table>
The first row defines a flat amount of 300 USD that applies to the first 10 percent of gross earnings. The second row defines a 10 percent rate that applies to the next 10 percent of gross earnings. The third row defines a 30 percent rate that applies to between 20 and 90 percent of gross earnings. The final row defines a flat amount of 0 USD between 90 and 100 percent.

Enterable Values on Calculation Cards: Explained

Some values entered on a calculation card override values defined in a calculation value definition. For example, you might set a default tax rate for the legislative data group, and allow the rate to be overridden by a flat amount entered on a personal calculation card.

The following table explains where you can enter override values on calculation cards. It also provides the order in which the Calculate Payroll process checks for values entered on calculation cards. When the process finds an entered value, it stops checking and uses the values defined at that level.

<table>
<thead>
<tr>
<th>Order</th>
<th>Type of Values</th>
<th>Task</th>
<th>Work Area</th>
</tr>
</thead>
<tbody>
<tr>
<td>1</td>
<td>Values for a payroll relationship on any type of calculation card</td>
<td>Manage Calculation Cards</td>
<td>Payroll Calculation or Payroll Administration</td>
</tr>
<tr>
<td>2</td>
<td>Values for a tax reporting unit for certain deductions, which vary by country or territory</td>
<td>Manage Legal Reporting Unit Calculation Cards</td>
<td>Setup and Maintenance</td>
</tr>
<tr>
<td>3</td>
<td>Values for a payroll statutory unit for certain deductions, which vary by country or territory</td>
<td>Manage Legal Entity Calculation Cards</td>
<td>Setup and Maintenance</td>
</tr>
</tbody>
</table>

Allowing Enterable Values on Calculation Cards

The ability to enter values on calculation cards is controlled by the Enterable Calculation Values on Calculation Cards section of the calculation value definition:

- For user defined calculation value definitions, you can specify an enterable calculation value in this section. You provide:
  - The display name to appear on the calculation card.
  - The value type, such as total amount or additional amount.

- Enterable values for statutory and involuntary deductions are predefined. You can't allow new enterable values for predefined calculation value definitions.

Enterable Value Types

The list of value types available for entry depends on the calculation type. For example, you can allow users to enter the percentage value for a flat rate calculation or the monetary value for a flat amount calculation.
The following value types are available for all calculation types except text:

<table>
<thead>
<tr>
<th>Value Type</th>
<th>Description</th>
</tr>
</thead>
<tbody>
<tr>
<td>Calculation value definition</td>
<td>Uses the calculation value definition entered on a calculation card to calculate the amount.</td>
</tr>
<tr>
<td>Total amount</td>
<td>Uses the amount entered on the calculation card as the total amount.</td>
</tr>
<tr>
<td>Additional amount</td>
<td>Adds the amount entered on the calculation card to the calculated amount.</td>
</tr>
</tbody>
</table>

**Calculation Types in Calculation Value Definitions: Explained**

The calculation type determines which values you must provide in the Calculation Values section of the Create or Edit Calculation Value Definition page. For example, if you select Flat Amount as the calculation type, then you must provide a flat amount value. You specify a default calculation type for the definition, which you can override on individual rows in the Calculation Values section.

**Predefined Calculation Types**

You can choose from several predefined calculation types, as described in this table:

<table>
<thead>
<tr>
<th>Calculation Type</th>
<th>Description</th>
</tr>
</thead>
<tbody>
<tr>
<td>Flat Amount</td>
<td>Uses the specified flat amount as the total deduction amount.</td>
</tr>
<tr>
<td>Flat Amount Times Multiplier</td>
<td>Multiplies a flat amount by a multiplier value. If you select this option, you must specify a database item that provides the value of the multiplier.</td>
</tr>
<tr>
<td>Conditional Flat Amount</td>
<td>Uses the specified flat amount if the condition defined in the Calculation section is met. For example, a person might qualify for an exemption if their filing status is married or head of household. If you select this option, you must specify a database item that provides the value of the condition.</td>
</tr>
<tr>
<td>Flat Rate</td>
<td>Applies the specified rate to the balance.</td>
</tr>
<tr>
<td></td>
<td>For example, to apply a rate of 10 percent, enter 10.</td>
</tr>
<tr>
<td>Incremental Rate</td>
<td>Applies a different rate to portions of the balance.</td>
</tr>
<tr>
<td></td>
<td>For example, assuming that the balance is 80,000 USD, you could apply a 1 percent rate for the first 20,000 of the balance. A 3 percent rate for the next 30,000, and a 5 percent rate to the next 30,000. This is also referred to as a blended rate.</td>
</tr>
<tr>
<td>Standard Formula 1</td>
<td>Calculates the total amount based on the following formula:</td>
</tr>
<tr>
<td></td>
<td>[ y = Ax - Bz ]</td>
</tr>
<tr>
<td>Calculation Type</td>
<td>Description</td>
</tr>
<tr>
<td>------------------</td>
<td>-------------</td>
</tr>
<tr>
<td>Where:</td>
<td></td>
</tr>
<tr>
<td>• y is the deducted amount.</td>
<td></td>
</tr>
<tr>
<td>• x is the calculated amount.</td>
<td></td>
</tr>
<tr>
<td>• A and B are specified values.</td>
<td></td>
</tr>
<tr>
<td>• z is a factor from a predefined formula. The value defaults to 1.</td>
<td></td>
</tr>
</tbody>
</table>

**Standard Formula 2**
Calculates the value based on the following formula:

\[ y = (x - A) \times B + Cz \]

Where:

• y is the deducted amount.
• x is the calculated amount.
• A, B, and C are specified values.
• z is a factor from a predefined formula. The value defaults to 1.

**Text**
Uses the specified character string as the calculated value.

---

**Specifying View Objects**
A view object is a query result set. You can specify a view object to define the valid values that are available to the selected calculation type.

> **Note:**
> - The view objects you can specify vary depending on the calculation type For example, if the calculation type is **Conditional Flat Amount**, then specify view objects for the condition and flat amount values.
> - When you specify a view object, include the fully qualified path name, such as: `oracle.apps.hcm.locUS.payrollSetup.details.publicView.UsStatePVO`

**Wage Basis Rules**

**Wage Basis Rules: Explained**

Wage basis rules determine the earnings that are subject to a deduction. For exemptions, wage basis rules determine the elements that reduce the amount subject to deduction. Each wage basis rule is associated with a primary or secondary element classification. When you define a wage basis rule, you can associate it with up to six references that define the context for the rule.

**Element Classifications**
When you create a new wage basis rule, keep the following in mind regarding element classifications:

• For deduction elements, the classifications identify which types of earnings are subject to the deduction.
For exemption elements, the classifications identify which types of earnings reduce the amount subject to calculation.

References for Wage Basis Rules

A wage basis rule may be associated with up to six references that define the context for the rule. Each reference has a number that determines the sequence in which it’s evaluated for processing relative to other references. For example, if a wage basis rule for a regional tax deduction has references for both county and city, then the county reference should have a higher number than the city so that it gets evaluated first.

The wage basis rules and related references for statutory and involuntary deductions are predefined for each country.

Note: You can’t edit predefined rules or references.

Creating Wage Basis Rules

You can create new wage basis rules for existing payroll components using the Manage Component Group Rules task in the Payroll Calculation work area. The process is summarized below:

1. On the Manage Component Group Rules page, select the group to which the new rule applies.
2. In the Calculation Component Group Overview section, click the group name and then click Wage Basis Rules. If wage basis rule references have been defined, click the reference.
3. In the Wage Basis Rules section, click Create.
4. Select the payroll component to which the rule applies.
5. Select the primary classifications to be used in the wage basis.
6. Provide the reference value for the rule, if applicable.

Using the Use in Wage Basis Check Box

Here are some rules on using the Use in Wage Basis check box that you should know about:

- If you are setting up rules for a non-US legislative data group, select the Use in Wage Basis check box for each primary classification you add as a wage basis rule.
- If you are setting up rules for a US legislative data group, there’s an extra validation that prevents the insertion of a wage basis rule with no secondary classification. You can’t select the Use in Wage Basis check box.

You must complete the process using these steps:

1. Add the record with the check box deselected.
2. Select the row with the correct combination of deduction and primary and secondary classification.
3. Correct the data.
4. Select the Use in Wage Basis check box.

Wage Basis Rules: Example

To illustrate how wage basis rules affect a tax calculation, let’s look at an example where an employee’s earnings included in the wage basis vary, depending upon where the employee lives.

Taxable Earnings by Region

Brittany is a salesperson who receives a salary of 2,000 USD each month. Brittany also has a company car she drives. She is responsible for reporting her “Personal Use” of the company car in order to be taxed properly. Brittany works in her company’s East Coast district, and she spends 50 percent of her time in New York and 50 percent of her time in Pennsylvania. The State of New York taxes Brittany for her personal use of the company car; however, Pennsylvania does
not. Last month, Brittany reported personal use that equated to 100 USD (50 USD personal use in New York, and 50 USD personal use in Pennsylvania).

For example:

- In New York, imputed earnings such as personal use of company car amounts are included in the taxable wages.
- In Pennsylvania, imputed earnings such as personal use of company car amounts are NOT included in taxable wages.

This table shows the tax calculations that apply for each region.

<table>
<thead>
<tr>
<th>Region</th>
<th>Earnings in Salary</th>
<th>Eligible Imputed Earnings</th>
<th>Taxable Amounts</th>
<th>Deduction Amount</th>
</tr>
</thead>
<tbody>
<tr>
<td>New York</td>
<td>1000</td>
<td>50</td>
<td>1050</td>
<td>35</td>
</tr>
<tr>
<td>Pennsylvania</td>
<td>1000</td>
<td>(50 - Exempt)</td>
<td>1000</td>
<td>30</td>
</tr>
</tbody>
</table>

The wage basis rules for this tax calculation are as follows:

<table>
<thead>
<tr>
<th>Region (Reference Value)</th>
<th>Primary Classification</th>
<th>Secondary Classification</th>
<th>Use in Wage Basis?</th>
</tr>
</thead>
<tbody>
<tr>
<td>New York</td>
<td>Standard Earnings</td>
<td>Regular</td>
<td>Y</td>
</tr>
<tr>
<td>New York</td>
<td>Imputed Earnings</td>
<td>Personal Use of Company Car</td>
<td>Y</td>
</tr>
<tr>
<td>Pennsylvania</td>
<td>Standard Earnings</td>
<td>Regular</td>
<td>Y</td>
</tr>
<tr>
<td>Pennsylvania</td>
<td>Imputed Earnings</td>
<td>Personal Use of Company Car</td>
<td>N</td>
</tr>
</tbody>
</table>

Component Group Rules

Cost Components, Cost Elements, and Cost Component Groups: How They Work Together

Cost components are user-defined or come from external sources, and are mapped to cost elements which the costing application uses to track the cost of items. Use cost component groups to map cost components to cost elements, and to map source cost elements to destination cost elements when items are transferred from one inventory organization to another.
This figure illustrates the relationship between cost components, cost elements, cost component groups, and cost profiles.

![Diagram](image)

**Cost Components**

Cost components are the most granular representation of item costs. Examples of cost components are purchase order item price, material, freight, tax, and overhead. Cost Components come from different sources:

- Predefined costs from external sources such as Purchasing, Accounts Payable, and Inventory Management
- Landed cost charges from Oracle Fusion Landed Cost Management.

**Cost Elements**

A cost element is the level where the costs of an item are tracked through the inventory accounting life cycle. Cost components are mapped to cost elements, which enables you to calculate item costs at different granularity levels for different business needs. For example, you may want more granularity for high-value than for low-value items.

You can define cost elements for four types of costs:

- Material cost element type for incoming material cost components.
- Overhead cost element type for costs that are calculated by the cost processor based on user-defined overhead rules.
- Profit in Inventory cost element type for tracking of internal margins when items are transferred from one inventory organization to another, including global procurement and drop shipment flows. For cost elements of this type, indicate the Profit in Inventory organization that incurs the gain or loss due to the transfer of goods.
- Adjustment cost element type for separate tracking of cost adjustments, which provides a more detailed view of item costs and profit margins.

Cost elements are defined at the set level and thereby have the advantages of set-level definitions for sharing and segregation. A Profit in Inventory cost element must be assigned to the Common cost element set so that it can be shared across cost organizations.
The following table gives examples of cost element definitions:

<table>
<thead>
<tr>
<th>Cost Element Set</th>
<th>Cost Element</th>
<th>Cost Element Type</th>
<th>Inventory Organization</th>
</tr>
</thead>
<tbody>
<tr>
<td>US</td>
<td>Metals Material</td>
<td>Material</td>
<td>Not Applicable</td>
</tr>
<tr>
<td>US</td>
<td>Plastic Material</td>
<td>Material</td>
<td>Not Applicable</td>
</tr>
<tr>
<td>US</td>
<td>Misc Material</td>
<td>Material</td>
<td>Not Applicable</td>
</tr>
<tr>
<td>US</td>
<td>Misc Material</td>
<td>Adjustment</td>
<td>Not Applicable</td>
</tr>
<tr>
<td>US</td>
<td>Plant Depreciation</td>
<td>Overhead</td>
<td>Not Applicable</td>
</tr>
<tr>
<td>US</td>
<td>Equipment Depreciation</td>
<td>Overhead</td>
<td>Not Applicable</td>
</tr>
<tr>
<td>US</td>
<td>Freight Charges</td>
<td>Overhead</td>
<td>Not Applicable</td>
</tr>
<tr>
<td>Common</td>
<td>Internal Margin</td>
<td>Profit in Inventory</td>
<td>Seattle</td>
</tr>
<tr>
<td>UK</td>
<td>Dairy Material</td>
<td>Material</td>
<td>Not Applicable</td>
</tr>
<tr>
<td>UK</td>
<td>Misc Material</td>
<td>Material</td>
<td>Not Applicable</td>
</tr>
<tr>
<td>UK</td>
<td>Dairy Material</td>
<td>Adjustment</td>
<td>Not Applicable</td>
</tr>
</tbody>
</table>

Cost Component Groups

Use cost component groups to define mappings of cost components from external sources to cost elements in the costing application. These mappings provide flexibility in the granularity level where you track costs. You can map one cost component to one cost element for a detailed cost breakdown, or several cost components to one cost element for a less granular view of costs. For cost components and cost elements that are related to landed cost charges, you can choose to capitalize them into inventory value, or expense them. All other costs are automatically capitalized.

You can also map source cost elements to destination cost elements when transferring items from one inventory organization to another. This helps to maintain visibility of the item cost structure from the source application and across the supply chain.

You can specify a default cost component mapping to cost element to be used in cases where the source cost element does not have a matching destination cost element. The default cost component mapping is helpful when:

- The detailed mapping of a cost component to cost element is not required, and you want to map it to a single cost element.
- The designated mapping for a cost component is missing. If the mapping is missing, the transaction automatically picks up the default cost component mapping.
Note: If the cost component mapping is missing, the cost processor logs a message in the processing log. If the cost component mapping is missing and there is no default mapping, you can create the mapping and the transactions will be processed in the next run. If there is a default mapping, the transaction is processed and you can review the message log to decide if you want to take further action: you can correct the mapping for future transactions, and you can create a cost adjustment to reclassify the costs as needed.

Cost component groups are one of the attributes of cost profiles, which the cost processor uses to determine how to calculate item costs. Cost component groups are defined at the set level and thereby have the advantages of set-level definitions for sharing and segregation. Cost component groups and cost profiles are both set enabled; therefore, only those cost component groups belonging to the same set as the cost profile are available to that cost profile.

Example 1: The following table describes mapping of one cost component to one cost element.

<table>
<thead>
<tr>
<th>Mapping Group</th>
<th>Cost Component</th>
<th>Cost Element</th>
</tr>
</thead>
<tbody>
<tr>
<td>MG1</td>
<td>PO Item Price</td>
<td>Material</td>
</tr>
<tr>
<td>MG1</td>
<td>PO Tax</td>
<td>Tax</td>
</tr>
<tr>
<td>MG1</td>
<td>Profit in Inventory</td>
<td>PII</td>
</tr>
<tr>
<td>MG1</td>
<td>Interorganization Freight</td>
<td>Freight Charges</td>
</tr>
<tr>
<td>MG1</td>
<td>Invoice Price Variance</td>
<td>IPV</td>
</tr>
<tr>
<td>MG1</td>
<td>Exchange Rate Variance</td>
<td>ERV</td>
</tr>
<tr>
<td>MG1</td>
<td>Tax Invoice Price Variance</td>
<td>TIPV</td>
</tr>
</tbody>
</table>

Example 2: The following table describes mapping of cost components to one or more cost elements.

<table>
<thead>
<tr>
<th>Mapping Group</th>
<th>Cost Component</th>
<th>Cost Element</th>
</tr>
</thead>
<tbody>
<tr>
<td>MG2</td>
<td>PO Item Price</td>
<td>Material</td>
</tr>
<tr>
<td></td>
<td>PO Tax</td>
<td></td>
</tr>
<tr>
<td></td>
<td>NR Tax</td>
<td></td>
</tr>
<tr>
<td></td>
<td>Invoice Price Variance</td>
<td></td>
</tr>
<tr>
<td></td>
<td>Exchange Rate Variance</td>
<td></td>
</tr>
<tr>
<td></td>
<td>Tax Invoice Price Variance</td>
<td></td>
</tr>
<tr>
<td>MG2</td>
<td>Interorganization Freight</td>
<td>Freight Charges</td>
</tr>
<tr>
<td>MG2</td>
<td>Profit in Inventory</td>
<td>PII</td>
</tr>
</tbody>
</table>
Example 3: The following table describes mapping of source cost elements to destination cost elements in an interorganization transfer.

<table>
<thead>
<tr>
<th>Mapping Group</th>
<th>Source Cost Element Set</th>
<th>Source Cost Element</th>
<th>Destination Cost Element Set</th>
<th>Destination Cost Element</th>
</tr>
</thead>
<tbody>
<tr>
<td>MG3</td>
<td>US</td>
<td>Material Tax</td>
<td>UK</td>
<td>Material</td>
</tr>
<tr>
<td>MG3</td>
<td>US</td>
<td>Freight Charges</td>
<td>UK</td>
<td>Freight Charges</td>
</tr>
<tr>
<td>MG3</td>
<td>US</td>
<td>Other</td>
<td>UK</td>
<td>Other</td>
</tr>
</tbody>
</table>

You have flexibility in how you map cost component groups to items:

- Different items in a cost organization and book combination can have the same or different cost component group mappings if they use different cost profiles.
- One item can have different cost component group mappings in different cost books.
- Several cost organizations can share the same cost component group mappings if they belong to the same set, or if they are defined the same way in different sets.
Chapter 10

Setting Up Pay Calculation Components

The following figure illustrates different mappings of cost component groups to items. That is, in a cost organization, Item A maps to two cost groups, and item B and Item C maps to only one cost group.

### Related Topics
- Cost Profiles, Default Cost Profiles, and Item Cost Profiles: Explained
- Cost Elements and Analysis Groups: Explained
- Can I delete, deactivate, or edit a user-defined cost component code?

### Planning Cost Organizations, Planning Cost Components, and Cost Estimate Mappings: How They Work Together

Standard cost planning refers to the process of estimating standard costs for use in the costing of inventory or manufacturing transactions. Planning cost organizations, planning cost components, and estimate mappings are the main elements used in the standard cost planning process.
This figure illustrates the relationship between the standard cost planning elements, and how they are used to generate standard cost estimates.

Planning Cost Organizations

Enabling a cost organization for cost planning helps to define and maintain costs across multiple locations and production facilities. One of the modeling options is to perform cost planning at the business unit level, by mapping all the inventory organizations belonging to the business unit to one cost organization.

Related Topics

- What’s the difference between a cost organization and a planning cost organization?
- Cost Planning Process: Explained
- Standard Cost Definition Process: Explained
Calculation Factors

Calculation Factors: Explained

Calculation factors define data-driven rules for calculating complex payroll elements, such as statutory deductions. Some elements may have a large number of calculation factors, one for each unique set of rules, ranges, and references values. The payroll run determines which calculation factor to use based on the reference values and calculation rules of the element being processed.

For example, a calculation factor for a tax deduction element might define:

- A context reference, such as a city or state
- The calculation value definition, such as a 4 percent tax rate on balances under 50,000
- Optionally a calculation method and calculation step

⚠️ Note: Calculation factors are predefined for statutory and involuntary deductions, and should not need to be changed.

To view and manage calculation factors, follow these steps:

1. Select the Manage Payroll Calculation Information task in the Payroll Calculation work area.
2. Select the calculation component.
3. In the Calculation Overview section, expand the Related Elements node.
4. Expand the Calculation Factors node to display a list of all calculation factors associated with the element.
5. Create new calculation factors and edit existing ones that have an update status of Unlocked.

⚠️ Note: You can’t edit predefined calculation factors or their reference values. If you create a new calculation factor, you must edit the element’s formula to use the new factor.

Aspects of a calculation factor are shown in the following figure:
Reference Values
A calculation factor may be associated with up to six references that define its context. For example, in US, the calculation of state tax deduction might vary based on the state and person’s filing status.

Each reference has a reference number that determines the order in which it’s evaluated for processing relative to other references.

Calculation Value Definition
Each calculation factor is associated with a calculation value definition that defines the calculation type, such as flat amount or flat rate. The calculation rates and rules may vary based on the amount subject to calculation. Predefined calculation value definitions are provided for statutory and involuntary deductions.

Calculation Step
A calculation step is a label assigned to a calculation factor to identify its role in a complex calculation.

For example, when calculating an income tax deduction, the payroll run might do the following:

1. Calculate the allowance.
2. Calculate any exemption amount.
3. Apply the tax rate to the reduced deductible amount.

This tax deduction might be defined as a single element with multiple calculation steps, each defined in a separate calculation factor. You can assign the same calculation step to more than one calculation factor. Calculation steps are optional.

Calculation Method
A calculation method references a single fast formula. It’s an optional component of a calculation factor. Calculation methods operate at a higher level than the calculation types defined in the calculation value definition. They provide a wrapper around the calculation of a deduction by retrieving values from a calculation value definition, applying a formula, and returning the final deduction amount for the current run.

For example, if the calculation method is set to Cumulative, which references the Core Cumulative fast formula, then the calculation process returns the total deduction amount as a cumulative year-to-date amount. Accrual calculations for payroll balance calculations typically restart at the beginning of each calendar year. This is another type of calculation method. In this case the plan rule for the accrual term start date is January 1.

Calculation Factors for Payroll Deductions: Examples
To illustrate how the payroll run uses calculation factors to calculate different types of deductions, let’s look at a social insurance deduction and a national income tax deduction using calculation steps.

Social Insurance Deduction
Employers in many countries or territories deduct social insurance payments from employees and also make contributions. Employee and employer rates are typically different. Such deductions often have wage limits.

The social insurance deduction processor element for this type of calculation might have the following calculation factors:

<table>
<thead>
<tr>
<th>Employer or Employee Code (Reference Value)</th>
<th>Calculation Method</th>
<th>Calculation Step</th>
<th>Calculation Value Definition</th>
<th>Values</th>
</tr>
</thead>
<tbody>
<tr>
<td>Employee</td>
<td>None</td>
<td>Calculate Social Insurance Employee Rate</td>
<td>Social Insurance Employee Rate</td>
<td>4 percent flat rate</td>
</tr>
</tbody>
</table>
### National Income Tax Deduction Using Calculation Steps

A national income tax calculation involves multiple steps. First, it calculates the allowance, then any exemption amount, and then it applies the tax rate.

The following table shows a subset of calculation factors that might be associated with a tax processor element.

<table>
<thead>
<tr>
<th>Filing Status (Reference Value)</th>
<th>Calculation Method</th>
<th>Calculation Steps</th>
<th>Calculation Value Definition</th>
<th>Values</th>
</tr>
</thead>
<tbody>
<tr>
<td>Single</td>
<td>None</td>
<td>Calculate Region A Allowance - Single</td>
<td>Region A Allowance - Single</td>
<td>10,000 flat amount</td>
</tr>
<tr>
<td>Single</td>
<td>None</td>
<td>Calculate Region A Exemption Amount - Single</td>
<td>Region A Exemption - Single</td>
<td>0 flat amount</td>
</tr>
<tr>
<td>Single</td>
<td>None</td>
<td>Calculate Region A Regular Rate - Single</td>
<td>Region A Rate - Single</td>
<td>7 percent flat rate</td>
</tr>
<tr>
<td>Married</td>
<td>None</td>
<td>Calculate Region A Allowance - Married</td>
<td>Region A Allowance - Married</td>
<td>10,000 flat amount</td>
</tr>
<tr>
<td>Married</td>
<td>None</td>
<td>Calculate Region A Exemption Amount - Married</td>
<td>Region A Exemption - Married</td>
<td>1,000 flat amount</td>
</tr>
<tr>
<td>Married</td>
<td>None</td>
<td>Calculate Region A Regular Rate - Married</td>
<td>Region A Rate - Married</td>
<td>6 percent flat rate</td>
</tr>
</tbody>
</table>

### Rate Definitions
Rate Definitions: Explained

You can create rate definitions to calculate compensation rates and other rates, such as accrual rates, using payroll balances, element entry values, or values defined by criteria. If the rate is based on more than one balance or element entry, or if it references other rate definitions, you can specify multiple rate contributors. Use one of these work areas to access the Manage Rate Definitions task: Setup and Maintenance, Payroll Calculation, or Absence.

Categories

When you create a new rate, you must select a category.

Each category is described in the following table.

<table>
<thead>
<tr>
<th>Category</th>
<th>Description</th>
</tr>
</thead>
<tbody>
<tr>
<td>Derived Rate</td>
<td>Retrieves values from one or more payroll balances or other rate definitions, including rates that retrieve element entry values. Use this option to create a rate that retrieves a value from one or more rate contributors.</td>
</tr>
</tbody>
</table>
| Element           | Retrieves a value from or posts to an element input value. The element input value must have a special purpose of either Primary Input Value or Factor, as follows:  
|                   | • Select the Primary Input Value special purpose for an amount value, such as a salary figure.  
|                   | • Select the Factor special purpose for a factor value, such as a car allowance that you calculate as 3 per cent of average earnings (factor = 0.03). |
| Value by Criteria | Retrieves values from a single value by criteria definition. A value by criteria definition specifies one or more evaluation conditions that determine a particular value or rate. You can specify the conditions as a tree structure to define the evaluation sequence. |

Configuring Rate Definitions: Points to Consider

To configure rate definitions you should know how to use the fields in the Returned Rate Details, Override and Defaulting Rules, and Contributor Rules sections to get your desired rate. For rates based on a single element entry value, you can also apply override and defaulting rules.

This table describes the fields that appear in the Basic Details section on the Create Rate Definition page for the Derived Rate, Element, and Value by Criteria category types.

<table>
<thead>
<tr>
<th>Field</th>
<th>Category</th>
<th>Description</th>
</tr>
</thead>
<tbody>
<tr>
<td>Storage Type</td>
<td>Element</td>
<td>If you select the Element category to define a rate, you must select a storage type of Amount or Percentage. For example, you can configure a rate definition using the Salary element. If the salary is held as a monetary value, select Amount. If the salary is a factor of another value, such as a balance, select Percentage.</td>
</tr>
<tr>
<td>Field</td>
<td>Category</td>
<td>Description</td>
</tr>
<tr>
<td>---------------</td>
<td>-----------</td>
<td>-------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------</td>
</tr>
<tr>
<td><strong>Field</strong></td>
<td><strong>Category</strong></td>
<td><strong>Description</strong></td>
</tr>
<tr>
<td>Element Name</td>
<td>Element</td>
<td>For the Element category, this field isn’t enabled until you select the storage type. Selecting an element automatically fills in the Name and Short Name fields with the element name.</td>
</tr>
<tr>
<td></td>
<td>Derived Rate</td>
<td>If you select the Element category to define a rate, you must select an element name. This is required if you are configuring a primary rate. This is a rate that retrieves a value from a single element such as salary.</td>
</tr>
<tr>
<td></td>
<td></td>
<td>For the Derived Rate category, the Element Name is enabled when you access the page.</td>
</tr>
<tr>
<td>Employment Level</td>
<td>Derived Rate</td>
<td>Select either Payroll Relationship, Term, or Assignment. This field is mandatory for all derived rates and value by criteria rate definitions. It controls which employment ID the rates process uses when calling a rate.</td>
</tr>
<tr>
<td></td>
<td></td>
<td>If the employee has multiple assignments, the rates process uses the assignment ID to identify the correct assignment record for the employee.</td>
</tr>
<tr>
<td></td>
<td></td>
<td>If the contributor value is held at a different level to the employment level defined on the rate, the rates process uses the employment ID to locate the correct record.</td>
</tr>
<tr>
<td>Status</td>
<td>Element</td>
<td>You can set the status of a rate to active or inactive. An inactive rate can’t be assigned to an employee. Employees that are allocated a rate while it was active aren’t impacted by a change in status to inactive.</td>
</tr>
<tr>
<td></td>
<td>Derived Rate</td>
<td></td>
</tr>
<tr>
<td></td>
<td>Value by Criteria</td>
<td></td>
</tr>
<tr>
<td>Base Rate</td>
<td>Element</td>
<td>Select this check box if the rate represents a base rate that another rate uses in its calculation. For example, you might have day shift employees and night shift employees, with different base pay rates.</td>
</tr>
<tr>
<td></td>
<td></td>
<td>If each set of employees receives an allowance that’s a percentage of the base rate, you only need to define one allowance rate that’s calculated based on the two rates that have the Base Rate check box selected.</td>
</tr>
</tbody>
</table>
Returned Rate Details

Use this section of the page to specify the periodicity of the returned rate, factor rules, currency, decimal display, rounding rules, and minimum and maximum rules. If the process returns a rate that’s outside the minimum and maximum range, you can set up an action that enforces the rule, displays a warning, or forces the user to fix the error. Additionally, you can select the Return FTE Rate check box to instruct the rate definition process to return a part-time value by applying an employee’s FTE to the rate value.

Periodicities

You must specify a periodicity, such as hourly or weekly, for the returned rate and each rate contributor. When you use the rate in a formula, you can, however, override the default periodicity.

The rate calculation converts each contributor to the periodicity specified on the rate contributor. It then adds or subtracts the rate contributors, even if the periodicities are different. In most cases, they will be the same. Once the rate contributors are summed, the rate calculation then converts them into the return periodicity and currency.

For example, for a rate with a periodicity of weekly using the Standard Rate Annualized conversion formula, the rate calculation does the following:

1. Calculates an annual figure from the value and periodicity of each contributing earning and deduction.
2. Converts the annual figure into a weekly value.

By default, rates are converted using these predefined rate conversion formulas:

- Standard Rate Annualized
- Standard Rate Daily
- Standard Working Hours Rate Annualized
• Assignment Working Hours Rate Annualized
• Periodic Work Schedule Rate Annualized

If the values in the predefined conversion rules don’t meet your requirements, you can define your own.

Factor Rules
You can apply a factor or multiplier to a calculated rate, or to an individual rate contributor. To apply a factor rule:

• Select Value as the factor rule
• In the Factor field enter the number by which you want to multiply the rate
• Add the contributor

You can apply a factor rule to the rate definition, rate contributors, or both. For example, you can define rate contributors to calculate hourly values based on salary and bonus. You can then apply a factor of 1.0 or 100 percent to the salary balance contributor and a factor of 0.5 or 50 percent to the bonus balance contributor. The factor rule is applied to the rate before the periodicity conversion is applied.

Minimum and Maximum Values
You can define minimum and maximum values for the returned rate, and for individual rate contributors. If the calculation returns a rate that’s outside the minimum or maximum range, you can set up an action if the value is out of the minimum or maximum range.

Use the Limit Violation Action field to display an error, warning, or enforce the application to use minimum or maximum value that you enter. For example, you can enter 500 as the minimum value and then select Enforce Rules. If the returned value comes back as 400, the application uses 500 as the value.

The following table explains the options for the minimum and maximum rate values

<table>
<thead>
<tr>
<th>Value</th>
<th>Comments</th>
</tr>
</thead>
<tbody>
<tr>
<td>Null</td>
<td>No minimum or maximum value</td>
</tr>
<tr>
<td>A specified value</td>
<td>Example: 2000</td>
</tr>
<tr>
<td>Based on another rate</td>
<td>Uses the calculated value of the rate definition that you select.</td>
</tr>
</tbody>
</table>

Caution: Be careful that you don’t create a loop. For example, Rate A has minimum value that is based on Rate B, which has a minimum value based on Rate A. This situation would result in a runtime error.

| Value by Criteria         | Minimum or maximum value based on a value by criteria definition. |

Override and Defaulting Rules
This tab only displays if you select Element as the category when you define your rate definition. On this tab, you can set up override rules for the element associated with your rate definition. If you select the Override Allowed check box, you can enter rate values on the Salary page.
Note: You can't define override and defaulting rules if you select the Values by Criteria category to define a rate.

You can select a formula to validate any rate that is returned and also use formulas to create default values.

For example you could use the HCM Rates Default Value formula type to define the number of workdays in a year for your organization.

\[
\begin{align*}
\text{workday} &= 250 \\
\text{periodicity} &= \text{YEAR} \\
\text{currency} &= \text{USD} \\
\text{return workday, periodicity, currency}
\end{align*}
\]

In addition, you can use a value by criteria definition as the default type. In this example, the process uses the value for the first record created and then carries that value forward in subsequent records, unless it’s manually overridden. The rate created using the value by criteria method is reevaluated by the rate engine for each subsequent record and could therefore change. For example you could use a value by criteria definition to enable a default value of 10 percent for bonuses that are targeted to all eligible employees.

Contributor Rules

This tab enables you to specify the periodicity for the contributor total. You can also decide to process contributor totals as full-time equivalency amounts by selecting Yes in the Process Contributor Total as FTE Amount field. The final rate value is converted from this status to the Return Rate FTE status.

Note: This tab is not available for rate definitions using the Element and Value by Criteria categories. In addition, you can't define contributor rules if you select the Value by Criteria category to define a rate.

Information

This tab enables you to enter text that instructs or explains the purpose of the rate, how the rate is calculated, or provides further details for the rate. Entering information in this section is optional. This tab is not available for rate definitions using the Value by Criteria categories.

Related Topics

- Rate Conversion Rules: Explained
- Configuring Periodicity Conversion Rules: Procedure

Rate Contributors for Derived Rates: Points to Consider

There are four different types of rate contributors that you can add to your rate definition. You can add rate contributors when you define a rate using the Derived Rate category. You can also manually add rate contributors for the Element category when the storage type is Factor. For example, if you define a bonus rate which is 0.1 (10 percent) of average earnings, you enter 0.1 as the factor on the element and define a rate contributor based on your average earnings balance.

Fields that are common to the different rate contributor types include: Reference Date, Add or Subtract, Periodicity, Factor Rule, Factor Value, the Minimum and Maximum Rate fields, and Return FTE Rate.

Rate Contributor Types

The following table lists the types of rate contributors, descriptions, and the additional fields that display for each type.
<table>
<thead>
<tr>
<th>Type</th>
<th>Description</th>
<th>Additional Fields</th>
</tr>
</thead>
<tbody>
<tr>
<td>Balance</td>
<td>Value calculated by payroll processes, such as:</td>
<td></td>
</tr>
<tr>
<td></td>
<td>• An employee’s average salary rate over their last three months of salary payments</td>
<td>Balance Name</td>
</tr>
<tr>
<td></td>
<td>• Taxable earnings for the last tax year</td>
<td>Balance Dimension</td>
</tr>
<tr>
<td></td>
<td>• Commissions paid in the last quarter</td>
<td>Divisional Balance</td>
</tr>
<tr>
<td>Base Rate</td>
<td>Value from the employee’s Base Rate</td>
<td>Employment Level</td>
</tr>
<tr>
<td>Overall Salary</td>
<td>Value from the employee’s Overall Salary rate</td>
<td>Employment Level</td>
</tr>
<tr>
<td>Node: If the rate definition is an Overall Salary Rate, you can’t select Overall Salary as a Contributor Type.</td>
<td></td>
<td></td>
</tr>
<tr>
<td>Rate Definition</td>
<td>Enables you to include other rate definitions that contribute to the rate definition you are creating.</td>
<td>Rate Name</td>
</tr>
<tr>
<td></td>
<td>For example you can add regular salary, car allowance, and bonus pay rate contributors together to create an overall salary definition.</td>
<td></td>
</tr>
</tbody>
</table>

**Add and Subtract**

Select Add to add the rate contributor to the rate definition. If you want to subtract the information from the rate definition, select Subtract. For example, you may want to subtract an employee’s sign-on bonus from their overall salary.

**Reference Dates**

You can select a reference date, which is the date the application uses to retrieve rate contributor information for the rate calculation. The reference date specifies the context for the balance dimension.

For example, to retrieve a rate as of the actual start of an absence, select Absence Start Date. To retrieve a rate as of a specific time period, select a specific time period.

The Reference Date field lists only the following types of time definitions:

- Time Span - a period of time, such as three months
- Retrieval Date - a type of time definition that is based on a database item

Selecting a value for the Reference Date field is optional.

**Note:** If you don’t select a reference date, the application uses the effective as-of date that is used by the rate engine to calculate the rate.
Divisional Balance
You can use this field to divide the calculated rate contributor by the balance that you select.

Single or Multiple Rate Contributors
If the rate definition is based on multiple values, you may need to create multiple rate contributors, as explained in the following table.

<table>
<thead>
<tr>
<th>Rate</th>
<th>Number of Rate Contributors</th>
</tr>
</thead>
<tbody>
<tr>
<td>A single earning or deduction, such as salary</td>
<td>One</td>
</tr>
<tr>
<td>A combination of earnings, such as the sum of salary and car allowance payments</td>
<td>Multiple, if salary and car allowance are stored as separate rate definitions</td>
</tr>
</tbody>
</table>

>Note: All balances and element entries that contribute to a rate must use the same currency.

Example: Using multiple rate contributors, an hourly holiday pay rate could be based on adding together the following values, which are all paid at the end of the previous year:

- Salary
- Incentive bonus
- Seniority bonus
- Other changeable components of remuneration

Configuring Elements to Use Rate Definitions: Procedure
If you create rate definitions that reference element input values, you must configure them for the different calculation rules:

- Flat Amount
- Factor

This ensures that the values calculated by the rate are consistent with the values processed through payroll. There are a number of important element configuration steps you must complete if you’re using the rate feature.

For example, the element should be:

- Recurring
- Assignment level

In addition, you must:

- Not select the **Multiple Entries Allowed** check box.
- Select a special purpose for each element input value:
  - Select **Primary Input Value** for an Amount value.
  - Select **Factor** for a Factor value.
Select **Periodicity** for a Periodicity value.

*Note:* When creating elements for use in rate definitions, do not select **Periodically**. The Rate Definition process is unable to convert rates with a periodicity of periodically to different frequencies such as annual, weekly, and daily.

- If the flat amount is a full-time equivalent value, you must select **Yes** in the **Default** field for the Full-Time Equivalent input value.
- Create element eligibility.

To set up payroll processing to create rate definitions, configure elements for the following calculation rules:

- Flat Amount
- Factor

### Configuring Elements to Create Rate Definitions for Flat Amount Calculations

Do the following:

1. From the Payroll Calculation work area, start the **Manage Elements** task.
2. Click **Create**.
3. Complete the fields as shown in this table.

<table>
<thead>
<tr>
<th>Field</th>
<th>Value</th>
</tr>
</thead>
<tbody>
<tr>
<td>Legislative Data Group</td>
<td>Select your legislative data group</td>
</tr>
<tr>
<td>Primary Classification</td>
<td>Standard Earnings</td>
</tr>
<tr>
<td>Category</td>
<td>Standard</td>
</tr>
</tbody>
</table>

4. Click **Continue**.
5. Enter a name, reporting name, and description.
6. Enter the effective date.
7. Answer the questions in the Durations and Standard Rules sections.

*Note:* Multiple entries are not allowed.

8. Select **Assignment Level**.
9. Select **Recurring**.
10. In the Calculation Rules section, select **Flat Amount** and then click **Next**.
11. Click **Submit**.
12. On the Element Summary page under the Input Values folder, select **Full-Time Equivalent**.
13. Check that the following fields and values exist:

<table>
<thead>
<tr>
<th>Field</th>
<th>Value or Check Box Status</th>
</tr>
</thead>
<tbody>
<tr>
<td>Name</td>
<td>Full-Time Equivalent</td>
</tr>
<tr>
<td>Special Purpose</td>
<td>Full-Time Equivalent</td>
</tr>
</tbody>
</table>
Configuring Elements to Create Rate Definitions for Factor Calculations

Do the following:

1. Repeat steps 1 through 9 in the first procedure.
2. In the Calculation Rules section, select **Factor** and then click **Next**.
3. Click **Submit**.
4. On the Element Summary page under the Input Values folder, select **Pay Value**.
5. Check that the following fields and values exist.

<table>
<thead>
<tr>
<th>Field</th>
<th>Value or Check Box Status</th>
</tr>
</thead>
<tbody>
<tr>
<td>Name</td>
<td>Pay Value</td>
</tr>
<tr>
<td>Special Purpose</td>
<td>Primary output value</td>
</tr>
<tr>
<td>Unit of Measure</td>
<td>Money</td>
</tr>
<tr>
<td>Displayed</td>
<td>Selected</td>
</tr>
<tr>
<td>Allow User Entry</td>
<td>Selected</td>
</tr>
<tr>
<td>Required</td>
<td>Deselected</td>
</tr>
<tr>
<td>Create a Database Item</td>
<td>Selected</td>
</tr>
</tbody>
</table>

6. On the Element Summary page under the Input Values folder, select **Factor**.
7. Check that the following fields and values exist.

<table>
<thead>
<tr>
<th>Field</th>
<th>Value or Check Box Status</th>
</tr>
</thead>
<tbody>
<tr>
<td>Name</td>
<td>Factor</td>
</tr>
</tbody>
</table>
Testing Your Element Configuration

To test your element configuration, follow the steps below.

Note: These procedures are for payroll users only.

<table>
<thead>
<tr>
<th>Step</th>
<th>Page</th>
<th>Action</th>
</tr>
</thead>
<tbody>
<tr>
<td>1</td>
<td>Payroll Dashboard</td>
<td>Find a payroll and an employee that you can use for testing purposes.</td>
</tr>
<tr>
<td>2</td>
<td>Manage Elements</td>
<td>For the Flat Amount element, use the Pay Value balance feed to enter an Eligible Compensation balance for the Percentage element.</td>
</tr>
<tr>
<td>3</td>
<td>Manage Element Entries</td>
<td>Add the Flat Amount and Percentage elements to the employee as element entries and enter input values.</td>
</tr>
<tr>
<td>4</td>
<td>Submit a Process or Report</td>
<td>Enter a suitable period for the payroll you selected in step 1.</td>
</tr>
<tr>
<td>5</td>
<td>Submit a Process or Report</td>
<td>Run the payroll.</td>
</tr>
<tr>
<td>6</td>
<td>View Payroll Process Results</td>
<td>Check if the payroll results are correct.</td>
</tr>
</tbody>
</table>
Creating Rate Definitions for Leave: Worked Example

This example shows how to calculate an employee’s absence rate as of a particular date. The rate includes a combination of average salary and car allowance. In this example, the employee has an annual year-to-date salary of 26,000 GBP. The employee also receives an annual car allowance payment of 2,000 GBP. The absence rate is 26,000 + 2,000 = 28,000 GBP. This rate is then converted into a daily rate for the purpose of providing a daily absence rate.

The following table summarizes the key information that you will use in the examples:

<table>
<thead>
<tr>
<th>Decisions to Consider</th>
<th>In This Example</th>
</tr>
</thead>
</table>
| What elements do I need to create before I define the rate? | • Salary (assignment level) - This element contains the salary value to be retrieved by the rate definition. You must create it using the Flat Amount calculation rule.  
• Car Allowance (assignment level) - This element contains the car allowance value to be retrieved by the rate definition. You must create it using the Flat Amount calculation rule.  
• Absence - Use the Absence template to create the element. Enter Sickness as the classification and Absence as the category. |
| Which balances hold the contributing values? | • Salary is fed by the Salary element.  
• Car Allowance is fed by the Car Allowance element. |
| Should I process contributor totals as full-time equivalent amounts? | Yes |

Creating the Rate Definition

1. In the Payroll Calculation or Setup and Maintenance work area, select the Manage Rate Definitions task.
2. In the Search Results section, click Create.
3. Complete the fields as shown in this table.

<table>
<thead>
<tr>
<th>Field</th>
<th>Value</th>
</tr>
</thead>
<tbody>
<tr>
<td>Category</td>
<td>Derived Rate</td>
</tr>
<tr>
<td>Effective Start Date</td>
<td>Select a date that is after the creation date of the objects that you are referencing</td>
</tr>
<tr>
<td>Legislative Data Group</td>
<td>Select your legislative data group</td>
</tr>
</tbody>
</table>

4. Click OK.
5. In the Basic Details section on the Create Rate Definition page, complete the fields as shown in this table.

<table>
<thead>
<tr>
<th>Field</th>
<th>Value</th>
</tr>
</thead>
<tbody>
<tr>
<td>Name</td>
<td>Absence Rate - Salary and Car Allowance</td>
</tr>
<tr>
<td>Short Name</td>
<td>ABS RATE - SAL/CAR ALLOW</td>
</tr>
</tbody>
</table>

6. In the Returned Rate Details section, select Daily as the value for the Periodicity field.
7. Go to the Contributor Rules tab and then select Yes as the value for the Process Contributor Total as FTE Amount field.

The balances referenced need to be populated using payroll runs for the periods covered by the balance dimension or the rate definition will not generate a meaningful value.

Creating Rate Contributors

1. In the Rate Contributors section, click Create.
2. Select Balance as the Contributor Type and then click OK.
3. On the Create Rate Contributors page, complete the fields as shown in this table.

<table>
<thead>
<tr>
<th>Field</th>
<th>Value</th>
</tr>
</thead>
<tbody>
<tr>
<td>Add or Subtract</td>
<td>Add</td>
</tr>
<tr>
<td>Balance Name</td>
<td>Regular Salary</td>
</tr>
<tr>
<td>Balance Dimension</td>
<td>Assignment Period to Date</td>
</tr>
<tr>
<td>Periodicity</td>
<td>Daily</td>
</tr>
</tbody>
</table>

4. Click Save and Continue.
5. Click Create.
6. Select Balance as the Contributor Type and then click OK.
7. On the Create Rate Contributor page, complete the fields as shown in this table.

<table>
<thead>
<tr>
<th>Field</th>
<th>Value</th>
</tr>
</thead>
<tbody>
<tr>
<td>Add or Subtract</td>
<td>Add</td>
</tr>
<tr>
<td>Balance Name</td>
<td>Car Allowance</td>
</tr>
<tr>
<td>Balance Dimension</td>
<td>Assignment Period to Date</td>
</tr>
<tr>
<td>Periodicity</td>
<td>Daily</td>
</tr>
</tbody>
</table>

8. Click Save and Continue.
9. Click Submit.
10. Assign an Absence element entry to the employee’s assignment.

**Note:** You will then need to pass the absence entry through to payroll using the absence interface.

Related Topics

- Integrating Absence Management with Global Payroll: Procedure
Creating a Rate Definition for Basic Salary: Worked Example

This example demonstrates how to create a primary rate for a basic salary. After you run the rate engine, the Manage Element Entries - Manage Person Details page displays the values for eligible employees.

**Prerequisite**

⚠️ **Note:** Before you define the rate, create the salary element at the assignment level. This element contains the salary information to be retrieved by the rate definition. You can create it using the flat amount or factor calculation rule.

**Creating the Basic Salary Rate Definition**

1. In the Payroll Administration work area, click the **Manage Rate Definitions** task.
2. Click **Create**.
3. Complete the fields, as shown in this table.

<table>
<thead>
<tr>
<th>Field</th>
<th>Value</th>
</tr>
</thead>
<tbody>
<tr>
<td>Category</td>
<td>Element</td>
</tr>
<tr>
<td>Effective Start Date</td>
<td>Enter the current date.</td>
</tr>
<tr>
<td>Legislative Data Group</td>
<td>Enter your legislative data group.</td>
</tr>
</tbody>
</table>

4. Click **OK**.
5. Complete the fields, as shown in this table.

<table>
<thead>
<tr>
<th>Field</th>
<th>Value</th>
</tr>
</thead>
<tbody>
<tr>
<td>Storage Type</td>
<td>Amount</td>
</tr>
<tr>
<td>Element Name</td>
<td>Regular Salary</td>
</tr>
</tbody>
</table>

6. In the Returned Rate Details section, select the Base Rate and complete the fields, as shown in this table.

<table>
<thead>
<tr>
<th>Field</th>
<th>Value</th>
</tr>
</thead>
<tbody>
<tr>
<td>Periodicity</td>
<td>Annual</td>
</tr>
<tr>
<td>Periodicity Conversion Formula</td>
<td>ANNUALIZED RATE CONVERSION</td>
</tr>
<tr>
<td>Currency</td>
<td>US Dollar</td>
</tr>
</tbody>
</table>

7. Click **Submit**.
Creating Rate Definitions for Overall Salary: Worked Example

This example demonstrates how to create a rate definition for overall salary that includes multiple rate contributors.

The following table summarizes the key decisions for this scenario.

<table>
<thead>
<tr>
<th>Decisions to Consider</th>
<th>In This Example</th>
</tr>
</thead>
<tbody>
<tr>
<td>What components of pay should be included in an employee’s overall salary?</td>
<td>• Regular Salary  &lt;br&gt; • Car Allowance</td>
</tr>
<tr>
<td>Should I include all pay for car allowance in the overall salary?</td>
<td>No. Only include 50 percent of the amount paid for car allowance.</td>
</tr>
</tbody>
</table>

In this example, we will:

- Create the overall salary rate definition
- Add the regular salary rate contributor
- Add the car allowance rate contributor

**Note:** The overall salary rate definition is a derived rate. To populate the Overall Salary check box, select a salary element in the Element name field. You then add the regular salary rate and car allowance rate contributors to the rate definition. The rate contributors that you add should be elements that you select from the Rate Name field on the Create Rate Contributor page.

Creating the Overall Salary Rate Definition

1. In the Payroll Administration work area, click the **Manage Rate Definitions** task.
2. Click **Create**.
3. Complete the fields, as shown in this table.

<table>
<thead>
<tr>
<th>Field</th>
<th>Value</th>
</tr>
</thead>
<tbody>
<tr>
<td>Category</td>
<td>Derived Rate</td>
</tr>
<tr>
<td>Effective Start Date</td>
<td>Enter the current date.</td>
</tr>
<tr>
<td>Legislative Data Group</td>
<td>Select your legislative data group.</td>
</tr>
</tbody>
</table>

4. Click **OK**.
5. Complete the fields, as shown in this table.

<table>
<thead>
<tr>
<th>Field</th>
<th>Value</th>
</tr>
</thead>
<tbody>
<tr>
<td>Name</td>
<td>Overall Salary</td>
</tr>
<tr>
<td>Short Name</td>
<td>OVERALL_SAL</td>
</tr>
</tbody>
</table>
Adding the Regular Salary Rate Contributor

1. In the Calculation section, click **Create**.
2. Enter **Base Rate** in the Contributor Type field and then click **OK**.
3. Complete the fields as shown in this table.

<table>
<thead>
<tr>
<th>Field</th>
<th>Value</th>
</tr>
</thead>
<tbody>
<tr>
<td>Add or Subtract</td>
<td>Add</td>
</tr>
<tr>
<td>Employment Level</td>
<td>Payroll Assignment</td>
</tr>
<tr>
<td>Periodicity</td>
<td>Weekly</td>
</tr>
</tbody>
</table>

4. Click **Save and Continue**.

Adding the Car Allowance Rate Contributor

1. In the Calculation section, click **Create**.
2. Enter **Rate Definition** in the Contributor Type field and then click **OK**.
3. Complete the fields as shown in this table.

<table>
<thead>
<tr>
<th>Field</th>
<th>Value</th>
</tr>
</thead>
<tbody>
<tr>
<td>Add or Subtract</td>
<td>Add</td>
</tr>
<tr>
<td>Rate Name</td>
<td>Car Allowance</td>
</tr>
<tr>
<td>Periodicity</td>
<td>Weekly</td>
</tr>
<tr>
<td>Factor Rule</td>
<td>Value</td>
</tr>
<tr>
<td>Factor Value</td>
<td>0.5</td>
</tr>
</tbody>
</table>
Field | Value
--- | ---
4. | Click **Save and Continue**.  
5. | Click **Submit**.

### Generating HCM Rates: Procedure

Submit the Generate HCM Rates flow to calculate and store rates for reporting purposes or inclusion in payroll calculations. Run this batch process frequently to ensure the stored rate values are accurate.

After you run this process, you can report on the rates using extracts. The user entity includes the database items that you can use in reports.

Rates calculated by this process are restricted to:

- Employees with an Overall Salary rate
- Rates that contribute to the Overall Salary rate
- Rates where the Reporting Required option is selected

Database items are provided to support the rate batch process. These array database items return all rates associated with a payroll relationship record as of a specific date.

> **Note:** The REPORTING_RATE_VALUES and REPORTING_RATE_PERIODICITIES database items return values based on the return rate details defined on the rate definition. The other periodicity database items, such as REPORTING_RATE_QUARTERLY, return a rate that is converted to the specified periodicity.

The Generate HCM Rates process supports the database items listed in this table.

<table>
<thead>
<tr>
<th>Database Items</th>
<th>Description</th>
</tr>
</thead>
<tbody>
<tr>
<td>REPORTING_RATE_NAMES</td>
<td>Name of the rate</td>
</tr>
<tr>
<td>REPORTING_RATE_VALUES</td>
<td>Value of the rate</td>
</tr>
<tr>
<td>REPORTING_RATE_PERIODICITIES</td>
<td>Periodicity of the rate</td>
</tr>
<tr>
<td>REPORTING_RATE_FTE_FLAGS</td>
<td>Full-time status of the rate</td>
</tr>
<tr>
<td>REPORTING_RATE_TERM_NUMBERS</td>
<td>Term number associated to the rate values</td>
</tr>
<tr>
<td>REPORTING_RATE_ASG_NUMBERS</td>
<td>Assignment number associated to the rate values</td>
</tr>
<tr>
<td>REPORTING_RATE_WEEKLY</td>
<td>Weekly rate value</td>
</tr>
<tr>
<td>REPORTING_RATE_MONTHLY</td>
<td>Monthly rate value</td>
</tr>
<tr>
<td>REPORTING_RATE_QUARTERLY</td>
<td>Quarterly rate value</td>
</tr>
</tbody>
</table>
Database Items | Description
--- | ---
REPORTING_RATE_YEARLY | Annual rate value
REPORTING_RATE_PT_WEEKLY | Part-time weekly rate value
REPORTING_RATE_PT_MONTHLY | Part-time monthly rate value
REPORTING_RATE_PT_QUARTERLY | Part-time quarterly rate value
REPORTING_RATE_PT_YEARLY | Part-time annual rate value
REPORTING_RATE_FT_WEEKLY | Full-time weekly rate value
REPORTING_RATE_FT_MONTHLY | Full-time monthly rate value
REPORTING_RATE_FT_QUARTERLY | Full-time quarterly rate value
REPORTING_RATE_FT_YEARLY | Full-time annual rate value

Run the process if any of the following conditions apply.

- Changes to the data referenced by the rate, which may include element entries, grade rates, and values defined by criteria. This process only reports the rate values. It doesn't update, delete, create, or have any impact on the underlying objects.
- Updates to rate definitions, such as when a new rate contributor is added or removed, or the rate is made inactive.
- Changes to employee records that impact their salary rates, such as changes to job or grade.

> **Note:** You should run the process prior to any operation that depends on the values that are stored in the table. For example, if you have a rate based on seniority, values could change simply by the passage of time.

To run the process:

1. In the Payroll Administration work area, select the **Submit a Process or Report** task.
2. Select your legislative data group.
3. Select the **Generate HCM Rates** flow pattern.
4. Fill in the following fields:
   - Payroll Flow
   - Process Mode

<table>
<thead>
<tr>
<th>Mode</th>
<th>Description</th>
<th>Accuracy</th>
</tr>
</thead>
<tbody>
<tr>
<td>Fast</td>
<td>Uses the start and end date specified to calculate the rate value. If the rate value is the same for both dates, it determines that the rate value is the same over the entire period. If the start and end values are different, this method then determines a value</td>
<td>This is the quickest but least accurate method to calculate rate values. It misses any changes if a rate value goes up and then back down to the same value that is calculated at the start and end dates.</td>
</tr>
</tbody>
</table>
Using the Rate Calculation Formula: Explained

Oracle provides a rate calculation formula called RATE ENGINE. Applications and other formulas can call this formula to calculate a rate using a rate definition.

To call this formula from a formula:

- Specify the name of the rate definition as an input.
- Optionally pass other formula inputs, such as periodicity. This periodicity overrides the return periodicity specified on the rate definition.

The rate calculation formula returns a value and a periodicity.

Rates Used to Calculate Absences in Payroll: Explained

You can specify a rate for use in calculating an absence in an absence plan or an absence element. When processing absence entries in a payroll run, the formula associated to the absence element uses the Rate Converter global formula to convert rates. The formula checks for a rate in the following sequence:

1. Absence plan
2. Absence element
3. Compensation salary element

This topic covers the different locations where you define rates for processing absences in payroll.
Absence Plan

In Oracle Fusion Absence Management, you can select a rate rule on the Entries and Balances tab of the Create Absence Plan page. The rate rule calculates the units passed to payroll when you record an absence. You can select rate rules for the absence payment, final disbursement, discretionary disbursement, and liability balance calculation.

For third-party absence providers, the rate information and override rates are transferred to payroll from the Payroll Administration work area in the XML file attached to the Load Absence Batch process.

Absence Element

If you don’t specify rates in the absence plan, you can specify a rate when you create the absence elements. The type of absence information determines the rates you can select. For example, for plans where you transfer accrual balances and absences, you can select different rates to calculate the absence payment, discretionary disbursement, final disbursement, and liability balance rate.

As best practice, specify a rate in either the plan or the element. If you specify a rate for the element, such as the rate for the final disbursement, ensure it is the same rate as the one you selected in the corresponding plan.

Compensation Salary Element

If the formula doesn’t find a rate specified in the plan or the element, it uses the compensation salary element.

When you associate a payroll element to a salary basis, you specify an input value that holds base pay on a worker’s element entry. The monetary amount or rate recorded in the element entry is the salary value in the worker’s salary information held on the assignment. If you specify a rate, the formula uses this rate if it doesn’t find one defined in the absence plan or absence element.

**Related Topics**

- Defining Payroll Elements for Processing Absences: Procedure

FAQ for Rate Definitions

How does periodicity conversion work when there are multiple contributors with different periodicities?

Sometimes you may need to add a base salary, which is an annual figure, to a 13th month salary, which is a monthly figure that is calculated from the annual base salary. The base salary in this example is held as an annual amount on an element entry as 24,000. The 13th month salary is 2,000 (24000 / 12). If you add each of these contributors together, the sum of the contributors is 26,000 (24,000 + 2,000).

At this point you have added an annual figure to a monthly figure, but you haven’t indicated what the periodicity of the total is in the Returned Rate Details section on the Create Rate Definitions page. If you select Annual in the Contributor Total Periodicity field, the sum of the contributors is 26,000. If you select Monthly, it converts the contributors to 312,000 (26,000 * 12), which is now the annual figure.

*Note:* When the formula is called to calculate the rate, there is an option to override the return periodicity of the rate.
Values Defined by Criteria

Values Defined by Criteria: Explained

Each calculation value definition requires you to specify one or more evaluation conditions that determine a particular value or rate. In cases where you specify many conditions, each condition is defined as a separate level and placed in priority order to produce a tree structure.

You control the criteria that you enter and the resulting tree structure. In each branch of the tree you can have multiple evaluation conditions. If no conditions are met, the payroll process uses the value established for the default criteria that you set up. Each criterion and value, as well as the parent criteria definition, is stored as a calculation value definition.

Values defined by criteria comprise the components listed in the following table.

<table>
<thead>
<tr>
<th>Component</th>
<th>Requirement</th>
</tr>
</thead>
<tbody>
<tr>
<td>Criteria Definition (evaluation condition)</td>
<td>At least one but you can have many.</td>
</tr>
<tr>
<td>Default Criteria Definition</td>
<td>Should have at least one in most cases to cover all conditions.</td>
</tr>
<tr>
<td></td>
<td>If you have a situation that where the criteria you set up covers all conditions, then you don’t need a default criteria definition.</td>
</tr>
<tr>
<td>Name</td>
<td>Refers to the name of the value definition. This is a mandatory field. This name must be unique across all value definitions within a legislative data group. It’s required to enable customers to identify the parent record when creating the hierarchy through the HCM Data Loader.</td>
</tr>
<tr>
<td>Value Definition Group</td>
<td>Grouping that helps you manage value definitions. This is a mandatory field.</td>
</tr>
<tr>
<td>Retrieval Date</td>
<td>Determines whether the criteria definition uses the date earned or effective date to retrieve information. The default value is effective date.</td>
</tr>
<tr>
<td>Display Name</td>
<td>Refers to the name of the hierarchy record created within the context of the value definition. This name does not need to be unique and is displayed in the value by criteria hierarchy record. If you don’t enter a display name, the database item description or name displays.</td>
</tr>
<tr>
<td>Value Definitions</td>
<td>You can have multiple values included with a value definition. Each one is identified by the value identifier.</td>
</tr>
<tr>
<td>Database Items</td>
<td>One per criteria definition</td>
</tr>
<tr>
<td>Operands</td>
<td>One per criteria definition</td>
</tr>
<tr>
<td>Value Sets</td>
<td>Optional</td>
</tr>
<tr>
<td>Literal Values</td>
<td>One per criteria definition</td>
</tr>
</tbody>
</table>
### Component and Requirement

<table>
<thead>
<tr>
<th>Component</th>
<th>Requirement</th>
</tr>
</thead>
<tbody>
<tr>
<td>If you use the <code>IN</code> operand, you can enter multiple values.</td>
<td></td>
</tr>
<tr>
<td>Rate</td>
<td>Used when you are creating a calculation value. If you select Flat Rate or Incremental Rate as the calculation type, you must enter a rate in this field.</td>
</tr>
</tbody>
</table>

### Criteria Definitions and Evaluation Conditions

Within the tree structure you create the criteria definitions that hold the actual values or rates. There are many types of values that can be held, such as percentage, number, cash amount, or text.

You can also define a periodicity, which allows the value to be specified as a periodic value. Additionally, you can define a value in a currency that’s different from the default currency specified at the legislative data group.

The supported calculation types include:

- Flat Amount
- Flat Amount Times Multiplier
- Flat Calculation
- Flat Rate
- Incremental Rate
- Number
- Rate Definition
- Standard Formula 1
- Standard Formula 2

### Value Definitions

After creating the criteria, you create value definitions to hold the values for each criterion. This is where you enter the calculation types and rates. If you are using a calculation type that’s a flat amount, flat amount times multiplier, or number, you can also specify a periodicity.

To view or modify the calculation values you entered, click the appropriate link to access the Manage Calculation Value Definition task. On this page you can change from and to values, override the calculation type, add new rows, change rates, and change currency. The From Value and To Value fields on this page are monetary.

You can capture multiple values for a single criterion if you specify a unique value identifier for each value. The tree structure shows this identifier instead of the value definition name. For example you may want to pay employees bonuses at different rates based on their annual salaries. In this case you can use value identifiers to define different rates for each salary range using the From Value and To Value fields.

### Database Items

Each condition references a database item to identify where the value is used. It also determines the data type of the value, which is text, number, or date. Define conditions using predefined database items or the dynamically created database items that are generated when certain data is created, such as balances and elements.

Here is a partial list of database items that you can reference in the new hire flow:

- Grade
- Job
- Job Code
• BU (Business Unit)
• Location
• Department
• Worker Category
• Assignment Category
• Employee Category
• Salary Basis
• Legal Employer
• Period of Service (Seniority)
• Number of Dependents (between the ages 3 and 18)

Note: You can only reference database items for objects that are defined in the new hire flow, which are used to calculate salary basis. If you reference other types of database items, the process either returns zero or it uses the default criteria.

Operands
You use operands when you’re creating criteria. You can specify whether the value defined by the database item should be equal to, greater than, less than, greater than or equal to, or less than or equal to the literal value.

To capture multiple values for the same criteria, use the In operand. For example if you want to give employees that work in New York and Chicago the same bonus, you can create a single evaluation condition for both cities using the In operand.

Value Sets
Specify a value set to provide a dynamic list of values from which you can select an entry. This option is available for input values that provide text only.

Literal Values
If you specify a value set, you can select an entry from a list of values, which is based on the selected value. If you leave the Value Set field blank, you can enter any type of information that is appropriate for the value definition that you are creating.

Manage Values Defined by Criteria: Examples
Use the Manage Values Defined by Criteria task to calculate or retrieve values based on one or more conditions. You can use values defined by criteria in rate definitions. You can also use value by criteria definitions in any formula used for validation.

If you use a third-party payroll product and have a requirement to extract the salary rate details, use the Generate HCM Rates process to calculate rate values. The Generate HCM Rates process is primarily used to calculate derived rate values, such as those which sum multiple salary components. However, it is also used to process primary rates, as you may define rate definitions which calculate values that are different from those stored on an element entry.

Note: The values calculated by the Generate HCM Rates process are stored on a rates table. You can extract this information using the HCM Extract tool to send to your third-party payroll providers.

Use these examples to understand how you can calculate values defined by criteria for these elements of payroll.
Annual Salaries
You can calculate annual salaries for employees based on their position. For example:

- If the employee is a Consultant, pay 45,000
- If the employee is a Senior Consultant, pay 55,000
- If the employee is a Principal Consultant, pay 65,000

Bonus Payments
You can choose to calculate bonus payments for employees that are weighted by their location. A more complicated scenario would be to pay bonuses based on an employee’s department, years of service, and annual salary.

- To weight a bonus payment by location, you could set up criteria like this:
  - For employees working in London pay a 15 percent bonus
  - For employees working in Manchester pay a 13 percent bonus
  - For employees working in Southampton pay a 9 percent bonus
  - For all other employees pay a 5 percent bonus

- To pay a bonus based on department, years of service, and annual salary, you could set up criteria like this:
  - If an employee working in sales has less than or equal to 5 years of service and an annual salary over 45,000, pay a 2,000 bonus
  - If an employee working in sales has less than or equal to 10 years of service and an annual salary over 45,000, pay a 5,000 bonus
  - If an employee working in sales has greater than 10 years of service and an annual salary over 45,000, pay a 9,000 bonus
  - For all other employees working in sales, pay a 7 percent bonus based on their annual salary

Pension Contributions
Your pension plan may have rules that limit contributions based on an employee’s annual salary. For example, in this scenario you could set up the following criteria:

- Employees making less than or equal to 25,000, limit maximum contributions to 2,500
- Employees making less than or equal to 50,000, limit maximum contributions to 7,500
- Employees making less than or equal to 100,000, limit maximum contributions to 12,500
- Employees making greater than 100,000, limit maximum contributions to 14 percent of pay

Hourly Rates
In the United States, labor law mandates that when a locality’s minimum wage is greater than the state or federal minimum wage, you must pay the higher rate. To fulfill this requirement, use the Manage Values Defined by Criteria task to set up rates of pay that are determined by a worker’s state, county, and profession.

In this example, you could set up criteria to:

- Pay carpenters working in New Jersey in Ocean County greater than or equal to 15 USD per hour
- Pay carpenters working in New Jersey in Essex County greater than or equal to 17 USD per hour
- Pay carpenters working in New Jersey in Union County greater than or equal to 19 USD per hour
• For all other workers, pay 12 USD, the prevailing state wage for laborers

Using Values Defined by Criteria to Pay Bonuses Based on Age and Location: Worked Example

This example demonstrates how to create criteria to pay employee bonuses at different rates based on age and location. The following table summarizes the key decisions for this scenario:

<table>
<thead>
<tr>
<th>Decisions to Consider</th>
<th>In this Example</th>
</tr>
</thead>
<tbody>
<tr>
<td>What ages and rates should be used?</td>
<td>• Less than age 25, pay 10 percent</td>
</tr>
<tr>
<td></td>
<td>• Less than age 35, pay 14 percent to London employees</td>
</tr>
<tr>
<td></td>
<td>• Less than age 35, pay 16 percent to San Francisco employees</td>
</tr>
<tr>
<td></td>
<td>• All other locations and ages greater than 35, pay 5 percent</td>
</tr>
<tr>
<td>What locations should be used to determine bonus rates?</td>
<td>• London</td>
</tr>
<tr>
<td></td>
<td>• San Francisco</td>
</tr>
<tr>
<td>Are there any special conditions that should be added?</td>
<td>Yes. In San Francisco the general manager wants to pay a flat amount of 15,000 USD for all employees under the age of 35 who make over 100,000 USD per year.</td>
</tr>
</tbody>
</table>

In this example, we will:
• Create the bonus rate criteria definition
• Create age criteria
• Create location criteria for age group 2
• Create a calculation value definition for age group 1
• Create calculation value definitions for locations
• Create calculation value definitions for default criteria definitions
• Modify evaluation conditions

Prerequisite

In this example we are using HRX_US_REP_LOCATION as the value set for the entry of different locations. If you don’t have an equivalent value set, you may need to create one.

Creating the Bonus Rate Criteria Definition

1. In the Payroll Administration work area, click the Manage Values Defined by Criteria task.

This task is also available in the Setup and Maintenance and Compensation work areas.

2. Click Create.

3. Complete the fields, as shown in this table.

<table>
<thead>
<tr>
<th>Field</th>
<th>Value</th>
</tr>
</thead>
<tbody>
<tr>
<td>Name</td>
<td>Bonus Rate</td>
</tr>
</tbody>
</table>
Field | Value
---|---
Effective Start Date | 1/1/15
Legislative Data Group | Select your legislative data group.

4. Select the **Create new value definition group** radio button.
5. Enter **Bonus** in the New Value Definition Group field.
6. Enter **Flat Rate** in the Default Calculation Type field.
7. Click **OK**.

### Creating Age Criteria

1. Select the row with the Bonus Rate criteria definition.
2. Click **New**.
3. Select **Criteria** and then click **OK**.
4. For each criteria definition you create, complete the fields as shown in this table.

<table>
<thead>
<tr>
<th>Field</th>
<th>Age less than 25</th>
<th>Age less than 35</th>
</tr>
</thead>
<tbody>
<tr>
<td>Calculation Value Definition Name</td>
<td>Bonus Rate Age Group 1</td>
<td>Bonus Rate Age Group 2</td>
</tr>
<tr>
<td>Value Definition Group</td>
<td>Bonus</td>
<td>Bonus</td>
</tr>
<tr>
<td>Retrieval Date</td>
<td>Date Earned</td>
<td>Date Earned</td>
</tr>
<tr>
<td>Sequence</td>
<td>1</td>
<td>2</td>
</tr>
<tr>
<td>Database Item Name</td>
<td>PER.PER.PERSON_AGE</td>
<td>PER.PER.PERSON_AGE</td>
</tr>
<tr>
<td>Operand</td>
<td>&lt;</td>
<td>&lt;</td>
</tr>
<tr>
<td>Literal Value</td>
<td>25</td>
<td>35</td>
</tr>
</tbody>
</table>

5. Click **OK** each time you create a new criteria definition.
6. To create a default group for the age criteria, repeat steps 1 to 3.
7. Complete the fields, as shown in this table.

<table>
<thead>
<tr>
<th>Field</th>
<th>Value</th>
</tr>
</thead>
<tbody>
<tr>
<td>Calculation Value Definition Name</td>
<td>Bonus Rate Age Group Default</td>
</tr>
<tr>
<td>Value Definition Group</td>
<td>Bonus</td>
</tr>
<tr>
<td>Retrieval Date</td>
<td>Date Earned</td>
</tr>
</tbody>
</table>

8. Select the **Default Criteria** check box and then click **OK**.
Creating the Location Criteria for Age Group 2

1. Select the row with the Person Age < 35 criteria definition.
2. Click New.
3. Select Criteria and then click OK.
4. For each criteria definition you create, complete the fields as shown in this table.

<table>
<thead>
<tr>
<th>Field</th>
<th>London</th>
<th>San Francisco</th>
</tr>
</thead>
<tbody>
<tr>
<td>Calculation Value Definition Name</td>
<td>Bonus Range Age Group 2 Location 1</td>
<td>Bonus Range Age Group 2 Location 2</td>
</tr>
<tr>
<td>Value Definition Group</td>
<td>Bonus</td>
<td>Bonus</td>
</tr>
<tr>
<td>Retrieval Date</td>
<td>Date Earned</td>
<td>Date Earned</td>
</tr>
<tr>
<td>Sequence</td>
<td>1</td>
<td>2</td>
</tr>
<tr>
<td>Database Item Name</td>
<td>PER_ASG_LOCATION_ID</td>
<td>PER_ASG_LOCATION_ID</td>
</tr>
<tr>
<td>Display Name</td>
<td>Location</td>
<td>Location</td>
</tr>
<tr>
<td>Operand</td>
<td>=</td>
<td>=</td>
</tr>
<tr>
<td>Value Set</td>
<td>HRX_US_REP_LOCATION</td>
<td>HRX_US_REP_LOCATION</td>
</tr>
<tr>
<td>Literal Value</td>
<td>London</td>
<td>San Francisco</td>
</tr>
</tbody>
</table>

5. Click OK each time you create a new criteria definition.
6. To create a default group for the location criteria, repeat steps 1 to 3.
7. Complete the fields, as shown in this table.

<table>
<thead>
<tr>
<th>Field</th>
<th>Value</th>
</tr>
</thead>
<tbody>
<tr>
<td>Calculation Value Definition Name</td>
<td>Bonus Rate Age Group 2 Location Default Rate</td>
</tr>
<tr>
<td>Value Definition Group</td>
<td>Bonus</td>
</tr>
<tr>
<td>Retrieval Date</td>
<td>Date Earned</td>
</tr>
</tbody>
</table>

8. Select the Default Criteria check box and then click OK.

Creating a Calculation Value Definition for Age Group 1

1. Select the row with the Person Age < 25 criteria definition.
2. Click New.
3. Select Value and then click OK.
4. Complete the fields, as shown in this table.
Creating Calculation Value Definitions for Locations

1. Select the row with the Location = London criteria definition.
2. Click New.
3. Select Value and then click OK.
4. Complete the fields, as shown in this table.

<table>
<thead>
<tr>
<th>Field</th>
<th>Value</th>
</tr>
</thead>
<tbody>
<tr>
<td>Calculation Value Definition Name</td>
<td>Bonus Rate Age Group 1 Rate</td>
</tr>
<tr>
<td>Value Definition Group</td>
<td>Bonus</td>
</tr>
<tr>
<td>Retrieval Date</td>
<td>Date Earned</td>
</tr>
<tr>
<td>Calculation Type</td>
<td>Flat Rate</td>
</tr>
<tr>
<td>Rate</td>
<td>.10</td>
</tr>
</tbody>
</table>

5. Click OK.

6. Select the row with the Location = San Francisco criteria definition.
7. Click New.
8. Select Value and then click OK.
9. Complete the fields, as shown in this table.

<table>
<thead>
<tr>
<th>Field</th>
<th>Value</th>
</tr>
</thead>
<tbody>
<tr>
<td>Calculation Value Definition Name</td>
<td>Bonus Rate Age Group 2 Location Rate 1</td>
</tr>
<tr>
<td>Value Definition Group</td>
<td>Bonus</td>
</tr>
<tr>
<td>Retrieval Date</td>
<td>Date Earned</td>
</tr>
<tr>
<td>Calculation Type</td>
<td>Flat Rate</td>
</tr>
<tr>
<td>Rate</td>
<td>.14</td>
</tr>
</tbody>
</table>

5. Click OK.
6. Select the row with the Location = San Francisco criteria definition.
7. Click New.
8. Select Value and then click OK.
9. Complete the fields, as shown in this table.
Field | Value
---|---
Rate | .16

10. Click **OK**.

Creating Value Definitions for the Default Criteria Definitions

1. Under the location criteria definition, select the row with the Default Criteria definition.
2. Click **New**.
3. Select **Value** and then click **OK**.
4. Complete the fields, as shown in this table.

<table>
<thead>
<tr>
<th>Field</th>
<th>Value</th>
</tr>
</thead>
<tbody>
<tr>
<td>Calculation Value Definition Name</td>
<td>Age Group Location Default Rate</td>
</tr>
<tr>
<td>Value Definition Group</td>
<td>Bonus</td>
</tr>
<tr>
<td>Retrieval Date</td>
<td>Date Earned</td>
</tr>
<tr>
<td>Calculation Type</td>
<td>Flat Rate</td>
</tr>
<tr>
<td>Rate</td>
<td>.05</td>
</tr>
</tbody>
</table>

5. Click **OK**.

6. To create a calculation value definition for all other employees that don’t meet any criteria, select the row with the last Default Criteria definition.

7. Repeat the steps described above except for the Calculation Value Definition Name field. Enter **Bonus Default Rate** instead.

8. Click **OK**.

Modifying Evaluation Conditions

1. To modify the evaluation conditions for the San Francisco location, click the Bonus Rate Age Group 2 Location Rate 2 link.
2. Scroll down to the Calculation Values section.
3. Enter **100,000** in the To Value field.
4. Click **Add Row**.
5. Enter **100,000.01** in the From Value field and **999,999,999,999** in the To Value field.

From and to values are monetary, unless you are using a database item.

6. Select **Flat Amount** in the Calculation Type Override field.
7. Enter **15,000** in the Flat Amount field.
8. Click **OK** and then **Submit**.
Using Values Defined by Criteria to Limit Pension Contributions: Worked Example

This example demonstrates how to create criteria to limit pension contributions based on annual salary amounts. The following table summarizes the key decisions for this scenario.

<table>
<thead>
<tr>
<th>Decisions to Consider</th>
<th>In this Example</th>
</tr>
</thead>
<tbody>
<tr>
<td>What salaries and contribution limits should be used?</td>
<td>• Salary less than or equal to 50,000, limit pension contribution to 5,000</td>
</tr>
<tr>
<td></td>
<td>• Salary less than or equal to 100,000, limit pension contribution to 10,000</td>
</tr>
<tr>
<td></td>
<td>• All other salary amounts, limit pension contribution to 17 percent of annual salary</td>
</tr>
</tbody>
</table>

In this example, we will:

• Create the pension limits criteria definition
• Create salary criteria
• Create the value definition for salary amount 1
• Create the value definition for salary amount 2
• Create the value definition for the default criteria definition

Creating the Pension Limits Criteria Definition

1. In the Payroll Administration work area, click the Manage Values Defined by Criteria task.
   This task is also available in the Setup and Maintenance and Compensation work areas.
2. Click Create.
3. Complete the fields, as shown in this table.

<table>
<thead>
<tr>
<th>Field</th>
<th>Value</th>
</tr>
</thead>
<tbody>
<tr>
<td>Name</td>
<td>Pension Limits</td>
</tr>
<tr>
<td>Effective Start Date</td>
<td>1/1/15</td>
</tr>
<tr>
<td>Legislative Data Group</td>
<td>Select your legislative data group.</td>
</tr>
</tbody>
</table>

4. Select the Use existing value definition group radio button.
5. Select Limit Rules in the Value Definition Group field.
6. Select Flat Amount in the Default Calculation Type field.
7. Click OK.

Creating Salary Criteria

1. Select the row with the Pension Limits criteria definition.
2. Click New.
3. Select Criteria and then click OK.
4. For each criteria definition you create, complete the fields as shown in this table.
5. Click **OK** each time you create a new criteria definition.
6. To create a default group for the salary criteria, repeat steps 1 to 3.
7. Complete the fields, as shown in this table.

<table>
<thead>
<tr>
<th>Field</th>
<th>Salary less than or equal to 50,000</th>
<th>Salary less than or equal to 100,000</th>
</tr>
</thead>
<tbody>
<tr>
<td>Calculation Value Definition Name</td>
<td>Salary less than or equal to 50,000</td>
<td>Salary less than or equal to 100,000</td>
</tr>
<tr>
<td>Value Definition Group</td>
<td>Limit Rules</td>
<td>Limit Rules</td>
</tr>
<tr>
<td>Retrieval Date</td>
<td>Date Earned</td>
<td>Date Earned</td>
</tr>
<tr>
<td>Sequence</td>
<td>1</td>
<td>2</td>
</tr>
<tr>
<td>Database Item Name</td>
<td>CMP_ASSIGNMENT_SALARY_AMOUNT</td>
<td>CMP_ASSIGNMENT_SALARY_AMOUNT</td>
</tr>
<tr>
<td>Operand</td>
<td>&lt; =</td>
<td>&lt; =</td>
</tr>
<tr>
<td>Literal Value</td>
<td>50,000</td>
<td>100,000</td>
</tr>
</tbody>
</table>

8. Select the **Default Criteria** check box and then click **OK**.

**Creating the Value Definition for Salary Amount 1**

1. Select the row with the Salary Amount < = 50,000 criteria definition.
2. Click **New**.
3. Select **Value** and then click **OK**.
4. Complete the fields, as shown in this table.

<table>
<thead>
<tr>
<th>Field</th>
<th>Value</th>
</tr>
</thead>
<tbody>
<tr>
<td>Calculation Value Definition Name</td>
<td>Salary Greater Than 100,000</td>
</tr>
<tr>
<td>Value Definition Group</td>
<td>Limit Rules</td>
</tr>
<tr>
<td>Retrieval Date</td>
<td>Date Earned</td>
</tr>
<tr>
<td>Calculation Type</td>
<td>Flat Amount</td>
</tr>
</tbody>
</table>
Creating the Value Definition for Salary Amount 2

1. Select the row with the Salary Amount ≤ 100,000 criteria definition.
2. Click New.
3. Select Value and then click OK.
4. Complete the fields, as shown in this table.

<table>
<thead>
<tr>
<th>Field</th>
<th>Value</th>
</tr>
</thead>
<tbody>
<tr>
<td>Calculation Value Definition Name</td>
<td>Contribution Limits 2</td>
</tr>
<tr>
<td>Value Definition Group</td>
<td>Limit Rules</td>
</tr>
<tr>
<td>Retrieval Date</td>
<td>Date Earned</td>
</tr>
<tr>
<td>Calculation Type</td>
<td>Flat Amount</td>
</tr>
<tr>
<td>Periodicity</td>
<td>Annually</td>
</tr>
<tr>
<td>Unit of Measure</td>
<td>Money</td>
</tr>
<tr>
<td>Currency</td>
<td>USD</td>
</tr>
<tr>
<td>Flat Amount</td>
<td>10,000</td>
</tr>
</tbody>
</table>

5. Click OK.

Creating the Value Definitions for the Default Criteria Definition

1. Select the row with the Default Criteria definition.
2. Click New.
3. Select Value and then click OK.
4. Complete the fields, as shown in this table.

<table>
<thead>
<tr>
<th>Field</th>
<th>Value</th>
</tr>
</thead>
<tbody>
<tr>
<td>Calculation Value Definition Name</td>
<td>Salary Greater Than 100,000</td>
</tr>
</tbody>
</table>
FAQ for Values Defined by Criteria

Does the order in which I add criteria definitions matter?

Yes. Each criteria definition that you add is defined as a separate level and placed in priority order. The order is used to produce a tree structure, which affects processing and the value that is returned.

For example, if the first criteria definition has the condition of salary greater than 0, and the next criteria definition in the sequence has the condition of salary greater than 100,000, all salaries would meet the first condition and there would be no results for the second condition. To fix this situation, you would reverse the order of the criteria definitions where the condition greater than 100,000 is first in the sequence.

You can change the sequence of the criteria definitions at any time to suit your business needs and fix processing problems.

Payroll Event Groups

Payroll Event Groups: Explained

A payroll event group defines the types of data changes that trigger retroactive event notifications or prorated calculation of a person’s earnings or deductions.

There are two types of payroll event groups:

- Proration
- Retroactive

Proration

Using proration, you can calculate proportionate earnings and deduction amounts whenever payroll-relevant data changes during a payroll period.

For example, you can calculate proportionate earnings and deduction amounts if:

- A person joins or leaves an organization in the middle of a payroll period
A person’s pay rate changes during a payroll period

If you want to prorate an element, such as basic salary, assign a proration event group to the element with proration points that affect a person’s salary. You can use the predefined event group, or create a new one. When you create an event group, you select the events that activate proration calculation, such as changes to:

- Hourly or annual pay rates
- Working hours
- Allowances or deductions
- Assignment changes, such as grade or position

**Tip:** You can only select events that represent changes to element entries, calculation cards, calculation value definitions and assignments.

**Retroactive**

Retroactive processing ensures that your payroll run for the current period reflects any backdated payments and deductions from previous payroll periods. A retroactive event group defines the types of changes that trigger a retroactive event notification.

Within a retroactive event group, select the events that produce notifications if a backdated change occurs. Specify the entity, update type, and attribute, as shown in the examples provided in the following table.

<table>
<thead>
<tr>
<th>Entity</th>
<th>Update Type</th>
<th>Attribute</th>
</tr>
</thead>
<tbody>
<tr>
<td>Element Entry Value</td>
<td>Correction</td>
<td>SCREEN_ENTRY_VALUE</td>
</tr>
<tr>
<td>Element Entry</td>
<td>Update</td>
<td>EFFECTIVE_START_DATE</td>
</tr>
<tr>
<td>Element Entry</td>
<td>Update</td>
<td>EFFECTIVE_END_DATE</td>
</tr>
<tr>
<td>Element Entry</td>
<td>Logical Date Change</td>
<td></td>
</tr>
<tr>
<td>Element Entry</td>
<td>Insert</td>
<td></td>
</tr>
<tr>
<td>Element Entry</td>
<td>Delete Changes</td>
<td></td>
</tr>
</tbody>
</table>

**Related Topics**

- How can I create an element for retroactive processing?

**Element Proration**
Setting Up Element Proration: Procedure

Proration calculates proportionate amounts for recurring elements when payroll-relevant data changes during a payroll period. This could include a person joining the enterprise or a mid-period pay increase. Proration creates two payroll run results. The first run result is for the payroll period up to the day before the event. The second one is from the date of the event to the end of the period. When you create an element, you specify its proration event group and the calculation method.

Proration rate conversion rules give you the flexibility of specifying a different rule than that used for periodicity. For example you prorate based on calendar days when using work units for conversion.

To set up element proration, you:

- Review the predefined proration event group to ensure that it includes changes you want to track. You can optionally update the event group or create a new group.
- Create an element and enable proration processing for an element.

Reviewing the Predefined Event Group

When you create or update a recurring element, you can make it subject to proration.

1. In the Payroll Calculation work area, start the Manage Event Groups task.
2. Search for the predefined event group: Entry Changes for Proration.
3. Review the types of changes that automatically trigger proration for the elements associated with this event group.

You can edit this group or create a new event group for the element, if required. For example, you might want to add changes to calculation cards or assignments.

Enabling Proration Processing for an Element

To enable proration:

1. Start the Manage Elements task, and click Create.
2. On the Create Element: Additional Details page, select Yes for the following question: Is this element subject to proration?
3. Select the predefined event group (Entry Changes for Proration) or a new group that you created.
4. Select a Proration Units and Proration Rate Conversion Rule.
5. Select a Proration Conversion Rule formula.

Note: If the predefined conversion rules don’t meet your requirements, you can create a user-defined formula.

Related Topics

- Creating and Assigning a Work Schedule: Worked Example

Creating Conversion Formulas for Proration: Procedure

The predefined proration formula GLB_EARN_PRORATION controls how the payroll calculation prorates an element entry when it encounters an event. This could happen when there is a change to an element entry value. You can copy and edit a predefined proration formula to modify the calculation. You then select the user-defined formula as the proration formula for your element.
Creating a Formula

As a prerequisite, create a modified rate conversion before you create its related proration conversion rule. Follow these rules to write a formula:

1. Select the formula type called Payroll Run Proration.
2. Search for and copy the predefined Rate Conversion Proration formula.
3. Add the suffix underscore PRORATE to the name (_PRORATE).
4. Update the formula inputs:
   - PRORATE_START_DATE (date)
   - PRORATE_END_DATE (date)
   - SOURCE_PERIODICITY (text)
   - DAYS_WORKED (number)
   - RATE_CONV_FORMULA (text)
   - HOURS_WORKED (number)
   - IN_AMOUNT (number)
   - UNIT_TYPE (text)
   - PRORATION_UNIT (text)
5. Add the formula outputs for the element input values.
6. Save, submit, and compile the formula.

Some countries or territories supply predefined proration formulas that you can use as the basis for your modified version.

Prorated Earnings and Deductions: How They're Calculated

You can select from a number of different proration conversion rules to calculate standard or supplemental earnings. You select the proration conversion rule when you create an earnings or deduction element using the Manage Elements task in the Payroll Calculation work area. You can calculate prorated earnings based on calendar days or work schedules.

This topic covers:

- How deductions are calculated
- How prorated earnings are calculated
- Examples of earnings calculation based on calendar days
- Example of earnings calculation based on work schedule

How Deductions Are Calculated

Typically, you don’t prorate deductions, such as deductions based on a percentage of earnings. You might prorate fixed rate deductions, such as involuntary deduction for a fitness center membership. In most cases, you use the predefined global proration formula for deductions (GLB_DEDN_PRORATION). For this formula the proration value is the periodic value multiplied by the number of calendar days in the proration period. This figure is then divided by the number of calendar days in the payroll period.
How Prorated Earnings are Calculated

Creating a recurring earnings element automatically associates it with a predefined proration formula (GLB_EARN_PRORATION). The proration formula determines how to prorate earnings in the proration period based on the proration calculation method you select.

As a guideline the global formula doesn't prorate:

- Nonrecurring elements
- Earnings elements with a calculation rule of unit multiplied by rate, if rate and hours are entered in the element entry

**Note:** Some predefined legislations provide a different default proration formula and rules.

These examples show how proration calculations are performed on earnings calculations based on:

- Calendar days
- Work schedules

Example: Earnings Calculation Based on Calendar Days

The formula calculates proration results as shown in the following table.

<table>
<thead>
<tr>
<th>Proration Conversion Rule and Proration Units</th>
<th>Proration Calculation</th>
</tr>
</thead>
<tbody>
<tr>
<td>Standard Rate Annualized rule</td>
<td>Calendar days in proration period multiplied by annual pay and divided by annual calendar days</td>
</tr>
<tr>
<td>Daily proration units</td>
<td></td>
</tr>
</tbody>
</table>

Example:

1. You assign a person to a monthly payroll for a salary basis of $25,000.
2. You update the salary on 10 December, 2013 to $30,000.
3. You calculate the December monthly payroll.
4. The proration formula calculates 2 proration periods with 9 calendar days in the first proration period, and 22 in the second period.

\[
\frac{9 \times 25000}{365} + \frac{22 \times 30000}{365} = 616.44 + 1808.22 = 2424.66
\]

<table>
<thead>
<tr>
<th>Standard Rate Daily rule</th>
<th>Total pay divided by calendar days in the payroll period and multiplied by calendar days in the proration period.</th>
</tr>
</thead>
<tbody>
<tr>
<td>Daily proration units</td>
<td></td>
</tr>
</tbody>
</table>

Example:

1. You hire a person to a weekly payroll in the middle of the payroll period.

\[
(500 / 7) \times 3 = 214.29
\]
Example: Earnings Calculation Based on Work Schedule

The formula calculates proration results as shown in the following table. If no working hours are defined, the proration formula checks the assignment definition for the number of working hours and frequency. If no information is found, the formula uses 40 as the number of working hours and 5 as the number of days for the work week.

<table>
<thead>
<tr>
<th>Proration Conversion Rule and Proration Units</th>
<th>Proration Calculation</th>
</tr>
</thead>
<tbody>
<tr>
<td>Periodic Work Schedule Rate</td>
<td>Work schedule days in proration period multiplied by annual pay and divided by 260 days, the default number of annual working days.</td>
</tr>
<tr>
<td>Annualized rule</td>
<td></td>
</tr>
<tr>
<td>Workday proration units</td>
<td>A day in a work schedule is a 24 hour period.</td>
</tr>
<tr>
<td>Perioic Work Schedule Rate</td>
<td></td>
</tr>
<tr>
<td>Hourly proration units</td>
<td>Work schedule hours in proration period multiplied by the annual pay and divided by 2080, the default number of annual working hours.</td>
</tr>
</tbody>
</table>

Example:

1. You hire a person to a monthly payroll for an annual salary basis of $25,000.
2. The employee works 5 days a week Monday through Friday.
3. You increase the monthly salary to $30,000 effective 10 December, 2013.
4. You calculate the December monthly payroll.
5. The proration formula calculates 6 working days from 1st December to 9th December, and 16 working days from 10th December to 31st December.

\[
(6 \times 25000) \div 260 + (16 \times 30000) \div 260 = 576.92 + 1846.15 = 2423.07
\]

Example:

1. An employee assigned to a weekly payroll receives an annual salary basis of $25,000.
2. You increase the salary to $30,000 effective 10 December, 2013.
3. The employee works 10 hours a day from 9 December to 12 December.

\[
(10 \times 25000) \div 2080 + (30 \times 30000) \div 2080 = 120.19 + 432.69 = 552.88
\]
Proration Calculation Rule and Proration Units

4. You calculate the weekly payroll for the week 8 December to 14 December.
5. The proration formula calculates 2 proration periods, with 10 working hours for the first period, and 30 for the second period.

Periodicity

Periodicity Conversion: Explained

Rate conversion formulas convert amounts to different periodicities for payroll calculations. The following calculations use rate conversion formulas:

- Proration
- Hours multiplied by rates calculation of an element run result
- Rates based on rate definitions

Predefined Periods

The following are the predefined periods for use when setting periodicity.

If these values don’t meet your requirements, you can copy a predefined rate conversion formula and edit its periodicity values.

<table>
<thead>
<tr>
<th>Periodicity</th>
<th>Valid for Payroll Periods</th>
<th>Number of Periods per Year</th>
</tr>
</thead>
<tbody>
<tr>
<td>Annually</td>
<td>Yes</td>
<td>1</td>
</tr>
<tr>
<td>Bimonthly</td>
<td>Yes</td>
<td>6</td>
</tr>
<tr>
<td>Biweekly</td>
<td>Yes</td>
<td>26</td>
</tr>
<tr>
<td>Calendar Monthly</td>
<td>Yes</td>
<td>12</td>
</tr>
<tr>
<td>Daily</td>
<td>No</td>
<td>365</td>
</tr>
<tr>
<td>Hourly</td>
<td>No</td>
<td>2920 (365 days multiplied by 8 hours)</td>
</tr>
<tr>
<td>Lunar Month</td>
<td>Yes</td>
<td>13</td>
</tr>
<tr>
<td>Periodically</td>
<td>No</td>
<td>Payroll frequency determines the number of periods to use in the rate conversion.</td>
</tr>
</tbody>
</table>
### Defining Periodicity

You can define periodicity in the following ways:

<table>
<thead>
<tr>
<th>Object</th>
<th>Task</th>
<th>Description</th>
</tr>
</thead>
<tbody>
<tr>
<td>Elements</td>
<td>Manage Elements</td>
<td>The Periodicity input value specifies the frequency of the element value. For example, salary element entries that hold annual salary values have an annual periodicity.</td>
</tr>
<tr>
<td>Payrolls</td>
<td>Manage Payroll Definitions</td>
<td><strong>Period Type</strong> specifies the number of payroll periods. For example, the Monthly Lunar period type includes 13 payroll periods.</td>
</tr>
<tr>
<td>Rates</td>
<td>Manage Rate Definitions</td>
<td>Rate definition can specify the following periodicities:</td>
</tr>
<tr>
<td></td>
<td></td>
<td>- Return periodicity of the rate</td>
</tr>
<tr>
<td></td>
<td></td>
<td>- Periodicity of each rate contributor</td>
</tr>
<tr>
<td></td>
<td></td>
<td>- Periodicity of the calculated sum of the rate contributors</td>
</tr>
</tbody>
</table>

### Rate Conversion Formulas

Rate conversion formulas change the periodicity of an amount.

For example, the Standard Rate Annualized conversion formula can convert an annual salary amount to a weekly amount.

The following table describes the predefined formulas.

<table>
<thead>
<tr>
<th>Periodicity</th>
<th>Valid for Payroll Periods</th>
<th>Number of Periods per Year</th>
</tr>
</thead>
<tbody>
<tr>
<td>Quarterly</td>
<td>Yes</td>
<td>4</td>
</tr>
<tr>
<td>Semiannually</td>
<td>Yes</td>
<td>2</td>
</tr>
<tr>
<td>Semimonthly</td>
<td>Yes</td>
<td>24</td>
</tr>
<tr>
<td>Workday</td>
<td>No</td>
<td>260</td>
</tr>
<tr>
<td>Weekly</td>
<td>Yes</td>
<td>52</td>
</tr>
<tr>
<td>Work Hour</td>
<td>No</td>
<td>2080 (260 days multiplied by 8 hours)</td>
</tr>
<tr>
<td>Rate Conversion Rule</td>
<td>Description</td>
<td>Example</td>
</tr>
<tr>
<td>--------------------------------------</td>
<td>-----------------------------------------------------------------------------</td>
<td>---------------------------------------------------------------------------------------------------</td>
</tr>
<tr>
<td>Standard Rate Annualized</td>
<td>Calculates the annual rate using the input periodicity and converts the amount to an output periodicity and rate.</td>
<td>To convert a weekly amount to a semimonthly periodicity, the formula:</td>
</tr>
<tr>
<td></td>
<td>This rule uses default values, such as 2080 hours or 260 working days, to calculate the annual rate. You select the day or hourly basis during element definition.</td>
<td>1. Multiplies the weekly amount by 52.</td>
</tr>
<tr>
<td></td>
<td></td>
<td>2. Divides the result by 24.</td>
</tr>
<tr>
<td>Standard Rate Daily</td>
<td>Calculates the daily rate using the input periodicity and converts the amount to an output periodicity and rate.</td>
<td>To convert an annual amount to daily periodicity, the formula:</td>
</tr>
<tr>
<td></td>
<td>This rule uses a default value, such as 260 working days a year, to calculate the daily rate.</td>
<td>1. Divides the annual amount by 365.</td>
</tr>
<tr>
<td></td>
<td></td>
<td>2. Multiplies the result by the number of days in the payroll period.</td>
</tr>
<tr>
<td>Standard Working Hours Rate Annualized</td>
<td>Uses the employee’s standard working hours to convert the monetary value and working hours to an annual value before calculating the rate.</td>
<td>The employee works 40 hours a week with a monthly salary of 1000 USD:</td>
</tr>
<tr>
<td></td>
<td></td>
<td>((1000 * 12) / (40 * 52)) = 5.77 an hour</td>
</tr>
<tr>
<td>Assignment Working Hours Rate Annualized</td>
<td>Uses the employee’s working hours to convert the monetary value and working hours to an annual value before calculating the rate.</td>
<td>The employee works 40 hours a week, with 37.5 standard working hours a week, and a monthly salary of 1000 USD:</td>
</tr>
<tr>
<td></td>
<td></td>
<td>((1000 * 12) / (37.5 * 52)) = 6.15 an hour</td>
</tr>
<tr>
<td>Periodic Work Schedule Rate Annualized</td>
<td>Uses the employee’s work schedule for the payroll period for daily and hourly conversions.</td>
<td>For an employee:</td>
</tr>
<tr>
<td></td>
<td></td>
<td>• With a monthly salary of 1000 USD</td>
</tr>
<tr>
<td></td>
<td></td>
<td>• Assigned a monthly payroll</td>
</tr>
<tr>
<td></td>
<td></td>
<td>The formula checks the work schedule details for the month.</td>
</tr>
<tr>
<td></td>
<td></td>
<td>For a daily conversion:</td>
</tr>
<tr>
<td></td>
<td></td>
<td>1000 a month/20 days in the month = 50</td>
</tr>
</tbody>
</table>

**Note:** For compensation calculations where the employee is not assigned a payroll, the rate is calculated using the weekly rate calculation. The amount is converted to an annual figure and divided by the number of days or hours in that week based on the work schedule.

The impact of rate conversion rule is summarized below:
Periodicity: The conversion rule for periodicity applies to Flat Amount, Hours * Rate, and Days * Rate calculation rules. You can override the periodicity used as the default for the element definition at the element entry level.

Work Units: The Work Units conversion rule applies only to flat amount calculation rules for standard and supplemental earnings elements. The selection of which work units to use in reports and payslips determines the conversion calculation. The application creates the element input values using the default values of the rate conversion formulas.

For example, the following table illustrates how the payroll process determines the standard work units for any given pay period:

<table>
<thead>
<tr>
<th>Work Units Selected</th>
<th>Example</th>
</tr>
</thead>
<tbody>
<tr>
<td>Hours</td>
<td>2080/24 = 86.67</td>
</tr>
<tr>
<td>Days</td>
<td>260/24 = 10.83</td>
</tr>
<tr>
<td>None</td>
<td>No input values are created</td>
</tr>
</tbody>
</table>

Proration: The element template includes a new question for proration units. Proration rate conversion rules replace the previous proration methods in the element template. You have greater flexibility, for example, to base proration on calendar days when using work units for conversion.

> Note: If the conversion rules do not meet your requirements, you can copy and edit the rules using the Manage Fast Formulas task in the Payroll Calculation work area.

Related Topics

- Configuring Periodicity Conversion Rules: Procedure
- Using Formulas: Explained

Retroactive Pay

Retroactive Pay: How It Is Calculated

Retroactive pay is the recalculation of prior payroll results due to changes that occur after the original calculation was run. To process retroactive pay, run the Recalculate Payroll for Retroactive Changes process. This process creates retroactive element entries based on retroactive events. You can view automatically-created retroactive events or create them manually. Only elements that are set up to include a retroactive event group can have retroactive element entries.

Examples of prior period adjustments that could trigger a retroactive event are:

- An employee receives a pay award that is backdated to a previous pay period.
- The payroll department makes a backdated correction for an error that occurred in a previous pay period.
Settings That Affect Retroactive Pay

To enable retroactive processing of an element:

1. On the Manage Event Groups page, review the types of changes that automatically trigger a retroactive notification for the predefined event group, which is called Entry Changes for Retro. You can edit this group or create a new event group for the element, if required.

2. On the Create Element: Additional Details page, select **Yes** for the following questions:
   - Is this element subject to proration?
   - Is this element subject to retroactive changes?

3. Select the predefined event group or a new group that you have created.

This figure illustrates retroactive setup.

---

How Retroactive Pay Is Calculated

To process retroactive pay:

1. In the Payroll Calculation work area, review or create retroactive events on the Manage Event Notifications page. You can download results to Excel to view retroactive events in a report format.
2. Submit the Recalculate Payroll for Retroactive Changes process. You can use the Submit a Process or Report task, or the process may run automatically as part of your payroll flow. This process never overwrites historical payroll data. Instead, it creates one or more retroactive entries to receive the process results.

3. Run the Calculate Payroll process.

Note: Always run the Recalculate Payroll for Retroactive Changes process immediately before you run a payroll. If you run it after the Calculate Payroll process, retroactive adjustments are held over until the next payroll period.

If you do not get a retroactive notification that you expect to get, review:

- The originating transaction causing the event
- Element setup
- Element eligibility for the person
- The retroactive event group entities and attributes that are set up to trigger retroactive events
- The proration event group entities and attributes setup that triggers proration
This figure illustrates retroactive processing for a person getting a pay increase retroactively.

Adding a Retroactive Event Manually: Worked Example

Normally you create retroactive adjustments, such as backdated salary changes, which automatically create retroactive events. This example shows how to create a retroactive event manually. In this example an employee, whose pay rate was supposed to change last pay period, is being terminated. Payroll hasn’t made the change yet, so we need to add the retroactive event manually to generate the correct payslip.

Creating a Payroll Relationship Event

1. Select the Manage Event Notifications task in the Payroll Calculation work area. On the Manage Event Notifications page.
2. Click Create.
3. In the Create Payroll Relationship Event window, complete these fields.
<table>
<thead>
<tr>
<th>Field</th>
<th>Value</th>
</tr>
</thead>
<tbody>
<tr>
<td>Approval Status</td>
<td>Awaiting Processing</td>
</tr>
<tr>
<td>Payroll Relationship</td>
<td>The person to process</td>
</tr>
<tr>
<td>Process Date</td>
<td>Date when the retroactive change process is run.</td>
</tr>
</tbody>
</table>

*Note:* This date indicates when the element change was triggered.

4. Click **Save and Close**.

### Creating a Retroactive Event

1. On the Manage Event Notifications page, click the name of the person associated with the event you created.
2. On the Manage Retroactive Events page, click **Create** in the Entry Details section.
3. Select the element you want to reprocess, the date from which to recalculate payroll runs, and a retroactive component.

   The retroactive component is the element from which the change in pay will be paid to the person.

4. Repeat the previous step if you want to recalculate multiple elements for this payroll relationship.
5. Click **Submit**.

### FAQs for Pay Calculation Components

**Why can't I edit the secondary classifications for a wage basis rule?**

You probably defined the rule for the primary classification to include all secondary classifications in the wage basis. Edit the primary classification row and deselect the **Select all secondary classifications** option. You can then edit individual secondary classification rows, and select the **Use in wage basis** option only for those classifications to be considered in the wage basis.

**Why can't I create payroll components on the Manage Calculation Information page?**

You can view existing components on this page, but you can't create new components. Use the Manage Elements task to create new elements. Creating some elements also creates associated calculation components. These elements can include involuntary deductions, pensions, and absence payment elements.

**Can I delete or edit a cost component group mapping?**

Yes. You can delete or edit a cost component group mapping only if it is not referenced in a cost profile.
Can I delete or edit the mapping of a cost component to an analysis group?

Yes. You can delete or edit the mapping of a cost component to an analysis group, even if the cost component or the cost component group is referenced in a cost profile.
Elements: Explained

Some elements are predefined. You can also create other elements to match your requirements. Each element belongs to a primary classification, according to its purpose, which determines the template you use to create it. The template creates the elements and, depending on your country extension, associated items required for payroll processing.

*Note:* You can enter up to 50 characters for the element name. If you enter more than 50 characters, the application will automatically shorten the name.

Elements can represent:

- Earnings, such as salary, wages, and bonuses
- Compensation, such as employee stock purchase and insurance plans
- Absences from work
- Tangible items distributed to persons, such as tools, uniforms, mobile phones, or computers
- Statutory deductions, such as taxes, voluntary deductions, contributions to charities or savings plans, and involuntary deductions, such as court orders and pretax deductions
- Employer taxes and other employer liabilities

Predefined Elements

The predefined elements are specific to your country or territory. They typically include deductions for tax and wage attachments. You can’t make any changes to these predefined elements. However, you must create eligibility records for them.

Element Creation

You can create as many earnings and deductions as you require using the Manage Elements task.

You select the element classification and category which determine:

- The template of questions you answer to specify the details of the element you want to create.
- The items that the template generates, which can include multiple elements, input values, formulas, balances, and other items as set out in the table below.

*Note:* The template you use to create elements also depends on the configuration selected for your country or territory on the Manage Features by Country or Territory page. For example, if the country extension is set to Payroll, you use a template that generates all the items required for payroll processing. If the country extension is set to Human Resources or None, you use a basic template that generates the elements only. However, if you select an element classification, such as Standard Earnings, Supplemental Earnings, Direct Payments and Taxable Benefits, the basis template creates input values for Amount, Periodicity, and Full-Time Equivalent.
You can configure any of the generated items to match your specific business requirements. For example, you can add input values, edit the formulas, or add a status processing rule to use a different formula for certain assignment statuses. You must also create element eligibility records for the elements. You can also use the batch loader from the Data Exchange or Checklist work area to load elements or migrate elements between environments.

The following table explains the purpose of the items used in element creation.

<table>
<thead>
<tr>
<th>Items Used</th>
<th>Purpose</th>
</tr>
</thead>
<tbody>
<tr>
<td>Input Values</td>
<td>Define the entry values available on each entry of this element, such as hours worked or amount.</td>
</tr>
<tr>
<td>Element Eligibility Records</td>
<td>Define the eligibility criteria a worker's employment record must meet to be eligible for the element. For example you can use grade, payroll, salary basis, or organization as eligibility criteria.</td>
</tr>
<tr>
<td>Status Processing Rules</td>
<td>Identify the formula the payroll run uses to process the element, and how to handle the formula results.</td>
</tr>
<tr>
<td>Related Formulas and Related Elements</td>
<td>Identify additional elements and formulas created by the template for payroll processing.</td>
</tr>
<tr>
<td>Related Balances</td>
<td>Identify the balances created by the element template for this element.</td>
</tr>
</tbody>
</table>

**Maintaining Elements: Explained**

After you create and use an element, you are limited on updates you can make to it. This ensures the integrity of the element for retroactive processing and the balances of the input values. You can’t remove existing input values or add new ones if you have created entries for the element. To add an input value to an element before you create any element entries, set your effective date to the element’s start date.

You can make the following changes to an element that has been previously processed:

- Change a required input value to be optional.
- Alter the sequence in which input values appear in the Element Entries page.
- Change the input value validation rules for minimum, maximum, lookup, or formula.
- Change your specification of which input values create database items.
- Change the reporting name. However, the database items created for the element will continue to use the original name.

**Element Classifications**

**Primary Element Classifications: Explained**

Primary element classifications are defined by Oracle Fusion to meet legislative requirements, and are supplied to users with the product.
Primary Classifications

Elements are grouped into primary classifications, such as Earnings and Voluntary Deductions. In a human resources department, you can use the primary classifications to identify groups of elements for information and analysis purposes. In a payroll department, the classifications control processing, including the sequence in which elements are processed and the balances they feed. Oracle Fusion provides primary classifications and some balances, mainly to reflect tax legislation. They are designed to meet the legislative requirements of your country, so you cannot change or delete them. You can create additional balances to be fed by any of the primary classifications.

Secondary Element Classifications: Explained

You can define secondary classifications to feed your own user defined balances.

Secondary Classifications

Secondary classifications are subsets of the primary classifications. In some legislations, secondary classifications have been predefined. As with primary classifications, you cannot remove or change any predefined secondary classifications, and you cannot disable any of the predefined balance feeds created for them.

Element Classification Components: How They Work Together

When you create an element, you select a primary classification, such as Involuntary Deductions, and optionally a secondary classification, such as Child Support. The classifications, which vary by country or territory, control the element template questions you answer to define the element. An element may automatically inherit subclassifications from its primary classification. You can optionally select additional subclassifications for an element to control the balances it feeds.

Primary Classifications

Primary classifications meet the legislative requirements of your country or territory, so you can’t change them.

In a human resources department, you can use the primary classifications to identify groups of elements for information and analysis purposes. In a payroll department, the classifications control processing, including the sequence in which elements are processed and the balances they feed.

Secondary Classifications

Secondary classifications are subsets of the primary classifications. Use them to manage wage basis rules for deductions and taxes. You can’t remove or change any predefined secondary classifications. In some countries or territories, you can create your own secondary classifications.

Subclassifications

Subclassifications provide a way to feed balances. Elements can have only one primary and secondary classification, but multiple subclassifications. You can create subclassifications or use predefined ones. You can specify that a subclassification automatically applies to every element in the primary classification.

Tip: Each subclassification belongs to one primary classification only. If you reuse a subclassification name under different primary classifications, it’s treated as a separate subclassification and you must create separate balance feeds for each subclassification.
Costing

Each primary classification includes the following costing rules:

- **Allow Costing:** If this rule is set to Yes, you can select any costing option for element eligibility records.
- **Allow Distribution:** If this rule is set to Yes, you can create distribution groups with elements in this classification. For example, you can create a distribution group with all of the earnings elements and prorate tax expenses proportionately over the cost centers in which the wages were earned.
- **Debit or Credit:** This rule determines whether a positive amount is costed as a debit or a credit.

**Frequency Rules**

If frequency rules are enabled for a primary classification, you can use them on an element if you don't want to process it each period. For example, you can set frequency rules to process element entries on the first and third weekly payroll periods of each month. The default frequency rule is to process each period.

**Related Topics**

- Payroll Balance Definitions: Explained

**Element Processing Sequence: How It's Determined**

You can set a predefined sequence in which a payroll run processes elements. An element’s primary classification defines a default processing priority for the element in payroll runs. Lower priority numbers process first.

**Overriding Default Processing Priority**

Most classifications also have a priority range. To set the priority, you edit the element on the Element Summary page. Setting a specific priority establishes the order in which the element processes with respect to other elements in the classification.

Sometimes you must prioritize the processing of certain element entries for an individual person. For example, you may need to determine the precise order in which deductions taken for wage attachments process for a person. In this case, enter a subpriority number for element entries.

**Element Employment Level**

**Employment Level for Elements: Critical Choices**

Your enterprise uses an employment model. When you create elements, you select the employment level at which to attach the element. If you select a level below payroll relationship, each assignment record can have separate element entries.

**Payroll Relationship Level**

This level is the highest level for accumulating balances. Every payroll run processes payroll relationship elements.

Typical elements to define at payroll relationship level are:

- Tax deductions
- Pension
• Child support
• Medical care
• Union dues
• Benefits activity rate calculations, such as employee contributions and flex credits

Assignment Level
Use this lowest level for elements that require different entries for different assignments, or when the element applies only to specific assignments.

Typical elements to define at assignment level are:
• Assignment salary
• Regular hours
• Overtime
• Sales bonus
• Profit-sharing bonus

Element Types

Creating Earnings Elements for Payroll: Worked Example

This example shows how to use the element template to create a regular earnings element, such as salary. After you create the earnings element, you must create at least one eligibility record for it.

Creating an Earnings Element
1. In the Payroll Calculation work area, click Manage Elements.
2. Click Create.
3. Complete the fields, as shown in this table.

<table>
<thead>
<tr>
<th>Field</th>
<th>Value</th>
</tr>
</thead>
<tbody>
<tr>
<td>Legislative Data Group</td>
<td>Your legislative data group</td>
</tr>
<tr>
<td>Primary Classification</td>
<td>Standard Earnings</td>
</tr>
<tr>
<td>Secondary Classification</td>
<td>Regular</td>
</tr>
</tbody>
</table>

4. Click Continue.
5. Enter a name and other basic details, then respond to the questions as shown in this table.

You can enter up to 50 characters for the element name. If you enter more than 50 characters, the task automatically shortens the name.
### Question | Answer
--- | ---
Should every person eligible for the element automatically receive it? | No.

What is the earliest entry date for this element? | First Standard Earnings Date

What is the latest entry date for this element? | Last Standard Earning Date

Note: If you select this date, you must enable proration so the calculation is correct if a person leaves prior to a pay period end date.

At which employment level should this element be attached? | Assignment Level

Does the element recur each payroll period, or does it require explicit entry? | Recurring

Process the element only once in each payroll period? | Yes

Can a person have more than one entry of the element in a payroll period? | No

Process and pay element separately or with other earnings elements? | Process and pay with other earnings

6. Click **Next**.
7. On the Additional Details page, complete the fields, as shown in this table.

### Question | Answer
--- | ---
What is the calculation rule? | Flat Amount

Is this element subject to proration? | Yes

Proration Group | Entry Changes for Proration

Is this element subject to retroactive changes? | Yes

Retro Group | Entry Change for Retro

Should this element be included in the earnings calculation of the FLSA overtime base rate? (USA only) | Yes
<table>
<thead>
<tr>
<th>Question</th>
<th>Answer</th>
</tr>
</thead>
<tbody>
<tr>
<td>Should this element be included in the hours calculation of the FLSA overtime base rate? (USA only)</td>
<td>Yes</td>
</tr>
</tbody>
</table>

8. Click Next.
9. Verify that the information is correct.
10. Click Submit.

Creating an Eligibility Record
On the Element Summary page, update the newly created element details.

1. In the Element Overview section, select Actions, Create Element Eligibility.
2. On the Element Eligibility name field, enter REGULAR SALARY ELIG.
3. In the Eligibility Criteria section, select All payrolls eligible.
4. Click Submit.

Related Topics
- Defining Payroll Elements for Payroll Interface: Worked Example

Defining Payroll Elements for Processing Absences: Procedure
You define elements to calculate and process absence payments in Oracle. When you define an absence element, your responses to the element template questions determine which elements, balances, formulas, and calculation components the template generates.

Defining an absence element involves the following steps:
- Defining an absence element
- Completing absence detail questions
- Completing accrual liability and balance payment questions
- Completing absence payment questions
- Submitting the element
- Defining element eligibility records and cost distributions

Defining an Absence Element
Define an absence element, selecting a primary classification of Absence, and a secondary classification. Typically, the predefined values include vacation, maternity, sickness, and other. Use the Manage Elements task in the Payroll Calculation or Setup and Maintenance work areas.

Completing Absence Detail Questions
The questions you complete in the Absence Details section determine which subsequent questions the template displays. You enter the following information in the Absence Details section:

1. Specify the calculation units to use when reporting the absence, for example that is shown on the payslip, and statement of earnings. Typically, you select Days or Hours for your reports that correspond to the units for your absence plan. When creating an absence element, select the work calculation rule to calculate the absence rate.
2. Select the absence information to transfer to payroll based on the type of absence management plan.

<table>
<thead>
<tr>
<th>Absence Management Plan Type</th>
<th>Absence Information to Transfer</th>
</tr>
</thead>
<tbody>
<tr>
<td>Accrual</td>
<td>Accrual Balances</td>
</tr>
<tr>
<td>Accrual, Leave Donation, Compensatory</td>
<td>Accrual Balances and Absences</td>
</tr>
<tr>
<td>Qualification</td>
<td>Qualification Absences</td>
</tr>
<tr>
<td>No Entitlement</td>
<td>No Entitlement Absences</td>
</tr>
</tbody>
</table>

**Completing Accrual Liability and Balance Payment Questions**

If you transfer accrual balances, complete the questions shown in the following table.

<table>
<thead>
<tr>
<th>Question</th>
<th>Steps</th>
</tr>
</thead>
<tbody>
<tr>
<td>Calculate absence liability?</td>
<td>1. Select Yes, if you calculate liability.</td>
</tr>
<tr>
<td></td>
<td>2. Select a liability rate.</td>
</tr>
<tr>
<td></td>
<td>Usually the rate is the same as the absence payment rate. You might</td>
</tr>
<tr>
<td></td>
<td>select a different rate when estimating liability for billing</td>
</tr>
<tr>
<td></td>
<td>purposes.</td>
</tr>
<tr>
<td>Does this plan enable balance payments when enrollment ends?</td>
<td>1. Select Yes to configure a final disbursement element and to</td>
</tr>
<tr>
<td></td>
<td>maintain balances for the disbursement hours and payments.</td>
</tr>
<tr>
<td></td>
<td>2. Optionally, select a rate to use for the calculation.</td>
</tr>
<tr>
<td>Does this plan enable partial payment of balance?</td>
<td>1. Select Yes to configure a discretionary disbursement element and</td>
</tr>
<tr>
<td></td>
<td>to maintain balances for disbursement hours and payments.</td>
</tr>
<tr>
<td></td>
<td>2. Optionally, select a rate to use for the calculation.</td>
</tr>
</tbody>
</table>

**Completing Absence Payment Questions**

Complete the following questions:

1. Select a method to reduce regular earnings if employees don’t complete a time card, or the time card entries aren’t used as a basis for calculating pay:
   
   - Reduce regular earnings by absence payment (entitlement payment balance)
   - Select rate to determine absence deduction amount (entitlement deduction balance)

   You might select one of the following:

   - The **Reduce regular earnings** option to reduce regular earnings by the absence payment. This means that the employee is paid the same net amount as if they weren’t absent.
   - The **Select rate to determine deduction amount** option when the employee is not due to be paid for the absence at the same rate as their regular earnings. In this case, the absence deduction rate that you select will be a rate that deducts 100% of the regular earnings. However, the absence payment rate would be a different rate, for example 50%.

2. Optionally, select a rate to calculate the absence payment.
If you have standard earnings and absence elements in the same payroll run that reduce regular earnings, the payroll calculation reduces earnings in this sequence:

1. Using absence element entries
2. Using any standard earnings elements that reduce regular earnings

The salary balance isn't reduced beyond zero.

### Submitting the Element

When you submit the element, the template automatically configures a base pay element, balances, formulas, and calculation components.

The template also configures additional elements, depending on the options selected in the template to transfer absence information, as shown in the following table.

<table>
<thead>
<tr>
<th>Type of Absence Information to Transfer</th>
<th>Optional Balance Payments Selected</th>
<th>Additional Elements Configured</th>
</tr>
</thead>
<tbody>
<tr>
<td>Accrual Balances</td>
<td>• Discretionary Disbursements</td>
<td>• Accrual</td>
</tr>
<tr>
<td></td>
<td>• Final Disbursements</td>
<td>• Discretionary Disbursement</td>
</tr>
<tr>
<td></td>
<td></td>
<td>• Final Disbursement</td>
</tr>
<tr>
<td>Accrual Balances and Absences</td>
<td>• Discretionary Disbursements</td>
<td>• Accrual</td>
</tr>
<tr>
<td></td>
<td>• Final Disbursements</td>
<td>• Entitlement</td>
</tr>
<tr>
<td></td>
<td></td>
<td>• Discretionary Disbursement</td>
</tr>
<tr>
<td></td>
<td></td>
<td>• Final Disbursement</td>
</tr>
<tr>
<td>Qualification Absences</td>
<td>none</td>
<td>Entitlement</td>
</tr>
<tr>
<td>No Entitlement Absences</td>
<td>none</td>
<td>Entitlement</td>
</tr>
</tbody>
</table>

### Defining Element Eligibility Records and Cost Distributions

Define element eligibility records for all the elements generated by the template, for example for your accrual, entitlement, discretionary and final disbursement elements.

If your enterprise calculates cost distributions, specify costing for all the element eligibility records. For example, for an accrual element, you do the following steps

1. Define element eligibility records for the accrual, accrual results, accrual retroactive, and accrual retroactive results elements.
2. Specify costing for the accrual results and retroactive results elements.

The costing process would cost the change in the liability balance since the last payroll period, debit the expense account and credit the liability account.

### Related Topics

- Costing of Elements: Critical Choices
- Importing Absence Entries to Payroll: Procedure
- Rates Used to Calculate Absences in Payroll: Explained
- Rate Conversion Rules: Explained
Defining Payroll Elements for an Absence Accrual Plan: Worked Example

This example shows how to define an absence element for a vacation accrual absence plan. Based on your setup decisions, this procedure configures the following additional elements:

- Accrual element to process absence liability amounts
- Entitlement element to process payments for absence during vacation
- Discretionary Disbursement element to process disbursement of partial time accruals
- Final Disbursement element to process accrual disbursement when the absence plan enrollment ends

The name of the element is prefixed to each additional element.

The following table summarizes key decisions for this scenario.

<table>
<thead>
<tr>
<th>Decisions to Consider</th>
<th>In This Example</th>
</tr>
</thead>
<tbody>
<tr>
<td>What type of an absence are you transferring to payroll?</td>
<td>Accrual balances</td>
</tr>
<tr>
<td>Who is eligible to receive this element?</td>
<td>All workers</td>
</tr>
<tr>
<td>What units do you want to use for reporting calculations?</td>
<td>Days</td>
</tr>
<tr>
<td>Do you want the element to calculate absence liability?</td>
<td>Yes</td>
</tr>
<tr>
<td>Which rate should the calculate absence liability use?</td>
<td>Liability Rate</td>
</tr>
<tr>
<td>Does your absence plan enable balance payments when enrollment ends?</td>
<td>Yes</td>
</tr>
<tr>
<td>Which rate should the final disbursement payment use?</td>
<td>Final Disbursement Rate</td>
</tr>
<tr>
<td>Does your absence plan enable payment of partial accrual balances?</td>
<td>Yes</td>
</tr>
<tr>
<td>Which rate should the partial disbursement payment use?</td>
<td>Partial Disbursement Rate</td>
</tr>
<tr>
<td>How do you want to calculate deductions for paid absences for employees not requiring a time card?</td>
<td>Reduce regular earnings by absence payment</td>
</tr>
</tbody>
</table>
  - Reduce regular earnings by the amount of the absence payment so that the worker does not get paid twice?
  - Select a rate to determine the absence deduction amount?
Prerequisites

Ensure that you configured a rate definition to determine the monetary value of a unit of absence, and depending on your enterprise separate rates to calculate liability, discretionary disbursement, and final disbursement payments. You configure a rate definition using the Manage Rate Definitions task in the Setup and Maintenance or Payroll Calculation work area.

Defining an Absence Element

1. In the Setup and Maintenance work area or the Payroll Calculation work area, use the Manage Elements task.
2. Click Create.
3. In the Create Element window, complete the fields as shown in this table.

<table>
<thead>
<tr>
<th>Field</th>
<th>Value</th>
</tr>
</thead>
<tbody>
<tr>
<td>Legislative Data Group</td>
<td>Select your legislative data group.</td>
</tr>
<tr>
<td>Primary Classification</td>
<td>Absences</td>
</tr>
<tr>
<td>Secondary Classification</td>
<td>Select an appropriate value for your legislation, such as Vacation.</td>
</tr>
<tr>
<td>Category</td>
<td>Absence</td>
</tr>
</tbody>
</table>

4. Click Continue.
5. On the Create Element: Basic Information page, complete the fields as shown in this table. Use default values for fields unless the steps specify other values.

You can enter up to 50 characters for the element name. If you enter more than 50 characters, the application will automatically shorten the name.

<table>
<thead>
<tr>
<th>Field</th>
<th>Value</th>
</tr>
</thead>
<tbody>
<tr>
<td>Name</td>
<td>Vacation Payment</td>
</tr>
<tr>
<td>Reporting Name</td>
<td>Vacation Payment</td>
</tr>
</tbody>
</table>

6. In the Absence Plan Details section, complete the fields as shown in this table. Use default values for fields unless the steps specify other values.

<table>
<thead>
<tr>
<th>Field</th>
<th>Value</th>
</tr>
</thead>
<tbody>
<tr>
<td>What type of absence information do you want transferred to payroll?</td>
<td>Accrual Balances and Absences</td>
</tr>
<tr>
<td>What calculation units are used for reporting?</td>
<td>Days</td>
</tr>
</tbody>
</table>

7. Click Next.
8. On the Create Elements: Additional Details page, in the Accrual Liability and Balance Payments section, complete the fields as shown in this table. Use default values for fields unless the steps specify other values.
Implementing Global Payroll

Chapter 11
Setting Up Elements

<table>
<thead>
<tr>
<th>Field</th>
<th>Value</th>
</tr>
</thead>
<tbody>
<tr>
<td>Calculate absence liability?</td>
<td>Yes.</td>
</tr>
<tr>
<td>Which rate should the liability balance calculation use?</td>
<td>Liability rate.</td>
</tr>
<tr>
<td>Does this plan enable balance payments when enrollment ends?</td>
<td>Yes</td>
</tr>
<tr>
<td>Which rate should the final balance payment calculation use?</td>
<td>Final disbursement rate.</td>
</tr>
<tr>
<td>Does this plan enable partial payments of absences?</td>
<td>Yes</td>
</tr>
<tr>
<td>Which rate should the discretionary disbursement use?</td>
<td>Discretionary disbursement rate.</td>
</tr>
</tbody>
</table>

9. On the Create Elements: Additional Details page, in the Absence Payments section, complete the fields as shown in this table. Use default values for fields unless the steps specify other values.

<table>
<thead>
<tr>
<th>Field</th>
<th>Value</th>
</tr>
</thead>
<tbody>
<tr>
<td>How do you want to reduce earnings for employees not requiring a time card?</td>
<td>Reduce regular earnings by absence payment.</td>
</tr>
<tr>
<td>Which rate should the absence payment calculation use?</td>
<td>Absence payment.</td>
</tr>
</tbody>
</table>

10. Click Next.
11. On the Create Element: Review page, review the information that you entered so far.
12. Click Submit to open the Element Summary page.

The template generates all the related elements, balances, and formulas.

**Defining Element Eligibility**

1. In the Element Overview section of the Element Summary page, click the Element Eligibility node.
2. Click Create Element Eligibility from the Actions menu.
3. In the Element Eligibility section, enter Vacation Payment Open in the Element Eligibility Name text box. Leave the rest of the fields on the page blank.
4. Click Submit.
5. Click Done.
6. In the Manage Elements page, search for the other elements prefixed with your absence element name.
7. Select each element in turn and repeat the steps on the Element Summary page to define eligibility for each element.
Creating Elements for Time Card Entries: Procedure

You create nonrecurring elements to process pay based on time card entries, such as elements for regular, overtime, double-time, and shift pay. Creating a time card element generates all the related elements, balances, formulas, and calculation components. You then transfer the elements to your time provider.

This topic covers the following procedures:

- Creating earnings elements
- Creating calculation components for standard-category elements
- Converting elements for use in time cards
- Setting up area overrides
- Setting up costing overrides

Creating Earnings Elements

The steps for creating a time card element depend on whether the time card template is available for your country. If the template is available, follow the steps in this section. Otherwise, create an earnings element using the Standard category, and specify an hours multiplied by rate calculation rule.

Complete these steps to create an element using the time card template:

1. Create an earnings element on the Manage Elements page of the Payroll Calculation work area.
2. Select a primary classification of standard or supplemental earnings.
3. For Global Payroll, select the Time Card category.
4. Complete the information on the Basic Details page.
5. On the Additional Details page:
   a. Select the calculation units to use in reports.
      Typically, you select time units that match the time units entered on time cards for that element. If you select different units, the application uses 8 hours to convert days to hours.
   b. Optionally, select a default rate to calculate time.
      When calculating the run result for the element entry, the formula uses the default rate unless a rate is entered on the person’s time card.
6. Complete the element eligibility information for the new time element, and its associated retroactive and related elements, such as the result and calculation elements.

⚠️ Note: If the straight time portion of overtime is reported separately from regular time, create two elements, such as overtime and overtime premium elements. If the regular and straight time portions of overtime are reported together, you might use straight time instead of regular time, and create a separate element for the overtime premium.

Creating Calculation Components for Standard-Category Elements

You can create calculation components for elements created with the Standard category rather than the Time Card category. Complete the following steps for each existing element:

1. Submit the Create Time Card Calculation Components process from the Payroll Checklist or Payroll Administration work area.
These elements must have a calculation rule of hours multiplied by rate.

2. Complete the element eligibility information for the element and its associated retroactive and its related elements, including the result element, and the element with a suffix of CIR.

3. After you run the process to convert your elements, submit the Compile Formula process in the Manage Payroll Calculations work area. Perform a bulk compile by entering wild cards in the Formula and Formula Type parameters.

Generate Time Card Fields for Your Elements

After creating elements, generate time card fields for them. For Time and Labor, perform the processes listed in the following table using the Define Time and Labor task list in the Setup and Maintenance work area.

<table>
<thead>
<tr>
<th>Process</th>
<th>Description</th>
</tr>
</thead>
<tbody>
<tr>
<td>Generate Data Dictionary Time Attributes</td>
<td>Creates dependent payroll attributes for all element input values, such as hours and rate.</td>
</tr>
<tr>
<td></td>
<td>You must run the Generate Data Dictionary Time Attributes process after making any changes to time elements. Such changes include adding or deleting elements, editing input values, or editing element eligibility records.</td>
</tr>
<tr>
<td></td>
<td><strong>Caution:</strong> Failure to run the process might negatively impact the setup of time card fields, the validation of payroll time types, or the transfer of time to payroll.</td>
</tr>
<tr>
<td>Generate Time Card Fields</td>
<td>Creates time card fields using the data dictionary time attributions for the specified legislative data group.</td>
</tr>
<tr>
<td></td>
<td>You can use the Manage Time Card Fields task to create time card fields for single and multiple attributes.</td>
</tr>
</tbody>
</table>

If you are using a third-party time provider, create an HCM extract for the time card elements. The extract includes the element’s mapping ID that you specify in the XML file when you transfer the time entries to payroll.

Setting Up Area Overrides

Some countries or territories create time card elements with area input values for use as overrides. The overrides enable employers to tax employees based on where they work. For example, employees would specify the area information where they worked on temporary assignment while away from their normal work location. These area entries are then included in the time card records transferred to payroll by the Load Time Card Batches process.

Setting Up Costing Overrides

You can specify additional attributes in Time and Labor to enter costing segment values on time cards. The segments must match the segments that you can enter on element entries. Use the Manage Element Entries task in the Payroll Calculation and search for a person’s record. View the available segments on the Costing tab of the Manage Person Details page.

Costing is defined on the element eligibility record of the results element. When you transfer time entries, the transfer process displays the costing on the calculation element.

As an example, the structure of your cost allocation key flexfield might specify that the department segment is entered at the element entry level. You could specify this additional attribute on the time card. Your employees could then specify the department to charge for overtime hours worked while on loan to a different department. After you transfer the time entries, the payroll calculation uses the department specified for the overtime hours to derive the costing results.
Use the **View Payroll Results** task on the Accounting Distribution work area to view the results of the costing overrides transferred to payroll.

**Related Topics**
- Processing Time Entries in Payroll: Explained
- Time Card Required Option: Critical Choices
- Elements: How They Hold Payroll Information for Multiple Features

## Element Input Values

### Element Input Values: Explained

An element’s input values define the entry values available on each entry of this element. Each input value has a unit of measure, such as money or date. Input values can include validations and conditions to control the data entry of the element entry assigned to a person. For example, an earnings element may have an input value for hours worked, which is required and has a unit of measure of number.

When you create an element, some input values are created automatically depending on your country extension and the element classification. You can create additional input values for any element, as needed.

### Input Value Options

For each input value created, you can modify these attributes:

<table>
<thead>
<tr>
<th>Field Value</th>
<th>Purpose</th>
</tr>
</thead>
<tbody>
<tr>
<td>Display Sequence</td>
<td>Enter a number to control the display order of the entry value on element entries.</td>
</tr>
<tr>
<td>Special Purpose</td>
<td>Select how the input value is to be used. For example, you can indicate that it holds a percentage value, a rate, or third-party payee details. This value assists with processing the input value based on what type of information it holds.</td>
</tr>
<tr>
<td>Unit of Measure</td>
<td>Select the value that describes the type of value the entry value can hold, such as number or character.</td>
</tr>
<tr>
<td>Displayed</td>
<td>Select to display the input value on the element entry.</td>
</tr>
<tr>
<td>Allow User Entry</td>
<td>Select to enter values on element entries.</td>
</tr>
<tr>
<td>Required</td>
<td>Select to make the input value a required entry value on the element entry. If you select <strong>Required</strong>, you must also select <strong>Displayed</strong> and <strong>Allow User Entry</strong>.</td>
</tr>
<tr>
<td>Create a Database Item</td>
<td>Select if you want to make the values available for formulas or HCM extract.</td>
</tr>
<tr>
<td>Rate Formula</td>
<td>Select a rate calculation formula, for example to return a value from a user-defined table. This option only applies to the Primary input value for elements associated with rate definitions that have the</td>
</tr>
</tbody>
</table>
### Field Value

<table>
<thead>
<tr>
<th>Field Value</th>
<th>Purpose</th>
</tr>
</thead>
<tbody>
<tr>
<td>Default</td>
<td>Enter a value that appears as the default value for this entry value in element entries, if needed.</td>
</tr>
<tr>
<td>Apply default at runtime</td>
<td>Select to apply the default value when you run the payroll process, rather than when you create the element entry. This selection ensures you use the latest value on the date of the payroll run. You can manually override the default value on the element entry.</td>
</tr>
<tr>
<td>Minimum</td>
<td>Enter a minimum value, if needed.</td>
</tr>
<tr>
<td>Maximum</td>
<td>Enter a maximum value, if needed.</td>
</tr>
<tr>
<td>Validation Formula</td>
<td>Enter a formula that validates the entry value entered on element entries, if needed.</td>
</tr>
<tr>
<td>Validation Source</td>
<td>Use with the other input value options to select the valid validation method, such as lookups or formulas.</td>
</tr>
<tr>
<td>Lookup Type</td>
<td>Specify a lookup type to provide a list of values for an entry value. This option is available for input values of type Character only.</td>
</tr>
<tr>
<td>Warning or Error</td>
<td>Use when you are validating the input value or entering a minimum or maximum value. It specifies whether a warning or an error displays if the entry fails the validation condition or doesn't meet the minimum or maximum value indicated.</td>
</tr>
<tr>
<td>Reference</td>
<td>Use to associate a balance context with the run result. For example, you can associate a context, such as jurisdiction, with an element. Create an input value for jurisdiction and select the jurisdiction context in the Reference field. Then the run result value of the input value works as a context value when updating the balance. If you select a reference, then the lookup type and validation source values should be automatically set to the reference context. You must provide the Reference field first for the validation source value to be automatically populated.</td>
</tr>
<tr>
<td>Value Set</td>
<td>Specify a value set to provide a dynamic list of values for an entry value. This option is available for input values of type Character only.</td>
</tr>
</tbody>
</table>

⚠️ **Caution:** Once an element is processed, you can't update certain input value attributes, such as unit of measure. This restriction ensures that you can't change attributes that would invalidate prior results.

This table provides examples of the allowable formats, depending on the unit of measure (UOM) specified for the entry value on the Manage Elements - Element Overview, Input Values page.

<table>
<thead>
<tr>
<th>Unit of Measure</th>
<th>Sample Entry Value</th>
<th>Display in Application</th>
</tr>
</thead>
<tbody>
<tr>
<td>Character</td>
<td>C</td>
<td>Complete</td>
</tr>
<tr>
<td>Integer</td>
<td>12345</td>
<td>12,345</td>
</tr>
<tr>
<td>Unit of Measure</td>
<td>Sample Entry Value</td>
<td>Display in Application</td>
</tr>
<tr>
<td>----------------------------------------</td>
<td>-------------------</td>
<td>------------------------</td>
</tr>
<tr>
<td>Number</td>
<td>12345.6789</td>
<td>12,345.6789</td>
</tr>
<tr>
<td></td>
<td>0.123456789</td>
<td>0.123456789</td>
</tr>
<tr>
<td>Day</td>
<td>123</td>
<td>123</td>
</tr>
<tr>
<td></td>
<td>0.123</td>
<td>0.123</td>
</tr>
<tr>
<td>Money</td>
<td>12345</td>
<td>12345.00</td>
</tr>
<tr>
<td></td>
<td>-12345.67</td>
<td>&lt;12345.67&gt;</td>
</tr>
<tr>
<td>Hours in decimal format, 1 place</td>
<td>12345</td>
<td>12345.0</td>
</tr>
<tr>
<td>Hours in decimal format, 2 places</td>
<td>12345</td>
<td>12345.00</td>
</tr>
<tr>
<td>Hours in decimal format, 3 places</td>
<td>12345</td>
<td>12345.000</td>
</tr>
<tr>
<td>Hours expressed as a numeric value</td>
<td>12345</td>
<td>12345</td>
</tr>
<tr>
<td>Hours and minutes expressed as numeric values</td>
<td>12345</td>
<td>12345:00</td>
</tr>
<tr>
<td>Hours, minutes, and seconds expressed as numeric values</td>
<td>12345</td>
<td>12345:00:00</td>
</tr>
<tr>
<td>Date</td>
<td>2016-06-21</td>
<td>21-Jun-2016</td>
</tr>
<tr>
<td>Time</td>
<td>13:05</td>
<td>1:05 PM</td>
</tr>
</tbody>
</table>

**Note:** Display values can be derived from the meaning attribute of the view object. For example if you enter C as a value for the Character UOM it could display as Complete. Conversion to display formats is based on the profile option value and locale.

**Related Topics**
- Element Entries: How Element Setup Affects Entries and Their Entry Values
- Creating and Editing Profile Options: Procedure

**Using a Value Set for an Element Input Value: Worked Example**

You can use value sets to provide a dynamic list of values for an element input value. Use a value set for lists containing values that already exist in tables, such as person name or number, legislative data group, or payroll statutory unit. The
benefit of this approach is that you don't have to create and maintain a lookup type. Using value sets helps maintain consistency and accuracy in your data.

**Note:** The only type of value set supported for element input values is the table-based value set. Oracle Fusion Global Payroll doesn't support other value set types, such as Independent or Format Only.

Create value sets using the Manage Value Sets task in the Setup and Maintenance work area. You select the Table validation type to define a value set that filters values from an existing table using a SQL statement.

The following table provides the required values that you enter when you create a value set for use on the Manage Elements page.

<table>
<thead>
<tr>
<th>Field</th>
<th>Value</th>
</tr>
</thead>
<tbody>
<tr>
<td>Module</td>
<td>Global Payroll</td>
</tr>
<tr>
<td>Validation Type</td>
<td>Table</td>
</tr>
<tr>
<td>Value Data Type</td>
<td>Character</td>
</tr>
</tbody>
</table>

**Note:** To enable the Value Set field on the Manage Elements page you must select Character as the Unit of Measure for the input value.

To improve the performance of your value set queries, use these contexts to filter the value set records:

- PayrollRelationshipId
- PersonId
- PayrollTermId
- PayrollAssignmentId
- LegDataGroupId
- LegCode
- SysEffectiveDate

WHERE Clause example: `pay_pay_relationships_dn.payroll_relationship_id = :{PARAMETER.PayrollRelationshipId}`

**Note:** If you use these contexts in your value set SQL, make sure the WHERE clause parameter name matches the context name.

In this example, an element contains input values for legislative data group and element name. The list of values for element name is dependent on the selected legislative data group. As part of setup, you can select a default legislative data group for the element, or for a specific element eligibility record.

In summary, the steps are:

- Create a value set to return a list of all legislative data groups
- Create a value set that returns all elements in the legislative data group
- Add the value set codes to the Manage Elements page
Creating a Value Set to Return a List of all Legislative Data Groups

1. From the Setup and Maintenance work area, search for and select the Manage Value Sets task.
2. Click Create.
3. Complete the fields, as shown in this table.

<table>
<thead>
<tr>
<th>Field</th>
<th>Value</th>
</tr>
</thead>
<tbody>
<tr>
<td>Value Set Code</td>
<td>LDG_VS</td>
</tr>
<tr>
<td>Description</td>
<td>Retrieve Legislative Data Groups</td>
</tr>
<tr>
<td>Module</td>
<td>Global Payroll</td>
</tr>
<tr>
<td>Validation Type</td>
<td>Table</td>
</tr>
<tr>
<td>Value Data Type</td>
<td>Character</td>
</tr>
<tr>
<td>FROM Clause</td>
<td>PER_LEGISLATIVE_DATA_GROUPS_vl</td>
</tr>
<tr>
<td>Value Column Name</td>
<td>NAME</td>
</tr>
<tr>
<td>Value Column Type</td>
<td>VARCHAR2</td>
</tr>
<tr>
<td>Value Column Length</td>
<td>240</td>
</tr>
<tr>
<td>ID Column Name</td>
<td>LEGISLATIVE_DATA_GROUP_ID</td>
</tr>
<tr>
<td>ID Column Type</td>
<td>NUMBER</td>
</tr>
<tr>
<td>ID Column Length</td>
<td>18</td>
</tr>
<tr>
<td>WHERE Clause</td>
<td>business_group_id=202</td>
</tr>
</tbody>
</table>

*Tip:* To avoid failure of the value set, use IDs instead of names in case the display name changes in the future.

4. Click Save.

Creating a Value Set that Returns all Elements in the Legislative Data Group

1. On the Manage Value Sets page, click Create.
2. Complete the fields, as shown in this table.
<table>
<thead>
<tr>
<th>Field</th>
<th>Value</th>
</tr>
</thead>
<tbody>
<tr>
<td>Value Set Code</td>
<td>ELE_VS</td>
</tr>
<tr>
<td>Description</td>
<td>Elements</td>
</tr>
<tr>
<td>Module</td>
<td>Global Payroll</td>
</tr>
<tr>
<td>Validation Type</td>
<td>Table</td>
</tr>
<tr>
<td>Value Data Type</td>
<td>Character</td>
</tr>
<tr>
<td>FROM Clause</td>
<td>pay_element_types_f</td>
</tr>
<tr>
<td>Value Column Name</td>
<td>base_element_name</td>
</tr>
<tr>
<td>Value Column Type</td>
<td>VARCHAR2</td>
</tr>
<tr>
<td>Value Column Length</td>
<td>80</td>
</tr>
<tr>
<td>ID Column Name</td>
<td>element_type_id</td>
</tr>
<tr>
<td>ID Column Type</td>
<td>NUMBER</td>
</tr>
<tr>
<td>ID Column Length</td>
<td>18</td>
</tr>
<tr>
<td>WHERE Clause</td>
<td>LEGISLATIVE_DATA_GROUP_id= :{PARAMETER:LDGIP}</td>
</tr>
</tbody>
</table>

3. Click **Save**.

**Adding the Value Set Codes to the Manage Elements Page**

1. From the Payroll Calculation Work Area, click the **Manage Elements** task.
2. Create a new element to meet your requirements and then click **Submit**.
3. When the Element Summary page displays, click the **Input Values** folder.
4. Click **Actions** and then select **Create Input Values**.
5. Enter the name LDG_IP and the display sequence for the input value.
6. Select **Character** as the Unit of Measure.
7. Enter **LDG_VS** in the Value Set field.
8. Go to the Default field and select a legislative data group.
9. Click **Save**.
10. Click **Submit**.
11. Repeat these steps to create an element input value using the ELE_VS value set.
You can override the default values on the Element Eligibility - Input Values page for a specific eligibility record.

## Element Entries

### Enabling Automatic, Multiple, or Additional Element Entries: Critical Choices

You can select options for an element to define how you can update its element entries. The options include:

- Automatic entry
- Allow multiple entries in same period
- Additional entry

#### Automatic Entry

When you create an element, you can select **Yes** for the question: Should every person eligible for the element automatically receive it? This setting selects the **Automatic entry** option by default for all eligibility records you create for that element. However, you can override the selection for any specific eligibility record before you save it.

When you select this option, saving the eligibility record initiates a payroll flow to create element entries for all eligible workers. To monitor this flow:

- You can view the progress of the process in the **Automatic Entry Status** field. If the status shows that an error occurred, you can save the eligibility record again to resubmit the flow.
- If you have access to payroll work areas, you can also monitor the progress of the Generate Automatic Element Entries flow on the Processes and Reports tab. You can navigate to the Processes and Reports tab through these work areas: Payroll Dashboard, Payroll Checklist or Payroll Calculation.

Any updates to the employment records of eligible workers, including hires and terminations, automatically update, create, or end the element entries, as appropriate.

**Tip:** If you select the **Automatic entry** option, you can't also select Allow multiple entries in same period.

#### Allow Multiple Entries in Same Period

This option enables you to give a person more than one entry of the element in the same pay period. For example, if you enter overtime hours on a weekly basis for a person that is paid monthly, you might need to enter five entries on an overtime element in each period.

If you are creating a net-to-gross element, you must select **Allow multiple entries in same period**.

**Note:** An element with the Automatic entry option selected cannot allow multiple entries in the same period.

#### Additional Entry

This option enables you to add an occasional one-time entry for recurring elements. This additional entry can override or add to the normal entry amount.
Determining an Element's Latest Entry Date: Critical Choices

An element’s latest entry date determines how element entries process after a person is terminated or transferred to another payroll. The options include: final close, last standard earning date, and last standard process date. These are the predefined options. You can create others that fit your business needs.

Final Close
This option enables the element to stay open for entries beyond a person’s last day worked. For example, you may want the element to stay open to pay a severance package.

Last Standard Earning Date
This option stops all element entries on the date the person leaves. You should use this option for recurring entries such as salary.

Tip: If you select the last standard earning date option, also select proration for the element. This ensures that the element is processed up to this date, even if it isn’t active at the end of a payroll period.

Last Standard Process Date
The value for last standard process date is automatically set to the last day of the pay period in which the person is terminated. You can, however, set it to a later period when you terminate a person. It stops all element entries on the last standard process date or on the date the assignment ends, if this is earlier.

Related Topics

• Element Entries: How Element Setup Affects Entries and Their Entry Values
• Element Duration Dates in Payroll Relationships: Explained

Default Values for Element Entries: Critical Choices

You specify default values for element entries using the Manage Elements task in the Payroll Calculation work area. Your element setup controls when the default value affects element entries. You can apply the default value only when an element entry is created, or you can apply the latest default value at runtime. Another option is to use a formula to provide default values on one or more entry values.

You can:

• Set a default value for an input value, or select a defaulting formula for the element.
• Override the default value or formula for a specific group of employees identified by an element eligibility record.
• Override the default value for specific employees on their element entries.
Defining Elements to Provide Default Values at Element Entry Creation
When you create or edit input values, you can specify a default value. If you don't select the **Apply default at runtime** option, then subsequent updates to the default value have no effect on existing element entries. Users can override or change the default value at any time.

Defining Elements to Provide Default Values at Runtime
To use this method, enter the default value and select the **Apply default at runtime** option for the input value. If the element entry value is left blank, the payroll process uses the current default value from the element or element eligibility record. If you enter a value in the element entry value, the manual entry overrides the default value and updates to the default value don’t affect that entry. You can clear the entry if you want to restore the default value.

Using a Formula to Provide Default Values
You can create a formula of type element input validation to provide default values for one or more entry values. Select this formula in the Defaulting Formula field for an element or element eligibility record. The order of precedence is as follows:

- A formula at the element eligibility level overrides a formula at the element level.
- If you enter a default value for the input value and select a defaulting formula, the formula overrides the default value.

**Related Topics**
- Element Entries: How Element Setup Affects Entries and Their Entry Values

### Element Input Validation Formula Type
You can use an element input validation formula to validate one or more element entry values. You can also use this formula type to provide a default value for an element entry value, or to calculate entry values based on the user’s entries in other entry values.

You select the formula on the Element Summary page in the following fields:

<table>
<thead>
<tr>
<th>Page Section</th>
<th>Field</th>
<th>Purpose</th>
<th>When the Formula Runs</th>
</tr>
</thead>
<tbody>
<tr>
<td>Element Details, or Element Eligibility</td>
<td>Validation Formula</td>
<td>To validate one or more entry values for the element based on entries in other entry values.</td>
<td>When you save the element entry.</td>
</tr>
<tr>
<td>Element Details, or Element Eligibility</td>
<td>Calculation Formula</td>
<td>To provide values for one or more entry values using a calculation that takes input from these or other entry values.</td>
<td>When you save the element entry.</td>
</tr>
<tr>
<td>Element Details, or Element Eligibility</td>
<td>Defaulting Formula</td>
<td>To provide default values for one or more entry values.</td>
<td>When you create the element entry.</td>
</tr>
<tr>
<td>Input Value</td>
<td>Validation Formula</td>
<td>To validate one entry value independently of others.</td>
<td>When you enter the value.</td>
</tr>
</tbody>
</table>

**Note:** In all cases, a formula at the element eligibility level overrides an equivalent formula at the element level.
Contexts
The following contexts are available to all formulas of this type:

- LEGISLATIVE_DATA_GROUP_ID
- DATE_EARNED
- EFFECTIVE_DATE

The following contexts are available to formulas at element or element eligibility level only, not to validation formulas at the input value level:

- PERSON_ID
- PAYROLL_RELATIONSHIP_ID
- PAYROLL_TERM_ID
- PAYROLL_ASSIGNMENT_ID
- HR_RELATIONSHIP_ID
- HR_TERM_ID
- HR_ASSIGNMENT_ID

Input Variables
The following input variables are available to formulas of this type.

<table>
<thead>
<tr>
<th>Formula Usage</th>
<th>Input Variables</th>
<th>Comments</th>
</tr>
</thead>
<tbody>
<tr>
<td>Validation formula at input value level</td>
<td>entry_value</td>
<td>Passes the value to be validated. You must declare the input variable as the appropriate type for the element input value.</td>
</tr>
<tr>
<td>Validation formula at element or element eligibility level</td>
<td>Any element input value name that corresponds to an entry value.</td>
<td>Replace spaces in the input value name with underscores in the input variable name. It doesn’t matter whether you use uppercase or lowercase for the name.</td>
</tr>
<tr>
<td>Defaulting formula</td>
<td>None</td>
<td>Use database items or other logic instead.</td>
</tr>
<tr>
<td>Calculation formula</td>
<td>Any element input value name of an entry value.</td>
<td>Replace spaces with underscores. You don’t need to provide all of the available entry values.</td>
</tr>
</tbody>
</table>

Return Values
The following return values are available to formulas of this type.

<table>
<thead>
<tr>
<th>Formula Usage</th>
<th>Return Values</th>
<th>Comments</th>
</tr>
</thead>
<tbody>
<tr>
<td>Validation formula at any level.</td>
<td>formula_status</td>
<td>Must be either ‘S’ (success) or ‘E’ (error), Required.</td>
</tr>
</tbody>
</table>
### Formula Usage

<table>
<thead>
<tr>
<th>Validation formula at any level.</th>
<th>formula_message</th>
<th>Text of message passed to user if the validation fails. Optional.</th>
</tr>
</thead>
<tbody>
<tr>
<td>Defaulting formula</td>
<td>Any element input value name of an entry value.</td>
<td>A return value overrides any default value provided on the input value in the element or element eligibility record.</td>
</tr>
<tr>
<td>Calculation formula</td>
<td>Any element input value name of an entry value.</td>
<td>You don’t need to return all of the available entry values. You can return the entry values that were passed in as input variables, or other entry values.</td>
</tr>
</tbody>
</table>

### Sample Formula

This section contains the following sample formulas:

- Validation formula at input value level
- Validation formula at element or element eligibility level
- Calculation formula at element or element eligibility level
- Defaulting formula at element or element eligibility level

#### Validation formula at input value level:

```sql
inputs are entry_value(date)
if(entry_value = '01-APR-2008' (date)) then
  
  formula_message = 'Valid date'
  formula_status = 'S'

else(formula_message = 'Invalid date'
    formula_status = 'E'

return formula_message, formula_status
```

#### Validation formula at element or element eligibility level:

```sql
inputs are hours_worked, rate, earning_date(date), comment(text)
if(hours_worked > 80) then
  
  formula_message = 'You are within the working limit.'
  formula_status = 'S'

else(formula_message = 'You have worked too many hours.'
    formula_status = 'E'

return formula_message, formula_status
```

#### Calculation formula at element or element eligibility level:

```sql
inputs are hours_worked, rate, comment(text)
if(hours_worked > 80) then
  
  rate = rate * 1.2
  comment = 'Your rate has been increased'
```
Defaulting formula at element or element eligibility level:

```sql
if(CATEGORY = 'S') then
    (rate = 20)
else
    (rate = 30)
rate_code = 'B'
return rate, rate_code
```

Formula Result Rules for Elements: Explained

An element’s status processing rule identifies the formula that the payroll run uses to process the element for workers with a specified assignment status. For each status processing rule, formula result rules determine what happens to each result that the formula returns.

### Status Processing Rules

An element can have one status processing rule for all assignment statuses, or a different rule for each status. For example, you could have two rules for a Wages element: Standard Wages and Paid Training Leave.

### Formula Result Rules

Formulas return formula results such as the amount to be paid, or a message. Results can update the current element entry or another target element entry with a lower processing priority, meaning that it’s processed later in the run.

The following table explains the available result rules.

<table>
<thead>
<tr>
<th>Results Rule</th>
<th>Purpose</th>
</tr>
</thead>
<tbody>
<tr>
<td>Direct Result</td>
<td>The element’s run result, or a direct result updating one of the element’s input values.</td>
</tr>
<tr>
<td>Indirect Result</td>
<td>An entry to a nonrecurring element that has a lower processing priority. The target element must be at the same employment level as the source element.</td>
</tr>
<tr>
<td>Message</td>
<td>A message issued by the formula under certain conditions. For example, a formula can check a loan repayment balance and, if the balance is zero, issue the message Loan is repaid.</td>
</tr>
</tbody>
</table>

There are three severity levels for a message rule:

- **Error** - This causes the run to roll back all processing for the employment record.
- **Warning** - This does not affect payroll processing but warns you of a possible problem.
- **Information** - This does not affect payroll processing.

<table>
<thead>
<tr>
<th>Order Indirect</th>
<th>Updates the subpriority of the element you select in the Target Element Name field.</th>
</tr>
</thead>
<tbody>
<tr>
<td>Stop</td>
<td>Uses the Date Earned of the payroll run to stop the processing of a recurring entry. A stop rule can be based upon reaching a specified accumulator, such as a balance owed of zero. The date upon</td>
</tr>
</tbody>
</table>
Results Rule | Purpose
--- | ---
 | which the total owed is reached appears on the Element Entries page as Settlement Date. The entries are not actually mass-dated but stopped from future processing. This supports retroactive processes which impact the total owed balance.
You should define the target element with Allow Multiple Entries selected. This enables you to allocate a new entry once the value of an existing entry has reached zero. For example, once an employee has repaid a loan you can add a new loan entry for the employee. If you add a new stop entry for the same element type, use balance contexts to differentiate between the owed balances.

**Note:** If you do not select Allow Multiple Entries and you want to add a second loan after the first loan has been stopped by a payroll run, end date the first loan before creating the second loan.

| Target Indirect | An entry to a nonrecurring element that has a lower processing priority, where the target element is defined at a different employment level than the element being processed. For example, you could use a Target Indirect rule to update the input value of an assignment-level element from the processing of a payroll element.

---

### Element Eligibility

**Element Eligibility: Explained**

Element eligibility determines which people are eligible for an element. To determine eligibility, you select the criteria that people must have to receive entries of the element.

**Eligibility Criteria**

You can define element eligibility using the following criteria.

<table>
<thead>
<tr>
<th>Level</th>
<th>Available Criteria</th>
</tr>
</thead>
<tbody>
<tr>
<td>Payroll Relationship</td>
<td>Payroll Statutory Unit, Relationship Type</td>
</tr>
<tr>
<td>Terms</td>
<td>Legal Employer, Department in which the person works, Job, for example, associate professor or secretary</td>
</tr>
<tr>
<td>Assignment</td>
<td>Grade, Employment Category, People Group, Legal Employer, Department, same as in Terms</td>
</tr>
</tbody>
</table>
### Available Criteria

<table>
<thead>
<tr>
<th>Level</th>
<th>Available Criteria</th>
</tr>
</thead>
<tbody>
<tr>
<td>Job, same as in Terms</td>
<td></td>
</tr>
<tr>
<td>Grade</td>
<td></td>
</tr>
<tr>
<td>Employment Category</td>
<td></td>
</tr>
<tr>
<td>People Group</td>
<td></td>
</tr>
</tbody>
</table>

#### Note:
You set up all the people groups that are appropriate for your enterprise. For example, you could decide to group people by company within a multi-company enterprise, and by union membership.

Location of person's office

Position, which is a class of job performed in a particular organization, for example, associate professor of chemistry, or finance department secretary.

Payroll

All payrolls eligible

---

**Tip:** You must define element eligibility for every element, including predefined elements. If you want the element to be available to all workers, add an eligibility name and save the element eligibility record with no additional criteria selected. This is the usual practice for compensation and benefit elements where you determine eligibility using eligibility profiles.

### Examples of Eligibility Criteria

In the following examples, you restrict who can receive an element entry:

- Your enterprise provides company cars only to people in the sales or customer support departments. You create two eligibility records, and use the Department field to specify the eligibility criteria. Select Sales Department for one record and Customer Support for the second record.

- Your enterprise offers a production bonus to people who work full-time in production and are on the weekly payroll. You create one eligibility record and select Full-time regular in the Employment Category field, Production in the Department field, and Weekly in the Payroll field.

### Multiple Rules of Eligibility

You can define more than one eligibility record for each element, but there must be no overlap between them.

For example, you can create one record for the combination of grade A and the job of accountant. However, you can’t create one record for grade A and a second for the job of accountant. These rules would imply that an accountant on grade A is eligible for the same element twice.

If you have more than one element eligibility record, you can enter different default values and costing information for each eligibility group.

### Maintaining Element Eligibility: Explained

After saving an element eligibility record, you can only make certain changes. You can’t update the eligibility criteria.
The following table summarizes the actions you can take.

<table>
<thead>
<tr>
<th>Action</th>
<th>Result</th>
</tr>
</thead>
<tbody>
<tr>
<td>Change input value default values and validation</td>
<td>These changes affect all new entries, and updates to existing entries. Changes to runtime defaults affect existing entries too.</td>
</tr>
<tr>
<td>Delete element eligibility record</td>
<td>Existing recurring entries are ended automatically when you end the element’s eligibility.</td>
</tr>
</tbody>
</table>

Note: You can’t delete the element eligibility record if any nonrecurring entries exist at the date you want to end the record. You must delete existing entries before you end the element’s eligibility.

Adding Eligibility Rules for Predefined Elements: Procedure

If the country extension on the Manage Features by Country or Territory page is set to Payroll or Payroll Interface, you must add element eligibility records for predefined statutory deduction elements before you hire any workers.

To search for the predefined elements:

1. Search for the Manage Elements task in the Setup and Maintenance work area.
2. Click Go to Task.
3. Search for the predefined elements, which are as follows:

<table>
<thead>
<tr>
<th>Country or Territory</th>
<th>Predefined Element</th>
</tr>
</thead>
<tbody>
<tr>
<td>US, Canada, Mexico</td>
<td>US Taxation, CA Taxation, MX Taxation</td>
</tr>
<tr>
<td>Australia, India, Singapore</td>
<td>Statutory Deductions</td>
</tr>
<tr>
<td>Kuwait, Saudi Arabia, United Arab Emirates</td>
<td>Social Insurance</td>
</tr>
<tr>
<td></td>
<td>Gratuity</td>
</tr>
<tr>
<td>China</td>
<td>Aggregation Information</td>
</tr>
<tr>
<td>UK</td>
<td>Tax and NI</td>
</tr>
<tr>
<td></td>
<td>Pensions Automatic Enrollment</td>
</tr>
<tr>
<td>Netherlands</td>
<td>Tax and Social Insurance Calculations</td>
</tr>
<tr>
<td>France</td>
<td>French Payroll Processing</td>
</tr>
</tbody>
</table>

Note: There are no predefined elements that require eligibility rules for Germany, Ireland, Switzerland, or Hong Kong.
To add eligibility rules:

1. Click the element name to open the Element Summary page.
2. Enter a date in the Effective As-of Date field.
   You are recommended to use the start date of the element, which is 1/1/1901.
3. Enter a name for the eligibility rule and click Submit. Since you haven’t selected any eligibility criteria, all employees are eligible for the element.
4. Click Done.

Voluntary Deductions

Defining Voluntary and Pre-statutory Deductions: Procedure

Use the Manage Elements task to define voluntary and pre-statutory deductions, such as pensions. You manage pension deductions through calculation cards or element entries, depending on country-specific rules. You manage other voluntary deductions, such as gym membership, union membership, and charity donations, through element entries.

Use these steps to set up deductions:

1. Define the elements.
2. Define the third-party payees.
3. Define a third-party payment method for each third-party payee.
4. Enter the deduction details for each person. Do this in the following ways, depending on the deduction type and your setup:
   - Configure a Benefits and Pensions calculation card.
   - Define element entry.
   - Load benefit batches.

Defining Elements

When you define a pension plan deduction, if you select the Benefit category, or it’s selected for you, the element template defines a calculation component. You add this component to Benefits and Pensions calculation cards to assign it to your workers.

To define other voluntary deductions:

- Select the Standard category.
  This selection means you manage these deductions using the Manage Element Entries task.
- After defining the element, you must add a Payee input value and select Third-Party Payee as the special purpose for it.
  If appropriate, enter a default value on the element or element eligibility record to populate the third-party payee details.

Defining Third-Party Payees

To define third-party payees, use the Manage Third Parties page in the Payment Distribution work area.
For pensions, select the **Organization** payee type and select the **Pension Provider** party usage code.

**Defining Third-Party Payment Methods**

To define payment methods for all external payees, use the Manage Third-Party Payment Methods task in the Payment Distribution work area.

**Entering Deduction Details for Each Person**

For pensions using the Benefit category:

1. Configure a Benefits and Pensions calculation card for the worker.
2. Add your new pension calculation component to the card.
3. Enter the payee and other details.

If you load your pension information using the Load Benefit Batches process, the payroll application configures the calculation card automatically. Before running this process, you must generate an XML file that contains the data you want to transfer to payroll.

For other voluntary deductions, you must define element entries. If the payee is not defaulted from the element or eligibility record, enter the payee on the element entry.

**Related Topics**

- Configuring a Personal Calculation Card: Worked Example
- Creating Third-Party Payment Methods: Procedure

**Creating Elements for Pension Deductions: Worked Example**

This example shows you how to create a pension deduction element using an element template. Follow these steps in the Payroll Calculation work area:

1. Create a pension deduction element
2. Create an eligibility record for the deduction

**Creating a Pension Element**

1. In the Payroll Calculation work area, click **Manage Elements**.
2. Click **Create**.
3. Complete the fields, as shown in this table.

<table>
<thead>
<tr>
<th>Field</th>
<th>Value</th>
</tr>
</thead>
<tbody>
<tr>
<td>Legislative Data Group</td>
<td>Your Legislative Data Group</td>
</tr>
<tr>
<td>Primary Classification</td>
<td>Voluntary Deductions or Pre-statutory Deduction</td>
</tr>
<tr>
<td>Secondary Classification</td>
<td>Appropriate classification for your country or territory, such as Pension Plan After Tax</td>
</tr>
<tr>
<td>Category</td>
<td>Benefit</td>
</tr>
</tbody>
</table>

4. Click **Continue**.
5. Complete the Basic Information page. For the latest entry date:
   ◦ Select **Last Standard Earning Date** if you enable proration for the element.
   ◦ Otherwise, select **Last Standard Process Date**.

6. Click **Next**.

7. On the Additional Details page, enter the calculation rules and limits for the deduction. The following table summarizes your choices.

<table>
<thead>
<tr>
<th>Rules</th>
<th>What You Can Enter</th>
</tr>
</thead>
<tbody>
<tr>
<td>Calculation rule</td>
<td>Fixed amount or percentage</td>
</tr>
<tr>
<td>Age limits</td>
<td>Minimum and maximum age</td>
</tr>
<tr>
<td>Maximum contribution amount</td>
<td>Any numeric value</td>
</tr>
<tr>
<td>Pensionable earnings limit</td>
<td>Minimum and maximum amount</td>
</tr>
<tr>
<td>Additional contributions allowed</td>
<td>Yes, or no. If yes, select calculation rule.</td>
</tr>
<tr>
<td>Employer contributions allowed</td>
<td>Yes, or no. If yes, select calculation rule, age limits, and amount limits</td>
</tr>
<tr>
<td>Overrides allowed</td>
<td>Yes, or no</td>
</tr>
<tr>
<td>Element subject to proration</td>
<td>Yes, or no</td>
</tr>
</tbody>
</table>

8. Click **Next**.

9. Verify the information is correct.

10. Click **Submit**.

   The template creates a recurring element at the payroll relationship level. It also creates a calculation component with the same name as the element. You add this component to workers’ calculation cards.

### Creating an Eligibility Record for the Deduction

On the Element Summary page, you can create as many eligibility records as you require:

1. In the Element Overview section, click the **Element Eligibility** link.
2. Select **Create Element Eligibility** from the Actions menu.
3. Enter a name for the eligibility record.
4. Select any criteria if you want to restrict who can pay this deduction.
5. Click **Submit**.
6. Click **Done**.

### Entering Calculation Values for Pensions: Points to Consider

Create a Benefits and Pensions calculation card for each worker who pays a pension deduction. On the card, select the calculation component that was created automatically for your pension element, and enter the required contribution
amounts and limits, as described in this topic. If you use the Load Benefit Batches process to transfer values from a benefits application, this process creates the calculation cards for you and enters the contribution amounts and limits.

**Default Contribution Amounts and Limits**

You enter some default contribution amounts and limits when you create the pension element. These default values are stored as calculation value definitions. You can edit the default values using the Manage Calculation Value Definitions page. You can also add a default payee or a separate payee for each employee by entering the payee ID in the Enterable Calculation Values area on the Calculation Cards tab.

**Enterable Calculation Values for Pensions**

To enter or override a calculation value for one worker, follow these steps:

1. Open the worker's Benefits and Pension calculation card on the Manage Calculation Cards page.
2. Add the calculation component for the pension, if it isn’t already on the card.
3. With this calculation component selected, click the **Enterable Calculation Values on Calculation Cards** tab.
4. Click **Create**.
5. Select the value you want to enter. Typically, you will enter a payee, reference number, and any additional contributions. You can also override any default contribution amounts or limits.

The following table lists the calculation values you can enter.

---

If the calculation component was created by running the Load Benefit Batches process, you can only enter or override the following values: Payee, Reference Number, and Employee Additional Contribution.

<table>
<thead>
<tr>
<th>Field</th>
<th>Required</th>
<th>Default Provided at Element Setup</th>
<th>Values</th>
</tr>
</thead>
<tbody>
<tr>
<td>Payee</td>
<td>Y</td>
<td>N</td>
<td>Enter the ID of an organization with the usage of Pension Provider.</td>
</tr>
<tr>
<td>Reference Number</td>
<td>Y or N</td>
<td>N</td>
<td>Free text</td>
</tr>
<tr>
<td></td>
<td></td>
<td></td>
<td>Depending on the localization rules this field may or may not be required.</td>
</tr>
<tr>
<td>Employee Contributions</td>
<td>Y</td>
<td>Y</td>
<td>Percent or flat amount as per element setup. Enter percentages as decimal values.</td>
</tr>
<tr>
<td>Additional Employee</td>
<td>N</td>
<td>N</td>
<td>Percentage or flat amount as per element setup, if additional contributions are allowed.</td>
</tr>
<tr>
<td>Contributions</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Minimum Age</td>
<td>N</td>
<td>Y</td>
<td>Numeric age</td>
</tr>
<tr>
<td>Maximum Age</td>
<td>N</td>
<td>Y</td>
<td>Numeric age</td>
</tr>
<tr>
<td>Maximum Contribution Amount</td>
<td>N</td>
<td>Y</td>
<td>Numeric amount</td>
</tr>
<tr>
<td>Minimum Pensionable Earnings</td>
<td>N</td>
<td>Y</td>
<td>Numeric amount</td>
</tr>
</tbody>
</table>
Involuntary Deductions

Adding Involuntary Deductions to a Calculation Card: Procedure

You use element templates to create the involuntary deduction elements supported for your legislation, such as bankruptcy orders, garnishments, child support payments, tax levies, and educational loans. The templates also create calculation components, which you can add to a personal calculation card, so the deductions are processed during a payroll run.
This figure shows the steps involved in creating an involuntary deduction and adding it to a personal calculation card:

### Prerequisites
Before you can add an involuntary deduction to a personal calculation card, you must first:

- Create a third party to receive the payment.
- Create a third-party payment method.
- Create an involuntary deduction element.

You can create multiple elements for the same involuntary deduction type if processing information or other details vary. For example, each jurisdiction you deal with may have different processing rules for court orders.

### Creating an Involuntary Deduction Calculation Card
Follow these steps:

1. In the Payroll Administration or Payroll Calculation work area, click the Manage Calculation Cards task.
2. Search for and select the payroll relationship.
3. If the person doesn’t already have an involuntary deduction calculation card, click Create.
4. Enter a start date for the card and select the involuntary deduction card type.
5. Click Continue.

### Adding the Calculation Component to the Calculation Card
You can add multiple calculation components for the same or different involuntary deduction types. For example, you could add two child support components and one garnishment component to the same calculation card.

On the Manage Calculation Cards page:

1. In the Calculation Components section, click Add Row.
2. Select the calculation component with the same name as the involuntary deduction element.
3. Optionally, enter a number in the Subprocessing Order field if the calculation card will include more than one calculation component.

By default, the payroll run processes these element entries in order by date received, starting with the oldest entry.

4. Enter a reference code to uniquely identify this deduction, such as a court order number, case number, or other identifier provided by the issuing authority.

5. Complete the fields on the Calculation Component Details tab.

- In the Involuntary Deduction Payment Details section, select all payees for the deduction.

  The payee fields display all third-party person payees associated with this payroll relationship and all external payees defined for your legislative data group.

- In the Involuntary Deduction Rules section, specify the information you require, including:
  - The date the involuntary deduction order was received
  - The issuing authority (such as a court)
  - The frequency of the deduction such as monthly or weekly, regardless of the payroll frequency. If you leave the Frequency field blank, the application uses the payroll frequency.

### Entering Values for the Deduction Amounts

You enter the order amount, fee, or other amounts used in the calculation on the calculation card. The values you enter replace any default values defined in calculation value definitions. The default order amount for an involuntary deduction is typically zero.

To create overrides on the Enterable Calculation Values on the Calculation Cards tab, complete the fields as shown in the following table. The values you can enter may vary by country or territory, but typically include the items described in the table below.

> **Note:** For most values, you can enter either an amount or a rate. Enter a rate if you want the application to calculate the amount as a percentage of available pay. For example, to define a rate of 20 percent for the order amount, create an Order Amount (Rate) value. Then enter 20 in the Rate field.

<table>
<thead>
<tr>
<th>Calculation Value</th>
<th>Description</th>
</tr>
</thead>
<tbody>
<tr>
<td>Order Amount</td>
<td>Rate or amount paid to the Order Amount Payee based on the frequency you specified.</td>
</tr>
<tr>
<td></td>
<td>For example, if you specified a frequency of monthly in the component details, enter the amount to deduct each month, regardless of the payroll period. The application automatically calculates the correct amount to deduct in each payroll period.</td>
</tr>
<tr>
<td></td>
<td>If you leave the Frequency field blank, this amount is deducted at the payroll frequency defined at the assignment level.</td>
</tr>
<tr>
<td>Organization Fee</td>
<td>Rate or amount paid to the Organization Fee Payee each time the deduction is processed.</td>
</tr>
<tr>
<td>Person Fee</td>
<td>Rate or amount paid to the Person Fee Payee each time the deduction is processed.</td>
</tr>
<tr>
<td>Processing Fee</td>
<td>Rate or amount paid to the Processing Fee Payee each time the deduction is processed.</td>
</tr>
<tr>
<td>Initial Fee</td>
<td>Rate or amount paid to Processing Fee Payee the first time this deduction is processed.</td>
</tr>
</tbody>
</table>
### Calculation Value

<table>
<thead>
<tr>
<th>Calculation Value</th>
<th>Description</th>
</tr>
</thead>
<tbody>
<tr>
<td>Maximum Withholding Amount and Minimum Withholding Amount</td>
<td>Maximum and minimum rates or amounts that can be withheld in one payroll period for this deduction.</td>
</tr>
<tr>
<td>Maximum Withholding Duration</td>
<td>The number of days after the Date Received that the order is valid. For example, a court order might only be valid for 90 days after the date issued.</td>
</tr>
<tr>
<td>Protected Pay Amount</td>
<td>Amount of the employee’s pay that is exempt from this deduction. Only pay exceeding this amount is included in the deductible amount (available for the deduction).</td>
</tr>
<tr>
<td>Exemption Percentage</td>
<td>Percentage of the employee’s pay that is exempt from this deduction.</td>
</tr>
</tbody>
</table>

**Related Topics**

- Creating Third Parties: Points to Consider
- Creating Third-Party Payment Methods: Procedure

### Fee and Proration Rules for Involuntary Deductions: Explained

Creating an involuntary deduction creates calculation value definitions that include predefined fee and proration rules. These rules vary by country and territory.

The following table describes the global rules:

<table>
<thead>
<tr>
<th>Rule</th>
<th>Processing</th>
</tr>
</thead>
<tbody>
<tr>
<td>Fee</td>
<td>Deduct the fee first, before calculating and paying the deduction amount.</td>
</tr>
<tr>
<td>Proration</td>
<td>Use the first come, first serve method.</td>
</tr>
<tr>
<td></td>
<td>If a person has multiple orders and there is insufficient money to pay them all, pay the deductions in the order in which they were received. Start with the oldest.</td>
</tr>
</tbody>
</table>

You can override these predefined fees and proration rules. For details, see the topic Involuntary Deduction Calculation Value Override Details for the US in the Help Portal.

### Involuntary Deduction Processing: Examples

Processing rules may vary by the legislation or the legal authority issuing the order for an involuntary deduction. These examples illustrate the processing of fees, protected pay amounts, and when employees have multiple assignments and payrolls.

Payroll processing first calculates disposable income using the disposable income rules. Then it looks at the exemption rules to calculate the amount exempt from withholding. Using these amounts, it can calculate the amount available to deduct.
Note: The payroll process calculates disposable income once, based on the highest processing priority card component. The exception is regional tax levies, which have a separate disposable income calculation.

Use these examples to understand how involuntary deductions are processed in different scenarios:

- Involuntary deduction has initial fee and processing fee
- Deduction amount exceeds protected pay amount
- Employee has multiple assignments and payrolls
- Multiple orders exist with different protected pay amounts

Involuntary Deduction Has Initial Fee and Processing Fee

Scenario: A US employee is issued a court order for a monthly garnishment of 500 USD. The order is subject to two fees. Both fees are paid to the agency responsible for administering the account. The agency then forwards the payments to the recipients:

- A 10 USD one time initial fee
- A 10 USD monthly processing fee

On the involuntary deduction calculation card:
1. Add a calculation component for a garnishment.
2. In the Calculation Component Details tab:
   - Select the Order Amount Payee and the Processing Fee Payee. The processing fee payee is also the initial fee payee.
   - Select Monthly in the Frequency field.
3. In the Enterable Calculation Values tab, enter the following values:

<table>
<thead>
<tr>
<th>Field</th>
<th>Value</th>
</tr>
</thead>
<tbody>
<tr>
<td>Order Amount</td>
<td>500</td>
</tr>
<tr>
<td>Processing Fee</td>
<td>10</td>
</tr>
<tr>
<td>Initial Fee</td>
<td>10</td>
</tr>
</tbody>
</table>

Payroll Run Results:

- The amount of the employee’s pay subject to deduction is 1000 USD.
- During the first monthly payroll after the court order is received, both the initial fee amount and the processing fee are deducted. The total deduction amount is 520 USD.
- In subsequent payroll runs, the order amount and the processing fee are deducted. The total deduction amount is 510 USD.

Deduction Amount Exceeds Protected Pay Amount

Scenario: A UK employee is issued a court order for the amount of 100 GBP per month. However, protected pay rules defined for the deduction require that the employee take home at least 700 GBP, after all deductions.
On the involuntary deduction calculation card:

1. Add a calculation component for a court order.
2. In the Calculation Component Details tab:
   - Select the **Order Amount Payee** and the **Processing Fee Payee**.
   - Select **Monthly** in the Frequency field.
3. In the Enterable Calculation Values tab, enter the following values:

```
<table>
<thead>
<tr>
<th>Field</th>
<th>Value</th>
</tr>
</thead>
<tbody>
<tr>
<td>Order Amount</td>
<td>100</td>
</tr>
<tr>
<td>Protected Pay</td>
<td>700</td>
</tr>
</tbody>
</table>
```

Payroll Run Results:

- The amount of the employee’s pay subject to the deduction is 750 GBP.
- A 100 GBP deduction amount would leave only 650 GBP for the final pay amount. Therefore, only 50 GBP is deducted for the month.
- The remaining balance of 50 GBP isn’t placed in arrears, based on processing rules defined for this deduction.

**Employee Has Multiple Assignments and Payrolls**

Scenario: An employee has one payroll relationship with two assignments. They receive paychecks from two different payrolls. One payroll is run on a weekly basis. The other is run on a monthly basis.

The employer receives a court order to deduct 200 USD per month from the employee’s wages. The court order amount must be deducted from all available money, regardless of the payroll. If the total order amount can’t be deducted from the first payroll run, then the following occurs. The remaining balance must be deducted from one or more subsequent runs during the month, until the full amount is paid.

On the involuntary deduction calculation card:

1. Add a calculation component for a court order.
2. In the Calculation Component Details tab:
   - Select the **Order Amount Payee**.
   - Select **Monthly** in the Frequency field.
3. In the Enterable Calculation Values tab, enter the following value:

```
<table>
<thead>
<tr>
<th>Field</th>
<th>Value</th>
</tr>
</thead>
<tbody>
<tr>
<td>Order Amount</td>
<td>200</td>
</tr>
</tbody>
</table>
```

Payroll Run Results:

- During the first weekly payroll run, only 50 USD can be deducted, leaving an amount owed of 150 USD for the month.
- When the next weekly payroll is run, the deduction can’t be taken due to insufficient pay; the balance for the month remains 150 USD.
• The monthly payroll runs before the next weekly payroll is run. The remaining 150 USD owed for the deduction is taken during the monthly payroll run.
• No money is deducted during the subsequent weekly payroll runs for this month.

Note: If a person has two assignments for different payroll relationships, they would typically be issued two different court orders, one for each employment. In this case, you would add each court order to a different calculation card.

Multiple Orders Exist with Different Protected Pay Amounts
Scenario: A UK employee has three court orders. Each court order has a different protected pay amount.

1. On the involuntary deduction calculation card add three calculation components for child support.
2. For each calculation component, select Monthly in the Frequency field.
3. Define the protected pay and order amount values for each deduction as shown in the following table:

<table>
<thead>
<tr>
<th>Involuntary Deduction</th>
<th>Protected Pay Amount</th>
<th>Order Amount</th>
<th>Date Received</th>
</tr>
</thead>
<tbody>
<tr>
<td>Child Support 1</td>
<td>500</td>
<td>1000</td>
<td>23 January 2012</td>
</tr>
<tr>
<td>Child Support 2</td>
<td>600</td>
<td>1100</td>
<td>2 February 2012</td>
</tr>
<tr>
<td>Child Support 3</td>
<td>1000</td>
<td>1200</td>
<td>2 February 2012</td>
</tr>
</tbody>
</table>

Payroll Run Results:
The net amount available for involuntary deductions in the payroll run is 2000 GBP. Based on the processing priority defined for child support payments, the payroll run processes the involuntary deductions in order by date received.

Here’s the result:
• Child Support 1 is paid in full, leaving 1000 GBP available for other deductions.
• Child Support 2 is paid an amount of 400 GBP (1000 less protected pay of 600).
• Child Support 3 is not paid. The total amount is placed in arrears, based on processing rules defined for the deduction.

Net-to-Gross Earnings

Net-to-Gross Earnings: How They’re Calculated
When you create an earnings element, you can indicate that it pays a specified net amount. Use this feature, if you need to pay a person:

• Guaranteed take-home pay (net) per payroll period
• Bonus of a specified net amount

To create an earnings element, use the Manage Elements task in the Payroll Calculation work area.
You can create a net-to-gross (gross-up) element for any recurring or nonrecurring earnings element using these primary classifications:

- Standard Earnings
- Supplemental Earnings
- Taxable Benefits (Imputed Earnings)

### Settings That Affect Net-to-Gross Processing

You define which deductions are used to calculate the gross amount from the specified net amount.

You must create the element as a gross-up element by answering **Yes** to the **Use this element to calculate a gross amount from a specified net amount?** prompt in the element template.

In each element entry, you specify the limits of the gross-up processing as follows:

- In the **Net** value, enter the value you want the employee to receive.
- In the **To Within** value, enter the allowed difference between the desired amount and the actual amount. This can’t be 0.

> **Note:** If these values are the same across most entries, you can enter a default value on the element eligibility record.

### How Formulas Calculate the Gross Amount

The formulas for net-to-gross processing do the following:

1. The predefined GLB_EARN_GROSSUP iterative formula takes as input the desired net amount (**Net** input value) and the amount by which net can differ from the desired amount (**To Within** input value).
2. In the first run, the formula:
   - **a.** Sets the lower gross limit to the desired net amount, and the higher gross limit to twice the desired amount.
   - **b.** Runs a function to provide the first guess of the gross.
   - **c.** Returns three values to the element’s input values: low gross, high gross, and additional amount.
3. The element’s payroll formula runs. It adds the additional amount to the desired amount to create the gross amount and returns this value to the element’s pay value for the payroll run to process.
4. In the next iteration, the iterative formula compares the additional amount to the total value of the balances that are available for gross-up for this element entry. The additional amount must not differ from this balance total by more than the amount you specified in the **To Within** field.
   - If the additional amount equals the balance total, the iterative processing ends.
   - If the additional amount is above or below the balance total by an acceptable margin, the processing ends and the formula returns the remainder (additional amount minus balance) to the element’s **Remainder** input value.
   - Otherwise, the formula runs the function to generate a better estimate for gross, using the remainder to determine by how much to change the guess. The formula checks the results in another iteration.

### Related Topics

- Using Formula Components: Explained
Creating a Net-to-Gross Earnings Element: Worked Example

This example demonstrates how to create a net-to-gross (gross-up) earnings element when an organization wants to pay a person a specific net amount on a bonus.

Before you create your earnings element, you may want to determine the following:

<table>
<thead>
<tr>
<th>Decisions to Consider</th>
<th>In This Example</th>
</tr>
</thead>
<tbody>
<tr>
<td>What is the primary classification of this earning?</td>
<td>Supplemental Earnings</td>
</tr>
<tr>
<td>Is the element recurring or nonrecurring?</td>
<td>Nonrecurring</td>
</tr>
<tr>
<td>Who is the bonus recipient?</td>
<td>Linda Swift</td>
</tr>
<tr>
<td>How much is the bonus?</td>
<td>1000 USD</td>
</tr>
<tr>
<td>What is the allowed difference between the specified bonus and the actual amount paid?</td>
<td>.05 USD</td>
</tr>
<tr>
<td>What is the calculation rule?</td>
<td>Flat amount</td>
</tr>
</tbody>
</table>

Creating the Earnings Element

Perform the following steps to create the element:

1. In the Payroll Calculation work area, click Manage Elements.
2. Click Create and then select the values shown in the table in the Create Element window.

<table>
<thead>
<tr>
<th>Field</th>
<th>Value</th>
</tr>
</thead>
<tbody>
<tr>
<td>Legislative Data Group</td>
<td>US LDG</td>
</tr>
<tr>
<td>Primary Classification</td>
<td>Supplemental Earnings</td>
</tr>
<tr>
<td>Secondary Classification</td>
<td>Bonus</td>
</tr>
<tr>
<td>Category</td>
<td>Standard</td>
</tr>
</tbody>
</table>

3. Click Continue.
4. On the Create Element: Basic Information page select the values shown in the table.
<table>
<thead>
<tr>
<th>Field or Question</th>
<th>Value</th>
</tr>
</thead>
<tbody>
<tr>
<td>Name</td>
<td>Bonus</td>
</tr>
<tr>
<td>Reporting Name</td>
<td>Bonus</td>
</tr>
<tr>
<td>Effective Date</td>
<td>01/01/2013</td>
</tr>
<tr>
<td>Should every person eligible for the element automatically receive it?</td>
<td>No</td>
</tr>
<tr>
<td>What is the earliest entry date for this element?</td>
<td>First Standard Earning Date</td>
</tr>
<tr>
<td>What is the latest entry date for the element?</td>
<td>Last Standard Earning Date</td>
</tr>
<tr>
<td>At which employment level should this element be attached?</td>
<td>Assignment Level</td>
</tr>
<tr>
<td>Does the element recur each payroll period, or does it require explicit entry?</td>
<td>Nonrecurring</td>
</tr>
<tr>
<td>Process the element only once in each payroll period?</td>
<td>Yes</td>
</tr>
</tbody>
</table>

> **Note:** All gross-up earnings elements must be processed and paid separately from other elements.

<table>
<thead>
<tr>
<th>Can a person have more than one entry of this element in a payroll period?</th>
<th>Yes</th>
</tr>
</thead>
<tbody>
<tr>
<td>Process and pay element separately or with other earnings elements?</td>
<td>Process separately and pay separately</td>
</tr>
<tr>
<td>Tax this earning across multiple pay periods?</td>
<td>No</td>
</tr>
<tr>
<td>Prorate this earning across all periods during which it was earned, and consider it for FLSA calculations, such as for commissions, bonuses, incentives, and other nondiscretionary earnings?</td>
<td>No</td>
</tr>
</tbody>
</table>

5. **Click Next.**

6. **On the Create Element: Additional Details page select the values shown in the table.**
Oracle Global Human Resources Cloud
Implementing Global Payroll

Chapter 11
Setting Up Elements

<table>
<thead>
<tr>
<th>Field or Question</th>
<th>Value</th>
</tr>
</thead>
<tbody>
<tr>
<td>What is the calculation rule?</td>
<td>Flat Amount</td>
</tr>
</tbody>
</table>

*Note: The default value is Flat Amount. Do not change this value. All gross-up earnings must have a calculation rule of Flat Amount.*

<table>
<thead>
<tr>
<th>What is the default periodicity of this element?</th>
<th>Periodically</th>
</tr>
</thead>
<tbody>
<tr>
<td>Periodicity Conversion Rule</td>
<td>Periodic Work Schedule Rate Annualized</td>
</tr>
<tr>
<td>How do you want the work units to be reported?</td>
<td>None</td>
</tr>
<tr>
<td>Is this element subject to retroactive changes?</td>
<td>No</td>
</tr>
<tr>
<td>Use this element to calculate a gross amount from a specified net amount?</td>
<td>Yes</td>
</tr>
<tr>
<td>Should this element be included in the earnings calculation of the FLSA overtime base rate?</td>
<td>No</td>
</tr>
<tr>
<td>Should this element be included in the hours calculation of the FLSA overtime base rate?</td>
<td>No</td>
</tr>
</tbody>
</table>

7. Click Next.
8. Click Submit.
9. In the Element Overview pane, select and review each input value, as shown in the table.

<table>
<thead>
<tr>
<th>Input Value</th>
<th>Description</th>
</tr>
</thead>
<tbody>
<tr>
<td>Pay Value</td>
<td>The gross pay value to be processed in the payroll run, entered by the iterative formula when it completes gross-up calculations.</td>
</tr>
<tr>
<td>Net</td>
<td>The user-entered flat amount, which provides the iterative formula with the desired net pay.</td>
</tr>
<tr>
<td>Low Gross</td>
<td>Used by the iterative formula to hold the lower gross pay guess, which feeds into the next iteration of the formula.</td>
</tr>
<tr>
<td>High Gross</td>
<td>Used by the iterative formula to hold the higher gross pay guess, which feeds into the next iteration of the formula.</td>
</tr>
<tr>
<td>Remainder</td>
<td>The amount by which the additional pay to be paid by the employer (gross minus desired net) differs from the total of the balances that are eligible for net-to-gross processing. This amount is returned by the iterative formula.</td>
</tr>
</tbody>
</table>
Creating Eligibility Rules

Perform the following steps to create eligibility rules:

1. In the Element Overview pane, click **Element Eligibility**.
2. Select **Create Element Eligibility** from the Actions menu.
3. In the Element Eligibility Name field, enter **Bonus**.
4. Click **Save**.

Reviewing Iterative Processing Order

Perform the following steps to review the iterative processing order:

1. In the Element Overview pane, click **Bonus**.
2. In the Advanced Rules section, review the iterative order.

   > **Note:** The default value is 1000. If you have more than one iterative element that may be processed in the same payroll flow, it is important to adjust the iterative order to indicate which should be processed first. Iterative order must be in the reverse sequence of the processing priority numbers. The element with the lowest iterative priority number is reduced first.

Including Balances in the Net-to-Gross Processing

Perform the following steps to include balances:

1. In the Element Overview pane, click **Balance Feeds**.
2. Review the balances to which the bonus contributes.
3. In the Element Overview pane, click **Gross Balance Exclusions**.
4. Add any balances that have been set to exclude by default if you want to include it on this specific earnings.
5. Click **Submit**.

Creating an Element Entry

In this example, create the element entry for the bonus for Linda Swift.

1. In the Payroll Calculation work area, select **Manage Element Entries**.
2. In the Name field, enter **Swift, Linda**.
3. In the Legislative Data Group field, select **US LDG**.
4. In the Effective As-of Date field, enter **01/01/2013**.
5. Click **Search**.
6. In the Search Results, select **Linda Swift**.
7. Click **Create**.

---

<table>
<thead>
<tr>
<th>Input Value</th>
<th>Description</th>
</tr>
</thead>
<tbody>
<tr>
<td>To Within</td>
<td>The amount by which actual net can differ from desired net after normal processing. This amount must not be zero but can be a nominal amount such as 0.01.</td>
</tr>
<tr>
<td>Additional Amount</td>
<td>The amount to add to the desired net to calculate gross pay. This amount is returned by the iterative formula.</td>
</tr>
</tbody>
</table>
8. In the Effective Date field, enter **01/01/2013**.
9. In the Element Name field, select **Bonus**.
10. In the Assignment field, select **E1026**.
11. Click **Continue**.
12. In the Net Value field, enter **1000.00**.

**Note:** If you want to pay a net-to-gross element, without the net-to-gross processing, add the flat amount in the Amount field. This amount will be the gross paid. It will be reduced by the applicable deductions.

13. In the To Within field, enter **.05**.
14. Click **Submit**.

**Related Topics**
- Balances in Net-to-Gross Calculations: Points to Consider

---

**Import File Formatting**

**File Format for Importing Absence Entries to Payroll**

When you submit the Load Absence Batches process, you specify the attachment for the XML file that contains the absence data. This topic explains the XML file format and XML tags you must use in the file.

You submit the Load Absence Batches process from the Payroll Administration work area. The process creates a new calculation card or updates an existing card for each worker whose absence information is transferred.

**XML File Format for Importing Absence Information to Payroll**

When you create a file to transfer absence information to payroll, use the following format.

```xml
<ABSENCE_LIST>
  <ABSENCE>
    <ABSENCE_TYPE>
      <ACTION>
        <ABSENCE_ID>
          <MAPPING_ID>
            <MAPPING_NAME>
              <LDG_ID>
                <LDG_NAME>
                  <HR_TERM_ID>
                    <TERM_NUMBER>
                      <HR_ASSIGNMENT_ID>
                        <ASSIGNMENT_NUMBER>
                          <ABSENCE_RATE_ID>
                            <ABSENCE_RATE_NAME>
                              <ABSENCE_UNIT>
                                <ABSENCE_UOM>
                                  <ADJUSTMENT_UNIT>
                                    <FACTOR>
                                      <CALCULATION_DATE>
                                        <PERIODICITY>
                                          <ABSENCE_START>
                                            <ABSENCE_END>
                                              <ABSENCE_DATE_LIST>
                                                <ABSENCE_DATE>
```

---

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XML Tags
This table describes the purpose of the tags used in the XML file.

<table>
<thead>
<tr>
<th>XML Tag</th>
<th>Description</th>
</tr>
</thead>
<tbody>
<tr>
<td>ABSENCE_LIST</td>
<td>Outermost tag that contains a set of absences.</td>
</tr>
<tr>
<td>ABSENCE</td>
<td>Tag containing information about a particular absence.</td>
</tr>
<tr>
<td>ABSENCE_TYPE</td>
<td>Type of absence that is being transferred to payroll, such as accrual,</td>
</tr>
<tr>
<td></td>
<td>accrual with entitlement, or entitlement.</td>
</tr>
<tr>
<td>ACTION</td>
<td>Type of action that will be performed, such as CREATE, REMOVE, and MODIFY.</td>
</tr>
<tr>
<td>ABSENCE_ID</td>
<td>Unique identifier for the absence from the source application. Never use</td>
</tr>
<tr>
<td></td>
<td>the same ID twice to identify another absence.</td>
</tr>
<tr>
<td>MAPPING_ID</td>
<td>Identifier for the payroll component definition, which is used to create</td>
</tr>
<tr>
<td></td>
<td>the absence in payroll.</td>
</tr>
<tr>
<td>MAPPING_NAME</td>
<td>Name used for the mapping.</td>
</tr>
<tr>
<td>LDG_ID</td>
<td>ID of the legislative data group associated with the record.</td>
</tr>
<tr>
<td>LDG_NAME</td>
<td>Name of the legislative data group associated with the record.</td>
</tr>
<tr>
<td>HR_TERM_ID</td>
<td>Unique ID for the HR period.</td>
</tr>
<tr>
<td></td>
<td>You can provide either the TERM_NUMBER or the HR_TERM_ID. If you provide</td>
</tr>
<tr>
<td></td>
<td>the TERM_NUMBER then you must also provide the legal employer details.</td>
</tr>
<tr>
<td>TERM_NUMBER</td>
<td>Number that identifies the employment periods for the absence.</td>
</tr>
<tr>
<td>HR_ASSIGNMENT_ID</td>
<td>This is the HR Assignments unique ID.</td>
</tr>
<tr>
<td></td>
<td>You can provide either the ASSIGNMENT_NUMBER or the HR_ASSIGNMENT_ID. If</td>
</tr>
<tr>
<td></td>
<td>you provide the ASSIGNMENT_NUMBER then you must also provide the legal</td>
</tr>
<tr>
<td></td>
<td>employer details.</td>
</tr>
<tr>
<td>ASSIGNMENT_NUMBER</td>
<td>Number that identifies the employment assignment for the absence.</td>
</tr>
</tbody>
</table>
## XML Tag Description

<table>
<thead>
<tr>
<th>XML Tag</th>
<th>Description</th>
</tr>
</thead>
<tbody>
<tr>
<td>ABSENCE_RATE_ID</td>
<td>Unique identifier for the absence rate.</td>
</tr>
<tr>
<td>ABSENCE_RATE_NAME</td>
<td>Name of the rate used to calculate the payment amount.</td>
</tr>
<tr>
<td>ABSENCE_UNIT</td>
<td>Unit of time in which the absence is recorded.</td>
</tr>
<tr>
<td>ABSENCE_UOM</td>
<td>Unit of measure being used for the absence (for example, days, hours or weeks).</td>
</tr>
<tr>
<td>ADJUSTMENT_UNIT</td>
<td>Unit of time in which an adjustment is being made to the absence.</td>
</tr>
<tr>
<td>FACTOR</td>
<td>Factor that is used in the calculation of the absence.</td>
</tr>
<tr>
<td>CALCULATION_DATE</td>
<td>Date used for payroll calculations, such as the payment calculation for maternity leave based on the baby’s due date.</td>
</tr>
<tr>
<td>PERIODICITY</td>
<td>Used with the amount or rate, the periodicity is the frequency that determines the absence rate.</td>
</tr>
<tr>
<td>ABSENCE_START</td>
<td>Date the absence started.</td>
</tr>
<tr>
<td>ABSENCE_END</td>
<td>Date the absence ended.</td>
</tr>
<tr>
<td>ABSENCE_DATE_LIST</td>
<td>List of dates in which the absence occurred.</td>
</tr>
<tr>
<td>ABSENCE_DATE</td>
<td>Date the absence is being reported.</td>
</tr>
<tr>
<td>LEAVE_DATE</td>
<td>Date on which the leave of absence occurred.</td>
</tr>
<tr>
<td>ACCRUE_DATE</td>
<td>Date on which the absence was accrued.</td>
</tr>
<tr>
<td>OVERRIDING_FACTOR</td>
<td>Factor that is being used to override the calculation of the absence.</td>
</tr>
<tr>
<td>OVERRIDING_RATE_ID</td>
<td>Unique identifier for the rate being used to override the absence.</td>
</tr>
<tr>
<td>OVERRIDING_RATE_NAME</td>
<td>Name of the overriding rate that will be used to calculate the absence.</td>
</tr>
<tr>
<td>OVERRIDING_UOM</td>
<td>Unit of measure being used to override the absence (for example, days, hours or weeks).</td>
</tr>
<tr>
<td>OVERRIDING_UNIT</td>
<td>Unit of time in which an override is being made to the absence.</td>
</tr>
</tbody>
</table>

**Related Topics**

- Importing Absence Entries to Payroll: Procedure
File Format for Importing Pension Deductions to Payroll

When you submit the Load Benefit Batches process, you specify the attachment for the XML file that contains the benefit data. This topic explains the XML file format and XML tags you must use in the file. You submit the Load Benefit Batches process from the Payroll Checklist or Payroll Administration work areas. The process creates a new calculation card or updates an existing card for each worker whose pension information is transferred.

XML File Format for Importing Pension Deductions to Payroll

When you create a file to transfer pension deduction information to payroll, use the following format.

```xml
<BENEFIT_LIST>
  <BENEFIT>...
    <ACTION>
      <BENEFIT_ID>
        <MAPPING_ID>
          <LDG_ID>
            <LDG_NAME>
            {...
              <HR_TERM_ID>
              <TERM_NUMBER>
              <HR_ASSIGNMENT_ID>
              <ASSIGNMENT_NUMBER>
            }
            <LEGAL_EMPLOYER_ID>
            <LEGAL_EMPLOYER_NAME>
          <BENEFIT_START>
            <BENEFIT_END>
            {...
              <BENEFIT_RATE_ID>
              <BENEFIT_RATE_NAME> | <AMOUNT>
              <PERIODICITY>
              <BENEFIT_MAX_ELECTION>
              <BENEFIT_REF_NUMBER>
            }
        </BENEFIT>
      </BENEFIT>
    </ACTION>
  </BENEFIT>
</BENEFIT_LIST>
```

XML Tags

This table describes the purpose of the tags used in the XML file.

<table>
<thead>
<tr>
<th>XML Tag</th>
<th>Description</th>
</tr>
</thead>
<tbody>
<tr>
<td>BENEFIT_LIST</td>
<td>Outermost tag that contains a set of benefits.</td>
</tr>
<tr>
<td>BENEFIT</td>
<td>Tag containing information about a particular benefit.</td>
</tr>
<tr>
<td>ACTION</td>
<td>The type of action that will be performed, such as CREATE, REMOVE, and MODIFY.</td>
</tr>
<tr>
<td>BENEFIT_ID</td>
<td>Unique identifier for the benefit from the source application. Never use the same ID twice to identify another benefit.</td>
</tr>
<tr>
<td>MAPPING_ID</td>
<td>Identifier for the payroll component definition, which is used to create the benefit in payroll.</td>
</tr>
</tbody>
</table>
### XML Tag | Description
--- | ---
LDG_ID | ID of the legislative data group associated with the record.
LDG_NAME | Name of the legislative data group associated with the record.
HR_TERM_ID | Unique ID for the employment period.
TERM_NUMBER | Number that identifies the employment period for the pension deduction.
HR_ASSIGNMENT_ID | Unique ID for the assignment.
ASSIGNMENT_NUMBER | Number that identifies the employment assignment for the pension deduction.
LEGAL_EMPLOYER_ID | ID of the legal employer name that the assignment belongs to.
LEGAL_EMPLOYER_NAME | Legal employer name that the assignment belongs to.
BENEFIT_START | Start date of the benefit.
BENEFIT_END | End date of the benefit.
BENEFIT_RATE_ID | ID of the rate that will be used to calculate the payment amount.
BENEFIT_RATE_NAME | Name of the rate that will be used to calculate the payment amount.
AMOUNT | Amount that is used to calculate the rate using the periodicity.
PERIODICITY | Used with the amount or rate, the periodicity is the frequency that determines the rate value.
BENEFIT_MAX_ELECTION | Annual maximum election amount that can be processed.
BENEFIT_REF_NUMBER | Employee’s reference number with the provider of the pension (benefit organization).

**Related Topics**
- Running the Load Benefit Batches Process: Procedure
File Format for Importing Time Entries to Payroll

You import time entries from a third-party provider by submitting the Load Time Card Batches process from the Payroll Checklist or Payroll Administration work areas. When you submit the process, you specify the batch XML file that includes your time entries. This topic explains the XML file format and XML tags you must use in the file.

You submit the Load Time Card Batches process from the Payroll Administration work area. The process creates a new calculation card or updates an existing card for each worker with time entries included in the batch.

XML File Format for Importing Time Entries

When you create a file to transfer time card entries to payroll, use the following structure.

```xml
<TIME_CARD_LIST>
  <TIME_CARD>...
    <ACTION>
      <TIME_CARD_ID>
        <MAPPING_ID>
          <MAPPING_NAME>
            <LDG_ID>
              <LDG_NAME>
                <HR_TERM_ID>
                  <TERM_NUMBER>
                    <HR_ASSIGNMENT_ID>
                      <ASSIGNMENT_NUMBER>
                        <LEGAL_EMPLOYER_ID>
                          <LEGAL_EMPLOYER_NAME>
                            <TIME_CARD_START>
                              <TIME_CARD_END>
                                <TIME_ITEM_LIST>...
                                    <TIME_ITEM>
                                      <TIME_TYPE>
                                        {<PAYMENT_RATE_ID>
                                          <PAYMENT_RATE_NAME> |<PAY_RATE_AMOUNT>
                                          <PERIODICITY>
                                          <FACTOR> |<AMOUNT>
                                          <PERIODICITY>
                                        }
                                      <TIME_UNIT>
                                        <TIME_UOM>
                                          <TIME_ITEM_START>
                                          <TIME_ITEM_END>
                                            <COST_SEGMENTS>
                                              <SEGMENT1..30>
                                            </COST_SEGMENTS>
                                          <PROPERTIES_LIST>...
                                            <PROPERTY_ITEM>
                                              <NAME>
                                              <VALUE>
                                            </PROPERTY_ITEM>
                                          </PROPERTIES_LIST>
                                        </TIME_ITEM>
                                        <TIME_ITEM_LIST>
                                        <TIME_CARD>
                                        </TIME_CARD_LIST>
```
## XML Tags

This table describes the purpose of the tags used in the XML file.

<table>
<thead>
<tr>
<th>XML Tag</th>
<th>Description</th>
</tr>
</thead>
<tbody>
<tr>
<td>TIME_CARD_LIST</td>
<td>Parent tag that contains a set of time cards.</td>
</tr>
<tr>
<td>TIME_CARD</td>
<td>Object that contains the information about a specific time card.</td>
</tr>
<tr>
<td>ACTION</td>
<td>Action to perform, such as CREATE, REMOVE, MODIFY.</td>
</tr>
<tr>
<td>TIME_CARD_ID</td>
<td>Unique identifier for this time card.</td>
</tr>
<tr>
<td>MAPPING_ID</td>
<td>Identifier for the payroll component definition.</td>
</tr>
<tr>
<td></td>
<td>Specify the Mapping ID or the Mapping Name. If none is included, the process uses the default interface type Import Time XML and attempts to find a mapping.</td>
</tr>
<tr>
<td>MAPPING_NAME</td>
<td>Name used for the mapping.</td>
</tr>
<tr>
<td></td>
<td>Specify the mapping name or the mapping ID. If none is included, the process uses the default interface type Import Time XML and attempts to find a mapping.</td>
</tr>
<tr>
<td>LDG_NAME</td>
<td>Name of the legislative data group (LDG) for this record.</td>
</tr>
<tr>
<td></td>
<td>Specify the identifier or name of the LDG. All the records in the XML file must belong to the same LDG. If you don’t include the LDG_ID or the LDG_NAME, the application uses the legislative data group you entered for the Load Time Card Batches process.</td>
</tr>
<tr>
<td>LDG_ID</td>
<td>Identifier for the LDG for this record.</td>
</tr>
<tr>
<td></td>
<td>Specify the identifier or name of the LDG. All the records in the XML file must belong to the same LDG. If you don’t include the LDG_ID or the LDG_NAME, the application uses the LDG you entered for the Load Time Card Batches process.</td>
</tr>
<tr>
<td>TERM_NUMBER</td>
<td>Number that identifies the employment terms for the time entry.</td>
</tr>
<tr>
<td>ASSIGNMENT_NUMBER</td>
<td>Number that identifies the employment assignment for the time entry.</td>
</tr>
<tr>
<td>TIME_CARD_START</td>
<td>Start date of the time card.</td>
</tr>
<tr>
<td>TIME_CARD_END</td>
<td>End date of the time card.</td>
</tr>
<tr>
<td>TIME_ITEM_LIST</td>
<td>Tag that contains a set of time items.</td>
</tr>
<tr>
<td>TIME_ITEM</td>
<td>Object that contains information about a specific hour item.</td>
</tr>
<tr>
<td>TIME_TYPE</td>
<td>Name supplied by the time application that maps to the payroll element and calculation component.</td>
</tr>
</tbody>
</table>
Setting Up Elements

<table>
<thead>
<tr>
<th>XML Tag</th>
<th>Description</th>
</tr>
</thead>
<tbody>
<tr>
<td>PAYMENT_RATE_ID</td>
<td>Identifier for the rate definition used to calculate the payment amount.</td>
</tr>
<tr>
<td>PAYMENT_RATE_NAME</td>
<td>Name of the rate definition used to calculate the payment amount.</td>
</tr>
<tr>
<td>RATE_AMOUNT</td>
<td>Actual rate used to calculate the payroll amount.</td>
</tr>
<tr>
<td>AMOUNT</td>
<td>Flat amount used to calculate the rate based on periodicity.</td>
</tr>
<tr>
<td>PERIODICITY</td>
<td>Frequency that determines the rate value, used with amount or rate amount.</td>
</tr>
<tr>
<td>FACTOR</td>
<td>Multiplier applied to the derived rate to calculate the payment amount.</td>
</tr>
<tr>
<td>TIME_UNIT</td>
<td>Number of units for the Unit of Measure specified in TIME_UOM. For example, if the UOM is hours, 8 units is 8 hours worked.</td>
</tr>
<tr>
<td>TIME_UOM</td>
<td>Unit of measure for specifying time unit, such as hours.</td>
</tr>
<tr>
<td>TIME_ITEM_START</td>
<td>Start time for the time entry.</td>
</tr>
<tr>
<td>TIME_ITEM_END</td>
<td>Ending time for the time entry.</td>
</tr>
<tr>
<td>COST_SEGMENTS</td>
<td>List of the costing segments.</td>
</tr>
<tr>
<td>PROPERTY_LIST</td>
<td>Set of properties for the time item.</td>
</tr>
<tr>
<td>PROPERTY_ITEM</td>
<td>Additional information that is captured. For example, a value definition for the property item State would return State and the name of the State.</td>
</tr>
<tr>
<td>NAME</td>
<td>Name of a property for the time item.</td>
</tr>
<tr>
<td>VALUE</td>
<td>Value of a property for the time item.</td>
</tr>
</tbody>
</table>

Related Topics

- Prerequisite Payroll Setup for Importing Time Entries: Explained
- Importing Time Card Entries to Payroll: Procedure

Setting Up Payroll Processing Rules
Frequency Rules: Explained

Use frequency rules to process a recurring element at a frequency other than the one defined for the payroll. For example, you can use a frequency rule to process a monthly deduction in the third payroll period of the month for employees that are paid on a weekly basis. For employees that are paid on a semimonthly payroll, you can use a frequency rule to process the monthly deduction in the second period of the month only.

For these cases, you would define a different frequency rule for each element.

You can control how often to process the element. Column headers that display on the Element Summary page are dynamic based on the frequency period. For example, if the payroll period is weekly, the column headers are Week 1, Week 2, and so on. You then select the periods in which you want the element processed.

Controlling the Processing of Recurring Elements

The Date field on the Element Summary page provides three values.

This table explains the three options that you can use to control the processing of recurring elements.

<table>
<thead>
<tr>
<th>Field Value</th>
<th>Description</th>
<th>How Pay Periods are Derived</th>
</tr>
</thead>
<tbody>
<tr>
<td>Date Earned</td>
<td>Date on which the application processes element entries for the payroll run.</td>
<td>Uses the pay period end date of the period that contains the date earned to determine the number of pay periods in the month.</td>
</tr>
<tr>
<td>Effective Date</td>
<td>In most cases this is the date between the first day and last day of the payroll period.</td>
<td>Uses the pay period end date of the period that contains the effective date to determine the number of pay periods in the month.</td>
</tr>
<tr>
<td>Payroll Run Date</td>
<td>Date used by the payroll calculation process to retrieve effective values such as employee details.</td>
<td>Uses the payroll run date to determine the number of pay periods in the month.</td>
</tr>
</tbody>
</table>

Note: For offset payrolls, where the effective date is not within the start and end dates of the current period, the end date of the period that contains the effective date is used.

For example, you have an offset payroll where the period start date is 01-February, the end date is 14-February, and the effective date for the process is 16-February. In this case the actual period end date is 28-February because the effective date (16-February) is between 15-February and 28-February.

Note: While the payroll run date is essentially the same as the effective date, the frequency rules process uses a different method to determine the number of the period in the month.
Using the Payroll Run Date Option: Example

Let’s say you deduct pre-tax medical insurance payments twice a month for all employees on your biweekly payroll. In this scenario, you should select the Payroll Run Date option. Selecting this option ensures that your payroll system doesn’t process more than two deductions for the month.

The pay period dates listed in this table are for a biweekly payroll.

<table>
<thead>
<tr>
<th>Pay Period</th>
<th>Pay Period Start Date</th>
<th>Pay Period End Date</th>
<th>Payroll Run Date</th>
</tr>
</thead>
<tbody>
<tr>
<td>3</td>
<td>16-January-2016</td>
<td>29-January-2016</td>
<td>3-February-2016</td>
</tr>
</tbody>
</table>

This table describes how the process determines the number of deductions taken for each of the date values when you process your January payroll.

<table>
<thead>
<tr>
<th>Field Value</th>
<th>Date Used to Derive the Number of Pay Periods</th>
<th>Number of Deductions Taken for January</th>
</tr>
</thead>
<tbody>
<tr>
<td>Date Earned</td>
<td>Pay period end date</td>
<td>3</td>
</tr>
<tr>
<td>Effective Date</td>
<td>Pay period end date</td>
<td>3</td>
</tr>
<tr>
<td>Payroll Run Date</td>
<td>Payroll run date</td>
<td>2</td>
</tr>
</tbody>
</table>

**Note:** Deductions would be taken out for the first two pay periods only since the payroll run date for the third pay period is in February.

Restricting Payroll Processing: Critical Choices

You can control which payroll relationships and which elements to process in a payroll run by selecting rules, such as a skip rule or frequency rule. You can also restrict the payroll relationships and further restrict the elements that the run will process by specifying flow parameters when you submit the calculation process, such as Calculate Payroll or Calculate Gross Earnings.

Restrict the Elements to Process Based on Rules

When you create an element, you specify eligibility rules that control who is eligible to receive an element. You can also create skip and frequency rules that control which recurring elements the payroll run processes, as shown in the following table.
<table>
<thead>
<tr>
<th>Rules</th>
<th>Descriptions</th>
<th>Examples</th>
</tr>
</thead>
<tbody>
<tr>
<td>Skip</td>
<td>Determines whether to include or exclude the element entry for the person using rules in a formula</td>
<td>A once-each-period rule stops recurring element entries from processing more than once in a payroll period.</td>
</tr>
<tr>
<td>Frequency</td>
<td>Specifies which payroll periods to process the entries</td>
<td>A frequency rule might specify that the formula processes an element only on the first and third weeks of a month.</td>
</tr>
</tbody>
</table>

### Restrict the Records to Process Based on Flow Parameters

Restrict the number of records for the calculation process by specifying flow submission parameters as shown in the following table.

<table>
<thead>
<tr>
<th>Parameter</th>
<th>Description</th>
</tr>
</thead>
<tbody>
<tr>
<td>Payroll Relationship Group</td>
<td>Restricts processing to the payroll relationships within the group, which you can define using static or dynamic rules, based on payroll relationship or assignment information.</td>
</tr>
<tr>
<td>Element Group</td>
<td>Restricts processing to the elements in the group, which you can define by selecting element classifications and including or excluding specific elements.</td>
</tr>
</tbody>
</table>
| Run Types                  | Determines which payroll calculations to perform and how to pay the results. The application processes an element in all the run types, unless you set up the element:  
  - To process separately  
  - As a trigger for a run type, in which case it is automatically excluded from the other run types |

The flow submission parameters for the calculation process include dates that control which records to process as shown in the following table.

<table>
<thead>
<tr>
<th>Date</th>
<th>Required?</th>
<th>Comments</th>
</tr>
</thead>
<tbody>
<tr>
<td>Process Date</td>
<td>No</td>
<td>Usually the payroll run date of your payroll definition.</td>
</tr>
<tr>
<td>Payroll Period</td>
<td>Yes</td>
<td>Used to derive other dates for processing.</td>
</tr>
</tbody>
</table>
| Date Earned   | Yes       | Identifies the element entries                                            
  - To include in the payroll run  
  - That belong to a proration group and ended within the payroll period |

**Related Topics**

- **Object Groups: Explained**
FAQs for Elements

What's the difference between a recurring and nonrecurring element?

A recurring element has an entry that applies in every pay period until the entry is ended.

A nonrecurring element has an entry that applies in one pay period only. It’s only processed once per pay period. The payroll to which the person is assigned determines the dates of the pay period.

> Note: A base pay element associated with a salary basis must be recurring.

What's an element's skip rule?

A skip rule is an optional formula that determines the circumstances in which an element is processed. If you specify a skip rule for the element, payroll runs process the element only when the conditions of the formula are met. Otherwise the element is skipped from processing. You select skip rules on the Manage Elements page.

Related Topics
  * Using Formula Components: Explained

How can I create an element for retroactive processing?

When you create the element, specify that it’s subject to retroactive changes. You can select the predefined retroactive event group for the element, or create your own. When an element is subject to retroactive changes, all components for the retroactive element are created automatically. This includes adding the element to the predefined retroactive event group and proration group. You can create your own retroactive event group and proration event group and change the default values for the element in the Manage Element flow.

When does an element get processed with a processing option of process once per period?

The first payroll run of each period processes the element entries. If this option isn’t available for your country or territory, you can select a skip rule to process the element once each period.

What happens if I select the Closed for Entry option for an element?

This option prevents the creation of all new element entries for the element. However, it doesn’t affect any existing element entries.
A Caution: When hiring, terminating, or updating assignments, this option prevents all element entry creation for the element, including automatic entries.

Related Topics

• Element Entry Methods: Explained

What happens if I manually enter a value in an element entry value that has a runtime default value?

Any subsequent changes to the default value on the element or element eligibility record won’t affect the element entry. However, you can clear your entry if you want to restore the default value.

How do I change the number of decimal places used in element input values?

Monetary input values use the number of decimal places defined for the currency, such as two for USD. If your calculations require more decimal places, select a numeric unit of measure for the input value. The level of decimal precision that you specify must match the precision value set on the Manage Currency page for the country. This ensures that the payroll processes and reports used for reconciliation and legislative reporting produce the expected results.
12 Setting Up Payment Methods

Organization Payment Methods

Organization Payment Methods: Explained

You must create one organization payment method for each combination of legislative data group, payment type, and currency that you use to disburse wages and other compensation. You can also create rules for validating or processing the distribution of payments. Create as many organization payment methods as required for your enterprise. Use the Manage Organization Payment Methods page in the Payment Distribution work area.

Important aspects of organization payment methods are:

- Payment types
- Payment sources
- Payment rules

Payment Types

When creating an organization payment method, you select a payment type.

The most common payment types are:

- Electronic funds transfer (EFT)
- Check
- Cash

The exact list of payment types and their names can vary by country. Your enterprise may support a different range of types that are appropriate for your localization. For example, in the US, the payment type for EFT is Direct Deposit; in the UK it’s BACS, and in Australia it’s BECS.

Tip: When selecting the EFT payment type, you can enter EFT information at the payment method level, the payment source level, or both. Entries at the payment source level take priority over entries at the organization payment level. For example, if you define details at the payment source level, then to use those details when processing payments, you must enter the payment source when submitting the payment process.

Payment Sources

If you’re using Oracle Fusion Global Payroll for payroll processing, you must define at least one payment source for each organization payment method. Oracle recommends one organization payment method, per payment type, per currency. Each payment source must be associated with an active bank account in Oracle Fusion Cash Management. If you define additional details at the payment source level, then to use those details when processing payments, you must enter the payment source name when submitting the payment process.

You can use the same bank account in different payment sources in more than one organization payment method, as illustrated in the following example.
### Payment Rules and Default Payment sources

If you define multiple payment sources, you can use payment rules to determine the appropriate payment source based on tax reporting unit (TRU).

The following example shows one organization payment method with three different payment sources for different TRUs.

<table>
<thead>
<tr>
<th>Payment Source</th>
<th>Tax Reporting Unit</th>
<th>Default Payment Source</th>
</tr>
</thead>
<tbody>
<tr>
<td>Payroll EFT Source US</td>
<td>None</td>
<td>Yes</td>
</tr>
<tr>
<td>Bank A - Account 7890045</td>
<td></td>
<td></td>
</tr>
<tr>
<td>Payroll EFT Source California</td>
<td>California TRU</td>
<td>No</td>
</tr>
<tr>
<td>Bank B - Account 1238900</td>
<td></td>
<td></td>
</tr>
<tr>
<td>Payroll EFT Source Texas</td>
<td>Texas TRU</td>
<td>No</td>
</tr>
<tr>
<td>Bank C - Account 8765999</td>
<td></td>
<td></td>
</tr>
</tbody>
</table>

The first payment source that you add is the default payment source, but you can select another payment source as the default, or not have a default payment source.

To understand the effect of having a default payment source, consider the following examples that describe what happens when a TRU changes, causing a payment rule to be invalid.

<table>
<thead>
<tr>
<th>Approach</th>
<th>Example</th>
</tr>
</thead>
<tbody>
<tr>
<td>With a default payment source, the payment process pays employees using the default payment source.</td>
<td>This approach might suit a company with multiple independent franchises, each with its own TRU. If a franchise holder sells the franchise, payments don’t fail.</td>
</tr>
<tr>
<td>Without a default payment source, the payments process issues error notifications to ensure that you use the appropriate payment source to fund the payment.</td>
<td>This approach might suit a company with strict policies about payment rule compliance.</td>
</tr>
</tbody>
</table>
Payment Methods and Payroll Definitions: How They Work Together

You select organization payment methods when creating other objects, such as payroll definitions, third-party payment methods, and personal payment methods. This topic describes the functional relationship between organization payment methods and the objects that use them.

Functional Relationships

The following table describes the functional relationship of organization payment methods with other objects.

<table>
<thead>
<tr>
<th>Object</th>
<th>Function</th>
</tr>
</thead>
<tbody>
<tr>
<td>Personal Payment Method</td>
<td>Associates a person to a payment method, currency, and payment source.</td>
</tr>
<tr>
<td>Third-Party Payment Method</td>
<td>Enables separate payment information for payments to third parties who aren't on the payroll. Payments to third parties, such as garnishments or other involuntary deductions, are typically processed separately from the payroll.</td>
</tr>
<tr>
<td>Payroll Definition</td>
<td>Establishes the default payment method for payments to employees who have no personal payment method defined.</td>
</tr>
<tr>
<td>Run-Type Payment Method</td>
<td>Overrides a payroll’s default payment method for payments to employees with no personal payment method defined. For example, your regular payroll is by EFT but you issue check bonuses once a year. Using the Separate Payment run type, the payment method overwrites the default payment method of the payroll.</td>
</tr>
</tbody>
</table>

Note: You can’t set EFT payment methods as default payment methods because each payee must have a personal payment method with account information to know where to deposit the money.

Related Topics

- Payroll Definitions: Explained
- Creating Third-Party Payment Methods: Procedure

Configuring Payment Method Preferences: Procedure

You can configure preferences related to payment methods using a user-defined table and fast formulas. After you create your formulas for the configuration that you require, you attach formula names as values for the corresponding preferences in the user-defined table.

1. Use the Manage Fast Formulas task to create the formula using the Payroll User Interface Configuration formula type.
2. On the Manage User-Defined Tables page, select the legislative data group that you to manage the user-defined table, and then search for and select PAYROLL_USER_INTERFACE_CONFIGURATION.
3. Click **Edit**, and then click Next.
4. On the User-Defined Table Values page, click **Add** and select the row for one of the values, and then click **OK**.

<table>
<thead>
<tr>
<th>Value</th>
<th>Purpose</th>
</tr>
</thead>
<tbody>
<tr>
<td>Default Organization Payment Method</td>
<td>Controls which payment methods can be created using the simplified user interface.</td>
</tr>
<tr>
<td>Execute Personal Payment Method Validation</td>
<td>Enables validations for personal payment methods that meet the criteria set in the formula. For example, an employee can only create one personal payment method with the Pay Card account type.</td>
</tr>
<tr>
<td>Maximum Number of Personal Payment Methods</td>
<td>Limits the number of personal payment methods that employees can create.</td>
</tr>
<tr>
<td>Payment Types Available to Workers</td>
<td>Limits personal payment methods to be based only on organization payment methods of the specified payment types.</td>
</tr>
<tr>
<td>Prevent Edit Personal Payment Method</td>
<td>Prevents employees from modifying any personal payment method details that meet the criteria set in the formula, such when the account type is equal to Pay Card.</td>
</tr>
<tr>
<td>Show Percentage or Amount</td>
<td>Sets a restriction to display only the Percentage amount type and field on the Manage Personal Payment Methods page.</td>
</tr>
</tbody>
</table>

5. In the Value field, enter the name of your formula. You must enter the formula name exactly as you created it on the Manage Fast Formulas page.

**Note:** Each preference that you configure must have its own formula.

Payment Method Rules: Examples

The following scenarios illustrate how you might use payment method rules to handle payments to different parties and from different payment sources. You set payment method rules on the Manage Organization Payment Methods page in the Payment Distribution work area.

**Pay Workers and Third Parties Using the Same Payment Source**

Your organization pays all workers and third-party payees from the same source bank account. In this scenario, no special payment method rules are required. Ensure that the payment source is set as the default and that you leave the Third-Party Payment, Tax Reporting Unit, and Payment Criteria fields blank.

**Pay Workers and Third Parties in a Specified TRU Using a Separate Payment Source**

Your enterprise is based in California, but you have some workers in Texas. To comply with California state regulations for out-of-state payments, you specify a payment source for the Texas tax reporting unit (TRU). In this scenario, your payment...
source for California is already set as the default payment source, so no change is needed for California. For the Texas employees:

1. Add a payment method rule.
2. Select the Texas TRU.
3. Select the Texas payment source.

Pay Workers and Third Parties in the Same TRU Using Separate Payment Sources

You currently pay everyone in your TRU using Payment Source A. Your company recently employed a private consultant, Jon Moore, from a third-party auditing company. A new company requirement states that payments must come from a new payment source, Payment Source B. For this scenario:

1. Create John as a third-party person payee.
2. In your organization payment method, add the Payment Source B payment source and a new payment method rule.
3. In the payment method rule, select the Third-Party Payment check box, Jon’s name as the third-party person to pay, and Payment Source B.

Pay Workers in a Specified Department Using a Separate Payment Source

You want to pay employees in the Sales and Development departments using different payment sources. For this scenario:

1. Create a payment method rule for each department.
2. Enter the department name in the Payment Criteria field.
3. Select the TRU and payment source.

This scenario has the following prerequisites:

- An information element exists named Default Payer with an input value named Payment Criteria.
- A formula exists that retrieves department names and the assignment IDs of the employees associated with them.
- The processing rules in the Default Payer element refer to the formula. The result rules target field is set to Payment Criteria. The returned field is set to the value specified in the formula.

Setting Up Payment Sources in Organization Payment Methods: Worked Example

This example demonstrates how to set up payment sources when creating organization payment methods (OPMs) for payroll processing. You set up payment sources through the Manage Organization Payment Methods task.

In this example, the InFusion US company pays its workers by electronic funds transfer (EFT) payments. To comply with state regulations for out-of-state payments, the company sets payment rules to pay from two different banks based on tax reporting unit (TRU). The following table summarizes the key decisions for this scenario.

<table>
<thead>
<tr>
<th>Decisions to Consider</th>
<th>In This Example</th>
</tr>
</thead>
<tbody>
<tr>
<td>How many OPMs do you need?</td>
<td>One method to pay by EFT in US dollars.</td>
</tr>
<tr>
<td>How many payment sources do you need?</td>
<td>Three. One default payment source for the US, one source for payments in Texas, and one source for payments in California.</td>
</tr>
<tr>
<td>How many bank accounts do you need?</td>
<td>Three. One for each payment source.</td>
</tr>
</tbody>
</table>
Decisions to Consider  |  In This Example
--- | ---
What payment method rules do you need? | Rules for bank accounts used as payment sources based on TRU.

Summary of Tasks
This worked example includes details for the following tasks you perform when creating OPMs:

1. Creating the basic details
2. Adding EFT file information
3. Setting up payment sources
4. Creating payment rules

Prerequisites
This worked example assumes that the following tasks are complete:

1. The primary ledger is set up in Oracle Cloud General Ledger.
2. The banks, branches, and account information to use as the payment sources are set up in Oracle Cloud Cash Management.
3. The legal entity associated with the legislative data group is assigned to a general ledger.
4. TRUs are set up.

Creating the Basic Details

1. In the Payment Distribution work area, click Manage Organization Payment Methods.
2. In the Search Results section, click Create.
3. Select the legislative data group, for example, InFusion US LDG.
4. Select the date when you want this payment method to be available for use, and then click Continue.

Tip: Select a date that is on or before the effective date of the payroll definition or other objects that use this payment method.

5. In the Basic Details section, complete the fields as shown in this table and then click Save.

<table>
<thead>
<tr>
<th>Field</th>
<th>Value</th>
</tr>
</thead>
<tbody>
<tr>
<td>Name</td>
<td>Payroll Direct Deposit US</td>
</tr>
<tr>
<td>Payment Type</td>
<td>Direct Deposit</td>
</tr>
</tbody>
</table>

Note: The available payment types for OPMs can vary by legislation.

| Currency        | US Dollar           |

6. Click Save.

Adding EFT File Information
When you select the EFT payment type, you can enter EFT information at the following levels:
Note: EFT file information entered at the payment source level takes priority over information entered at the organization payment method level

1. Payment source level
2. Organization payment method level
3. Both levels

Setting Up Payment Sources
Perform the following steps three times to create each payment source.

1. In the Payment Sources section under Payment Source Information, click Create.
2. On the Create Payment Source page, complete the fields in order, as shown in this table, and then click Continue.

<table>
<thead>
<tr>
<th>Field</th>
<th>US Value</th>
<th>Texas Value</th>
<th>California Value</th>
</tr>
</thead>
<tbody>
<tr>
<td>Name</td>
<td>Payroll EFT Source US</td>
<td>Payroll EFT Source Texas</td>
<td>Payroll EFT Source California</td>
</tr>
<tr>
<td>Bank Account Name</td>
<td>Bank A</td>
<td>Bank B</td>
<td>Bank C</td>
</tr>
<tr>
<td>Bank Reference</td>
<td>123456789</td>
<td>234567890</td>
<td>345678901</td>
</tr>
<tr>
<td>Company Reference</td>
<td>456789012</td>
<td>567890123</td>
<td>678901234</td>
</tr>
</tbody>
</table>

Tip: Keep your payment source names unique and as specific as possible for each scenario. This naming convention helps when managing complicated combinations of OPMs and payment rules.

Creating Payment Rules
1. In the Payment Method Rules section, for Payroll EFT Source US, ensure that the default setting is Yes.
2. In the same section, click Create and select the values shown in this table to create two payment rules that map a payment source to a TRU.

<table>
<thead>
<tr>
<th>Field</th>
<th>Texas Value</th>
<th>California Value</th>
</tr>
</thead>
<tbody>
<tr>
<td>Default</td>
<td>No</td>
<td>No</td>
</tr>
<tr>
<td>Tax Reporting Unit</td>
<td>Texas TRU</td>
<td>California TRU</td>
</tr>
<tr>
<td>Payment Source</td>
<td>Payroll EFT Source Texas</td>
<td>Payroll EFT Source California</td>
</tr>
</tbody>
</table>

3. Click Submit.
Deriving Payment Sources by Department: Worked Example

You can use payment criteria to set up rules that derive payment sources within a single tax reporting unit (TRU). The prepayments process identifies the source bank information using the employee’s TRU and any additional payment criteria that you define. This example uses department, but you can use other criteria, such as business unit.

The tasks to complete this setup are Manage Organization Payment Method, Manage Elements, and Manage Fast Formulas. The key steps in this example are:

1. Define the payment rules in the organization payment method.
2. Create the formula to get department names from HR.
3. Create the formula that calls the department names formula to get employee department by Assignment ID.
4. Create the Default Payer information element.

In this example, the enterprise wants to pay employees in the Sales and Development departments from separate payment sources. You create an element to pass the department name as a run result value.

Defining Payment Rules

1. On the Manage Organization Payment Method page, in the Payment Sources section, create the payment sources to use in the payment rules, if they don’t already exist.
2. In the Payment Method Rules section, add one payment rule for each department, as shown in this table.

<table>
<thead>
<tr>
<th>Field</th>
<th>Development Department</th>
<th>Sales Department</th>
</tr>
</thead>
<tbody>
<tr>
<td>Tax Reporting Unit</td>
<td>First America</td>
<td>First America</td>
</tr>
<tr>
<td>Payment Criteria</td>
<td>Development</td>
<td>Sales</td>
</tr>
<tr>
<td>Payment Source</td>
<td>HSBC New York</td>
<td>HSBC Boston</td>
</tr>
</tbody>
</table>

Creating the Department Formula

Use the following steps to create the formula that retrieves the database items from HR for department names.

1. On the Manage Fast Formulas page, create the formula with values as shown in this table.

<table>
<thead>
<tr>
<th>Field</th>
<th>Value</th>
</tr>
</thead>
<tbody>
<tr>
<td>Formula Name</td>
<td>XX_ Employee_ Department</td>
</tr>
<tr>
<td>Formula Type</td>
<td>Payroll Access to HR</td>
</tr>
<tr>
<td>Description</td>
<td>Formula to return the department of an employee</td>
</tr>
<tr>
<td>Effective Date</td>
<td>01/01/1951</td>
</tr>
</tbody>
</table>

Note: Enter the same date used to create elements during implementation.
2. In the **Formula Text** section, enter the following content:

   ```
   Default for PER_ASG_ORG_DEPARTMENT_NAME is ''
   l_dept_output = PER_ASG_ORG_DEPARTMENT_NAME
   Return l_dept_output
   ```

3. Click **Submit**.
4. Click **Compile**.

### Creating the Payment Criteria Formula

Use the following steps to create the formula that retrieves the departments for employees to use as payment criteria values.

1. On the Manage Fast Formulas page, create the formula with values as shown in this table.

<table>
<thead>
<tr>
<th>Field</th>
<th>Value</th>
</tr>
</thead>
<tbody>
<tr>
<td>Formula Name</td>
<td>XX_Default_Payer_Payment_Criteria</td>
</tr>
<tr>
<td>Formula Type</td>
<td>Oracle Payroll</td>
</tr>
<tr>
<td>Description</td>
<td>Formula to use the returned Department database item as Payment Criteria input for Default Payer element.</td>
</tr>
<tr>
<td>Effective Date</td>
<td>01/01/1951</td>
</tr>
</tbody>
</table>

   **Note:** Enter the same date used to create elements during implementation.

2. In the **Formula Text** section, enter the following content:

   ```
   Default for ASG_HR_ASG_ID is 0
   SET_INPUT('HR_ASSIGNMENT_ID', ASG_HR_ASG_ID)
   EXECUTE('XX_Employee_Department') /* Formula to retrieve the Employee Department. */
   Emp_Dept = GET_OUTPUT('l_dept_output','Null')
   Return Emp_Dept
   ```

3. Click **Submit**.
4. Click **Compile**.

### Creating the Default Payer Element

Perform the following steps to create the Default Payer element with the Payment Criteria input value, and automatic element eligibility.

1. On the Manage Elements page, create an element using the Information primary classification and the values shown in this table, and then submit your changes.

<table>
<thead>
<tr>
<th>Field</th>
<th>Value</th>
</tr>
</thead>
<tbody>
<tr>
<td>Name</td>
<td>Default Payer</td>
</tr>
</tbody>
</table>

   The name must match exactly. This name is how the application identifies any existing payment criteria.
Chapter 12
Setting Up Payment Methods

### Oracle Global Human Resources Cloud
Implementing Global Payroll

<table>
<thead>
<tr>
<th>Field</th>
<th>Value</th>
</tr>
</thead>
<tbody>
<tr>
<td><strong>Reporting Name</strong></td>
<td>Default Payer</td>
</tr>
<tr>
<td><strong>Effective Date</strong></td>
<td>01/01/1951</td>
</tr>
</tbody>
</table>

**Note**: Enter the same date used to create other elements during implementation.

<table>
<thead>
<tr>
<th>Field</th>
<th>Value</th>
</tr>
</thead>
<tbody>
<tr>
<td>What is the earliest entry date for this element?</td>
<td>First Standard Earnings Date</td>
</tr>
<tr>
<td>What is the latest entry date for this element?</td>
<td>Last Standard Process Date</td>
</tr>
</tbody>
</table>

2. Edit the new element to create an input value named Payment Criteria as follows:
   a. In the Element Overview section, click **Input Values**, and then select **Create Input Values** from the Actions menu.
   b. Enter values as shown in this table.

<table>
<thead>
<tr>
<th>Field</th>
<th>Value</th>
</tr>
</thead>
<tbody>
<tr>
<td><strong>Name</strong></td>
<td>Payment Criteria</td>
</tr>
<tr>
<td><strong>Display Sequence</strong></td>
<td>10</td>
</tr>
<tr>
<td><strong>Unit of Measure</strong></td>
<td>Character</td>
</tr>
</tbody>
</table>

   c. Click **Save**.

3. Edit the new element to create element eligibility that is set to automatic entry as follows:
   a. In the Element Overview section, click **Element Eligibility**, and then select **Create Element Eligibility** from the Actions menu.
   b. In the **Element Eligibility Name** field, enter **Payment Criteria Element Eligibility**.
   c. Select **Automatic entry**.
   d. Click **Save**.

4. Edit the new element to create processing rules as follows:
   a. In the Element Overview section, click **Status Processing Rules**, and then select **Create Status Processing Rules** from the Actions menu.
   b. In the **Formula Name** field, select **XX_Default_Payer_Payment_Criteria**.
   c. In the Result Rules section, add a row using the values in this table.

<table>
<thead>
<tr>
<th>Field</th>
<th>Value</th>
</tr>
</thead>
<tbody>
<tr>
<td>Result Returned</td>
<td>EMP_DEPT</td>
</tr>
<tr>
<td>Result Rule</td>
<td>Direct Result</td>
</tr>
<tr>
<td>Target Input Value</td>
<td>Payment Criteria</td>
</tr>
</tbody>
</table>
Personal Payment Methods

Creating Accounts: Points to Consider

Banks, branches and accounts fit together on the premise of the Bank Account model. The Bank Account model enables you to define and keep track of all bank accounts in one place.

The Bank Account Model can explicitly grant account access to multiple business units, functions, and users. Consider the following when you set up bank accounts:

- Assign a unique general ledger cash account to each account, and use it to record all cash transactions for the account. This facilitates book to bank reconciliation.
- Grant bank account security. Bank account security consists of bank account use security, bank account access security, and user and role security.

Account Use

Account Use refers to accounts created for:
- Oracle Fusion Payables
- Oracle Fusion Receivables
- Oracle Fusion Payroll

Select the appropriate use or uses when creating an account in one or more of these applications.

Account Access

Payables and Receivables account access is secured by business unit. Before the bank account is ready for use by Payables or Receivables, you must:

1. Select the appropriate use for the application.
2. Grant access to one or more business units.

Note: You can only assign access to the business units that use the same ledger as the bank accounts owning the legal entity,

User and Role Security

You can further secure the bank account so that it can only be used by certain users and roles. The default value for secure bank account by users and roles is No. For Payables and Receivables, you must have the proper business unit assigned to access a bank account even if the secure bank account by users and roles is No. If the secure bank account by users and roles is set to Yes, you must be named or carry a role assigned to the bank account to use it.

Note: You must assign the security duty role Cash Management Administration to the Cash Manager job role to provide access for setting up banks, branches, and accounts.
Bank, Branch, and Account Components: How They Work Together

Banks, branches, and accounts fit together on the premise of the Bank Account model.

The model enables you to define and keep track of all bank accounts in one place and explicitly grant account access to:

- multiple business units
- functions
- users

This eliminates the redundant duplicate bank account setup in different business units when these business units share the same bank account.

Banks

Creating a bank is the first step in the bank account creation. You can:

- Search for existing banks to view and update
- Create a new bank from an existing party

Consider the following:

- The option to create from an existing party is implicitly implemented by the matching option.
- The option is available only after the existing party has been found with the same bank.
- If you select the matching option, the page repopulates the information from the matched party.

Branches

Once you have created your bank, the next step is creating a branch or branches associated to the bank. The matching option is also available when creating branches. To create a new branch without using the matching option, manually enter the required information. You can also define other branch-related attributes in the same page.

If you don’t use the matching option when an existing party is found, a branch with the same party name is created.

Accounts

The four areas associated with defining an account are:

- General information
- Control of the account
- Security and access to the account
- Business unit assignment

Once the bank and branch are created, proceed to the bank account setup by doing the following:

- Select the bank branch you want to associate to your bank account.
- Assign the owner of the bank account.

**Note:** To create a bank account for Payables or Receivables, add the Business Unit Access first for the business units to use the bank account.
Consider the following:

- The Oracle Fusion Account Payables or Receivables accounts are identified by the business unit.
- The Oracle Fusion Payroll accounts are identified by the legal entity.

Related Topics
- Reconciliation Matching Rules: Explained

### Entering Bank Information for Personal Payment Methods: Critical Choices

You can enter bank, branch, and bank account information centrally as part of implementation, or you can let employees add their own bank information. You can share this information across multiple applications for different purposes.

The following table summarizes several approaches for creating bank information for employees.

<table>
<thead>
<tr>
<th>Approach</th>
<th>Purpose</th>
</tr>
</thead>
<tbody>
<tr>
<td>Manage Banks page and Manage Bank Branches page</td>
<td>View, create, or edit banks and branches centrally for outgoing payments or receiving payments</td>
</tr>
<tr>
<td>Manage Personal Payment Methods page</td>
<td>Create or edit employee bank account details for receiving payments</td>
</tr>
<tr>
<td>Payroll batch loader</td>
<td>Load personal payment methods and employee bank account details using an integrated Excel workbook</td>
</tr>
</tbody>
</table>

### Controlling Who Can Manage Banks and Branches

The following table shows the roles that are typically involved in managing bank information, what actions they can take by default, and which pages they use.

<table>
<thead>
<tr>
<th>Role</th>
<th>Can Create Banks and Branches?</th>
<th>Can Create Employee Bank Account Details?</th>
<th>Location</th>
</tr>
</thead>
<tbody>
<tr>
<td>Cash Manager</td>
<td>Yes</td>
<td>No</td>
<td>Manage Banks page and Manage Bank Branches page, Setup and Maintenance work area</td>
</tr>
<tr>
<td>Payroll Administrator</td>
<td>Depends on duty role or profile option</td>
<td>Yes</td>
<td>Manage Personal Payment Methods page, Payment Distribution work area</td>
</tr>
<tr>
<td>Payroll Interface Coordinator</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Payroll Manager</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Employee</td>
<td>Depends on duty role or profile option</td>
<td>Yes</td>
<td>Manage Payment Methods page, Portrait</td>
</tr>
</tbody>
</table>
You can use a profile option to control access to create bank and branch data. On the Manage Cash Management Profile Options page, set the Use Existing Banks and Branches profile option to either **Yes** or **No**.

- If you set it to **Yes**, you can load bank and branch data so that administrators and employees select bank details from a list of values on the Create Personal Payment Method page.
- If you set it to **No** (default setting), you can’t load any bank details. Administrators and employees enter their bank and branch details as free text.

**Related Topics**
- Payroll Batch Loader Workbooks for Bank Data
- Payroll User Interface Configuration Formula Type

**Third-Party Payment Methods**

**Creating Third Parties: Points to Consider**

You create third parties to process payments to external organizations and people who aren’t on the payroll. Use the Manage Third Parties task in the Payment Distribution work area or the Batch Loader task in the Payroll Administration, Data Exchange, or Checklist work area to create third-party organizations for payments, such as pension providers or professional bodies, or third-party organizations, such as disability organizations. During the creation, third party persons and organizations are also defined as trading community members in the Trading Community Architecture (TCA), allowing use in other products.

The following figure illustrates the steps to create third parties.
### Party Usage Codes

Creating third parties on the Manage Third Parties page creates corresponding records for them as trading community members. For third-party persons, the application automatically assigns a party usage code of External Payee. For third-party organizations, you assign a party usage code.

The following table describes the party usage codes for third-party organizations.

<table>
<thead>
<tr>
<th>Party Usage Code</th>
<th>Use For</th>
<th>Examples</th>
</tr>
</thead>
<tbody>
<tr>
<td>External Payee</td>
<td>Organizations that can be associated with employee calculation cards or element entries. Use this party usage code for organizations when the others don’t apply.</td>
<td>County Sheriff for involuntary deductions</td>
</tr>
<tr>
<td>Payment Issuing Authority</td>
<td>Organizations responsible for issuing instructions for involuntary deductions, such as a tax levy or bankruptcy payment order. Payment issuing authorities don’t receive payments.</td>
<td>Court, agency, or government official</td>
</tr>
<tr>
<td>Pension Provider</td>
<td>Organizations that provide pension administration for employee pension deductions.</td>
<td>Stock broker, investment company, benefit administrator, labor union</td>
</tr>
<tr>
<td>Professional Body</td>
<td>Organizations entrusted with maintaining oversight of the legitimate practice of a professional occupation.</td>
<td>The American Society for Mechanical Engineers in the US</td>
</tr>
<tr>
<td>Bargaining Association</td>
<td>Organizations that represent employees in negotiations. Bargaining associations associated with trade unions may receive payments for union fees deducted from an employee’s pay.</td>
<td>The Air Line Pilots Association International (ALPA) in Canada and the US</td>
</tr>
<tr>
<td>Disability Organization</td>
<td>Organizations that are authorized to make disability assessments. Disability organizations don’t receive payments.</td>
<td>The Royal National Institute of Blind People in the UK</td>
</tr>
</tbody>
</table>

**Related Topics**

- Creating Third-Party Payment Methods: Procedure
- Payroll Batch Loader Workbook for Third-Party Organizations
Third-Party Payments: Examples

The following scenarios illustrate how you can pay third-party people and organizations.

Child Support to a Former Spouse

John Smith is an employee at your organization. Mary Smith receives a child-support payment each payroll period that is deducted from John’s salary. To set up payments for Mary:

1. Create Mary as a third-party person.
2. Create Mary’s third-party payment method and select the payroll relationship for John.
3. Add the child support order to John’s involuntary deduction calculation card and select Mary’s name in the Order Amount Payee field.

Processing Fee to a County Sheriff’s Office

The County Sheriff’s office receives a processing fee on garnishment payments. When you create the third-party organization, you designate it as an External Payee before you create its third-party payment method. When you add the garnishment order to the employee’s involuntary deduction calculation card, you select the County Sheriff in the Organization Fee Payee field.

Related Topics

- Creating Third-Party Payment Methods: Procedure

Third-Party Rollup Payments: Explained

A third-party payment is a payment you make to organizations. The organization could be a court, labor union, or a pension provider, or persons not on the payroll.

Before you run the Third-Party Payments Register process to view third-party payment details, complete the following tasks:

1. Calculate and verify prepayments
2. Run the Third-Party Payments Rollup process
3. Generate the payments

The Run Third-Party Payments Rollup process is optional. Use this process to consolidate multiple payments made to a third party and generate a single payment.

Submit the Run Third-Party Payment Register task from the Payroll Checklist or Payment Distribution work areas.

Understanding Third-Party Rollup Payments

A union can have several of its members belonging to the same employer. An employee can have multiple deductions made to the same third-party payee, such as multiple child support orders.

Rather than make individual payments for each individual employee deduction, you can roll up the multiple payments into a single payment. Use the Third-Party Payments Rollup process to combine the individual employee deductions and pay the union through a single payment instrument. Additionally, you can generate the third-party payments register and provide the third-party payee employee and deduction details.
Excluding Third-Party Payment Methods

You may want to exclude specific third parties from the Third-Party Rollup process because they may want an individual check per payment. For example, the UK requires that deduction from earnings orders, such as child maintenance payments, be sent as separate transactions.

Select the Exclude from Third-Party Rollup Process check box on the Manage Third-Party Payment Methods page to exclude a third-party payee from the Third-Party Rollup process. Use the Manage Third-Party Payment Methods task in the Payment Distribution work area to access this page.

Generate the third-party payments register to view the individual payments made.

Reporting Third-Party Rollup Payments

Run the Third-Party Payments Register process to generate and view the following:

- List of individual third-party payments and the corresponding employee deduction information
- List of all rollup payments and deduction information of employees who share the same rollup payments
- Consolidated total of each rollup payment
- Payments made to each individual payee
- Consolidated total of multiple deduction payments of each employee
- Component name and component reference of involuntary deductions stored on the calculation cards
- Element name of voluntary deductions

Related Topics

- Calculate Payment Distribution: Overview
- Creating Third-Party Payment Methods: Procedure
- Third-Party Payment Register

Generating Employee and Third-Party Check Payments: Explained

Use the Generate Employee and Third-Party Check Payments task from the Payment Distribution work area to generate check payments. The process selects employees and third parties who:

- Are processed in the prepayments process for a given payroll
- Have a payment method of check

Before you generate the check payments, you must consider the following:

- An employer can have multiple employee deductions made to the same third-party payee, such as multiple child support orders. Rather than make individual payments for each individual employee deduction, use the Third-Party Payments Rollup process to combine individual employee deductions and make a single payment.
- Run this process to generate your checks for employees and then run the process again to generate checks for your third parties. Use the Payee field while running this process to select the appropriate payee.
- You may want to exclude specific third parties from the Third-Party Rollup process because they may want an individual check per payment. Select the Exclude from Third-Party Rollup Process check box on the Manage Third-Party Payment Methods page to exclude a third-party payee from the Third-Party Rollup process.
- A third-party payee may want the payments on a date that is different from the employee payment date. For example, you may want to make employee payroll payments on the last day of the month, whereas, make third-
party payments 5 days later. Use the Manage Time Definitions task and create a time definition to define a time span of 5 days. Select this time definition in the Time Definition field on the Manage Third-Party Payment Methods UI. Enter the relevant process dates, and run the prepayments process, for example, with a process date of 30, June. This stamps the effective employee payments date as 30, June and the third-party payments date as 05, July. The payments process runs twice:

- Once for the employees with a process end date of 30, June
- Once for the third parties with a process end date of 05 July and an overriding payment date of 05 July

- Different banks can have different check templates. To accommodate this requirement, you must first create a report category for each separate bank and check template. Select the created report category for the requisite bank’s payment source so that the process uses the correct check template to generate the check payments. Use the Manage Organization Payment Methods task in the Payment Distribution work area to define the payment source for third-party payments. Attach the correct report category for that payment source. Use the Report Category for Third-Party Payee or Report Category for Worker field in the Payee Information section of the Create Payment Source page.

Related Topics
- Creating Third-Party Payment Methods: Procedure

Generating Employee and Third-Party Check Payments: Procedure

The Generate Employee and Third-Party Check Payments task selects employees and third parties who:

- Are processed in the prepayments process for a given payroll
- Have a payment method of check

Payroll Managers and Payroll Administrators can run this process from the Payment Distribution work area.

Prerequisites

The prerequisite tasks for the Generate Employee and Third-Party Check Payments task include:

- Create the third party and the third party payment method, and associate a deduction from the employee to pay the third party.
- Add an organization payment method (OPM), including a payment source (the bank details should already be set up).
- Add a payroll definition, including a default payment method of Check, and all valid payment methods.
- Attach a payroll to the employee.
- Attach element entries to the employee.
- Calculate payroll.
- Run the Prepayments process to calculate the distribution of net pay.
- Run the Payroll Archive process to archive the earnings, deductions, tax calculation details, accruals, payment methods, and so on.

Generating the Employee and Third-Party Payments

Run this process to generate checks for your employees and then run the process again to generate checks for your third parties. To run the process:

1. Open the Payment Distribution work area, and click Submit a Process or Report from the Tasks pane.
2. Select the required legislative data group.
3. Select the Generate Employee and Third-Party Check Payments task, and click Next.
4. Enter a unique payroll flow name.

**Note:** Name the flow so you can easily identify the process later. This is helpful while searching, so you can determine what you have already run or if you must roll back any process.

5. Specify the required payroll name.
6. Select the payee type for which the check payment process is run. The available options are Employee or Third Party. You can generate the check payments for either employees or third parties.
7. Enter a Process Start Date to define the date range of this process.
8. Enter a Process End Date to define the date range of this process.
9. Select the required consolidation group to view the payments for all payrolls that are included in this consolidation group. A consolidation group defines a grouping of different payrolls for reporting purposes. This is not a mandatory field. If you don’t select a value, the process uses the default consolidation group assigned to the payroll.
10. Select the OPM you want to use for this process. The value you select determines the payment source to make the payments. There could be multiple payment sources in the OPM.
11. Select the payment source to process for the above payment method. This parameter is optional. If you have defined attributes, such as a payment file limit or report category, at the payment source level, you should enter the payment source. When you enter the payment source, the defined attributes are applied.

**Note:** You can have different payment sources (bank accounts), with different banks, which have different check templates. You must then run the check process for each payment source and each set of payees. Select the correct payment source so that the correct stationary is used for the payments.

To accommodate this requirement, you must first create a report category for each separate bank and check template. Attach the created report category to the appropriate bank’s payment source so that the correct check template is used to generate the check payments.

12. Optionally, specify an Overriding Payment Date on which a payment is due to be made to the payee.
13. Specify the Start Check Number in the sequence of checks used for payroll processing.
14. Specify the End Check Number in the sequence of checks used for payroll processing.
15. Select a Process Configuration Group if available. Use a process configuration group to set rules for payroll processes, such as passwords or number of threads. If you don’t select a process configuration group, the process uses the parameters in the default group.
16. Click Next.
17. Click Submit.

**Related Topics**
- Consolidation Group Usage: Examples
- Payroll Process Configuration Groups: Explained

**Configuring Payslips and Checks**
Adding Text to Payslips and Checks: Procedure

Configuring your checks and payslips to display additional text requires the setup steps described in this topic. You must create an information element with input values, add the input values to the Organization Information EFF flexfield, and modify the output template. Depending on your implementation, you also may require a new formula.

Summary of the setup steps:

1. Create the information element, its element eligibility, and the input values you want displayed.
2. If you need a formula to calculate the run results, perform the following steps:
   a. On the Manage Fast Formulas page, create a formula of type Oracle Payroll to return the values that you want to add.
   b. On the Manage Elements page, edit the information element to:
      • Create a status processing rule associated with your new formula.
      • Add formula result rules to return formula results to the element’s input values.
3. On the Manage Enterprise HCM Information page, in the Organization Information EFF section, add the information element and input values.

† Note: The Organization Information EFF configuration is at the enterprise level. For each LDG for which you want to archive payroll information, you must add a separate row for the information element.

4. Create employee element entries, unless you selected the Automatic Entry option for the element.
5. After calculating the payroll and prepayments, run the Archive Periodic Payroll Results process.
6. Modify the check template or payslip template, as appropriate. Refer to the Report Designer’s Guide for Oracle Business Intelligence Publisher for more information.

Input Values for Payslip and Check Text: Examples

You can create element input values to store information, such as congratulatory messages and detailed earnings information, that you want displayed on checks or payslips. The following scenarios illustrate how you can archive payroll information for this purpose.

Display Earnings by Earned Weekly Period

For example, you want to display earnings details on payslips, such as overtime pay per week within a semimonthly pay period. In this example, before modifying your payslip template, you create an element using the Information element classification. You create the following input values in your element and add them to the payroll information to archive:

• Description
• Start Date
• End Date
• Hours
• Rate
• Multiple
• Amount
Display a Message on a Check

You want to display a birthday congratulations message on checks. In this example, before modifying your check template, you could create an element using the Information element classification with the following input values:

- Message Title
- Message Description

Multilanguage Support for Payslips: Explained

The Generate Payslips process is run once each payroll period and it generates the payslip XMLs based on the payroll archive and prepayments data. The application creates the payslip PDFs and stores them in the Document of Records for future reference and retrieval.

Printing Payslip PDFs

Some workers may opt for a printed payslip and you must provide individual PDF payslips to them.

The application supports producing all printed payslips in a single file for ease of printing. However, for the payslip labels to be translated, each payslip must have its own individual PDF output file. To enable single PDFs, add the Bursting configuration onto the Print Delivery option within the Payslip extract definition.

For more details on how to add the Bursting option, refer to Adding Bursting to Print Delivery Option: Procedure on the Oracle Applications Help.

Translating the Payslip

You can now generate individual payslips in the worker’s correspondence language of choice. Run the Generate Payslips process just once and generate the payslips for the various workers in a language of their choice depending on what is set as the worker’s correspondence language.

The process translates:

- The metadata, the layout labels, and the static text on the payslip template.
- The underlying data that comes from the transactional and setup tables, and the data that the Payroll Archive process archives for the payslip.

Set the process configuration parameter, Enable Payslip Translation, to Y, before running the Payroll Archive process. You must set this only once. If you have run the Payroll Archive before setting this parameter, you must roll back the process, set the Enable Payslip Translation parameter to Y, and rerun the Payroll Archive process.

Installing the Correspondence Language

Although the worker’s correspondence language may be set to one of several languages, only those languages that are installed are supported for translation. To determine the number of languages you must install, consider how diverse the worker population is in terms of their preferred correspondence language.

If the correspondence language is not one of the installed languages, the Payslip is produced in the base language.

To enable translation of the payslip labels, set the Locale property of both Document of Records and Print Delivery options within the Payslip Extract Definition to Correspondence Language. If you do not want the payslip labels to be translated, leave the Locale property blank or set it to the base language, for example, en-us, for US English.

For the payslip data that is not delivered by Oracle, the translated values of the data must be available in the application. Enter translated values for the base language and each of the installed languages that needs payslip translation support.
For example, if you have created additional element names and its associated balances, you must also enter their translated values in the application. Otherwise, the translated values are not reflected in the payslip PDFs.

**Related Topics**
- Adding Translations of Modified Text: Overview

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**Adding Bursting to Print Delivery Option: Procedure**

When you enable payslip translation, both the transactional data and the labels on the payslip are translated. As only one language can be applied to all the labels on a payslip, payslips for different languages must be in their own PDF. One way of ensuring that is to add the Bursting configuration on the Print Delivery option within the Payslip Extract Definition.

**Adding the Bursting Configuration**

Complete the following steps to add Bursting to the Print Delivery option for the payslip:

1. Select the **Manage Extract Definitions** task in the Data Exchange work area..
2. In the Search window, enter **Payslip** in the Name field.
3. Select **Archive Retrieval** in the Type field.
4. Select a legislative data group and click **Search**.
5. Click **Payslip** in the Search Results region.
6. Click the **Deliver** tab in the Manage HCM Extract Definitions: Payslip page.
7. Select the **Printed Payslip** Delivery Option Name row in the Extract Delivery Options section.
8. Complete the following in the Additional Details section.
   a. Select **Default** in the Value column of Bursting.
   b. Remove content in the Value column of Locale.
   c. Select **Search** in the Attribute column of Locale.
   d. In the Search and Select: Attribute window, enter the following, as given in the table below.

<table>
<thead>
<tr>
<th>Field</th>
<th>Value</th>
</tr>
</thead>
<tbody>
<tr>
<td>Parent Data Group</td>
<td>Global Archive Payroll Calculation Breakdown</td>
</tr>
<tr>
<td>Attribute</td>
<td>Correspondence Language</td>
</tr>
<tr>
<td>Record</td>
<td>Global Calculation Breakdown ID Information</td>
</tr>
</tbody>
</table>

9. Click **Search**, and then **OK**.
10. Click **Save** and then **Submit**.

**Related Topics**
- Adding Translations of Modified Text: Overview

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**FAQ for Payment Methods**
How can I display employee work location and department on their payslip or check?

Define a check or payslip template to include the archived payroll information, including the employee’s work location and department details. Use this template in the BI Publisher Report and add the report to the Generate Check Payments or Generate Payslips flow. When you submit the flow, the flow output is automatically generated based on the template included in the BI Publisher Report.

Related Topics

- Adding a BI Publisher Report to a Flow: Procedure
13 Setting Up Payroll Flow Patterns

Flow Patterns

Payroll Flows: Explained

The Global Payroll application provides several predefined tasks, such as processes, reports, and manual tasks, that you can to define and process payroll. You can group together a set of tasks to form a flow. You can manage a flow from a payroll work area or from the Data Exchange work area. A flow can include one or more tasks.

A flow pattern is a series of tasks that are grouped together in a predefined order. The tasks are grouped into activities such as extract reports and processes, or tasks that cover a phase of the payroll process. A flow pattern can include automatic or manual tasks. The flow pattern determines the sequence of tasks executed in a flow.

Use the Manage Payroll Flow Patterns task from the Payroll Checklists work area to create your own flow patterns or copy an existing flow pattern. You can also use the Refine Extracts flow in the Data Exchange work area. You can modify an existing flow and add, delete, or reorder the list of tasks within a flow.

You can schedule flows to run at a specified time or at regular intervals and monitor the status of the tasks within a flow. You can also:

- Link one or more flows to create a process
- Define a flow within a flow
- Define a flow to execute multiple instances of a task within the flow

Flow Pattern Parameters: Explained

Each task in a flow pattern supports task actions, such as submit, roll back, mark for retry, retry, and view. Task action parameters control how the application processes a task and how the task relates to other tasks in the flow pattern. Flow parameters are a subset of task action parameters. They supply the information required to successfully complete the tasks in the flow pattern.
The following figure shows the relationship of the tasks, task action parameters, and flow parameters in a flow pattern. Before you submit a flow, review and edit the task action parameters and the flow parameters for each task within the flow. Task action parameters control task interactions.

When you create a flow pattern, you review and edit the task parameters for the Submit and Initialize task actions. After submitting the flow pattern, you can edit the parameters for the remaining task actions, such as Mark for Retry, Retry, and Roll Back. The parameter details you can edit include:

- Display and display format
- Lookups and value sets
- Usage
- Sequence
- Parameter Basis and Basis Value

### Display and Display Format
Display parameters control the format and availability of the flow parameter, as shown in the following table.
### Parameters

<table>
<thead>
<tr>
<th>Parameters</th>
<th>Purpose</th>
</tr>
</thead>
<tbody>
<tr>
<td>Display</td>
<td>Determines whether the parameter displays when submitting the flow</td>
</tr>
<tr>
<td>Display Format</td>
<td>Identifies the type of data displayed, such as a date or text, or choice list</td>
</tr>
</tbody>
</table>

Display parameters work with other parameters, such as Parameter Basis and Basis Value. For example, most task action parameters don’t display the Request parameter because the application obtains the value for this parameter from the context.

### Lookups and Value Sets

Use lookups and value sets for descriptive flexfields to control and validate the data used in the payroll flow pattern.

The following table describes which parameter basis to use for the different methods for obtaining the lookup value.

<table>
<thead>
<tr>
<th>Lookup Value</th>
<th>Parameter Basis</th>
</tr>
</thead>
<tbody>
<tr>
<td>Entered when submitting a flow</td>
<td>Bind to Flow</td>
</tr>
<tr>
<td>Derived by the application from existing tables, such as the value for the payroll statutory unit</td>
<td>Bind to Flow Task or Context Binding</td>
</tr>
<tr>
<td>Derived by application from a Post SQL process</td>
<td>Post SQL Bind</td>
</tr>
</tbody>
</table>

### Usage

A parameter can receive information (input) or generate information (output) that subsequent tasks can use. For example, for the Calculate Payroll task, the Payroll Process parameter for the Submit task action generates an output value for the payroll action ID. The Retry task action can use this payroll action ID.

The following table describes the typical settings for a parameter whose usage is output. For output usage parameters the parameter is not displayed and its value is derived using the parameter basis.

<table>
<thead>
<tr>
<th>Parameter Option</th>
<th>Setting</th>
</tr>
</thead>
<tbody>
<tr>
<td>Display</td>
<td>No</td>
</tr>
</tbody>
</table>

- Bind to Flow, the application derives the value from the flow parameter and then updates the flow parameters table with the output value
- If you select no value, the output value results from the task’s output

### Sequence

Control the order in which the application processes and displays the parameters by specifying the sequence. Sequence numbers provide default logic for the application to derive the order in which to process the parameters. For example, if you have two lookups and the values of the second lookup depends on the first lookup. You must set the first lookup to a lower sequence number than the second one.
Parameter Basis and Basis Value

The Parameter Basis controls how the application derives the value for the parameter. The Basis Value further specifies the value the application uses for the parameter.

Use the values listed in the following table to select parameter basis and values when you define payroll flows. The table provides examples when you might select them and describes how the values are assigned.

<table>
<thead>
<tr>
<th>Parameter Basis</th>
<th>Description</th>
<th>Basis Value Available</th>
<th>Example</th>
</tr>
</thead>
<tbody>
<tr>
<td>Use Specified Value</td>
<td>Assigns a specific value to the parameter.</td>
<td>Text is entered as constant or value entered by the person who submits the flow.</td>
<td>Specify a constant if the value is the same for all tasks, such as the payroll statutory unit.</td>
</tr>
<tr>
<td>Bind to Context</td>
<td>Derives the value from the context of the current flow instance or the task instance of the flow pattern.</td>
<td>Select flow, task, or the Request. The application automatically generates the parameter value.</td>
<td>If the task includes a Request parameter, bind it to the flow context. Tasks in the flow reference this task using the Request ID generated by the application. Bind the legislative data group parameter to a task parameter that supplies the legislative data group. For example, the legislative data group for prepayments uses the payroll as context, because it’s already associated with the legislative data group.</td>
</tr>
<tr>
<td>Bind to Flow Parameter</td>
<td>Derives the value from one of the flow parameter values.</td>
<td>Application automatically derives the parameter value.</td>
<td>Bind a parameter to the flow that several tasks share to avoid multiple occurrences of the same parameter.</td>
</tr>
<tr>
<td>Bind to Flow Task Parameter</td>
<td>Binds the value to the output of the previous task.</td>
<td>Select a value from the previous task’s parameters.</td>
<td>Bind a parameter to a task, such as Retry corrective action. When the flow owner resubmits the task to retry it, the application uses the output of the Submit task parameter.</td>
</tr>
<tr>
<td>Bind to Task Parameter</td>
<td>Resolves the value for the task parameter.</td>
<td>Select a value from the current task’s parameters.</td>
<td>Bind a parameter to the task if several tasks share a parameter, such as a start date, but one task requires a different date.</td>
</tr>
<tr>
<td>No value specified</td>
<td>Stops the application from generating a parameter value when the task executes.</td>
<td>Application generates a blank value.</td>
<td>Not applicable</td>
</tr>
<tr>
<td>Post SQL Bind</td>
<td>Calculates the parameter but doesn’t display it on the user interface.</td>
<td>SQL statement calculates the parameter value.</td>
<td>Bind a parameter using the Post SQL bind to generate data.</td>
</tr>
</tbody>
</table>
Parameter | Basis Value Available | Example
---|---|---
Basis Value Available | For example, use a post SQL process to use the payroll period and payroll parameters and generate the process date.

**Parameter Basis**

<table>
<thead>
<tr>
<th>Description</th>
<th>SQL Bind</th>
<th>Calculates and displays value on the user interface, prior to submission.</th>
<th>SQL statement calculates the parameter value and display it on the user interface, before submission.</th>
<th>Bind a parameter using SQL</th>
</tr>
</thead>
<tbody>
<tr>
<td>For example use SQL Bind to calculate the payment type parameter for the Generate Check Payment task. The application obtains the payment type ID for the check payment record.</td>
<td>Use SQL Bind to prompt the task owner to enter a reason for a corrective action, such as a QuickPay.</td>
<td></td>
<td></td>
<td></td>
</tr>
</tbody>
</table>

**Creating Flow Patterns: Procedure**

Use flow patterns or create new patterns required to complete your extract reports and processes or payroll tasks. You build flow patterns from predefined tasks, such as processes, reports, and manual tasks that verify results.

For example, you can use the predefined Load Batch from File flow to load data from a source file to the application tables.

Work areas include tasks to submit flows, such as Submit a Payroll Process or Report, or Submit Extracts. Submitting a flow pattern generates a flow and if the flow includes several tasks, a checklist.

**Building a Flow Pattern**

Complete the following steps to create a flow pattern:

1. Select the Manage Payroll Flow Patterns task in the Payroll Checklist work area or the Refine Extracts flow from the Data Exchange work area.
2. Create a new flow pattern or search for and select an existing flow pattern to copy.
3. Select a legislative data group (LDG).
4. On the Basic information page, specify the following information.
   
   **a.** Select the LDG Required option. This field value determines the availability of this flow pattern. The pattern can be made available to a specific LDG or to all LDGs. The following table explains the available choices.

<table>
<thead>
<tr>
<th>LDG Required</th>
<th>Result</th>
</tr>
</thead>
<tbody>
<tr>
<td>No</td>
<td>Flow pattern available to all LDGs</td>
</tr>
<tr>
<td>Yes</td>
<td>Flow pattern restricted by LDG</td>
</tr>
</tbody>
</table>

   **b.** Default Flow option.

5. Select the activities and tasks to include in the flow pattern.
The activity associated with the task determines the work area where you can submit the flow.

6. On the Tasks page, complete the following information.
   - Optionally, rename the task and description and change the activity or task group for the task.
     For example, you might place all your reports in the Statutory activity and rename each verification task so it includes the report name.
   - Select a task owner.
   - Skip the step to specify the duration dates that determine when to send the notification to alert the flow or task owner to start a task or that it is overdue. Return to this step after you complete flow parameters on the Parameters page.
   - Select the type of notifications received by the flow or task owner.

7. On the Task Sequence page, review the task sequence and reorder, add or delete tasks, as required.
   All flow patterns begin with a Start task and conclude with an End task. Tasks are sequential but you can start processing on more than one task, for example to run reports concurrently.

   **Tip:** Specify the order in which the tasks display in the checklist by specifying a value for the sequence on the Edit Task Details Owners and Checklist page

8. On the Parameters page, select the parameters to complete when submitting the flow pattern.
   The application uses the flow parameters to submit and complete the tasks in the flow pattern, or as a basis for deriving values to submit the remaining tasks in the flow pattern.

9. On the Task Parameters page, review the parameters, and if necessary update the parameters.
   For example, you might specify a constant if the value is the same for all tasks, such as the Process Configuration Group parameter.

10. Review the resulting checklist for the flow pattern before submitting the flow pattern.

11. Define a security profile for it using the Manage Payroll Flow Security Profile task in the Setup and Maintenance work area.
    The HCM data role security controls who can submit the flow pattern or view the resulting flow from the Payroll Dashboard or payroll work areas.

Related Topics
   - Sequencing Rules for Flows and Locked Tasks: Explained

Editing Flow Patterns: Examples

Review the following scenarios to better understand how to edit flow patterns to meet the requirements of your enterprise.
Use the Manage Payroll Flow Pattern task in the Payroll Checklist work area or the Refine Extracts task in the Data Exchange work area to edit the scenarios:

- Updating a parameter to use a specified value
- Supplying a reason for a corrective action
- Adding tasks and reordering the task sequence
- Automatically incrementing dates in a scheduled extract
Updating a Parameter to Use a Specified Value

Your payrolls use a single process configuration group named InFusion UK Consolidation Group. You want to specify a constant for the configuration group task action parameter and hide the parameter to avoid data entry mistakes. You perform the following steps.

1. Query the flow pattern you defined for the payroll cycle.
2. On the Parameters tab of the Manage Payroll Flow Pattern page, edit the Process Configuration Group parameter. You enter the values shown on the following table. The table lists the parameters you define to maintain a constant value for the Process Configuration Group task action parameter and avoid data entry mistakes.

<table>
<thead>
<tr>
<th>Parameter Detail</th>
<th>Value</th>
</tr>
</thead>
<tbody>
<tr>
<td>Display</td>
<td>No</td>
</tr>
<tr>
<td>Display Format</td>
<td>Text</td>
</tr>
<tr>
<td>Lookup</td>
<td>No value</td>
</tr>
<tr>
<td>Usage</td>
<td>Input Parameter</td>
</tr>
<tr>
<td>Parameter Basis</td>
<td>Constant Bind</td>
</tr>
<tr>
<td>Basis Value</td>
<td>InFusion UK Configuration Group</td>
</tr>
</tbody>
</table>

Supplying a Reason for a Corrective Action

Your enterprise typically issues electronic funds transfer payments. You defined a flow pattern to issue check payments and to verify them. You want to track the reason managers issue checks, so you add a flow parameter to capture that information.

1. Query the payments flow pattern you defined.
2. On the Parameters tab of the Manage Payroll Flow Pattern page, Select and Add the Reason parameter to include the parameter as a flow submission parameter. Complete the details as shown in the following table.

<table>
<thead>
<tr>
<th>Parameter Detail</th>
<th>Value</th>
</tr>
</thead>
<tbody>
<tr>
<td>Display</td>
<td>Yes</td>
</tr>
<tr>
<td>Display Format</td>
<td>Text</td>
</tr>
<tr>
<td>Lookup</td>
<td>No value</td>
</tr>
<tr>
<td>Usage</td>
<td>Input Parameter</td>
</tr>
<tr>
<td>Parameter Basis</td>
<td>Context Binding</td>
</tr>
<tr>
<td>Basis Value</td>
<td>Payroll Flow</td>
</tr>
</tbody>
</table>
Adding Tasks and Reordering the Task Sequence

Your flow pattern includes a Calculate Gross Earnings process and the Element Results Register Report. You can add two extract reports that run concurrently, followed by a verification task, to simplify the checklist to a single list. You perform the following steps:

1. From the Data Exchange work area, select the Refine Extracts task.
2. On the Refine HCM Extracts page, query the flow pattern.
3. On the Tasks tab of the Manage Payroll Flow Patterns page:
   a. Add the first extract report, specifying the same Activity and Task Group as the Calculate Gross Earnings.
   b. Add the second extract report, specifying the same Activity and Task Group as the Calculate Cross Earnings.
   c. Add a manual verification task, specifying the same Activity and Task Group as the Calculate Cross Earnings.
4. Edit each task, specifying a sequence number on the Edit Task Details Owners and Details page.
   The lowest number is used for the first task in the checklist. For example, you might specify a sequence of:
      o 10 for the Calculate Gross Earnings task
      o 20 for the first extract report
      o 30 for the second extract report
      o 40 for the manual verification task
5. On the Tasks Sequence tab, reorder the sequence of reporting tasks as shown in the following table. Follow this order to run the two reports concurrently.

<table>
<thead>
<tr>
<th>Task</th>
<th>Following Task</th>
</tr>
</thead>
<tbody>
<tr>
<td>Start Flow</td>
<td>Calculate Gross Earnings</td>
</tr>
<tr>
<td>Calculate Gross Earnings</td>
<td>First extract report</td>
</tr>
<tr>
<td>Calculate Gross Earnings</td>
<td>Second extract report</td>
</tr>
<tr>
<td>First extract report</td>
<td>Manual verification task</td>
</tr>
<tr>
<td>Second extract report</td>
<td>Manual verification task</td>
</tr>
<tr>
<td>Manual verification task</td>
<td>End Flow</td>
</tr>
</tbody>
</table>

Automatically Incrementing Dates in Scheduled Extract

You create a flow pattern to extract weekly payroll data that requires the user to enter a process date parameter. You schedule the extract to run weekly. The application evaluates the flow parameters at the time of submission, and the task parameters at the beginning of task execution. You edit the task parameters to automatically increment the date field. The date values are derived from the default date parameter values.

You use the Refine Extracts task from the Data Exchange work area, or the manage Flow Patterns task from the checklist work area. You edit the task parameters on the task’s Basic Information page by performing the following actions:

1. Select the Process Date parameter.
2. Select Context binding from the Parameter Basis field.
3. Select System Date from the Basis Value field.

Editing a Flow Pattern: Worked Example

This example demonstrates how to edit a QuickPay flow pattern that you copied to change the task owner and to notify the flow owner in advance of the payments process.

In this example, the process date is the date paid. You designate an owner for the task that verifies prepayment results, to ensure that a person with adequate authority reviews the results before the task submits to generate payments. You notify the owner that verification starts before the task should begin. The following table summarizes the key decisions for this example.

<table>
<thead>
<tr>
<th>Decisions to Consider</th>
<th>In this Example</th>
</tr>
</thead>
<tbody>
<tr>
<td>Who is the task owner for the Verify Prepayments Result task?</td>
<td>Payroll Manager Operations role</td>
</tr>
<tr>
<td>When does the prepayments verification task start?</td>
<td>Two days before the process date for the Generate Check Payments task starts</td>
</tr>
</tbody>
</table>

Prerequisites

1. Create a QuickPay flow pattern by copying the predefined QuickPay flow pattern, entering a name for the flow pattern and the legislative data group.

Specifying a Task Owner

1. In the Payroll Checklist work area, click the Manage Payroll Flow Patterns task from the task pane.
2. On the Manage Payroll Flow Patterns page, search for the QuickPay flow pattern that you created, and edit the flow pattern.
3. On the Tasks tab, select the Verify Prepayment Results task, and click the Edit Task icon.
4. On the Edit Task Details: Owner and Checklist page, select the Payroll Manager Operations role as the checklist owner.
5. On the Edit Task Details: Duration and Notifications page, in the Duration region, complete the fields, as shown in this table.
   
   This table lists field names for the Duration and their respective values.

<table>
<thead>
<tr>
<th>Field</th>
<th>Value</th>
</tr>
</thead>
<tbody>
<tr>
<td>Due Date</td>
<td>Process Date</td>
</tr>
<tr>
<td>Offset</td>
<td>-2</td>
</tr>
</tbody>
</table>

6. In the Notifications region, select the Flow Task Start Notification option.
7. Click Submit, and return to the Manage Payroll Flow Patterns page.
8. On the Manage Payroll Flow Patterns page, click Submit.
Creating a Flow Pattern to Reissue a Check: Worked Example

This example demonstrates how to create a payroll flow pattern to issue a replacement check that an employee lost or didn’t receive.

The following table summarizes the key decisions for this scenario.

<table>
<thead>
<tr>
<th>Decision to Consider</th>
<th>In This Example</th>
</tr>
</thead>
<tbody>
<tr>
<td>Which tasks should the flow pattern include and in what sequence?</td>
<td>Verify a Payment, Void Payment, Generate Check Payment</td>
</tr>
<tr>
<td>Who has access to submit the flow?</td>
<td>InFusion Payroll Manager</td>
</tr>
<tr>
<td>Which notifications should the flow owner receive?</td>
<td>Error and Warning notifications</td>
</tr>
<tr>
<td>Which predefined task or flow parameters do you want to override?</td>
<td>Process Configuration Group parameter for the Void Payment task</td>
</tr>
</tbody>
</table>

Creating the Payroll Flow Pattern

1. In the Payroll Checklist work area, select the Manage Payroll Flow Patterns task from the task pane, and create a new flow pattern for the legislative data group.
2. On the Create Payroll Flow Pattern: Basic Information page, complete the fields, as shown in this table. The following table lists the regions, fields, and field values on the Basic Information Page for creating a payroll flow pattern.

<table>
<thead>
<tr>
<th>Region</th>
<th>Field</th>
<th>Value</th>
</tr>
</thead>
<tbody>
<tr>
<td>Basic Information</td>
<td>Flow Pattern</td>
<td>InFusion Reissue Check</td>
</tr>
<tr>
<td>Activities</td>
<td>Activities to Include</td>
<td>Payment</td>
</tr>
<tr>
<td>Tasks</td>
<td>Available Tasks</td>
<td>Void Payment, Generate Check Payments, Verify a Payment</td>
</tr>
</tbody>
</table>

3. Click Next.
4. On the Create Payroll Flow Pattern: Tasks page, select the Verify the Payment task.
5. In the Owner and Checklist region, click the Owner field, and select Fusion Payroll Manager.
6. On the Create Flow Pattern: Tasks Sequence page, confirm tasks follow this sequence: Verify a Payment, Void Payment, Generate Check Payment. Correct the sequence, if necessary.
7. On the Create Payroll Flow Pattern: Flow Parameters page, click Select and Add. Select multiple parameters from the Select and Add window, as shown in this table. The following table lists field names and their respective values.

<table>
<thead>
<tr>
<th>Field</th>
<th>Value</th>
</tr>
</thead>
<tbody>
<tr>
<td>Void Payment</td>
<td>Start Check Number, End Check Number, Process Configuration Group, Process Date, Payroll Process, Reason</td>
</tr>
</tbody>
</table>
### Oracle Global Human Resources Cloud

### Implementing Global Payroll

#### Chapter 13

### Setting Up Payroll Flow Patterns

---

**Field | Value**
---

### Note:
With the exception of the Reason parameter, only the Generate Check Payment task uses these parameters. Add them only once as flow parameters to cover both tasks.

**Generate Check Payment**  
Payroll, Start Date, Consolidation Group, Organization Payment Method, Overriding Payment Date, Payment Source, Payment Type

---

8. Select the row for the Process Configuration Group flow parameter and edit the flow parameters, as shown in this table:

<table>
<thead>
<tr>
<th>Field</th>
<th>Action</th>
</tr>
</thead>
<tbody>
<tr>
<td>Display</td>
<td>No</td>
</tr>
<tr>
<td>Display Format</td>
<td>Text</td>
</tr>
<tr>
<td>Lookups</td>
<td>No value</td>
</tr>
<tr>
<td>Parameter Basis</td>
<td>Use Specified Value</td>
</tr>
<tr>
<td>Basis Value</td>
<td>InFusion Process Configuration Group</td>
</tr>
</tbody>
</table>

You don’t must edit the Process Configuration task parameter. The application uses the details specified for the flow parameter, not the task parameter details.

9. On the Create Payroll Flow Pattern: Review page, preview the resulting payroll checklist, and submit the flow pattern.

---

### Creating a User-Defined QuickPay Flow Pattern: Procedure

When you start a QuickPay process using the Calculate QuickPay task, the checklist displays the tasks included in the predefined QuickPay flow pattern. To base the checklist on a user-defined flow pattern, you update the FLOW_DEFINITION user-defined table. When required, you can always start a QuickPay process using the predefined or other QuickPay flow pattern. Use the Submit a Payroll Flow task in the Payroll Checklist work area.

This topic covers the following procedures:

- Replace the predefine QuickPay flow
- Revert to the predefined QuickPay flow

### Replacing the Predefined QuickPay Flow

As a prerequisite, you copy and update the predefined QuickPay flow pattern. You then complete the steps to update the FLOW_DEFINITION user-defined table.

Create a user-defined flow pattern.

1. Use the Manage Payroll Flow Pattern task in the Payroll Checklist work area.
2. Copy the predefined QuickPay flow pattern, and specify its legislative data group.
3. Update the new flow pattern with the tasks to include in your QuickPay flow.

Complete the following steps for the FLOW_NAME column.

1. Use the Manage User-Defined Tables task in the Payroll Calculation work area. Specify the legislative data group as a search criteria. Search for and open the FLOW_DEFINITION table.

   Note: Each legislative data group can have only one flow pattern specified for the Calculate QuickPay task.

2. Click the Edit.
3. Specify the Effective As-Of Date.
4. In the User-Defined Columns section, select FLOW_NAME.
5. In the User-Defined Rows section, click Create.
6. In the Sequence field, enter the number 1.
7. In the Exact field, enter a name, such as Enter Flow Name.
8. Click Next.
9. On the Edit User-Defined Table page in the User Defined Table Values section, click Create.
10. In the Add User-Defined Table Values dialog, select the name you specified for the Exact field.
11. In the Value field, enter QUICK_PAY.
12. Save your work.
13. Click Back to return to the Edit User-Defined Table page.

Complete the following steps for the FLOW_NAME_OVERRIDE column.

1. On the Edit User-Defined table page, in the User-Defined Columns section, select FLOW_QUICKPAY_OVERRIDE.
2. Click Next.
3. On the Edit User-Defined Table page in the User Defined Table Values section, click Create.
4. In the Add User-Defined Table Values dialog, select the name you specified for the Exact field.
5. In the Value field, enter the name of the QuickPay flow pattern you configured.
6. Click Submit.

Reverting to the Predefined QuickPay Flow

The Calculate QuickPay task uses the user-defined table values specified in the FLOW_DEFINITION table. As a result, if you no longer want to use the configured default QuickPay flow, edit the user-defined table values.

1. Use the Manage User-Defined Tables task and search for the FLOW_DEFINITION table for your legislative data group.
2. Edit the FLOW_NAME_OVERRIDE column. Delete the name of the configured QuickPay in the Value field in the User-Defined Table Values section.
3. Review the FLOW_NAME column. Keep QUICK_PAY in the Value field in the User-Defined Table Values section.

Related Topics
- Creating a User-Defined Table for Matched Row Values: Example
- Creating a User-Defined Table for a Range of Row Values: Example
- QuickPay: How It’s Processed

Checklist and Flow Tasks
Checklist and Flow Tasks: Explained

A flow can consist of one or more tasks. The flow pattern determines the sequence of tasks executed in a flow. Submitting a flow from the Data Exchange or payroll work areas generates a checklist. Use the flow’s checklist to monitor and manage the tasks included in the flow.

Depending on the flow pattern, the checklist might include:

- Automatic tasks, such as extracts, reports, and processes
- Manual tasks, such as verification tasks required to complete a flow

Working with Checklists

Use the checklist while working with flows to perform the following activities:

- Monitor the status of the flow tasks
- Manage the flow tasks, such as reassigning tasks, marking tasks completed, and performing corrective actions
- View task details, such as a list of records processed by the flow

For payroll, while working on a task in the flow, you can remain in the Payroll Checklist work area or go to a related work area that includes tasks in the regional area. For example, while reviewing the results for the Calculate Payroll task, you might go to the Payroll Calculation work area to review the person’s calculation card or element entries.

Related Topics

- Monitoring the Status of Flow Tasks: Explained

Flow Task Start and Due Dates: Critical Choices

Specify duration dates and notification options in the payroll flow pattern to give flow owners adequate time before a task starts to prepare and before a task is due to address any issues.

Task Start and Due Dates

Specify the following duration dates on the Tasks page of the Manage Payroll Flow Patterns page:

- Start date, the date the task owner should start the task

  Note: The start date applies to notifications only. You schedule when a flow starts on the Scheduling page when you submit the flow.

- Due date, the date the task owner should complete the task

To specify duration dates:

1. Select the flow parameter date to use as the basis for the duration date
2. Optionally, offset the date by specifying a plus or minus value depending on whether the date falls before or after the duration date.
Notifications
Select notifications to send error and warning messages, and to inform the task owner when a task starts or ends. The receipt of notifications depends on the duration dates and their offsets.

1. Specify the notifications the task owner receives.
2. Optionally, specify the number of days before the application automatically deletes a notification from storage.

Use the Manage Payroll Process Configuration task in the Setup and Maintenance work area to complete the Notification Expiration Offset parameter.

Related Topics
• Scheduling Flows: Explained

Managing Corrective Tasks in a Payroll Flow Pattern: Points to Consider
Before defining flow patterns to correct payroll run or payment results, consider whether flow owners can correct individual records or tasks by using task actions, predefined processes, or predefined flows, such as the Cancel Payments flow.

Using Task Actions
Most tasks support corrective task actions at the task level or individual record level. The type of task and its status determine which corrective actions the flow owner can select from the Actions menu when viewing results.
The following figure shows the task actions available from the Actions menu when working on the Payroll Flow Checklist or the Processes and Reports tab of the payroll flow.

You can confirm whether the task includes the task actions by performing these steps:

1. Edit your flow pattern on the Manage Payroll Flow Pattern page of the Payroll Checklist work area.
2. Select the task on the Tasks tab, and edit it.
3. Review the Execution Mode column on the Edit Task Details: Basic Information page to confirm that the task supports the Mark for Retry, Retry, and Roll Back task actions.

Using Predefined Processes

Flow owners can use the Submit a Process or Report task from a payroll work area to submit corrective processes:

- Roll Back Process
- Retry Payroll Process
The flow owner might use these processes to roll back or retry a flow that includes a single process and that is in progress with errors.

**Using Flow Patterns**

If your enterprise performs several tasks to correct problems, flow owners can use a predefined flow pattern, such as the Cancel Payment flow.

- A predefined flow pattern, such as the Cancel Payment flow

  The Cancel Payment flow pattern includes tasks to view the person process results, void the payment, process an external payment to prevent reissue of the original payment, and reverse the original prepayment and payroll run calculations.

- A flow pattern you create, such as a flow pattern to reissue a lost check

  This flow pattern might include tasks to void the payment, issue an external payment, and view the person process results.

**Editing Flow Tasks: Points to Consider**

Edit flow patterns you create or copy. This topic suggests points to keep in mind when you add, delete, or move a task in a flow pattern.

**Editing Tasks**

Refer to the following table for examples of edits you can perform to tasks in a flow pattern or checklist. For each kind of edit, the table also provides examples and the probable impact the edit can have on the flow.

<table>
<thead>
<tr>
<th>Edits</th>
<th>Impact</th>
<th>Examples</th>
</tr>
</thead>
<tbody>
<tr>
<td>Add a task</td>
<td>You add a task to position it as the last task in the activity or task group. Update the task sequence. If you repeat a task, rename it to make clear its purpose on the checklist.</td>
<td>You add a manual verification task after each report. You rename each task with the report name.</td>
</tr>
<tr>
<td>Delete a task</td>
<td>When you delete a task you may impact subsequent tasks in the flow that depend on its results. Review the subsequent tasks.</td>
<td>You delete a task. The Parameter Basis of the next task is Bind to Task and its Basis Value is the value of the deleted task. You update the Parameter Basis of the subsequent task as required, for example, to Bind to Flow.</td>
</tr>
<tr>
<td>Move a task to a different activity</td>
<td>The activity determines the work areas where you can submit the flow patterns you define, and controls how the checklist displays.</td>
<td>You move a task in a payroll flow pattern for a report from the Payments activity to the Statutory activity. The flow owner can view the report results from the Payroll Checklist or Regulatory and Tax Reporting work areas, but not the Payment Distribution work area.</td>
</tr>
</tbody>
</table>
Reorder the list of tasks displayed in a checklist

The sequence specified for the task further determines the task order within an activity on the checklist.

You decide to flatten the checklist sequence to group all the tasks within a single activity.

1. On the Tasks page, you confirm that each task belongs to the same activity and task group.
2. You edit each task, specifying a value in the Sequence column on the Edit Task Details Owners and Details page. The lowest number is used for the first task in the checklist. For example, you might specify a sequence of 10 for the payroll calculation task and 20 for the prepayments calculation task.

You perform these edits on the Task Sequence tab of the Manage Payroll Flow Patterns page. For payroll flow patterns, use the Manage Payroll Flow Patterns task in the Payroll Checklist work area. For extract flow patterns, use the Refine Extracts task in the Data Exchange work area.

**Related Topics**

- Sequencing Rules for Flows and Locked Tasks: Explained

**Flow Security Profiles**

**Flow Security and Flow Owners: Explained**

Your HCM data role security determines which flows you can submit or view. This topic explains how the HCM data roles and flow security work together. You define security for flow patterns using the Manage Payroll Flow Security Profile task in the Setup and Maintenance work area.

Submitting a flow generates a checklist of the included tasks. You become the owner of the flow and its tasks. If a flow pattern designates tasks to different owners, you remain the flow owner. Either you or the owner of a task can reassign the task to someone else, for example, to cover situations where the task is overdue and the task owner is on leave.

**Payroll Flow Security and HCM Data Roles**

HCM data roles secure the access to flows through data privileges and to the tasks on a checklist through functional privileges.

The following figure illustrates how the payroll manager and payroll administrator can submit a process or report and can view the results of the monthly payroll flow. Either the payroll manager or the payroll administrator can submit the flow and perform
its tasks or have the tasks reassigned to them. The payroll manager and the payroll administrator can perform the same tasks because both of them have the same functional privileges. They can both submit and view the payroll flow data.

The following figure illustrates how only the payroll manager can calculate the payroll. The payroll manager can't reassign this task to a payroll administrator, because the administrator doesn't have the necessary functional privileges to submit the monthly payroll flow action.
Troubleshooting

The following table describes what action to take if you encounter problems submitting or completing a task in a flow.

<table>
<thead>
<tr>
<th>Problem</th>
<th>Solution</th>
</tr>
</thead>
<tbody>
<tr>
<td>Can’t submit or view a flow</td>
<td>Confirm that the data role assigned to you includes a security profile for the payroll flow pattern.</td>
</tr>
<tr>
<td>Can’t perform a task, such as a process or report</td>
<td>Confirm that your data role is based on a job or abstract role that includes functional privileges to perform that task.</td>
</tr>
</tbody>
</table>

Creating Flow Pattern Security Profiles: Examples

The following examples illustrate different methods you can use to organize payroll flows into appropriate security profiles. Use the Assign Security Profiles to Role task in the Setup and Maintenance work area to grant workers access to those profiles by data role.

Payroll Processing and QuickPay Flows

Payroll administrators are responsible for payroll processing. The payroll flow security profiles for the payroll administrator data role include the Payroll Cycle flow and the QuickPay flow.
End of Year Reporting

Some payroll administrators are responsible for year-end reporting. The payroll flow security profiles for their data role includes the End of Year flow and the Archive End-of-Year Payroll Results flow.

Hiring and Terminations

HR administrators are responsible for hiring and terminating employees. The payroll flow security profiles for the HR specialist data role includes the New Hire flow and the Termination flow.

Multiple Owners for a Flow

Multiple Owners for a Flow: Explained

You can assign payroll flows and tasks within payroll flows to individuals or multiple individuals within a group. If a group is given ownership, all members of the group have access to the tasks. Any member of the group can claim ownership of a task and complete the task, even if they have not submitted the task.

Use the Manage Payroll Flow Pattern task from the Payroll Checklist work area to create a flow pattern. Use the Owner Type and Owner fields to specify the group or person who can have access to the tasks.

Generally Task ownership and access are given by default to the person who submits the flow. Granting the task ownership and access only to a single person seems restrictive. Taking corrective action on the task and accessing report output is also limited to the user who submitted the report. However, anyone who has access to the flow can monitor the task even if they are not owners of the task. Granting ownership to more than one person ensures continuity and completion of the task. For example, if the person who submitted the task is unavailable, and the task is overdue, someone else can monitor and complete the task.

You can assign group ownership only to user-defined flows and not the predefined flows. When the ownership is defined at a flow level, any future flow instance inherits the group information.

After you submit the flow, you can assign group ownership to the individual tasks. Such ownership is only applicable to the particular flow instance.

Creating Data Roles and Security

Before you assign ownership:

1. Create a data role that you can assign to the users you plan to group together. Use the Manage Data Roles and Security Profiles task from the Setup and Maintenance work area to create the data role. The grouping of users is through the data role you create.

2. While creating the data role, associate appropriate job roles and security profiles as required. The values you associate determine which flows a person with this data role can submit or view.

Creating Users and Adding the Data Role

After you create the data role, use the Manage Users task in the Setup and Maintenance work area to create users. Use Add Role in the Roles region to provision the newly created data role manually to the user.

Selecting the Task Owners

The HCM data role security determines who can submit or view the tasks within the flow pattern. Payroll supervisors or administrators are generally responsible for payroll processing and reviewing payroll report outputs and extracts. Once they
have initiated a payroll flow, others within the group can monitor the flow and ensure the tasks within the flow are completed successfully. You can assign appropriate responsibilities and functional privileges while defining the different data roles and security profiles.

Related Topics

- Creating HCM Data Roles for Global Payroll Implementation Users: Procedure
- Creating HCM Data Roles for Implementation Users: Explained

Editing a Flow Pattern and Creating Multiple Owners: Worked Example

This example demonstrates how to copy a QuickPay flow pattern and change the task owners and assign tasks to multiple individuals within a group. It also demonstrates how you can claim a task, review notifications, and set the status of a flow task as ‘Completed’, so that the flow continues.

The following table summarizes the key decisions for this scenario.

<table>
<thead>
<tr>
<th>Decisions to Consider</th>
<th>In this Example</th>
</tr>
</thead>
<tbody>
<tr>
<td>Who is the task owner for the Verify Payroll Results task?</td>
<td>Payroll Supervisor</td>
</tr>
<tr>
<td>Who is the task owner for the Calculate QuickPay Prepayments task?</td>
<td>Any person who has the Payroll Clerk data role and privileges.</td>
</tr>
<tr>
<td>Who is the task owner for the View Prepayments Results task?</td>
<td>Payroll Supervisor</td>
</tr>
<tr>
<td>Who is the task owner for the Make External Payment task?</td>
<td>Any person who has the Payroll Clerk data role and privileges.</td>
</tr>
<tr>
<td>Who is the task owner for the Verify Payment task?</td>
<td>Payroll Supervisor</td>
</tr>
</tbody>
</table>

Prerequisites

Before you begin, complete the following.

1. Use the Manage Payroll Flow Pattern task from the Payroll Checklist work area to create a QuickPay flow pattern by copying the predefined QuickPay flow pattern. Enter a name for the copied flow pattern and enter the legislative data group (LDG), to restrict this flow to a single LDG. Use the Owner Type and Owner fields to specify the group or person who can have access to the tasks.
2. Use the Manage Data Roles and Security Profiles task from the Setup and Maintenance work area to create a data role. Create a data role for Payroll Supervisor and Payroll Clerk.
3. Ensure the right privileges are set up for the data roles you create.
Specifying a Task Owner
The HCM data role security determines who can submit or view the tasks within the flow pattern. To specify a task owner:

1. In the Payroll Checklist work area, click the Manage Payroll Flow Patterns task from the task pane.
2. On the Manage Payroll Flow Patterns page, search for the QuickPay flow that you created, and edit the flow pattern.
3. On the Tasks tab, select the Verify Payroll Results task, and click the Edit Task icon.
4. On the Edit Task Details: Owner and Checklist page, complete the fields as given in the table below.

<table>
<thead>
<tr>
<th>Field</th>
<th>Value</th>
</tr>
</thead>
<tbody>
<tr>
<td>Owner Type</td>
<td>User</td>
</tr>
<tr>
<td>Owner</td>
<td>Payroll Supervisor</td>
</tr>
</tbody>
</table>

5. Similarly, select the View Prepayment Results task and select Payroll Supervisor as the task owner.
6. Next, select the Verify Payment task and select Payroll Supervisor as the task owner.
7. On the Tasks tab, select the Calculate QuickPay Prepayments task, and click the Edit Task icon.
8. On the Edit Task Details: Owner and Checklist page, complete the fields as given in the table below.

<table>
<thead>
<tr>
<th>Field</th>
<th>Value</th>
</tr>
</thead>
<tbody>
<tr>
<td>Owner Type</td>
<td>Group</td>
</tr>
<tr>
<td>Owner</td>
<td>Payroll Clerk</td>
</tr>
</tbody>
</table>

9. Similarly, select the Make External Payment task and select Payroll Supervisor as the task owner.

10. In the Notifications region, select the Make External Payment task and select Payroll Supervisor as the task owner.
11. Click Submit, and return to the Manage Payroll Flow Patterns page.
12. On the Manage Payroll Flow Patterns page, click Submit.

Claiming a Task and Monitoring Task Status
Once a task is assigned to a group, all users within the group receive the notification for the task, once the task is in the 'Started' status in the checklist. You can review the notification sent to you and claim the task.

1. In the Payroll Checklist work area, click the Manage Payroll Flow Patterns task from the task pane.
2. On the Manage Payroll Flow Patterns page, search for the QuickPay flow that you created, and edit the flow pattern.
3. On the Tasks tab, select the Calculate QuickPay Prepayments task, and click the Edit Task icon.
4. In the Notifications region, select Claim from the Actions menu.
   Once you have claimed the task, the checklist displays you as the owner of the task. Using the checklist you can set the status of the task as, 'Mark as Complete', 'Mark as Incomplete', and so on.
5. In the Notifications region, use the Actions menu to set the status of the task as, 'Mark as Complete', to continue the flow.
   You can also approve, reject, or reassign the task using the Actions menu in the Notifications region.

Related Topics
- Creating HCM Data Roles for Global Payroll Implementation Users: Procedure
- Creating HCM Data Roles for Implementation Users: Explained
Adding a BI Publisher Report to a Flow

Add single or multiple BI Publisher reports to your copied or user-defined flow pattern. When you submit the flow, the report automatically generates an output file that you can view. The output file is based on the template used for the BI Publisher report, such as an html template. The Run BI Publisher Report task belongs to the Statutory activities in the flow pattern.

Adding Your Report to a Flow

Follow these steps to add the task to add your BI Publisher report to an existing extract flow.

1. Use the Manage Flow Patterns task in the Payroll Checklist work area or the Refine Extracts task in the Data Exchange work area or the area.
2. Search and select the flow that you will configure.
3. On the Manage Flow Pattern page, on the Tasks tab, click the Edit button.
4. Click the Select and Add button on the menu bar. In the Search Tasks dialog, search for and select Run BI Publisher Report. Click the Done button.
5. On the Task Sequence page, confirm the sequence is correct.
6. On the Flow Parameters page, add a required parameter for the first argument of the BI Publisher report.

The flow parameters map to the BI Publisher arguments. For example, if your report is based on a SQL query, the first argument is the first bind variable of a SQL query data model.

Tip: To easily determine the sequence of arguments, view the list of parameters for the generated report in BI Publisher.

7. Optionally, rename the parameter to a more meaningful name.
8. On the Task parameters page, in the Parameter Details section, complete the following steps:
   a. Confirm that the Parameter Basis for the First Argument value is Bind to Flow.
   b. Specify a value for the Report Name and Report Path parameters.
      For example, if the BI Publisher data model is saved to the Custom folder in Shared Folders you would specify /Custom/yourBIreport.xdo.
   c. Specify values for other arguments if required.
9. Review the flow and submit it.

Creating a Flow within a Flow

This example describes how to copy the Transfer Batch flow and modify it to include a predefined flow pattern you created. In this example, the predefined flow you add submits a report to check for any batch line errors after transferring a batch. If the transfer fails, you can skip the transfer process or mark it as complete, and then view the report for error details.
Summary of Tasks

This worked example includes details for the following tasks:

1. Creating the parent flow pattern
2. Adding the report flow to the parent flow
3. Testing the flow

Creating the Parent Flow Pattern

1. In the Payroll Checklist work area, select the Manage Payroll Flow Patterns task.
2. Search for and select the row for Transfer Batch, and then click the Copy icon.
3. Enter the name of the new flow pattern, such as Transfer Batch with Error Report.
4. Enter a description, such as "Transfer a batch and view any batch line errors that occurred." and then click Save and Close.
5. Search for and select the Transfer Batch and Error Report flow pattern, and then click Edit.
6. Add the parameter that derives batch name from the batch ID as follows:
   a. On the Parameters tab, click Add.
   b. Select the added row and click Edit.
   c. Add values as shown in this table. The table lists the parameters you must review and edit before you submit the flow.

<table>
<thead>
<tr>
<th>Field</th>
<th>Value</th>
</tr>
</thead>
<tbody>
<tr>
<td>Flow Parameter</td>
<td>Batch Name</td>
</tr>
<tr>
<td>Use for Searches</td>
<td>No</td>
</tr>
<tr>
<td>Display</td>
<td>No</td>
</tr>
<tr>
<td>Display Format</td>
<td>Text</td>
</tr>
<tr>
<td>Sequence</td>
<td>3</td>
</tr>
<tr>
<td>Usage</td>
<td>Input parameter</td>
</tr>
<tr>
<td>Parameter Basis</td>
<td>Post SQL Bind</td>
</tr>
<tr>
<td>Basis Value</td>
<td>select batch_name from pay_batch_headers where batch_id = :BATCH</td>
</tr>
</tbody>
</table>

7. Click Save.
Adding the Report Flow to the Parent Flow

1. On the Tasks tab, click **Select and Add**.
2. In the Search window, search for and select **Submit Another Flow**, and then click **Done**.
3. In the row for Submit Another Flow, click the **Edit** icon in the menu bar and set the values as shown in this table. Use the fields listed in the table to define the task you have added to generate the batch lines error report.

<table>
<thead>
<tr>
<th>Field</th>
<th>Value</th>
</tr>
</thead>
<tbody>
<tr>
<td>Task</td>
<td>Run Batch Lines Report</td>
</tr>
<tr>
<td>Activity</td>
<td>Statutory</td>
</tr>
<tr>
<td>Task Group</td>
<td>Reporting</td>
</tr>
<tr>
<td>Description</td>
<td>Submit the batch lines error report for the specified batch.</td>
</tr>
</tbody>
</table>

4. Edit task parameters as follows:
   a. In the row for Run Batch Lines Report, click **Edit Task**.
   b. Configure the predefined task parameters as shown in this table. To configure task parameters, you must select a parameter and the corresponding parameter basis and basis value.

<table>
<thead>
<tr>
<th>Parameter</th>
<th>Parameter Basis</th>
<th>Basis Value</th>
</tr>
</thead>
<tbody>
<tr>
<td>Flow Name</td>
<td>Constant Bind</td>
<td>The name of the flow, for example Batch Lines Report. This value is case-sensitive. Enter the name exactly.</td>
</tr>
<tr>
<td>From Flow Instance ID</td>
<td>Context Binding</td>
<td>Payroll flow</td>
</tr>
<tr>
<td>From Flow Task Instance ID</td>
<td>Context Binding</td>
<td>Payroll task</td>
</tr>
<tr>
<td>Use to Calculate Results</td>
<td>Constant Bind</td>
<td>Y</td>
</tr>
<tr>
<td>Parameter Name 1</td>
<td>Constant Bind</td>
<td>Batch Name</td>
</tr>
<tr>
<td>Parameter Value 1</td>
<td>Bind To Flow</td>
<td>Batch Name</td>
</tr>
</tbody>
</table>

   c. Click **Next**, and optionally complete the owner and checklist information.
   d. Click **Next**, and optionally complete the duration and notification information.
   e. Click **Submit**.

5. Edit the task sequence as follows:
   a. On the Task Sequence tab, edit the following two rows as shown in this table. The table lists the flow tasks and its sequence in the flow.
Testing the Flow

1. Create and save a test batch that should cause an error. Alternatively, you can search for an existing batch that was transferred with errors using this SQL query:
   
   ```sql
   SELECT * FROM pay_batch_headers WHERE batch_status = 'E';
   ```

2. On the Submit a Process or Report page, select a legislative data group.
3. Select the **Transfer Batch with Error Report** task, and then click **Next**.
4. Enter a unique name for the current flow instance.
5. Enter the name of the batch with errors that you saved or queried, and then click **Submit**.
6. Click **OK and View Checklist**, and then click the **Refresh** icon until the Transfer Batch task shows as in progress with error.
7. View the report in the flow as follows:
   a. Select the row with the Transfer Batch task, and then select **Skip Task** in the Actions menu.
   b. In the row for Run Batch Lines Report, click **Go to Task**.
   c. In the Processes and Results section, click the name of the report.
   d. In the row for Run BI Publisher Report, click **Go to Task**.
   e. On the Process and Reports tab, click **View Results**.
   f. Click the PDF file name to open the report.

Creating a Report to View Batch Line Errors

This example describes how to configure a flow to view a report showing errors that occurred while transferring a batch using the payroll batch loader. After you configure the report and the flow pattern for it, you can add it to other flow patterns. For example, for a user-defined flow pattern that includes the Transfer Batch flow task, you could add this flow immediately after that task.

In this example, the SQL query that defines the data model for the report takes the batch name as a bind variable. The bind variable enables the batch name to be user-entered when run alone, or dynamically derived when run within another flow.

Summary of Tasks

This worked example includes details for the following tasks:

1. Defining the report data model and output file name
2. Generating the report template
3. Configuring the flow pattern to submit the report

Prerequisites

This worked example assumes you completed the following prerequisites:

1. The following software is installed:
   - JRE version 7 or later
   - Microsoft Word
   - Oracle BI Desktop Integration for Word

   **Tip:** Select the Download BI Desktop Tools menu in the Get Started section of the Oracle Business Intelligence home page to download the Template Builder for Word installer.

2. You know the name of an existing batch that has transferred with errors. You will use this batch name for testing your report.

   **Tip:** You can use the following SQL query to retrieve the batch names:
   ```sql
   select * from pay_batch_headers where batch_status = 'E';
   ```

Defining the Report Data Model and Output File Name

1. Sign in as a user with the Oracle Business Intelligence administration privileges.
2. Configure a SQL-based data model for the report as follows:
   a. In the Navigator, select Reports and Analytics.
   b. On the Reports and Analytics work area, click Browse Catalog.
   c. On the Catalog page, select New, and then select Data Model.
   d. On the Diagram tab, click New Data Set, and then click SQL Query.
   e. In the SQL Query window, enter values as shown in this table, and then click OK.

<table>
<thead>
<tr>
<th>Field</th>
<th>Value</th>
</tr>
</thead>
<tbody>
<tr>
<td>Name</td>
<td>Batch Lines Report</td>
</tr>
<tr>
<td>Data Source</td>
<td>ApplicationDB_HCM</td>
</tr>
<tr>
<td>Type of SQL</td>
<td>Standard SQL</td>
</tr>
<tr>
<td>SQL Query</td>
<td>select 'Marker' as Marker, bl.batch_line_id bl.batch_line_status line_text, bl.line_sequence from pay_batch_headers bh, pay_batch_lines bl, pay_message_lines ml where bh.batch_id = bl.batch_id and bl.batch_line_id = ml.source_id and bh.batch_name = :batchName</td>
</tr>
</tbody>
</table>

   **Note:** Ensure that you don’t include a semicolon at the end of your SQL query.
3. To change the name of the output file from Default Document.pdf, follow these steps:
   a. Select **Bursting**.
   b. On the Bursting page, click **Create New Bursting**.
   c. Set field values as shown in this table.

<table>
<thead>
<tr>
<th>Field</th>
<th>Value</th>
</tr>
</thead>
<tbody>
<tr>
<td>Data Source</td>
<td>ApplicationDB_HCM</td>
</tr>
<tr>
<td>Split By</td>
<td>/DATA_DS/G_1/MARKER</td>
</tr>
<tr>
<td>Delivery By</td>
<td>/DATA_DS/G_1/MARKER</td>
</tr>
<tr>
<td>SQL Query</td>
<td>select 'Marker' as KEY, 'Batch Lines Report' as TEMPLATE, 'PDF' as OUTPUT_FORMAT, 'Batch Lines Report - '</td>
</tr>
</tbody>
</table>

**Note:** Ensure that you don’t include a semicolon at the end of your SQL query.

4. Click the **Save As** icon and save the data model in the path **Shared Folders/Custom/** with the name **BatchReportDataModel**.

5. Test that the data model query returns data as follows:
   a. Click **Data Sets**.
   b. On the Data tab, enter the name of an existing batch that transferred successfully with errors, and then click **View**.

   You should see values for BATCH_LINE_ID and BATCH_LINE_STATUS and any messages that occurred.

   **Note:** The batch name field is case sensitive, so enter the name exactly. If you don’t see values or if you entered incorrect SQL syntax, edit the SQL for the data model and try again.

6. Click **Save As Sample Data**, and then click **OK**.

7. Click **Export**, and then save the XML file to your file system. You will use this when designing your report template.

8. Click **Save**.

---

**Generating the Report Template**

1. Generate the report template as follows:
   a. On your data model page, click **Create Report**.
   b. In the Create Report window, click **Cancel**, and then click **OK**.
   c. Click the **Select Data Model** icon, select your data model, and then click **OK**.
   d. Click the **Generate** icon.
   e. In the **Template Name** field, **Batch Lines Report**, and then click the **Generate** button.
   f. Click **Edit** and open the file in Microsoft Word.
g. Save the RTF file to your file system.

2. In Microsoft Word, modify your template as follows:
   a. Delete the MARKER and BATCH_LINE_ID columns from the table.
   b. Change the column headings to user-friendly values, such as Status, Error Text, and Line Number.
   c. Click the Field icon and insert BATCHNAME before the batch lines table.
   d. Insert text before the BATCHNAME field, such as Batch Lines Errors for Batch followed by a colon and space character.
   e. Make any other layout changes, as needed, such as changing column width.
   f. Save and close the RTF file.

3. Upload your modified template as follows:
   b. Click the Upload icon.
   c. Click Browse to select your RTF template, and then click OK.
   d. In the Upload Template File window, in the Locale field, select the same local that is listed as the default local, and then click OK.
   e. Click OK to overwrite the existing template for that locale.
   f. Click Save, and then click Return.

4. Set the default format as follows:
   a. Click View a List.
   b. In the Default Format field, select PDF.
   c. Click Save Report.
   d. In the Save As window, in the Name field, enter Batch Lines Report, and then click OK.

5. Ensure that the report has the correct role access as follows:
   a. On the Catalog page, locate the batch lines report.
   c. Click Add users/roles to add roles, as necessary.
   d. Click OK.

6. Test your report as follows:
   a. On the Catalog page, for the batch lines report, click Edit.
   b. Ensure that the application displays the name of your data model. If it doesn't, add it and save your changes.
   c. On the Catalog page, for the batch lines report, click Open.
   d. In the Batch Name field, enter the batch name you entered previously. You should see the data in the sample report.

Configuring the Flow Pattern

1. Ensure that you are signed in as a user with payroll administration privileges.
2. On the Payroll Checklist work area, select the Manage Payroll Flow Patterns task.
3. Click Create, and then click Continue, with no legislative data group selected.
4. On the Basic Information page, enter the values as shown in this table, and then click Next.
5. Click Next to accept default values until you are on the Parameters page.

6. Add the Batch Name parameter as follows:
   a. Click Select and Add.
   b. Search for and select First Argument, and then click OK.
   c. Click Edit and change its values as shown in this table, and then click Next.

<table>
<thead>
<tr>
<th>Field</th>
<th>Value</th>
</tr>
</thead>
<tbody>
<tr>
<td>Flow Parameter</td>
<td>Batch Name</td>
</tr>
<tr>
<td>Use for Searches</td>
<td>No</td>
</tr>
<tr>
<td>Display</td>
<td>Mandatory</td>
</tr>
<tr>
<td>Display Format</td>
<td>Text</td>
</tr>
<tr>
<td>Sequence</td>
<td>2</td>
</tr>
<tr>
<td>Usage</td>
<td>Input parameter</td>
</tr>
<tr>
<td>Parameter Basis</td>
<td>Post SQL Bind</td>
</tr>
<tr>
<td>Basis Value</td>
<td>select batch_name from pay_batch_headers where batch_id = :BATCH</td>
</tr>
</tbody>
</table>

7. On the Task Parameters page, edit the Report Path parameter as shown in this table.

<table>
<thead>
<tr>
<th>Field</th>
<th>Value</th>
</tr>
</thead>
<tbody>
<tr>
<td>Display</td>
<td>Yes</td>
</tr>
<tr>
<td>Parameter Basis</td>
<td>Constant Bind</td>
</tr>
</tbody>
</table>
8. Select the **First Argument** parameter and ensure that its values are as shown in this table.

<table>
<thead>
<tr>
<th>Field</th>
<th>Value</th>
</tr>
</thead>
<tbody>
<tr>
<td>Basis Value</td>
<td>/Custom/Batch Lines Report.xdo</td>
</tr>
</tbody>
</table>

<table>
<thead>
<tr>
<th>Field</th>
<th>Value</th>
</tr>
</thead>
<tbody>
<tr>
<td>Parameter Basis</td>
<td>Bind to Flow</td>
</tr>
<tr>
<td>Basis Value</td>
<td>Batch Name</td>
</tr>
</tbody>
</table>

9. Click **Next**, and then click **Submit**.

10. Test your flow as follows:
    
    **a.** In the Payroll Checklist work area, select the **Submit a Process or Report** task.
    
    **b.** Select **Batch Lines Report**, and then click **Next**.
    
    **c.** Enter a unique name for the current flow instance.
    
    **d.** Enter the same batch name that you used when generating the report, and then click **Submit**.
    
    **e.** Click **OK and View Checklist**, and then click the **Refresh** icon until the status shows as completed.
    
    **f.** In the row for Run BI Publisher Report, click **Go to Task**.
    
    **g.** On the Process and Reports tab, click **View Results**.
    
    **h.** Click the PDF file name to open the report.

---

**Multiple Instance of a Flow**

**Multiple Instance of a Flow: Explained**

You can create a flow pattern and repeat a task instance multiple times. For example, you can schedule the Archive End-of-Year Payroll Results task for multiple payroll statutory units (PSUs) within the organization. You can initiate and submit the task for a single PSU and the task repeats itself for each subsequent PSU. The task repeats itself depending on the number of iterations you have specified.

Use the Manage Payroll Flow Pattern task from the Payroll Checklist work area to create a flow pattern that includes the task, Submit Another Task. Submit Another Task takes the task name as the input parameter and uses the repeat formula to execute multiple submissions of a task. The formula controls the repetition logic and execution of the task.

The following sections explain the main components you must consider while using this task.

**Task Name**

This is the name of the task that is submitted multiple times. The Submit Another task takes this parameter as an input parameter.

**Task Repeat Formula**

The Task Repeat Formula is a prerequisite for this flow and it decides the repetition logic and drives the iteration. When you create the repeat formula, you must use the "Task Repeat" formula type. The input parameters are predefined for an input
task. You can add them as flow parameters during flow creation. The formula return values are used to validate the task parameters.

Parameters
Task parameters submit the information required for the task submissions to complete successfully. This flow has two sets of parameters:

- Parameters for Submit Another Task
- Parameters for the repeat submission task that is submitted multiple times

You can specify the parameters for Submit Another Task as flow task parameters while defining the flow pattern.

The input values for the repeat submission task are either one of the following:

- Task parameters from the flow parameters defined while creating the flow
- Return parameters from the repeat formula

The application uses the flow parameter values as the task parameters in either one of the following manners:

- If the task parameter name matches the Base Flow Parameter Name, exposed in the UI at the flow-level, then the values are used directly.
- If the task parameter names do not match the Base Flow Parameter Name, the application uses a fast formula function to pass the flow parameter values as the task parameters. This formula function is built into the repeat formula.

For example, assume that you have defined the flow parameter as 'Effective Date', and the corresponding Base Flow Parameter Name is 'EFFECTIVE DATE'. The application uses formula function `GET_FLOW_PARAM_VALUE()` and stores the return value of this formula function in the task parameter 'EFFECTIVE DATE'. The formula function is:

```
*EFFECTIVE DATE=GET_FLOW_PARAM_VALUE('Effective Date')
```

You must provide the correct parameter basis when you define the task parameters. Some of the static parameters like the Effective Date or the Start Date can have a parameter basis value of 'Bind to Flow'. The dynamic parameters like the Payroll Statutory Unit ID are derived from the database tables. Hence can have a parameter basis value of 'Bind to Flow Task' or 'Context Binding'. If you have defined specific names for the flow task parameters, you must ensure that the same names are used in the repeat formula.

Alternately, you can use the return parameters from the repeat formula as the task parameters. In this case the input parameters for the repeat formula are only the Base Task Name and the Repeat Counter. While calling the formula, the application uses these two parameters to get the context of the job submission. You create the Repeat formula to return input values for the submission task.

The formula output Repeat Flow decides if another job submission has to be done.

These parameters can be static or dynamic parameters. For example, for the Archive End-of-Year Payroll Results process the following parameters are defined as static parameters:

- Effective Date
- Start Date
- Tax Year Date
- Repeat Counter

The Repeat Counter is a static variable and is maintained by the application. During the iteration process this parameter increments by '1' after every submission.
In this example, the dynamic parameters for each submission are:

- Payroll Statutory Unit ID
- Repeat Flow

However, you can also define the Tax Year as a dynamic parameter, so that you can generate the report for various years.

**Maximum Repeat Counter**

You can specify a threshold limit of the maximum number of instances that can be executed for a single submission of the task. If the iteration runs into an error, this parameter prevents the process from getting into an infinite loop. A repeat counter N indicates one parent and N-1 child submissions.

**Repeat Flow Parameter**

The repeat flow parameter indicates when the task iteration should stop. A repeat flow instance is submitted only if the repeat flow parameter is set to 'Y'.

**Execute in Parallel**

You can execute the submissions in parallel or serial. For parallel submissions, the number of threads is taken into consideration. A number of submissions equivalent to the number of threads is submitted in parallel. For serial submissions, number of submissions equivalent to the Repeat Counter is executed one after the other.

If you have set the Execute in Parallel parameter to 'Yes', you must specify a value for the Maximum Parallel Threads. This parameter is taken into consideration for a parallel submission.

For example, if you have specified a value of X, during a submission, the application processes X instances of the task initially. The parent task waits for X child submissions to complete, evaluates the fast formula and executes another set of X child submissions to complete. This cycle continues till the Maximum Repeat Counter submissions are completed or the Repeat Flow value is 'N'.

**Parent Log File**

After the flow is completed, you can view the ESS Log file to view the details of the input parameters for each job submission. The log displays one set of flow instance details and parameter values for the parent submission and similar set of values for each subsequent child submission.

**Generating Archive End-of-Year Payroll Results Process for Multiple PSUs: Worked Example**

This example demonstrates how you can create a flow pattern using Submit Another Task and generate the Archive End-of-Year (EOY) report. You generate the report for individual payroll statutory units (PSUs) within your organization. The Archive EOY Payroll Results task is used to retrieve employee and employer information and employee balances in a given year for year-end reporting.

Use the Manage Payroll Flow Pattern task from the Payroll Checklist work area to create a flow pattern that also includes the task, Submit Another Task.

**Prerequisites**

You have reviewed and validated the year-end data and completed balance adjustments and balance feeds for year-end reporting.
The following table summarizes the key decisions for this example.

<table>
<thead>
<tr>
<th>Decisions to Consider</th>
<th>In This Example</th>
</tr>
</thead>
<tbody>
<tr>
<td>What is the start date of the report?</td>
<td>January 01, 2011</td>
</tr>
<tr>
<td>What is the effective date of the report?</td>
<td>January 01, 2012</td>
</tr>
<tr>
<td>What is the tax year date?</td>
<td>January 01, 2011</td>
</tr>
<tr>
<td>What is the repeat formula name?</td>
<td>Sample Formula</td>
</tr>
<tr>
<td>Is this report confined to a single legislative data group (LDG)?</td>
<td>No. The report can be used globally for any LDG in the organization.</td>
</tr>
<tr>
<td>What are the static flow parameters?</td>
<td>Effective Date, Start Date, Tax Year Date, Repeat Counter</td>
</tr>
<tr>
<td>What are the dynamic parameters?</td>
<td>Payroll Statutory Unit ID and the Repeat Flow</td>
</tr>
</tbody>
</table>

The input parameters for the repeat submissions are obtained from the repeat formula returns. In this example, you will:

1. Create a repeat formula
2. Create a flow pattern
3. Submit the flow
4. View the results and log file

Creating the Repeat Formula

In this example, you use the text editor to create a fast formula and return the values required to run the Archive EOY Results for a PSU. This formula is not specific to any legislative data group (LDG) and the formula type you use for this formula is Task Repeat.

Complete the following steps to create a repeat formula:

1. Select the Manage Fast Formulas task in the Payroll Calculations work area.
2. On the Manage Fast Formulas page, click the Create icon, to create a new formula.
3. On the Create Fast Formula, complete the fields as shown in this table.

<table>
<thead>
<tr>
<th>Field</th>
<th>Value</th>
</tr>
</thead>
<tbody>
<tr>
<td>Formula Name</td>
<td>Sample Formula</td>
</tr>
<tr>
<td>Formula Type</td>
<td>Repeat Task</td>
</tr>
<tr>
<td>Description</td>
<td>Archive EOY Results for each PSU</td>
</tr>
<tr>
<td>Effective Start Date</td>
<td>January 01, 2011</td>
</tr>
</tbody>
</table>

4. Click Continue.
5. Enter the following formula text details in the Formula Text Section.

```plaintext
FORMULA NAME: Sample Formula
FORMULA TYPE: Flow Schedule
DESCRIPTION: Formula to iterate the EOY Archiver
Formula Results: Iterates the EOY and generates the report
/* Inputs */
INPUTS ARE REPEAT_COUNTER, BASE_TASK_NAME (text)
REPEATFLOW = 'N'
START_DATE = '2011-01-01'
EFFECTIVE_DATE = '2012-01-01'
TAX_YEAR_DATE = '2011-01-01'

/* FORMULA BODY */
IF REPEAT_COUNTER = 1
THEN (PAYROLL_STATUTORY_UNIT = 300100001794785
  REPEATFLOW = 'Y')
IF REPEAT_COUNTER = 2
THEN (PAYROLL_STATUTORY_UNIT = 300100002950763
  REPEATFLOW = 'Y')
IF REPEAT_COUNTER = 3
THEN (PAYROLL_STATUTORY_UNIT = 300100013071724
  REPEATFLOW = 'Y')
IF REPEAT_COUNTER = 4
THEN (PAYROLL_STATUTORY_UNIT = 300100007796226
  REPEATFLOW = 'N')

/* Results */
RETURN START_DATE, EFFECTIVE_DATE, TAX_YEAR_DATE, PAYROLL_STATUTORY_UNIT, REPEAT_COUNTER, REPEATFLOW
/* End Formula Text */
```

6. Click **Compile**.

7. Click **Save**.

Creating a Flow Pattern

Complete the following steps to create a flow pattern:

1. Select the **Manage Payroll Flow Patterns** task in the Payroll Checklist work area.
2. Click the **Create** icon to create a new flow pattern. You can also search for and select an existing flow pattern to copy.
3. Leave the Legislative Data Group field blank and click **Continue**.
4. On the Basic Information page, complete the fields as given below. The following table lists the fields and their respective values for the basic flow information.

<table>
<thead>
<tr>
<th>Field</th>
<th>Value</th>
</tr>
</thead>
<tbody>
<tr>
<td>Flow Pattern Name</td>
<td>EOY Results Flow</td>
</tr>
<tr>
<td>Description</td>
<td>Enter a description for the flow.</td>
</tr>
<tr>
<td>LDG Required</td>
<td>No</td>
</tr>
<tr>
<td>Activities to Include</td>
<td>Select two options, Statutory and Calculate.</td>
</tr>
</tbody>
</table>

5. Select **Submit Another Task** to include it in the flow pattern. The activity associated with the task determines the work area where you can submit the flow.

6. On the Task Sequence page, reorder, add, or delete tasks as required.
7. Specify the order in which the tasks display in the checklist. You can specify a value for the sequence on the Edit Task Details Owners and Checklist page.

8. On the Parameters page, select the Create icon.

9. On the Select and Add: Parameters page, add the parameters as given in the following table, to complete the flow pattern.

The following table lists the parameters that you must complete for the Submit Another Task flow.

<table>
<thead>
<tr>
<th>Name</th>
<th>Description</th>
<th>Task</th>
<th>Display</th>
</tr>
</thead>
<tbody>
<tr>
<td>Task Name</td>
<td>Name of the task</td>
<td>Submit Another Task</td>
<td>Required</td>
</tr>
<tr>
<td>Task Repeat Formula</td>
<td>Name of the formula</td>
<td>Submit Another Task</td>
<td>Required</td>
</tr>
<tr>
<td>Maximum Repeat Counter</td>
<td>Maximum number of submissions</td>
<td>Submit Another Task</td>
<td>Required</td>
</tr>
<tr>
<td>Execute in Parallel</td>
<td>Decides if the submissions are in parallel or sequential</td>
<td>Submit Another Task</td>
<td>Yes</td>
</tr>
<tr>
<td>Maximum Parallel Threads</td>
<td>Maximum number of submissions executed in parallel</td>
<td>Submit Another Task</td>
<td>Yes</td>
</tr>
</tbody>
</table>

The application uses the flow parameters to submit and complete the tasks in the flow pattern, or as a basis for deriving values to submit the remaining tasks in the flow pattern.

10. After you have completed the requisite parameters, click OK.

11. On the Task Parameters page, review the parameters, and if necessary update the parameters.

12. Review the resulting checklist for the flow pattern before submitting the flow pattern.

13. Click Submit.

Submitting the Flow

Complete the following steps to submit the newly created flow pattern.

1. Select the Submit a Payroll Flow task in the Payroll Checklist work area.

2. Search for EOY Results Flow and click Next.

3. Enter the parameters as given in the following table.

The following table lists the fields and their respective values for submitting the flow.

<table>
<thead>
<tr>
<th>Field</th>
<th>Value</th>
</tr>
</thead>
<tbody>
<tr>
<td>Payroll Flow</td>
<td>Enter a payroll flow name.</td>
</tr>
<tr>
<td>Task Name</td>
<td>Archive End-of-Year Payroll Results</td>
</tr>
<tr>
<td>Task Repeat Formula</td>
<td>Archive EOY Results Repeat Formula</td>
</tr>
<tr>
<td>Maximum Repeat Counter</td>
<td>10</td>
</tr>
<tr>
<td>Execute in Parallel</td>
<td>Yes</td>
</tr>
</tbody>
</table>
### Field Value

<table>
<thead>
<tr>
<th>Field</th>
<th>Value</th>
</tr>
</thead>
<tbody>
<tr>
<td>Maximum Parallel Threads</td>
<td>3</td>
</tr>
</tbody>
</table>

4. Click **Next**. Check the flow interaction.
5. Click **Next** and select the schedule. You can select ‘As Soon As Possible’ to execute the task immediately.
6. Click **Review** to review the parameters.
7. Click **Submit**.
8. Click **Done**.

### Viewing the Results and Log File

To access the archive results after the process is submitted:

1. From the Confirmation page, click **OK and View Checklist**.
2. Click **Go to Task**.
3. Click the **Processes and Results** tab.
4. Click **View Results**.
5. Highlight a process row to view the results of a specific process.
6. Click the **View Output** icon to view the output of the process.
7. Click the **Log** icon to view the process log.
   - The log file shows details of each submission. You can also use the View Payroll Process Results task in the Payroll Checklist work area to view the process results.

### Using Value Sets in Payroll Flows

#### Using Value Sets in Payroll Flows: Explained

You can use value sets for descriptive flexfields to control and validate the data used in the payroll flow patterns. The value set provides a dynamic list of values for an entry value.

The value set filters values that already exist in tables, such as person name or number, location, legislative data group, or payroll statutory unit. The benefit of this approach is that you don’t have to create and maintain a lookup type. Using value sets helps maintain consistency and accuracy in your data.

Use the Manage Value Sets task in the Setup and Maintenance work area to create a value set. Consider the following while creating value sets for payroll flows:

- The Module field specifies which specific module you want the value set to be created for. For example, you can create a value set for payroll calculations, payroll checklists, payroll flows, and so on.

- The only type of value set supported for payroll flow parameters is the table-based value set. Other value set types, such as Independent or Format Only, are not supported. Once the value set is created, it filters values from an existing table using a SQL statement. The value set is then made available as a parameter to run a payroll flow.

- Value Data Type refers to the data type of the values that are filtered from an existing data and displayed on the payroll flow page. You can use values of type Character only.

- While creating the value set definition, enter the following details to build a query for the value set:
  - The From Clause defines the table name used for the query.
The Value Column Name is the attribute which is visible on the screen.
ID Column Name is the attribute used to store the value in the back end. The Column Type and Column Length pertain to the column in the database that stores the entered values.

- When creating a value set for a flow parameter which is dependent upon another parameter value, put the respective parameter name as bind value in the Where Clause. For example, if the location parameter is dependent upon the payroll flow parameter while flow submission, bind the payroll flow ID value to the Where Clause as given below:

  \[ \text{Pf}_\text{ flow_id} = \{\text{PARAMETER.LOCATION_IP}\}, \text{where LOCATION_IP is the value name.} \]

Using value sets gives you the flexibility to create your own list of values, without depending on other teams.

Using Value Sets in Payroll Flows: Worked Example

This example demonstrates how you can create a value set and use the input values for location name as an entry value for a flow. The location parameter is used in the flow to generate multiple reports in a sequence.

Use the Manage Value Sets task in the Setup and Maintenance work area to create a value set. After you create a value set, use the Manage Payroll Flow Patterns task from the Payroll Checklist work area to link the value set with a flow.

The process creates a Location parameter that you can use when you run the custom flow. The search option on the parameter helps you select an appropriate value.

The tasks include:

1. Creating a value set that returns all locations
2. Adding the value set codes to the Manage Payroll Flow Patterns page

Creating a Value Set that Returns all Locations

To create a value set that returns all locations:

1. From the Setup and Maintenance work area, click the Manage Value Sets task from the task pane.
2. On the Manage Value Sets page, click Create.
3. Complete the fields, as shown in this table.

<table>
<thead>
<tr>
<th>Field</th>
<th>Value</th>
</tr>
</thead>
<tbody>
<tr>
<td>Value Set Code</td>
<td>LOCATION_VS</td>
</tr>
<tr>
<td>Description</td>
<td>Locations</td>
</tr>
<tr>
<td>Module</td>
<td>Payroll Flows</td>
</tr>
<tr>
<td>Validation Type</td>
<td>Table</td>
</tr>
<tr>
<td>Value Data Type</td>
<td>Character</td>
</tr>
<tr>
<td>FROM Clause</td>
<td>pay_flows_pf</td>
</tr>
<tr>
<td>Value Column Name</td>
<td>pft.flow_name</td>
</tr>
</tbody>
</table>
### Chapter 13
Setting Up Payroll Flow Patterns

<table>
<thead>
<tr>
<th>Field</th>
<th>Value</th>
</tr>
</thead>
<tbody>
<tr>
<td>Value Column Type</td>
<td>VARCHAR2</td>
</tr>
<tr>
<td>Value Column Length</td>
<td>100</td>
</tr>
<tr>
<td>ID Column Name</td>
<td>pf.base_.flow_id</td>
</tr>
<tr>
<td>ID Column Type</td>
<td>Number</td>
</tr>
<tr>
<td>ID Column Length</td>
<td>18</td>
</tr>
<tr>
<td>WHERE Clause</td>
<td>Pf_flow_id = (PARAMETER. LOCATIONIP)</td>
</tr>
<tr>
<td>ORDER BY Clause</td>
<td>pft.flow_name</td>
</tr>
</tbody>
</table>

**Note:** LOCATION_IP is the input value name.

4. Optionally, to secure the value set, you can select the **Data Security** check box and provide the Data Security Resource Name.  
   Note: Data security can be enabled only if the value set is based on a single table or view.

5. Click **Save**.

### Adding the Value Set Codes to the Manage Flow Patterns Page

To add the value set codes to the Manage Flow Patterns page:

1. Form the Payroll Checklist work area click the **Manage Flow Patterns** task.
2. Create a new custom flow to meet your requirements, add required tasks and arrange their sequence.  
The application uses the flow parameters to submit and complete the tasks in the flow pattern, or as a basis for deriving values to submit the remaining tasks in the flow pattern.
3. Select the **Parameters** tab, and click **Create**, and create an empty parameter.
4. Select the new parameter and click **Edit** and add the following parameter details as shown in the table below.

<table>
<thead>
<tr>
<th>Field</th>
<th>Value</th>
</tr>
</thead>
<tbody>
<tr>
<td>Display Format</td>
<td>Value Set</td>
</tr>
<tr>
<td>Lookup</td>
<td>Enter the Value Set Name, LOCATION_VS, in this example.</td>
</tr>
</tbody>
</table>

5. Optionally, enter **Owner and Checklist** information, and then click **Next**.
6. Click **Submit**.
   While running the custom flow, the Location parameter renders as a smart list of values. You can use the search option to select a location.

### FAQs for Payroll Flow Patterns
Can I edit a predefined flow pattern?

You can't edit predefined flow patterns, but you can edit payroll flow patterns that you copy or create. For example, you might copy a predefined flow pattern and configure it to your requirements, such as adding a report extract you defined, or displaying additional flow parameters. You might create a new flow pattern that includes only the tasks you perform during a specific phase of the payroll cycle, such as the end of an accounting period or at the end of a quarter.

Can I skip the flow parameters for a single-task payroll flow pattern?

No, you must specify flow parameters required to successfully complete the task. Typically, these parameters include the mandatory task action parameters. You can also specify optional parameters that serve to restrict the results of the flow.

How can I rearrange tasks in a flow pattern?

Edit the task sequence by selecting a different task in the Following Task column. Every flow pattern begins with a Start Flow task, which does not belong to an Activity or Task Group, and concludes with an End Flow task.

When creating a flow, use the Manage Payroll Flow Pattern task in the Payroll Checklist work area or the Refine Extracts task in the Data Exchange work area. Rearrange tasks on the Task Sequence page. When editing a flow, select the task and edit its sequence on the Create Flow Pattern: Basic Information page. When you submit a flow, processes in the flow use and build upon the results of previous processes. To maintain data integrity, ensure the sequenced tasks follow a consecutive order.

Related Topics

- Sequencing Rules for Flows and Locked Tasks: Explained

How can I run tasks concurrently in a flow?

Use the Manage Payroll Flow Patterns task in the Payroll Checklist. Search for and open your flow pattern. Click the Task Sequence tab. You specify that each concurrent task follows the same previous task.

For example, you create a flow pattern with a payroll calculation task and two reports. The flow ends when both reports complete. For the first row, you specify the Start Flow task with the Calculate Payroll as the following task. For the second row, you specify Calculate Payroll as the task, and the first report as the following task. For the third row, you specify Calculate Payroll as the task, and the second report as the following task. For the fourth row, you specify the first report as the task and End Flow as the following task. For the last row, you specify the second report as the task and End Flow as the following task.

What happens if I don't enter a task owner in a flow pattern?

The person who submits the flow becomes the flow owner and the task owner. The person’s security privileges determine whether the person can submit the flow.
Why don't the duration dates in the flow pattern display?

The start and end dates and their offsets display after you complete the flow parameter dates. Use the Manage Payroll Flow Patterns task in the Payroll Checklist work area or the Refine Extracts task in the Data Exchange work area. Enter the flow parameters on the Parameters page, and then return to the Tasks page to enter the duration dates.

If your flow pattern doesn't specify dates as flow parameters, the duration list of values is blank. Change the values for the Duration list by displaying the date parameters for tasks in your flow pattern.

Can I automate a QuickPay flow using a service?

No, because QuickPay tasks require user input. The Flow Actions service is only for flows that don't require user action.
14 Setting Up Payroll Process Configuration

Payroll Process Configuration Groups

Payroll process configuration groups provide sets of processing parameters, primarily related to logging and performance. When you run a process, such as a new-hire flow or termination flow, or an extract process or report, you can select a process configuration group.

If you don’t select a process configuration group, the application uses the parameters in the default group. You must specify the default group in the Process Configuration Group ACTION_PARAMETER_GROUPS profile option.

The following table gives details of the tasks and work areas where you can set up profile options and default process configuration groups.

<table>
<thead>
<tr>
<th>Action</th>
<th>Work Area</th>
<th>Task and Page</th>
</tr>
</thead>
<tbody>
<tr>
<td>Edit predefined process configuration groups</td>
<td>Setup and Maintenance or Payroll Calculation</td>
<td>Default Group tab of the Manage Payroll Process Configuration page</td>
</tr>
<tr>
<td>Create additional process configuration groups</td>
<td>Setup and Maintenance or Payroll Calculation</td>
<td>Group Overrides tab on the Manage Process Configuration Group page</td>
</tr>
<tr>
<td>Select a process configuration group as the default at the site or user level</td>
<td>Setup and Maintenance</td>
<td>Manage Default Process Configuration Group Profile Option Values task or the Manage Administrator Profile Values task</td>
</tr>
</tbody>
</table>

You might create a group with the logging parameters turned on to troubleshoot processes. You can also specify different performance parameter values, such as chunk size and buffer size, for running different processes.

Related Topics

- Setting Profile Option Values: Procedure

Parameters

Payroll Process Configuration Parameters

Payroll processing parameters are system-level parameters that control aspects of payroll-related processes, such as flows and reports. Values for each parameter are predefined with the application, but you can override these values as part of your initial implementation and for performance tuning. Use the Manage Payroll Process Configuration task in the Setup and Maintenance work area.
Processing Parameters

The effects of setting values for specific parameters may be system-wide. When you submit a process that uses flows, such as a batch upload, new hire, or report process, it reads values from the PAY_ACTION_PARAMETERS table.

*Note:* You should understand the concept of array processing and how this affects performance before setting some parameters.

The application does not allow a blank value for any parameter and you must delete the parameter row if the parameter is not required.

The following table describes processing parameters and lists values and predefined default values. These parameters apply to HR applications including payroll and payroll interface.

<table>
<thead>
<tr>
<th>Parameter</th>
<th>Description</th>
<th>Values</th>
</tr>
</thead>
<tbody>
<tr>
<td>Assignment ID to End Logging</td>
<td>Assignment ID upon which logging ends.</td>
<td>Default: All assignments</td>
</tr>
<tr>
<td>Assignment ID to Start Logging</td>
<td>Assignment ID upon which logging starts.</td>
<td>Default: All assignments</td>
</tr>
<tr>
<td>Balance Buffer Size</td>
<td>Buffer size for array inserts and updates of latest balances, based on one row per balance.</td>
<td>Maximum: 1000</td>
</tr>
<tr>
<td></td>
<td></td>
<td>Minimum: 1</td>
</tr>
<tr>
<td></td>
<td></td>
<td>Default: 500</td>
</tr>
<tr>
<td><strong>Tip:</strong></td>
<td></td>
<td></td>
</tr>
<tr>
<td></td>
<td></td>
<td>If your trace files show differences between execute and retrieve timings, look at the buffer sizes you’re using. Try setting each of these to 100.</td>
</tr>
<tr>
<td>Batch Error Mode</td>
<td>Determines error notifications for payroll batch loader uploads.</td>
<td>ALL = all rows</td>
</tr>
<tr>
<td></td>
<td></td>
<td>ANY = any rows</td>
</tr>
<tr>
<td></td>
<td></td>
<td>NONE = no errors</td>
</tr>
<tr>
<td></td>
<td></td>
<td>Default: ANY</td>
</tr>
<tr>
<td>Chunk Size</td>
<td>Number of payroll relationship actions that process together. See also the Parallel Processing Parameters topic.</td>
<td>Maximum: 16000</td>
</tr>
<tr>
<td></td>
<td></td>
<td>Minimum: 1</td>
</tr>
<tr>
<td></td>
<td></td>
<td>Default: 20</td>
</tr>
<tr>
<td>Disable Locking Code in Check Process Post-Populate Method</td>
<td>Disables the locking code added to the post-populate method to improve check process performance. This parameter isn’t available by default. To add the parameter, search for the lookup type PAY_ACTION_PARAMETER_TYPE on the Manage Common Lookup page and add the lookup code ORA_DISABLE_POST_POP_FIX.</td>
<td>Yes, No</td>
</tr>
<tr>
<td></td>
<td></td>
<td>Default: No</td>
</tr>
<tr>
<td></td>
<td></td>
<td>Don’t change this value unless advised by Oracle Support.</td>
</tr>
<tr>
<td>Parameter</td>
<td>Description</td>
<td>Values</td>
</tr>
<tr>
<td>---------------------------------------</td>
<td>-------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------</td>
<td>--------</td>
</tr>
<tr>
<td>Element Entry Buffer Size</td>
<td>Buffer size that payroll runs use in the initial array selects of element entries, element entry values, run results, and run result values per assignment.</td>
<td></td>
</tr>
<tr>
<td></td>
<td>Maximum: 1000</td>
<td></td>
</tr>
<tr>
<td></td>
<td>Minimum: 1</td>
<td></td>
</tr>
<tr>
<td></td>
<td>Default: 500</td>
<td></td>
</tr>
<tr>
<td>Formula Execution Logging</td>
<td>Sets the logging level to investigate formula code problems. See also the Logging Processing Parameters topic.</td>
<td>Delete the parameter row if the parameter is not required.</td>
</tr>
<tr>
<td>Historic Payment</td>
<td>Removes the validation to look for banks active as of the process date. This validation is usually enforced by the payments process.</td>
<td>Yes, No</td>
</tr>
<tr>
<td></td>
<td>This parameter isn’t available by default. You can add it in test environments only. To add the parameter, search for the lookup type PAY_ACTION_PARAMETER_TYPE on the Manage Common Lookups page and add the lookup code HISTORIC_PAYMENT.</td>
<td>Default: No</td>
</tr>
<tr>
<td>Logging Area</td>
<td>Area where code logging is performed. See also the Logging Processing Parameters topic.</td>
<td>The values correspond to C-code entries in the form PY_ENTRY, that includes the functional area that has logging enabled.</td>
</tr>
<tr>
<td>Logging Category</td>
<td>Helps investigate problems with large volumes of detailed data. See also the Logging Processing Parameters topic.</td>
<td>You can set any number of categories by specifying multiple values. For example, enter GMPE, for general logging information, routing information, performance information, and element entry information.</td>
</tr>
<tr>
<td></td>
<td>Refer to the Logging Processing Parameters topic in the Related Links section for applicable values.</td>
<td>Delete the parameter row if the parameter is not required.</td>
</tr>
<tr>
<td>Manual Task Processing</td>
<td>Enables processing of manual tasks when SOA server is unavailable.</td>
<td>Y, N</td>
</tr>
<tr>
<td></td>
<td>Default: Y</td>
<td></td>
</tr>
<tr>
<td>Maximum Errors Allowed</td>
<td>Number of payroll relationship actions that you can roll back, when rolling back a process.</td>
<td>Minimum: 0</td>
</tr>
<tr>
<td></td>
<td>Default: CHUNK_SIZE or 20</td>
<td></td>
</tr>
<tr>
<td>Maximum File Size for View Report Output</td>
<td>Maximum size in bytes of the report file to show in the output window.</td>
<td>Must be a positive number.</td>
</tr>
<tr>
<td></td>
<td>This parameter isn’t available by default. To add the parameter, search for the lookup type PAY_ACTION_PARAMETER_TYPE on the Manage Common Lookups page and add the lookup code BI_OUTPUT_SIZE.</td>
<td>Default: 1000000</td>
</tr>
<tr>
<td>Parameter</td>
<td>Description</td>
<td>Values</td>
</tr>
<tr>
<td>--------------------------------------------------------</td>
<td>------------------------------------------------------------------------------</td>
<td>---------------------------------------------</td>
</tr>
<tr>
<td>Maximum Iterations Allowed per Run Action</td>
<td>Maximum number of iterations allowed per run action within net-to-gross calculations within the payroll run.</td>
<td>Minimum: 0</td>
</tr>
<tr>
<td></td>
<td></td>
<td>Default: 15</td>
</tr>
<tr>
<td>Maximum Number of Payroll Relationship Actions to Roll Back</td>
<td>Number of payroll relationship actions that you can roll back, when rolling back a process.</td>
<td>Minimum: 1</td>
</tr>
<tr>
<td></td>
<td></td>
<td>Default: 50</td>
</tr>
<tr>
<td>Multithreaded XML Generation for Extracts</td>
<td>Generates XML for extracts using multiple threads.</td>
<td>Y, N</td>
</tr>
<tr>
<td></td>
<td></td>
<td>Default: N</td>
</tr>
<tr>
<td>New Hire Flow Pattern</td>
<td>Name of the customer-defined flow that is triggered as part of the new hire process.</td>
<td>Delete the parameter row if the parameter is not required.</td>
</tr>
<tr>
<td>Notifications Expiration Offset</td>
<td>Number of days before a payroll flow notification is automatically deleted.</td>
<td>Minimum: 5</td>
</tr>
<tr>
<td></td>
<td></td>
<td>Default: 5</td>
</tr>
<tr>
<td>Payroll Batch Loader Encryption Type</td>
<td>The type of encryption applied to source files loaded using the payroll batch loader.</td>
<td>PGPSIGNED, PGPUNSIGNED, PGPX509SIGNED, PGPX509UNSIGNED</td>
</tr>
<tr>
<td></td>
<td></td>
<td>Delete the parameter row if the parameter is not required.</td>
</tr>
<tr>
<td>Payroll Criteria for Element Eligibility</td>
<td>Enables eligibility by payroll for assignment-level elements.</td>
<td>Yes, No</td>
</tr>
<tr>
<td></td>
<td></td>
<td>Default: No</td>
</tr>
<tr>
<td>Process Timeout</td>
<td>Number of minutes before the Run Balance Generation process times out.</td>
<td>Minimum: 0</td>
</tr>
<tr>
<td></td>
<td></td>
<td>Default: No timeouts limit enforced. Delete the parameter if no value is specified.</td>
</tr>
<tr>
<td>Remove Report Assignment Actions</td>
<td>Removes report processing actions after generating reports.</td>
<td>Yes, No</td>
</tr>
<tr>
<td></td>
<td></td>
<td>Default: Yes</td>
</tr>
<tr>
<td>Run Result Buffer Size</td>
<td>Buffer size for array inserts and updates, based on 1 row for each payroll run result.</td>
<td>Maximum: 1000</td>
</tr>
<tr>
<td></td>
<td></td>
<td>Minimum: 1</td>
</tr>
<tr>
<td></td>
<td></td>
<td>Default: 500</td>
</tr>
<tr>
<td>Shuffle Chunk Processing</td>
<td>Random processing of order chunks for assignment actions.</td>
<td>Yes, No</td>
</tr>
<tr>
<td></td>
<td></td>
<td>Default: No</td>
</tr>
<tr>
<td>Suppress Empty XML Tags in Extract Reports</td>
<td>Reduces the size of extract output for reports by excluding tags with blank values in XML output files.</td>
<td>Y, N</td>
</tr>
<tr>
<td></td>
<td></td>
<td>Default: Y</td>
</tr>
<tr>
<td>Parameter</td>
<td>Description</td>
<td>Values</td>
</tr>
<tr>
<td>-----------------------------------</td>
<td>-----------------------------------------------------------------------------</td>
<td>----------------------------------------------------------------------</td>
</tr>
<tr>
<td>Termination Flow Pattern</td>
<td>Name of the customer-defined flow that is triggered as part of the termination process.</td>
<td>Delete the parameter row if the parameter is not required (No predefined Termination flow pattern).</td>
</tr>
<tr>
<td>Threads</td>
<td>Total number of subprocesses that you can run from the Oracle Enterprise Scheduler Service. See also the Parallel Processing Parameters topic.</td>
<td>Minimum: 1</td>
</tr>
<tr>
<td>Trace</td>
<td>Enables the database trace facility for application processes written in C only.</td>
<td>Yes, No</td>
</tr>
<tr>
<td>Trace Level</td>
<td>Sets the trace level of the trace event. To generate the finest level of detail, enter the highest value.</td>
<td>1, 4, 8, 12</td>
</tr>
<tr>
<td>User Messaging</td>
<td>Enables detailed logging of user-readable information to the PAY_ MESSAGE_LINES table.</td>
<td>Yes, No</td>
</tr>
<tr>
<td>XML_DATA_SOURCE</td>
<td>For document records delivery options performance purposes, determines if XML is derived from the database.</td>
<td>Y, N</td>
</tr>
</tbody>
</table>

### Payroll-Specific Processing Parameters

The following table lists the processing parameters that are applicable only for Oracle Fusion Global Payroll.

<table>
<thead>
<tr>
<th>Parameter</th>
<th>Description</th>
<th>Values</th>
</tr>
</thead>
</table>
| Accounting Date for Transfer to General Ledger | The date to transfer and post journal entries for costing results to Oracle Fusion General Ledger. | E = Date Earned  
P = Process Date  
EVE = For the Partial Period Accrual Reversal process, date earned is used. If the date earned isn’t defined for the time periods on the Payroll Definition page, the payroll period end date is used.  
For the payroll run that includes the actual costs, the process date of the payroll run is used.  
Default: P |
| Cost Buffer Size                  | Buffer size for array insert and select statements when calculating the costing of the payroll run results. | Maximum: 1000  
Minimum: 1  
Default: 500 |
## Logging Processing Parameters

Use logging parameters to investigate problems that aren’t easily identified in other ways. In a normal operation, disable logging because it can impact the performance of the process you’re logging.

> **Note:** Prepare log files before contacting Oracle Support for assistance. Define the logging area, category, and range of assignments before resubmitting the problem.

<table>
<thead>
<tr>
<th>Parameter</th>
<th>Description</th>
<th>Values</th>
</tr>
</thead>
</table>
| Date to Retrieve Assignment Status | Date earned or date paid, used to determine the effective date for checking assignment status in payroll calculations. | E = Date earned  
P = Date paid  
Default: P |
| Earliest Retroactive Processing Date | The earliest date that retroactive processes are calculated. Updates made before this date are not recalculated. | Date value in YYYY/MM/DD format |
| Extract Data Group for Payroll Register | Limits the records to include in the output file based on the specified data group name. | Default: No data group |
| Limit Payroll Register Output by Data Group | Enables processing a subset of records to include in the output file when an extract data group parameter value is also specified. | Y, N  
Default: N |
| Override Location for Tax Libraries | Directory location for Quantum tax libraries. | There are no set values. Values must be directory structures where the tax libraries are stored.  
Delete the parameter row if the parameter is not required.  
Default: $VERTEX_TOP/lib |
| Reversal and Balance Adjustment Accounting Date | Accounting date based on one of the following dates:  
- The process date of reversal or balance adjustment  
- The process end date of the Transfer to Subledger Accounting task. You can use this task to transfer journal entries for costing results to Oracle Fusion General Ledger. | T = Transfer using end date of the Transfer to Subledger Accounting task as the accounting date  
P = Use process date of the reversal or balance adjustment as the accounting date  
Default: P |
| Wage Basis Rules Buffer Size | Used in array selects from the PAY_TAXABILITY_RULES table within the Payroll Calculation process. | Minimum: 100  
Default: 500 |
Logging Parameters

Typically, you use this feature during your initial implementation and testing before you go live. In a normal operation you should disable detailed logging.

The three processing parameters for logging are:

- Logging Area
- Logging Category
- Formula Execution Logging

Logging Area

The Logging Area parameter works with the Logging Category parameter to limit the code area for logging. Even if you set the logging category, you must also set the logging area if you want to limit logging to a particular code area.

The values correspond to C-code entries in the form PY_ENTRY, which includes the functional area that will have logging enabled.

Logging Category

Logging categories define the type of information included in the log. You can set any number of categories by specifying multiple values to focus on specific areas that you think may be causing a problem. The default value is no logging.

The following table explains each logging category. It provides the log output information to investigate the problems encountered.

<table>
<thead>
<tr>
<th>Parameter Value</th>
<th>Logging Category</th>
<th>Description</th>
</tr>
</thead>
<tbody>
<tr>
<td>B</td>
<td>Balance Information</td>
<td>Provides output information that shows the creation and maintenance of balances used during payroll processing.</td>
</tr>
<tr>
<td>C</td>
<td>C cache structures information</td>
<td>Provides output information that shows details of the payroll cache structures and changes to the entries within the structure. While working on a service request, Oracle may ask you to use this parameter to gather additional information.</td>
</tr>
<tr>
<td>E</td>
<td>Element entry information</td>
<td>Provides output information that shows the state of the element entries in the process memory after retrieving entries from the database. The information is provided whenever data for an entry is changed during processing.</td>
</tr>
<tr>
<td>F</td>
<td>Formula information</td>
<td>Provides output information that shows details of formula execution, including formula contexts, inputs, and outputs.</td>
</tr>
<tr>
<td>G</td>
<td>General logging information</td>
<td>Provides general information, rather than a specific information type. This parameter doesn’t provide sorted output. In general, it’s recommended that you choose parameters that provide specific types of information.</td>
</tr>
<tr>
<td>Parameter Value</td>
<td>Logging Category</td>
<td>Description</td>
</tr>
<tr>
<td>-----------------</td>
<td>---------------------------------</td>
<td>---------------------------------------------------------------------------------------------------------------------------------------------</td>
</tr>
<tr>
<td>I</td>
<td>Balance output information</td>
<td>Provides output information that shows details of values written to the database from the balance buffers.</td>
</tr>
<tr>
<td>L</td>
<td>Balance fetching information</td>
<td>Provides output information that shows the balances retrieved from the database and whether or not the process will use those balances. (If balances such as Year To Date totals have expired because the year has changed, the process resets them and uses the new balance.)</td>
</tr>
<tr>
<td>M</td>
<td>Entry or exit routing information</td>
<td>Provides output information to show when any function is entered and exited. This information is indented to show the call level, and can be used to trace the path taken through the code at the function call level. Often, this information is useful when attempting to track down a problem such as a core dump.</td>
</tr>
<tr>
<td>P</td>
<td>Performance information</td>
<td>Provides output information to show the number of times certain operations take place at the assignment and run levels and why the operation took place. This parameter is often used to balance the buffer array write operation.</td>
</tr>
<tr>
<td>Q</td>
<td>C cache query information</td>
<td>Provides output information that shows the queries being performed on the payroll cache structures. While working on a service request, Oracle may ask you to use this parameter to gather additional information.</td>
</tr>
<tr>
<td>R</td>
<td>Run results information</td>
<td>Provides output details of run results and run result values from the Run Results buffer or the Values buffer before writing them to the database. This enables verification that the buffer contents were correct.</td>
</tr>
<tr>
<td>S</td>
<td>C cache ending status information</td>
<td>Provides output information that shows the state of the payroll cache before the process exits, whether that process ends with success or an error. While working on a service request, Oracle may ask you to use this parameter to gather additional information.</td>
</tr>
<tr>
<td>T and Z</td>
<td>PL/SQL detail and PL/SQL output</td>
<td>To obtain detailed information about the PL/SQL calls made by the Payroll application, use the combination of the T parameter and the Z parameter. This combination is typically useful for obtaining information about payroll processes.</td>
</tr>
</tbody>
</table>
Parameter Value | Logging Category | Description
--- | --- | ---
V (USA and Canada only) | Vertex tax calculation information | Provides output information that shows the values passed in and out of a third-party Vertex tax engine. This parameter also provides a separate file in the Out directory that shows the internal settings of the Vertex engine. This logging option is available to customers in the USA and Canada only.

**Formula Execution Logging**

Formula execution logging is the code area where logging is performed. This processing parameter mechanism is only available for formula logging in the payroll run. Specify parameter values as a character or combination of characters to determine the area for logging. For example, the string di (the combination of d and i) corresponds to the logging of database item cache access and formula input and output values. The default value is no logging.

⚠️ **Caution:** Use the dump logging options in rare circumstances only. The T trace option, which generates very large amounts of data, would significantly slow down processing.

The following table lists formula execution logging parameter values and its details.

<table>
<thead>
<tr>
<th>Parameter Value</th>
<th>Meaning</th>
</tr>
</thead>
<tbody>
<tr>
<td>c</td>
<td>Change contexts</td>
</tr>
<tr>
<td>d</td>
<td>Database item cache access</td>
</tr>
<tr>
<td>D</td>
<td>Database item cache dump</td>
</tr>
<tr>
<td>f</td>
<td>Formula cache access</td>
</tr>
<tr>
<td>F</td>
<td>Formula cache dump</td>
</tr>
<tr>
<td>I</td>
<td>Formula input/output values</td>
</tr>
<tr>
<td>m</td>
<td>Miscellaneous</td>
</tr>
<tr>
<td>n</td>
<td>Nested calls</td>
</tr>
<tr>
<td>s</td>
<td>SQL execution (database item and PL/SQL formula function calls)</td>
</tr>
</tbody>
</table>
Parallel Processing Parameters

Payroll processes are designed to take advantage of multiprocessor computers. You can improve performance of your batch processes, such as Calculate Payroll or Calculate Gross Earnings, by splitting the processing into a number of threads, or subprocesses, which run in parallel.

To improve performance you can also set the number of payroll relationship actions that process together and the size of each commit unit for the batch process.

**Parallel Processing Parameters**

**Threads**

When you submit a batch process, the Threads parameter determines the total number of subprocesses that run concurrently. The number of subprocesses equals the Threads value minus 1.

Set this parameter to the value that provides optimal performance on your computer:

- The default value of 1 is set for a single-processor computer.
- Benchmark tests on multiprocessor computers show that the optimal value is approximately 2 processes per processor.

For example, if the server has six processors, set the initial value to 12 and test the impact on performance of variations on this value.

**Chunk Size**

The Chunk Size parameter:

- Indicates the size of each commit unit for the batch process.

<table>
<thead>
<tr>
<th>Parameter Value</th>
<th>Meaning</th>
</tr>
</thead>
<tbody>
<tr>
<td>T</td>
<td>Trace (very large level that provides the inputs and outputs of every call made when executing a formula)</td>
</tr>
<tr>
<td>w</td>
<td>Working storage area access</td>
</tr>
<tr>
<td>W</td>
<td>Working storage area dump</td>
</tr>
<tr>
<td>1</td>
<td>Level 1 (combination of c, f, i, and m)</td>
</tr>
<tr>
<td>2</td>
<td>Level 2 (combination of 1, c, d, n, and w)</td>
</tr>
<tr>
<td>3</td>
<td>Level 3 (combination of 2, D, s, and W)</td>
</tr>
<tr>
<td>4</td>
<td>Level 4 (combination of 3 and F)</td>
</tr>
<tr>
<td>5</td>
<td>Level 5 (combination of 4 and T)</td>
</tr>
</tbody>
</table>
• Determines the number of assignment actions that are inserted during the initial phase of processing.
• Sets the number of assignment actions that are processed at one time during the main processing phase.

This parameter doesn’t apply to all processes, such as Generate Check Payments and Retroactive Pay.

To set the value of the Chunk Size parameter, consider the following points:

• Parameter values range from 1 to 16,000.
• The default value is 20, which was set as a result of benchmark tests.
• Each thread processes one chunk at a time.
• Large chunk size values aren’t desirable.

FAQ for Payroll Process Configuration

How can I improve performance and troubleshoot flows?

Add parameters to a payroll process configuration group to optimize performance and troubleshoot your payroll processes. To process large volumes of records, use the Threads and Chunk Size parameters. To troubleshoot processes, add the Logging Category or Formula Execution Logging parameters to a configuration group and rerun the process using that configuration group. Using these parameters enables you to investigate formula code problems.
15 Setting Up Auditing and Data Validation

Auditing Business Objects

Auditing Payroll Business Objects: Explained

Set up auditing policies to maintain a history of changes to your important data: what changed, who changed it, and when. The audit tracks changes to attributes of payroll business objects made using the application pages, web services, or payroll processes, which use Oracle Enterprise Scheduler.

You can view the audit history to determine how a business object obtained its current value and to compare old and new values. To view the history or to create an audit report from the Audit History work area, you require appropriate duty roles and privileges. Enterprises typically assign the following two audit duty roles to the application implementation consultant and master data management application roles:

- Audit trail management, which determines the objects audited
- Audit trail report viewing to view the audit history

Payroll Business Objects

When you set up auditing for payroll, you configure Oracle Fusion Applications business objects on the Manage Audit Policies page in the Setup and Maintenance work area:

1. Select the HCM Payroll application on the Configure Business Object Attributes page.
2. Specify the attributes to audit for the objects.

For example, you might audit the start and end date attributes for the calculation card component details.

The following table lists the payroll business objects you can set up for auditing payroll. You track changes to attributes specified for these objects.

<table>
<thead>
<tr>
<th>Payroll Business Object</th>
<th>Description</th>
</tr>
</thead>
<tbody>
<tr>
<td>Assigned Payroll</td>
<td>Holds date-effective attributes about payrolls assigned to a worker.</td>
</tr>
<tr>
<td>Assigned Payroll More Details</td>
<td>Holds details that aren’t date-effective about the payroll assigned to a worker.</td>
</tr>
<tr>
<td>Calculation Card</td>
<td>Holds values required for calculating payroll components.</td>
</tr>
<tr>
<td>Calculation Card Component</td>
<td>Holds the definition of a component that represents one or more logically related payroll components.</td>
</tr>
<tr>
<td>Calculation Card Component Detail</td>
<td>Holds the input values of a person’s calculation card.</td>
</tr>
<tr>
<td>Calculation Reporting Card</td>
<td>Defines the tax reporting units that report the calculation.</td>
</tr>
</tbody>
</table>
## Managing Audit Policies: Explained

Auditing is used to monitor user activity and all configuration, security, and data changes that have been made to an application. Auditing involves recording and retrieving information pertaining to the creation, modification, and removal of business objects. All actions performed on the business objects and the modified values are also recorded. The audit information is stored without any intervention of the user or any explicit user action.

Use audit policies to select specific business objects and attributes to be audited. The decision to create policies usually depends on the type of information to be audited and to the level of detail required for reporting.

### Enabling Audit Functionality

For Oracle Applications Cloud, you must configure the business objects and select the attributes before enabling audit. If you enable audit without configuring the business objects, auditing remains inactive. By default, auditing is disabled for all applications. To enable and manage audit, ensure that you have a role with the assigned privilege Manage Audit Policies (FND_MANAGE_AUDIT_POLICIES_PRIV). For appropriate assignment of roles and privileges, check with your security administrator.

To enable auditing for Oracle Fusion Middleware products, select one of the levels at which auditing is required for that product. The audit levels are predefined and contain the metadata and events to be audited. For more information, see Audit Events for Oracle Applications Cloud Middleware (Doc ID 2114143.1) on My Oracle Support at https://support.oracle.com.

If you don’t want an application to be audited, you can stop the audit process by setting the Audit Level option to None.

### Related Topics
- Configuring Audit: Highlights
- Audit Events for Oracle Applications Cloud Middleware

## Configuring Audit Business Object Attributes: Points to Consider

Audit enables tracking the change history of particular attributes of a business object. However, those objects and their attributes must be selected for audit and auditing must be enabled for that application. Your configuration settings determine
which attributes to audit for a given object, and when the audit starts and ends. Auditing takes into account all the operations performed on an object and its attributes, such as create, update, and delete. To configure audit business object attributes, search for the Manage Audit Policies task in the Application Extensions functional area within your offering.

Selecting an Application
To set up auditing, you must select a web application that contains the required business objects that can be audited. From the list of business objects, select those business objects that you want to audit. Selecting a business object also displays its attributes that are enabled for auditing.

Selecting Attributes
For each selected business object to be audited, select the corresponding attributes to include in the audit. All attributes that belong to that object are by default selected for audit and appear on the user interface. However, you can add or remove attributes from the list. When you remove an attribute from the list, you stop auditing it even when the parent object is selected for audit. So, if you want an attribute to be audited, you must add it to the list. If the object selected in an audit hierarchy is also a part of several other audit hierarchies, the attribute configuration for that object is applicable to all the hierarchies in that application.

Tip: For business objects based on flexfields, select the Flexfields (Additional Attributes) check box to view and add or remove flexfield attributes, to include or exclude them from the audit.

Starting and Stopping Audit
The business object is ready for audit after you select its attributes and save the configuration changes. However, to start auditing, the audit level for Oracle Applications Cloud must be set to Auditing on the Manage Audit Policies page.

To stop auditing an object, you can deselect the entire object and save the configuration. As a result, all its selected attributes are automatically deselected and are not audited. To continue to audit the business object with select attributes, deselect those attributes that are not to be audited. When users view the audit history for an application, they can specify the period for which they want the results. Therefore, make a note of when you start and stop auditing an application.

For example, users intend to view the audit history of an object for the previous week, but auditing for that object was stopped last month. They wouldn’t get any audit results for that week, because during the entire month that object wasn’t audited. Even if you enable audit for that object today, users can’t get the wanted results because audit data until today isn’t available.

Audit History: Explained
Using audit history you can view changes to the application data such as the business objects that were created, updated, and deleted. To view the history or to create a report, you must have a role with the assigned privilege View Audit History (FND_VIEW_AUDIT_HISTORY_PRIV). For appropriate assignment of roles and privileges, check with your security administrator.

To open the Audit History work area, click Navigator > Audit Reports.

The default search displays a summary of the audit history in the search results table. It includes key data such as date, user, product, event type, business object type, and description. For a detailed report, search again with modified search criteria. You can export the report summary to Microsoft Excel.
The following table lists the search parameters used and the outcome of their selection in the detailed report.

<table>
<thead>
<tr>
<th>Search Parameter</th>
<th>Result of Selection</th>
</tr>
</thead>
</table>
| Business Object Type              | • Narrows the search results to that specific business object within the selected product.  
                                       • Enables the Show Attribute Details check box.                                      |
| Include Child Objects             | Displays all the child objects that were listed for that business object when audit was set up. For example, a sales order object that contains several items as child objects. |
|                                   | **Note:** Displays the objects at the immediate parent-child level only. To view the children at subsequent levels, select the child object as the business object type and search again. |
| Show Attribute Details            | Enables the attribute list so that users can select either all attributes or a specific attribute to view the changes. Based on the selection, the search results indicate whether the attribute is created, updated or deleted, and the corresponding old and replaced values. |
| Show Extended Object Identifier    | Displays the instances (contexts) in which the business object was used. The context values identify the objects and the transactions in which they were used. Each context is unique and assigns a unique description to the business object. |
|                                  | **Note:** The default report displays a standard set of columns that contain prominent details of the audit history. To view additional details, you can change the display of columns. |

**Related Topics**
- Audit Event Types: Explained

## Data Validation

### Payroll Data Validation Report: Explained

Before you run payroll or any other statutory processes or reports, the required HR and payroll data setup must be complete for all your workers. Missing or noncompliant data can impact legal processes or reports.

The Payroll Data Validation Report provides details of missing or statutorily noncompliant data at the worker and organization level. Prior to running the payroll process or any other report, run the Payroll Data Validation Report. You can then take corrective action as necessary to complete the data setup and correct noncompliant data.

You can run this report from the Payroll Calculations or the Payroll Checklist work area.

During the implementation phase, add the business rules and validation messages at the enterprise or legislative data group level. These validations are in addition to the country-specific validations that are predefined in the application.
Validation Levels
The data group you select when adding validation rules to the Data Validation Report determines the level of validation. For example, you might have a validation rule at the tax reporting unit level or at the person details level. When adding a validation, you must ensure a database item exists for the attribute for which you are adding the validation.

Setting up Validation Rules
Use the delivered formula ‘Global Attribute Mandatory Check’ to set up validations to identify missing data. You add the validations to the Data Validation Report extract definition. The summary of the required steps is as follows:

1. Identify a suitable short name for the attribute for which you want to add the validation, for example, ASG_JOB_CODE. Prefix it with CST to mean user-defined. Therefore, the short name should be CST_ASG_JOB_CODE.
2. Set up a lookup code to control the validation. For mandatory validations, that you set up using the delivered formula, set up the lookup code as a short name suffixed by MC. For example, CST_ASG_JOB_CODE>MC.
3. Based on the level at which you need the validation, you must create the records and data elements in the appropriate data group. Identify the relevant data group to add the validation and create a record in the group. For example, add assignment level validations to the Assignment Data Group.

   Note: A database item must exist for the attribute for which you are adding the validation.

4. Add the validation and create the extract definition attributes.
5. Generate and compile the formula at the report record.
6. Run the appropriate Payroll Data Validation Report to include the validations.

Controlling the Validations
Use the delivered ORA_HRX_GLB_VALIDATION_OBJECTS lookup type to set up a lookup code that you can use to control the validation. For example, you can use this lookup code to add multiple country tags to a validation. Alternately, if the validation is no more valid for the country, you can remove the previously added country tag from the lookup code.

   Note: If you don’t add a country tag, the application does not trigger any validation.

Validation Types
The validations can be simple or complex.

The application triggers simple validations if you haven’t provided a value for an attribute required for a report or a process. For example, the Tax Reporting Registration Number is missing at the organization level or the National Identifier value is missing for a worker. You can create a simple validation by using the delivered formula ‘Global Attribute Mandatory Check’ and the appropriate database item group.

The application triggers complex validations when there is more than one attribute included in the validation. For example, a value is missing for a National Identifier Type pertaining to a worker.

For coding complex validations, Oracle recommends that you use data elements of type Rule with a user-defined Rule Formula to perform the validation. You must deliver these data elements in a record of type Formula.

User-Defined Rule Formula
For coding complex validations, Oracle recommends that you use extract attributes of type Rule with a user-defined Rule Formula to perform the validation. Consider the following for coding user-defined Rule Formula:

- Check if the formula is of type Extract Rule.
- Check that the lookup code exists for the short code of the data element, and is enabled for the legislation code, for which the report is run.
• Check if the formula is associated with the correct data element. Since this is a user-defined formula, check and run only if short code matches.

• Perform the validation to return validation message text or return a NULL value. The message text should be fewer than 240 characters or the application considers only the first 240 characters of the message.

Validation Rules for Data Validation Report: Explained

You can add validation rules to the Data Validation Report to identify missing data required to run a process or report. You can run the report and make relevant corrections to complete the employer or payroll-related data.

Use the Manage Extract Definitions task in the Data Exchange work area to add a validation rule to the Data Validation Report extract definition.

Rule Formula

Use the delivered formula ‘Global Attribute Mandatory Check’ to set up validations to identify missing data. You add the validations to the Data Validation Report extract definition.

This formula includes certain important enhancements such as supporting translated messages. It also offers the ability to control the validations without you deleting the validation already configured by you or delivered by Oracle. It is not mandatory for you to migrate your existing validations from the ‘Global Null Check Rule’ formula to the new one. Oracle recommends to migrate to the new formula to make use of the benefits.

Validation Levels

The following table describes the validation rules at the various levels.

<table>
<thead>
<tr>
<th>Validation Level</th>
<th>Description</th>
</tr>
</thead>
<tbody>
<tr>
<td>Employee</td>
<td>Add simple validations for a missing attribute at the worker level. For example, if the National Identifier value is missing for a worker.</td>
</tr>
<tr>
<td>Organization</td>
<td>Add simple validations for a missing attribute at the organization level. For example, a missing Tax Reporting Registration Number.</td>
</tr>
<tr>
<td>Repeating Child Entity of a Worker</td>
<td>Add validations at the repeating child entity of a worker. For example, you may add a validation for a missing IBAN number for one of the multiple payment methods that a worker has. You can add a validation to specify the details of the attribute value (IBAN Number). This attribute value is missing for the Entity Type (Personal Payment Method) and for the Entity Name (Personal Payment Method Name).</td>
</tr>
<tr>
<td>Repeating Child Entity of the Organization</td>
<td>Add validations at the repeating child entity of an organization. For example, add a validation for a missing SWIFT Code for one of the multiple organization payment methods that is valid for a payroll statutory unit. You can add a validation to specify the details of the attribute value (SWIFT Code). This attribute value is missing for the Entity Type (Organization Payment Method) and for the Entity Name (Organization Payment Method Name).</td>
</tr>
</tbody>
</table>

Data Groups

The data group you select when adding validation rules to the Data Validation Report determines the level of validation. For example, you might have a validation rule at the tax reporting unit level or at the worker details level.
The processes associated with the Data Validation Report extract definition are:

- Run Payroll Data Validation Report
- Run Worker Data Validation Report
- Data Validation Report for Payroll Interface

The following reports use different data groups to report data validation. You must select a data group for any validation rules you add based on the type of data and the level you want validation to occur.

**Payroll Data Validation Report**
You can add validation rules to following data groups to report payroll-related data validation:

- Payroll Statutory Units
- Tax Reporting Units
- Payroll Relationships
- Payroll Assignments

**Worker Data Validation Report**
You can add validation rules to following data groups to report worker-related data validation:

- Payroll Statutory Units
- Legal Employers
- Reporting Establishments
- Work Relationships
- Person Details
- Assignments

**Data Validation Report for Payroll Interface**
You can add validation rules to following data groups to report worker-related and payroll-related data validation for Global Payroll Interface:

- Payroll Group
- Payroll Relationship Group
- Work Relationships
- Assignments
- Payroll Relationships
- Payroll Assignments

**Usage of Tags**
The report output has different sections for legal employer, reporting establishment, person, and so on. The validations reported in the different sections is based on the tag that is added for rule data element. Consider the following while using tags for adding validation rules for Data Validation Report.

- For reporting validations at organization level, add the validations to Organization Data Groups and the related tags, as given in the table below.

<table>
<thead>
<tr>
<th>Validation Level</th>
<th>Data Group</th>
<th>Tag</th>
</tr>
</thead>
<tbody>
<tr>
<td>Legal Employer</td>
<td>Legal Employers</td>
<td>LEMP_RULE_TEXT</td>
</tr>
</tbody>
</table>
### Setting Up Auditing and Data Validation

**Table 15-1:**

<table>
<thead>
<tr>
<th>Validation Level</th>
<th>Data Group</th>
<th>Tag</th>
</tr>
</thead>
<tbody>
<tr>
<td>Establishment</td>
<td>Reporting Establishments</td>
<td>REP_EST_RULE_TEXT</td>
</tr>
<tr>
<td>Payroll Statutory Unit</td>
<td>Payroll Statutory Units</td>
<td>PSU_RULE_TEXT</td>
</tr>
<tr>
<td>Tax Reporting Unit</td>
<td>Tax Reporting Units</td>
<td>TRU_RULE_TEXT</td>
</tr>
</tbody>
</table>

- For reporting validations at worker level, add the validations to the corresponding data group and the predefined tags as given in the table below.

<table>
<thead>
<tr>
<th>Validation Level</th>
<th>Data Group</th>
<th>Tag</th>
</tr>
</thead>
<tbody>
<tr>
<td>Employee or payroll relationship level validations</td>
<td>Identify appropriate data groups (Example: Assignment).</td>
<td>RULE_TEXT</td>
</tr>
</tbody>
</table>

- For reporting organization validations or the validations of other entities in a separate table, add the validations to the corresponding data group and the predefined tags as given below.

<table>
<thead>
<tr>
<th>Validation Level</th>
<th>Data Group</th>
<th>Tag</th>
</tr>
</thead>
<tbody>
<tr>
<td>All levels other than employee or organization</td>
<td>Identify appropriate data groups (Example: Assignment).</td>
<td>OTHERS_RULE_TEXT</td>
</tr>
</tbody>
</table>

### Setting up a Lookup Code for Controlling the Rules for Data Validation Reports: Procedure

Use the delivered ‘ORA_HRX_GLB_VALIDATION_OBJECTS’ lookup type to set up a lookup code that you can use to control a validation for the Data Validation Report. You can then use this lookup code to add multiple country tags to a validation. Alternately, you can remove a previously added country tag from the lookup code, if the validation is no more valid for the country.

**Note:** If you don’t tag a country, the application does not trigger any validation.

To create a lookup code:

1. In the Setup and Maintenance work area, select the Manage HCM Extract Lookups task.
2. Search for and select Manage HCM Extract Lookups.
3. Click Create.
4. Enter the lookup code details as given in the following table.

<table>
<thead>
<tr>
<th>Field</th>
<th>Description</th>
</tr>
</thead>
<tbody>
<tr>
<td>Lookup Code</td>
<td>Enter a lookup code suitable for the attribute or entity to be validated. If you want to use the Oracle delivered formula for mandatory attribute validation, enter suffix as &gt;MC n the lookup code, for example CST_. PERSON_. ADDRESS_LINE 1&gt;MC.</td>
</tr>
</tbody>
</table>
### Field | Description
--- | ---
Display Sequence | Enter a unique value for the lookup code. It is recommended to use a sequence number, between 201 to 500, for the user-defined lookup codes.
Start Date | Enter 01/01/0001.
End Date | Enter 12/31/4712.
Meaning | Enter a suitable meaning for the lookup code, for example, Person Address Line 1 Check.
Description | Enter a suitable description, for example, Person Address Line 1 check.
Tag | Tag an appropriate country or countries, for which the validation is to be performed. For example, +FR.

**Note:** If no Tag is setup, the application does not perform the validation for any country.

5. Click **Save**.

### Adding Rules to Data Validation Reports

This example demonstrates how to add a validation rule to the Data Validation Report extract definition. Before making changes to the extract, you select a legislative data group. When you submit your changes for a new rule, that validation is available for that legislative data group. Depending on the validation rule and the data group you add it to, the validation is included when you submit either or both of the following processes:

- Run Payroll Data Validation Report
- Run Worker Validation Report

The following table summarizes the key decisions for this scenario.

<table>
<thead>
<tr>
<th>Decisions to Consider</th>
<th>In This Example</th>
</tr>
</thead>
<tbody>
<tr>
<td>Which data group does the new validation belong in?</td>
<td>Person Details</td>
</tr>
<tr>
<td>Based on the level at which you need the validation, you must create the records and data elements in the appropriate data group.</td>
<td></td>
</tr>
<tr>
<td>What type of validation are you adding?</td>
<td>A rule to check whether each person’s Person Address Line 1 attribute has no value. If there is no value, the report displays an error message.</td>
</tr>
</tbody>
</table>

### Prerequisites

1. A database item exists that retrieves the value to be validated. The contexts required by the database item are provided by the block level to which you can add the validation. In this example, a database item must exist for the person address line 1 attribute.
Creating the Validation

To create a validation:

1. In the Name field, enter **Data Validation Report**.
2. In the **Data Exchange** work area, select **Manage Extract Definitions**.
3. Search for and select the extract definition to edit as follows:
   a. In the Type list, select **Full Profile**.
   b. Select a legislative data group, for example US LDG.
   c. Click **Search**.
   d. In the search results, click **Data Validation Report**.
4. On the Manage Extract Definitions page, click **Switch Layout**.
5. In the **Session Effective Date** field, enter **01/01/0001**.
6. Add a new record to the Data Group to which you want to add validations as follows:
   a. Select **Person Details** under the **Data Group** node.
   b. In the Records section, click **Create**.
      Ensure that the Session Effective Date is 01/01/0001.
   c. Complete the fields in the **Create Extract Record** section as shown in this table.

<table>
<thead>
<tr>
<th>Field</th>
<th>Value</th>
</tr>
</thead>
<tbody>
<tr>
<td>Sequence</td>
<td>Enter a unique value for the records within the Data Group. It is recommended to use a sequence number between 200 and 600.</td>
</tr>
</tbody>
</table>

*Note:* Two records in the same Data Group cannot use the same sequence number.

<table>
<thead>
<tr>
<th>Name</th>
<th>Person Address Details</th>
</tr>
</thead>
<tbody>
<tr>
<td>Type</td>
<td>Detail record</td>
</tr>
<tr>
<td>Process Type</td>
<td>Fast Formula</td>
</tr>
</tbody>
</table>

d. Click **Save**.
7. Add the database item attribute as follows.
   a. In the **Extract Attributes** section, click **Create**
   b. Complete the fields as shown in this table. This table lists the fields and the respective values for the extract attributes.

<table>
<thead>
<tr>
<th>Field</th>
<th>Description</th>
</tr>
</thead>
<tbody>
<tr>
<td>Name</td>
<td>Enter a suitable name, for example, Person Address Line 1 Attribute. This name is used in the validation message.</td>
</tr>
<tr>
<td>Tag Name</td>
<td>Person_Address_Line_1_Attribute</td>
</tr>
<tr>
<td>Short Code</td>
<td>Enter a suitable name to match the lookup code and remove the suffix, &quot;&gt;MC&quot;, for example, CST_PERSON_ADDRESS_LINE_1.</td>
</tr>
<tr>
<td>Field</td>
<td>Description</td>
</tr>
<tr>
<td>---------------</td>
<td>------------------------------------------------------------------------------</td>
</tr>
<tr>
<td>Start Date</td>
<td>01/01/0001</td>
</tr>
<tr>
<td>End Date</td>
<td>12/31/4712</td>
</tr>
<tr>
<td>Data Type</td>
<td>Enter a value appropriate to the data that you want to check. For example, Text for address details.</td>
</tr>
<tr>
<td>Type</td>
<td>Database item group</td>
</tr>
<tr>
<td>Database Item Group</td>
<td>Person Address Line 1</td>
</tr>
<tr>
<td>Output Label</td>
<td>Person Address Line 1</td>
</tr>
<tr>
<td>Output Column</td>
<td>6</td>
</tr>
</tbody>
</table>

**Note:** If you don’t find the Database Item Group that fetches the attribute value you want to validate, it could be that:
- The Extract Attribute is added at an incorrect level (Data Group), or
- The Database Item Group is unavailable. Verify the availability of the Database Item Groups by trying to add the extract attribute to other levels (Data Group). If the required Database Item Group is unavailable, you can contact Oracle Support.

For more information, see Database Items for Extracts and Formulas in Oracle Fusion HCM guide on My Oracle Support (1565118.1).

- Click **Save and Close**.

8. Create another attribute for the validation rule as follows:
   - In the **Extract Attributes** section, click **Create**
   - Complete the fields as shown in this table. This table lists the fields and the respective values for the validation rule.

<table>
<thead>
<tr>
<th>Field</th>
<th>Value</th>
</tr>
</thead>
<tbody>
<tr>
<td>Name</td>
<td>Person Address Line 1 Rule</td>
</tr>
<tr>
<td>Tag Name</td>
<td>RULE_TEXT</td>
</tr>
<tr>
<td></td>
<td><strong>Note:</strong> Enter this value exactly.</td>
</tr>
<tr>
<td>Short Code</td>
<td>CST.PERSON_ADDRESS_LINE_1&gt;MC</td>
</tr>
<tr>
<td></td>
<td><strong>Note:</strong> The short code must include the short code of the database item attribute you created followed by a space and the suffix: &gt;MC. The short code is case-sensitive.</td>
</tr>
<tr>
<td>Start Date</td>
<td>01/01/0001</td>
</tr>
</tbody>
</table>
Oracle Global Human Resources Cloud
Implementing Global Payroll

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Setting Up Auditing and Data Validation

<table>
<thead>
<tr>
<th>Field</th>
<th>Value</th>
</tr>
</thead>
<tbody>
<tr>
<td>End Date</td>
<td>12/31/4712</td>
</tr>
<tr>
<td>Data Type</td>
<td>Text</td>
</tr>
<tr>
<td>Type</td>
<td>Always set as Rule.</td>
</tr>
<tr>
<td>Rule</td>
<td>Global Attribute Mandatory Check</td>
</tr>
<tr>
<td>Output Label</td>
<td>Enter a value same as the Short Code, for example, CST_PERSON_ADDRESS_LINE_1-RULE.</td>
</tr>
<tr>
<td>Output Column</td>
<td>Enter a unique value within the record, 26.</td>
</tr>
<tr>
<td>Results Display Option</td>
<td>Summary and detail</td>
</tr>
</tbody>
</table>

**c.** Click **Save and Close.**

9. In the **Actions** menu, select **Generate Formula.**
10. In the **Actions** menu, select **Compile Formula.**
11. Click the Extract Execution Tree node and verify that all formulas are compiled.
12. Click **Submit.**

Payroll Data Validation Report

Run the Payroll Data Validation Report to generate a list of workers with missing or noncompliant payroll data. Use this report to verify if the required data setup for all workers for the payroll run or process is complete.

Payroll managers can run this report from the Payroll Calculations or the Payroll Checklist work area. Run this report prior to running the payroll process.

**Parameters**

Most parameters are self-explanatory, while the following have special meaning in the context of this report.

**Payroll Flow**

Select the required payroll flow name for the process that is being run. Enter a value each time the process is run.

**Effective As-of Date**

Use this field to specify the first effective date of the payroll process to include in the report. The data status is verified as of the selected effective date.

**Payroll Statutory Unit**

Select the Payroll Statutory Unit for which the report is to be run.
Report Results

The report provides details of missing or noncompliant statutory data for the selected payroll statutory unit as of the selected effective as-of date. The details are at the worker or organization level.

You can view the PDF output of the report or the Excel output, as required.
Glossary

absence plan
A benefit that entitles workers to accrue time for the purpose of taking leave and receiving payments during absence periods.

absence type
A grouping of absences, such as illness or personal business that is used for reporting, accrual, and compensation calculations.

abstract role
A description of a person's function in the enterprise that is unrelated to the person's job (position), such as employee, contingent worker, or line manager.

assignment
A set of information, including job, position, pay, compensation, managers, working hours, and work location, that defines a worker's or nonworker's role in a legal employer.

assignment level
See sourcing assignment level.

assignment statement
A statement that formulas use to set a value for a local variable.

balance dimension
The scope of a balance value, such as the period of time over which it accumulates, and whether it relates to an assignment or a payroll relationship.

balance feed
Input value from an element, or all elements in a classification, that adds to, or subtracts from, a balance.

benefits object hierarchy
A structure that enables efficient management of benefits that share similar attributes. The four object types used to structure benefits offerings are programs, plan types, plans, and options.

calculation card
Captures values required for payroll calculations for some earnings and deductions, such as absence payments and involuntary deductions. For some countries, you can also create various types of cards to hold default values for tax reporting units or payroll statutory units.
**calculation component**
An individual calculation captured on a calculation card, which is typically associated with an element.

**calculation factor**
A data-driven rule for calculating a deduction or exemption.

**calculation method**
An optional component of a calculation factor that supports complex calculations. It specifies a formula to return the final value, such as a cumulative year-to-date amount.

**calculation type**
The amount or percent based method used to calculate a pricing guideline. Values include Percent of, Percent off, Margin percent, Amount off, and Absolute value.

**calculation value definition**
The rates, amounts, or rules that payroll runs use to calculate the components listed on a calculation card.

**consolidation group**
A grouping of payroll runs within the same period for the same payroll, for which you can run reporting, costing, and post-run processing. You can specify a default consolidation group for each payroll definition.

**context**
A grouping of flexfield segments to store related information.

**context-sensitive segment**
A flexfield segment that may or may not appear depending upon a context. Context-sensitive segments are attributes that apply to certain entity rows based on the value of the context segment.

**cost profile**
Defines the cost accounting policies for items, such as the cost method and valuation structure.

**data instance set**
The set of HCM data, such as one or more persons, organizations, or payrolls, identified by an HCM security profile.

**database item**
An item of information that has special programming attached, which formulas and HCM extracts use to locate and retrieve the data.
**dimension**  
See

**distribution**  
Amount paid to a participant from a plan such as a savings plan or a flexible spending account.

**element**  
Component in the calculation of a person’s pay. An element may represent a compensation or benefit type, such as salary, wages, stock purchase plans, pension contributions, and medical insurance.

**element classification**  
Provides various element controls, such as the processing order, balances feeds, costing, and taxation. Oracle predefines primary element classifications and some secondary classifications. You can create other secondary classifications.

**element eligibility**  
The association of an element to one or more components of a person’s employment record. It establishes a person’s eligibility for that element. Persons are eligible for the element if their assignment components match the components of the element eligibility.

**element entry**  
The record controlling an employee’s receipt of an element, including the period of time for which the employee receives the element and its value.

**element group**  
Group of one or more elements, which you define for running various payroll processes, reports, or for cost distribution purposes. Use element groups to limit the elements processed by a payroll batch process.

**element template**  
Predefined questions that you answer to create elements and associated items. Templates vary depending on the element classification, country, and products you are using.

**eligibility profile**  
A user-defined set of criteria used to determine whether a person qualifies for a benefits offering, variable rate or coverage, compensation plan, checklist task, or other object for which eligibility must be established.

**extensible flexfield**  
Expandable fields that you can use to capture multiple sets of information in a context or in multiple contexts. Some extensible flexfields let you group contexts into categories.

**fast formula**  
A simple way to write formulas using English words and basic mathematical functions. Formulas are generic expressions of calculations or comparisons that repeat with different input values.
**final close date**
The last date on which a payroll run can process element entries. Typically, the last effective date of the payroll record.

**flexfield**
A flexible data field that you can configure such that it contains one or more segments or stores additional information. Each segment has a value and a meaning.

**flexfield segment**
An extensible data field that represents an attribute and captures a value corresponding to a predefined, single extension column in the database. A segment appears globally or based on a context of other captured information.

**flow**
An occurrence of a flow pattern that you manage from a payroll work area or from the Data Exchange work area using the View Extracts task. The data security for your role determines which flows you can submit and access.

**flow checklist**
A sequence of automatic and manual flow tasks grouped into activities, such as extract reports and processes, or tasks related to payroll processing. Submitting a flow generates a checklist that you use to monitor the flow and manage its tasks.

**flow pattern**
A series of tasks performed in a predefined order, which are grouped into activities, such as extract reports and processes, or tasks that cover a phase of the payroll process. The flow pattern is used to generate a flow, which you can manage from its checklist.

**flow task**
A process or report, or manual task such as verifying results. A flow pattern can include more than one flow task.

**formula**
Combination of operators, functions, dimension and member names, and numeric constants used to calculate database members.

**HCM data role**
A job role, such as benefits administrator, associated with instances of HCM data, such as all employees in a department.

**input value**
Field defined for an element that holds information about an element entry that’s needed for calculation. For example, hours worked, an alternate payment rate, or the amount of a bonus or deduction.

**job role**
A role, such as an accounts payable manager or application implementation consultant, that usually identifies and aggregates the duties or responsibilities that make up the job.
**key flexfield**
Configurable flexfield comprising multiple parts or segments, each of which has a meaning either individually or in combination with other segments. Examples of key flexfields are part numbers, asset category, and accounts in the chart of accounts.

**key flexfield structure instance**
An occurrence of a key flexfield structure that shares the same order of segments as other instances of the key flexfield structure. However, each instance uses different value sets to validate the segments.

**last standard earnings date**
Date on which standard earnings stop accumulating, typically the date of the termination or payroll transfer.

**last standard process date**
Last date on which element entries are considered for normal processing in a payroll run. Typically, the last day of the payroll period in which a termination or payroll transfer occurs.

**legal employer**
A legal entity that employs people.

**legal entity**
An entity identified and given rights and responsibilities by commercial law through the registration with country’s appropriate authority.

**legal reporting unit**
The lowest level component of a legal structure that requires registrations. Used to group workers for the purpose of tax and social insurance reporting or represent a part of your enterprise with a specific statutory or tax reporting obligation.

**legislation**
The base definition that governs certain rules so that Oracle Global Human Resources can perform differently for different countries and territories in order to meet statutory requirements. Can be predefined by Oracle or defined during implementation using the Manage Legislations for Human Resources task.

**legislative data group**
A means of partitioning payroll and related data. At least one legislative data group is required for each country where the enterprise operates. Each legislative data group is associated with one or more payroll statutory units.
lookup code
An option available within a lookup type, such as the lookup code BLUE within the lookup type COLORS.

lookup type
The label for a static list that has lookup codes as its values.

object group
User-defined set of elements or people that restrict the items you want to include in various processes and reports.

payment source
Bank account or other source of funds associated with organization payment methods.

payroll batch loader
An integrated Microsoft Excel workbook loader that helps you enter data more easily into HCM tables. Used for entering balances, balance groups, elements, element entries, payroll definitions, assigned payrolls, bank information for personal payment methods, formula global values, and user-defined tables.

payroll employment group
Group of people that payroll runs use for processing, data entry, and reporting.

payroll processing parameters
System-level information that controls settings for flow processes, such as logging, chunk size, and other options that affect process performance.

payroll relationship
Defines an association between a person and a payroll statutory unit based on payroll calculation and reporting requirements.

payroll statutory unit
A legal entity registered to report payroll tax and social insurance. A legal employer can also be a payroll statutory unit, but a payroll statutory unit can represent multiple legal employers.

person type
A subcategory of a system person type, which the enterprise can define. Person type is specified for a person at the assignment level.

profile option level
The category or layer that defines a profile option. Site, Product, and User are the predefined levels.

profile option value
The setting mapped to the level of a profile option. A profile option may have multiple values set at different levels, such as Site or User.
**reduced deductible amount**
The final deductible amount after all exemptions are subtracted.

**registration**
The record of a party's identity related details with the appropriate government or legal authorities for the purpose of claiming and ensuring legal and or commercial rights and responsibilities.

**retroactive process**
A process that recalculates the amount to pay a person in the current period to account for retrospective changes that occurred in previous payroll periods.

**role**
Controls access to application functions and data.

**role mapping**
A relationship between one or more roles and one or more assignment conditions. Users with at least one assignment that matches the conditions qualify for the associated roles.

**salary basis**
Defines validation and payroll details for worker base pay. It identifies the currency and period of the quoted base pay and the factor used to annualize base pay. It optionally identifies components or rates used to itemize salary adjustments and the grade rate used to validate salary.

**security profile**
A set of criteria that identifies HCM objects of a single type for the purposes of securing access to those objects. The relevant HCM objects are persons, organizations, positions, countries, LDGs, document types, payrolls, and payroll flows.

**set-level definition**
Enables you to segment and share your reference data. Entities that are defined at the set level can be shared by all cost organizations belonging to that set. You can also use the **Common** set to share the same reference data across all cost organizations.

**standard cost**
An inventory valuation method in which inventory is valued at a predetermined standard value. You track variances for the difference between the standard cost and the actual transaction cost, and you periodically update the standard cost to bring it in line with actual costs.
**tax reporting unit**
A legal entity that groups workers for the purpose of tax and social insurance reporting.

**unit of measure**
A division of quantity that is adopted as a standard of measurement.

**user-defined table**
Structure of rows and columns that maintains date effective lists of values. Tables store values as cells for specific row and column combinations.

**value set**
A predefined set to validate the values that a user enters in the application. The set may be hierarchical.

**wage basis rule**
Determines the classifications of earnings that are subject to a deduction. Also referred to as a taxability rule.

**work relationship**
An association between a person and a legal employer, where the worker type determines whether the relationship is a nonworker, contingent worker, or employee work relationship.

**work relationship group**
Group of people that you can define for reporting, for example in HCM extracts.