



**Use Case Specification Document**

Leave Management System

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**Record of Release**

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| 1.0 | Chetan N S | Hasan Ali Doulatganjwala, Anjum Fathima | Hasan Ali Doulatganjwala, Anjum Fathima | 10-02-2021 | Included the usecase diagram |
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Table of Contents

[1 Introduction 4](#_Toc484427365)

[1.1 Scope and Purpose 4](#_Toc484427366)

[1.2 Definitions, Acronyms, and Abbreviations 4](#_Toc484427367)

[2 UC1:Employee UseCase 5](#_Toc484427368)

[2.1 Context of Use 5](#_Toc484427369)

[2.2 Scope and Level 5](#_Toc484427370)

[2.3 Primary and Secondary Actors 5](#_Toc484427371)

[2.4 Stakeholder and Interest 5](#_Toc484427372)

[2.5 Assumptions 5](#_Toc484427373)

[2.6 Pre-Condition 5](#_Toc484427374)

[2.7 Post-Condition 5](#_Toc484427375)

[2.8 Trigger 6](#_Toc484427376)

[2.9 Main Success Scenario 6](#_Toc484427377)

[2.10 Exception Flow Scenarios 6](#_Toc484427379)

[2.12 Technology and Data Variations List 7](#_Toc484427380)

[2.13 Use Case Diagram 7](#_Toc484427382)

[2.14 Open Issues 7](#_Toc484427383)

[3 References 8](#_Toc484427384)

[3.1 Notation 8](#_Toc484427385)

[4 Appendix 9](#_Toc484427386)

1. To update the table of contents, put the cursor anywhere in the table and press [F9]. To change the number of levels displayed, select the menu option Insert‑>Index and Tables, make sure the Table of Contents tab is active, and change the Number of Levels to a new value.

# Introduction

## Scope and Purpose

This document presents the Use Case Specifications, which contains the textual properties of the use case. The system use case should describe how the system behaves from the actor’s point of view. In some cases it may not necessary to go to multiple levels of detail for the design scope and goal level.

## Definitions, Acronyms, and Abbreviations

| Term | Meaning |
| --- | --- |
| UC | Use Case |

1. **UC number:** unique Use Case ID  
     
   **Scope symbol:** Organization black-box, Organization white-box, System black-box, System white-box or Component. (optional – see Use Case Technique associtated with the RA.024 Task Overview)  
     
   **UC name:** the name should be the goal as a short active verb phrase.  
     
   **Level symbol:** User-Goal, Summary, Very high summary, Subfunction or Too low. (optional – see Use Case Technique associtated with the RA.024 Task Overview)  
     
   e.g., UC 26:  Register for Courses 

# UC1: Employee Usecase

## Context of Use

This Use Case explains the interaction of the Employee of the organization with application and it showcases all the functionalities of the application

1. Use the Use Case Brief description to develop a longer statement of the goal, if needed, its normal occurrence conditions.   
     
   For example -  
   You should review the **Brief Description (From RA.023 Use Case Model Task):**  
   This use case begins when the A/P clerk has invoices that need to be settled.  
     
   The A/P clerk matches the invoices to the receipt information, until there are no more invoices to process.  
     
   This use case ends when the A/P clerk has settled all the invoices that have complete receipt information.  
    **Context of Use:**  The A/P clerk settles invoices on a daily basis.  This can happen several times throughout the day.  In order to settle the invoices, the invoice items and the receipt item information needs to be matched**.   
     
   *The Context Of Use should state under what conditions, when, how often etc.***

## Scope and Level

1. Scope: design scope, what system is being considered black-box under design.  
     
   Level: one of: Summary, User-goal, Subfunction

| Scope | Level |
| --- | --- |
| Specific System | High |

## Primary and Secondary Actors

1. Role name and/or description of the primary and secondary actors for the use case, people, or other associated systems.

#### Primary Actor

| Name | Description |
| --- | --- |
| Employee | This actor uses the application to apply Leave |

#### Secondary Actors

| Name | Description |
| --- | --- |
| L1 Manager | This actor approve or reject the applied Leave |

## Stakeholder and Interest

1. Name of the stakeholder and key interests of the stakeholder in the use case.

| Name | Interest |
| --- | --- |
| Employee | Uses the application for apply the leave and view the status |
| L1 Manager | Uses the application to approve the leave |

## Assumptions

* Employee is a valid member of the organization and contains a valid Employee Id(Ps number)
* Employee uses the PS number to register and Login to the system

1. List any assumptions about the Use Case  
   e.g., The current time of day system xxx will be used to determine the effective date.  
    This Use Case applies to all types of Employee Actor.

## Pre-Condition

* An new user has to Register to the application and then login using the Employee Id(Ps number) to use any of the functionalities of the application

1. List of conditions that must be true before the use case may be applied. Write pre-conditions as simple assertions.  
     
   e.g. The user is logged on.  
    The credit card has been validated.

## Post-Condition

* The Employee must have at least L1 Manager to apply of the leave

## Trigger

* The user can access the application using the URL provided

1. The action upon the system that starts the use case, may be a time event.

## Main Success Scenario

1. Put here the steps of the scenario from trigger to goal delivery, and any cleanup after.  
     
   This is in the format:  
     
    <step number> <action description>  
     
   where action description is of the form <subject> <active verb> <object>. Make sure the actions moves forward after this step. After each step, another subject "has the ball", so that typically we show a dialog that is user-system-user.  
     
   e.g., 3. The system displays a list of matching customers and requests a selection
2. During the discovery of the Main Success Scenario, the actor may have several options. References to conditional options should be placed in the alternate and exception flow areas of this template. The assumption in the Main Success Scenario, is that everything works as the user expected and achieves the goal they had intended.   
   It is recommended that you **use the table format below.** Both an actor step and a system step may appear in the same row of the table.b You should use structure sentences that use active verb phrases and are in the present tense. Avoid compound sentences and describe the steps by starting with the phrase The actor or the system, wait until you are done to number the steps. Each step should contain one testable, traceable requirement.

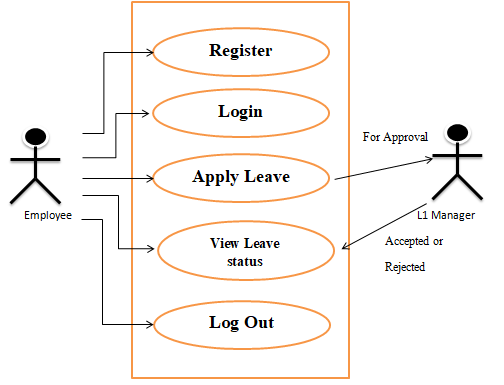
|  |  |
| --- | --- |
| **What the Actor does** | **What the System does** |
| 1. Employee: Register | Application checks if the user is valid Employee PS number and register the user to the database |
| 2. Employee: Login | Application checks the Ps number and the Password Entered by the Employee if verified takes him to the Index page |
| 3. Employee : Apply Leave | Application allows the user to apply for the leave of entered dates |
| 4. Employee: View Status | Application show the user the status of the leave applied |
| 6. Manager: Approve or Reject Leave | Application allows the manager to approve or reject leave request |
| 5. Employee : Log Out | Application will logout the user and will end the session |

## Exception Flow Scenarios

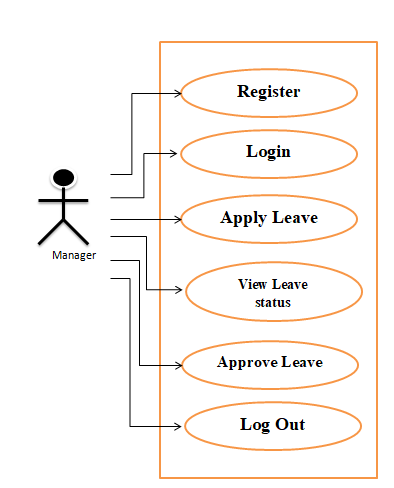
1. Put here there extensions, one at a time, each referring to the step of the main scenario.  
   The first step of the alternate path should explain the deviation  
   The first step has the same number as the step of the main flow that it came from  
   Steps should be numbered x.1, x.2, x.3 (x is the step number of the main flow that originated the alternate flow  
   Last step of the alternate flows indicates which step in the Main Success scenario that invoked this alternate flow  
   Post conditions are in addition to those of the basic flow.  
     
   This is in the format:  
     
   < step altered><branch letter>. <condition>:, followed by <step altered><branch letter><step number>. <action or sub-use case>, where “step altered” is the step at which condition occurs and we follow an alternative sequence of numbered steps. One possible action is "the use case continues at step <step number>".  
     
   e.g., 3a. There are no matching customers:  
    3a1. System reports that no match was found

|  |  |
| --- | --- |
| **What the Actor does** | **What the System does** |
| 1. Wrong Employee Id(PS number) | Application show the error message “Incorrect Employee Id” |
| 2. Wrong Employee Id and Password in Login | Application show the error message “Incorrect Employee Id or Password” |

## Use Case Diagram



**Employee Use Case**



**Manager Use Case**

| **Use Case ID: UC\_01** | **Use Case Name: Registration** | | **Version No: 1.0**  **Date: 10-Feb-2021** |
| --- | --- | --- | --- |
| **Primary Actor: Employee** | |  | |
| **Brief Description:** Employee who is new to the application needs to register to the application with a valid Employee Id | | | |
| **Stakeholders and Interests:** Employee | | | |
| **Preconditions:** User must be Employee of the organization | | | |
| **Validation:** Employee id, Password | | | |
| **Assumptions:** 1. Employee is a valid member of the organization  2. Employee has his/her valid Employee id with them.  2. Employee enter a valid(strong) password as there is no Pre condition checked for the password | | | |
| **Success Guarantee (Post conditions):** Employee will be registration and will be able to Login | | | |
| **Relationship between other use case: Extend to UC\_02** | | | |
|  | | | |

| **Use Case ID: UC\_02** | **Use Case Name: Login** | | **Version No: 1.0**  **Date: 10-Feb-2021** |
| --- | --- | --- | --- |
| **Primary Actor: Employee** | |  | |
| **Brief Description:** Employee who has registered to the application then the user will be able to login to the system with Email id and password | | | |
| **Stakeholders and Interests:** Employee | | | |
| **Preconditions:** User should register to the application before login | | | |
| **Validation:** Employee id, Password | | | |
| **Assumptions:** 1. User is successfully registered to the application  2. Employee enter a Valid Employee id and Password | | | |
| **Success Guarantee (Post conditions):** Employee will be logged in and can use the application | | | |
| **Relationship between other use case: Extend to UC\_03** | | | |
|  | | | |

| **Use Case ID: UC\_03** | **Use Case Name: Apply Leave** | | **Version No: 1.0**  **Date: 10-Feb-2021** |
| --- | --- | --- | --- |
| **Primary Actor: Employee** | |  | |
| **Brief Description:** Once Login user can apply Leave. User has to enter the details like FromDate, TillDate and reason for the Leave which will be sent to the manager for approval | | | |
| **Stakeholders and Interests:** Employee | | | |
| **Preconditions:** User should be logged in and should have at least L1 Manager | | | |
| **Validation:**  FromDate, TillDate, Reason | | | |
| **Assumptions:** 1. User is successfully Logged in to the application  2. User Enter a valid reason for the leave  3. user has at least L1 Manager | | | |
| **Success Guarantee (Post conditions):** Leave will be applied and will wait for approval | | | |
| **Relationship between other use case: Extend to UC\_05** | | | |
|  | | | |

| **Use Case ID: UC\_04** | **Use Case Name: Approve Leave** | | **Version No: 1.0**  **Date: 10-Feb-2021** |
| --- | --- | --- | --- |
| **Primary Actor: Employee (Manager)** | |  | |
| **Brief Description:** Once Login Manager has one extra functionality where manager can approve or reject leave applied | | | |
| **Stakeholders and Interests:** Employee(Manager) | | | |
| **Preconditions:** There should be a leave application applied by an employee under him/she | | | |
| **Assumptions:** 1. Employee(Manager) is a manager for at least one Employee  2. Approval or rejection of the leave application is made solely by the manager as there is no precondition to decide that | | | |
| **Success Guarantee (Post conditions):** Employee leave application is either approved or rejected | | | |
| **Relationship between other use case: Extend to UC\_05** | | | |
|  | | | |

| **Use Case ID: UC\_05** | **Use Case Name: Leave status** | | **Version No: 1.0**  **Date: 10-Feb-2021** |
| --- | --- | --- | --- |
| **Primary Actor: Employee** | |  | |
| **Brief Description:** Once leave is applied the users can view the status of the leave. The leave status can be one of the following:   1. ForApproval 2. Approved 3. Rejected | | | |
| **Stakeholders and Interests:** Employee | | | |
| **Preconditions:** Employee should have applied for a leave | | | |
| **Assumptions:** 1. User is successfully Logged in to the application  2. Employee should have applied for a leave | | | |
| **Success Guarantee (Post conditions):** Employee leave application is either approved or rejected | | | |
| **Relationship between other use case: used after UC\_03** | | | |
|  | | | |

| **Use Case ID: UC\_06** | **Use Case Name: Logout** | | **Version No: 1.0**  **Date: 10-Feb-2021** |
| --- | --- | --- | --- |
| **Primary Actor: Employee** | |  | |
| **Brief Description:** Once all the operation that the user wishes to perform is completed then the user can logout of the application**.** | | | |
| **Stakeholders and Interests:** Employee | | | |
| **Preconditions:** Employee should be logged in to the application | | | |
| **Assumptions:** 1. User is successfully Logged in to the application | | | |
| **Success Guarantee (Post conditions):** Employee is successfully logged out of the system | | | |
| **Relationship between other use case: Taken to UC\_02** | | | |
|  | | | |

1. Exception flows deviate from the Main flow and does not return to the main flow.  
   The actor’s goal is not achieved. The path from the beginning of the use case to the end of the exception flow, is called the “exception scenario”  
   This is in the format:  
     
   < step altered><branch letter>. <condition>:, followed by <step altered><branch letter><step number>. <action or sub-use case>, where “step altered” is the step at which condition occurs and we follow an alternative sequence of numbered steps. One possible action is "the use case continues at step <step number>".  
     
   e.g. 3a. There are no matching customers:  
    3a1. System reports that no match was found

The following items are listed as samples of what types of information to include in the decisions section. This section should be used to record decisions made to resolve issues about a use case, in order for the project to continue to move forward.

**EXAMPLES:**

**SPECs and Design Pages are not complete.**

Team will use snapshot copies.

The Design Specification documents and Design pages are not complete. <Customer Long Name> is working to complete the content. (The specific files are listed in the Related Information section.)

To work around this problem, we have taken a snapshot of the requirement files and placed them under version control. This will allow us to start developing the use cases. The current folders are:

SPECs - trunk\docs\orcl\business requirements\Administration\020507 WFA Specs

UID - trunk\docs\orcl\User Interface\ORCL UCD JAN07\GP

After we have gone through the initial creation of the use case, the developer of this use case will go back and get a new copy of the requirements and update the use case.

**No SPEC. Creating Use Case from Design sample pages.**

There is no customer Design Specification (SPEC) document for this use case at this time. We are creating the use case from the Design pages that the customer provided. We will ask questions to help us fill in the information that we cannot obtain from the Design sample pages. We will update the use case when s the SPEC document has been released.

**<Use case detail> will be handled outside of the Oracle Applications implementation**

We will use the <alternate system name> application to handle position management. The position management features in the Oracle ERP will not be used.

The manager can change a person’s Job Title or Position in the ERP system. If the title or position does not exist, the manager can create it ad hoc with no approvals or validation. (See: SPEC-zzz-xxx01 Change Job Title.doc). People who have an ERP or relational database background will have a hard time with the fact that there is no rigid process of Job Title or Position changes.

**The Design is Set. Any additional changes are for future releases.**

1. During the <date> Turnover Meeting, the project sponsor stated, “The design is set. Design changes are for future releases.” (See: Turnover\_Meeting Minutes\_20070122.DOC)

## Open Issues

* One of the main issues is to understand what client wants as there is a is a minimal documentation provide
* Implementing all the modules and the functionalities client requests.

1. List of issues about this use case awaiting decisions.

# References

## Notation

#### Design Scope

Level in which the system is inserted in the use case. Am I checking up on organization or on system? Am I describing its internal structure or not?

|  |  |
| --- | --- |
|  | **Organization black-box**  Consider the **organization** where the system is inserted, **without revealing** its intern structure. |
|  | **Organization white-box**  Consider the **organization** where the system is inserted, **revealing** its intern structure. |
|  | **System black-box \*\***  Consider the system, **without revealing** its intern actions. |
|  | **System white-box**  Consider the system, **revealing** its intern actions. |
|  | **Component**  Describes the functioning of a system component. |

#### Goal Level

Level in which the user requirements are met, and operation way

|  |  |
| --- | --- |
|  | **User-Goal \*\*\***  Corresponds to a user interaction with the system in which one of his goals is met. |
|  | **Summary & Very high summary**  More abstract level than user-goal, commonly used to provide the context in which the use cases are inserted. |
|  | **Subfunction & Too low**  Detailed user-goal, used when some operational detail is necessary. |

# Appendix

Use case diagrams are very necessary in order to clarify system requirements from the end-users. However, many other methods, such as textual representation or formal specifications methods such as Z, exist to depict the information contained within a use case diagram. Thus, while defining system requirements is a necessary part of the software development process, it is not strictly necessary to utilize use case diagrams to model this information. Use case diagrams are very difficult to derive from source code during the reverse engineering process. While it is possible to extract system processes from activity diagrams and to properly label these processes using some type of artificial intelligence, it is very difficult to derive use cases without significant manual input from the users.