

Oracle® Insurance Accounting Analyzer User Guide



Release 8.1.2.3.0

F84334-01

July 2023

The Oracle logo, consisting of a solid red square with the word "ORACLE" in white, uppercase, sans-serif font centered within it.

ORACLE®

Oracle Insurance Accounting Analyzer User Guide, Release 8.1.2.3.0

F84334-01

Copyright © 2000, 2023, Oracle and/or its affiliates.

Primary Authors: (primary author), (primary author)

Contributing Authors: (contributing author), (contributing author)

Contributors: (contributor), (contributor)

This software and related documentation are provided under a license agreement containing restrictions on use and disclosure and are protected by intellectual property laws. Except as expressly permitted in your license agreement or allowed by law, you may not use, copy, reproduce, translate, broadcast, modify, license, transmit, distribute, exhibit, perform, publish, or display any part, in any form, or by any means. Reverse engineering, disassembly, or decompilation of this software, unless required by law for interoperability, is prohibited.

The information contained herein is subject to change without notice and is not warranted to be error-free. If you find any errors, please report them to us in writing.

If this is software, software documentation, data (as defined in the Federal Acquisition Regulation), or related documentation that is delivered to the U.S. Government or anyone licensing it on behalf of the U.S. Government, then the following notice is applicable:

U.S. GOVERNMENT END USERS: Oracle programs (including any operating system, integrated software, any programs embedded, installed, or activated on delivered hardware, and modifications of such programs) and Oracle computer documentation or other Oracle data delivered to or accessed by U.S. Government end users are "commercial computer software," "commercial computer software documentation," or "limited rights data" pursuant to the applicable Federal Acquisition Regulation and agency-specific supplemental regulations. As such, the use, reproduction, duplication, release, display, disclosure, modification, preparation of derivative works, and/or adaptation of i) Oracle programs (including any operating system, integrated software, any programs embedded, installed, or activated on delivered hardware, and modifications of such programs), ii) Oracle computer documentation and/or iii) other Oracle data, is subject to the rights and limitations specified in the license contained in the applicable contract. The terms governing the U.S. Government's use of Oracle cloud services are defined by the applicable contract for such services. No other rights are granted to the U.S. Government.

This software or hardware is developed for general use in a variety of information management applications. It is not developed or intended for use in any inherently dangerous applications, including applications that may create a risk of personal injury. If you use this software or hardware in dangerous applications, then you shall be responsible to take all appropriate fail-safe, backup, redundancy, and other measures to ensure its safe use. Oracle Corporation and its affiliates disclaim any liability for any damages caused by use of this software or hardware in dangerous applications.

Oracle®, Java, and MySQL are registered trademarks of Oracle and/or its affiliates. Other names may be trademarks of their respective owners.

Intel and Intel Inside are trademarks or registered trademarks of Intel Corporation. All SPARC trademarks are used under license and are trademarks or registered trademarks of SPARC International, Inc. AMD, Epyc, and the AMD logo are trademarks or registered trademarks of Advanced Micro Devices. UNIX is a registered trademark of The Open Group.

This software or hardware and documentation may provide access to or information about content, products, and services from third parties. Oracle Corporation and its affiliates are not responsible for and expressly disclaim all warranties of any kind with respect to third-party content, products, and services unless otherwise set forth in an applicable agreement between you and Oracle. Oracle Corporation and its affiliates will not be responsible for any loss, costs, or damages incurred due to your access to or use of third-party content, products, or services, except as set forth in an applicable agreement between you and Oracle.

Contents

1 About the Guide

1.1	Intended Audience	1-1
1.2	Access to Oracle Support	1-1
1.3	Related Information Sources	1-1
1.4	About Oracle Financial Services Analytical Applications (OFSAA)	1-1
1.5	About Oracle Financial Services Analytical Applications Infrastructure (OFS AAI)	1-2
1.6	About Oracle Insurance Accounting Analyzer Application Pack	1-2

2 Understanding Oracle Insurance Accounting Analyzer Application

2.1	Introduction	2-1
2.2	Functional Flow	2-2

3 Exploring Oracle Insurance Accounting Analyzer Application

3.1	Level of Aggregation	3-1
3.1.1	Overview	3-1
3.1.2	Identifying Portfolios of Insurance Contracts	3-1
3.1.3	Grouping Contracts at Initial Recognition According to Expected Profitability	3-2
3.1.3.1	Onerous Assessment	3-3
3.1.3.2	Onerous Classification	3-3
3.1.4	Forming the Cohorts	3-3
3.1.5	Reinsurance Contracts Held	3-3
3.2	General Measurement Model (GMM)	3-4
3.2.1	Overview	3-4
3.2.2	Performing Initial Measurement	3-4
3.2.3	Performing Successive Measurements	3-5
3.2.4	Reinsurance Contracts Held	3-5
3.2.4.1	Estimates of Future Cash Flows	3-5
3.2.4.2	Risk Adjustment for Non-financial Risk	3-5
3.2.4.3	Contractual Service Margin	3-6
3.3	Variable Fee Approach (VFA)	3-6
3.3.1	Overview	3-6

3.3.2	Reinsurance Contracts Held	3-7
3.4	Premium Allocation Approach (PAA)	3-7
3.4.1	Overview	3-7
3.4.2	Reinsurance Contracts Held	3-7
3.5	Long Duration Contracts	3-8
3.6	Subledger	3-8
3.7	Exchange Rate	3-9
3.8	Acquired Contracts	3-9
3.9	Year-To-Date (YTD)	3-9

4 Application Workflow

4.1	Application Configuration	4-1
4.1.1	Access Application Configuration	4-1
4.1.2	Configure the Seeded Data	4-2
4.2	Level of Aggregation	4-4
4.2.1	Access Level of Aggregation	4-4
4.2.2	Search for Level of Aggregation Definitions	4-5
4.2.3	Create a New Level of Aggregation Definition	4-5
4.2.4	Edit Level of Aggregation Definition	4-8
4.2.5	View Level of Aggregation Definition	4-8
4.3	Calculation Preferences	4-9
4.3.1	Access Calculation Preferences	4-9
4.3.2	Search for a Calculation Preferences Definitions	4-10
4.3.3	Create a New Calculation Preferences Definition	4-10
4.3.4	Edit a Calculation Preferences Definition	4-18
4.3.5	View a Calculation Preferences Definition	4-19
4.3.6	View the History of a Calculation Preference Definition	4-19
4.3.7	Create a New Version of a Calculation Preference Definition	4-20
4.3.8	Copy a Calculation Preferences Definition	4-22
4.3.9	Retire Calculation Preferences Definition	4-23
4.4	Liability Calculations	4-23
4.4.1	Map a User to a User Group to Approve the Liability Calculation	4-23
4.4.2	Access Liability Calculations	4-24
4.4.3	Search for Liability Calculation Definitions	4-25
4.4.4	Create a New Liability Calculation Definition	4-25
4.4.5	Edit Liability Calculation Definition	4-34
4.4.6	View Liability Calculation Definition	4-34
4.4.7	Approve a Liability Calculation	4-35
4.4.8	View the History of a Liability Calculation Definition	4-35
4.4.9	Create a new Version of a Liability Calculation Definition	4-37

4.4.10	Run Liability Calculation Definition	4-39
4.4.11	Copy Liability Calculation Definition	4-40
4.4.12	Retire Liability Calculation Definition	4-40
4.5	Variable Maintenance	4-40
4.5.1	Access Variable Maintenance	4-41
4.5.2	Search for a Variable	4-41
4.5.3	Create a New Variable for IFRS17	4-41
4.5.4	Create a New Variable for LDTI	4-45
4.5.5	Edit a Variable	4-49
4.5.6	View a Variable	4-49
4.5.7	Delete a Variable	4-49
4.6	Subledger Attributes	4-50
4.6.1	Access Subledger Attributes	4-50
4.6.2	Search for Subledger Accounting Attributes	4-50
4.6.3	Create a New Subledger Accounting Attribute	4-51
4.6.4	Edit a Subledger Attribute	4-55
4.6.5	Create a New Version of a Subledger Attribute	4-55
4.6.6	View a Subledger Attribute Version	4-55
4.6.7	View a Subledger Attribute	4-56
4.6.8	Delete a Subledger Attribute	4-56
4.7	Subledger	4-56
4.7.1	Access Subledger	4-57
4.7.2	Search for Subledger Definitions	4-57
4.7.3	Map the Subledger Roles and Groups	4-58
4.7.4	Create New Subledger Definition	4-59
4.7.5	Edit a Subledger Definition	4-67
4.7.6	View a Subledger Definition	4-67
4.7.7	Execute a Subledger Definition	4-67
4.7.8	View a Subledger Error Log	4-68
4.7.9	Finalize a Subledger Run	4-69
4.7.10	Create a New Version of the Subledger Definition	4-70
4.7.11	Delete a Subledger Definition	4-70
4.8	Subledger Manual Adjustment	4-71
4.8.1	Access Subledger Manual Adjustment	4-71
4.8.2	Search for Subledger Manual Adjustment Definitions	4-71
4.8.3	Create New Subledger Manual Adjustment Definition	4-72
4.8.4	Edit a Subledger Manual Adjustment Definition	4-73
4.8.5	View a Subledger Manual Adjustment Definition	4-73
4.8.6	Run Subledger Manual Adjustment Definition	4-73

5	Oracle Insurance Accounting Analyzer Reports	
6	Annexure – Technical Details	
6.1	Discounting Engine Interest Rates Decimal Values	6-1
6.2	Discounting Engine Cash Flows Decimal Values	6-1
7	Viewing the Logging Details for Discounting Engine	
8	Create the Distribution Channel Members	
9	List of Financial Element Types and Codes	
10	Increasing the Cohort ID length	
11	References	
11.1	Hierarchy Selection	11-1
12	Band Maintenance	
12.1	Access Band Maintenance	12-1
12.2	Search for Band Definitions	12-1
12.3	Create a New Band Definition	12-1
12.4	Edit Band Definition	12-2
12.5	View Band Definition	12-2
13	Dimension Management	
13.1	Access Dimension Management	13-1
13.2	Adding a Member Definition	13-1
13.3	Map the Financial Element or Transaction Type to the Cash Flow Type	13-1
13.3.1	Map the Financial Element to the Cash Flow Type	13-1
13.3.2	Map the Transaction Type to the Cash Flow Type	13-2

14 Batch Execution

14.1	Access Batch Execution	14-1
14.2	Run or Execute the Batches	14-1

15 Chapter 1

1

About the Guide

This section provides release information for the Oracle Insurance Accounting Analyzer Application

1.1 Intended Audience

This document is intended for users of the Oracle Insurance Accounting Analyzer Application.

1.2 Access to Oracle Support

Oracle customers have access to electronic support through My Oracle Support. For information, visit <http://www.oracle.com/pls/topic/lookup?ctx=acc&id=info>

1.3 Related Information Sources

You can access the following online documents from the Oracle Help Center (OHC) Documentation Library for the [Oracle Insurance Accounting Analyzer Application](#):

- Oracle Insurance Accounting Analyzer Release Notes
- Oracle Insurance Accounting Analyzer Installation Guide
- Oracle Insurance Accounting Analyzer User Guide

You can access the OFS AAI documentation online from the OHC Documentation Library for [Oracle Financial Services Analytical Applications Infrastructure](#):

- Oracle Financial Services Analytical Applications Infrastructure Installation and Configuration Guide
- Oracle Financial Services Analytical Applications Infrastructure User Guide

The additional documents are:

- [OFSAA Licensing Information User Manual Version 8.1.2.0.0](#)
- [OFS Analytical Applications Infrastructure Security Guide](#)
- [OFS Analytical Applications 8.1.x Technology Matrix](#)

1.4 About Oracle Financial Services Analytical Applications (OFSAA)

In turbulent markets today, financial institutions require a better understanding of their risk-return while strengthening their competitive advantage and enhancing long-term customer value. Oracle Financial Services Analytical Applications (OFSAA) enable financial institutions to measure and meet risk-adjusted performance objectives, cultivate a risk management culture through transparency, lower the costs of compliance and regulation, and improve insight into customer behavior.

OFSAA uses industry-leading analytical methods, shared data models, and application architecture to enable integrated risk management, performance management, customer insight, and compliance management. OFSAA actively incorporates risk into decision-making, enables you to achieve a consistent view of performance, promotes a transparent risk management culture, and provides pervasive intelligence.

Oracle Financial Services Analytical Applications delivers a comprehensive, integrated suite of financial services analytical applications for both banking and insurance domains.

1.5 About Oracle Financial Services Analytical Applications Infrastructure (OFS AAI)

Oracle Financial Services Analytical Applications Infrastructure (OFS AAI) powers the Oracle Financial Services Analytical Applications family of products to perform the processing, categorizing, selection, and manipulation of data and information required to analyze, understand and report on specific performance, risk, compliance, and customer insight issues by providing a strong foundation for the entire family of Oracle Financial Services Analytical Applications across the domains of Risk, Performance, Compliance, and Customer Insight.

1.6 About Oracle Insurance Accounting Analyzer Application Pack

IFRS17 is an international norm that supersedes the current reporting standards, IFRS 4. The new standard provides users of financial statements with a new perspective on the financial accounts of insurance companies. Oracle Financial Services Insurance Accounting Analyzer application enables insurance companies to adhere to the disclosure requirements as proposed under IFRS 17 with an ability to compute Contractual Service Margin and Net Liabilities.

2

Understanding Oracle Insurance Accounting Analyzer Application

This section provides information and the functional flow of the Oracle Insurance Accounting Analyzer Application.

2.1 Introduction

Insurance companies need to identify the risks that arise from the insurance contracts along with the calculation of assets and liabilities. IFRS 4 was introduced in March 2004 and was intended to provide limited improvements to accounting for insurance contracts. IFRS 4 permitted companies to continue previous accounting practices for insurance contracts but did enhance the disclosure requirements.

IFRS17 released in May 2017, supersede the current IFRS 4 reporting standards on accounting for insurance contracts and has an effective date of 1 January 2021. The new standards provide users of financial statements with a new perspective on the financial accounts of insurance companies. IFRS 17 introduces an approach that tackles some challenges in accounting for insurance contracts currently addressed inconsistently when a company applies IFRS 4. Some of the benefits of the IFRS17 are:

- IFRS 17 provides updated information about the obligations, risks, and performance of insurance contracts.
- Increased transparency in financial information reported by insurance companies will give investors and analysts more confidence in understanding the insurance industry.
- Consistent accounting for all insurance contracts based on a current measurement model.

The Oracle Insurance Accounting Analyzer application follows the IFRS 17 standard diligently and enables insurance companies to adhere to the disclosure requirements as proposed under the IFRS 17 standard, along with an ability to compute the Contractual Service Margin and Net Liabilities.

The IFRS 17 standard requires insurance companies to have a consistent accounting standard for the insurance contracts that ensure timely recognition of losses in the book of accounts. Insurance companies are required to identify and report the fulfillment cash flows and contractual service margin at every reporting date, based on the current market conditions. The Oracle Insurance Accounting Analyzer application helps organizations in arriving at the insurance obligations, and insurance contract liabilities reported on the balance sheet, by using different methodologies for a set of portfolios and by assessing the net liability for every insurance contract.

The IFRS 17 standard requires the entities to perform initial recognition of insurance contracts and execute periodical re-assessment of the insurance liabilities, based on the current assumption sets. The insurance liabilities are presented in every reporting period and those reflect the change in the amount since inception. The profitability of insurance contracts is amortized over the duration of the contract, based on the services provided.

One of the critical requirements of IFRS 17 is to estimate the measurements at the most granular level, rather than at the aggregated portfolio level. Groups are formed with a portfolio to reflect the insurance contract that shares similar risks. The financial report separately displays the asset and liabilities of the groups of contracts. This primarily involves displaying the insurance and finance results separately per insurance group.

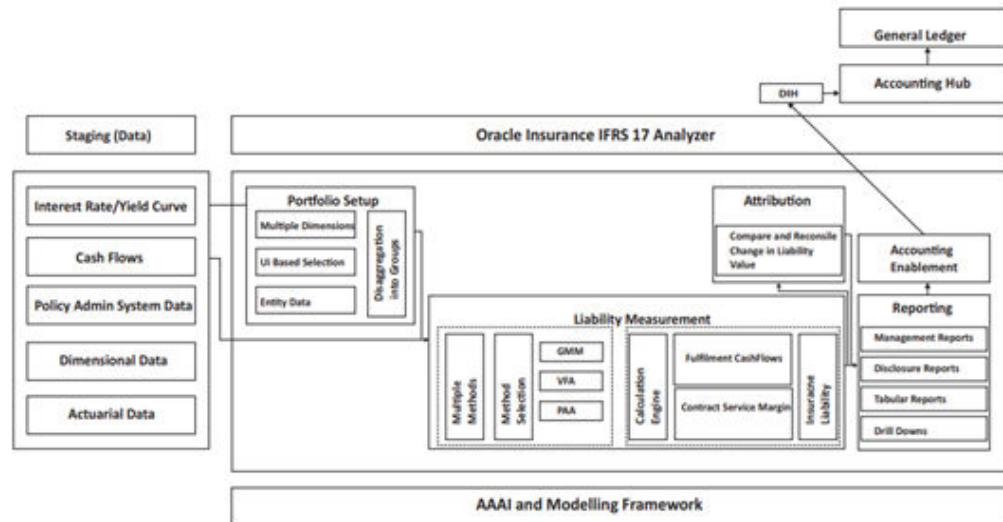
 **Note:**

By default, the financial elements dimension member code is numeric. If you require it to be an alphanumeric code, then you must follow the post-installation activities as described in the Configurations to use the Alphanumeric and Numeric Codes for **Dimension Members** section in the [AAI Administration Guide](#). This is a one-time activity and this decision must be taken before the application is used. Changing it from numeric to alphanumeric while using the application is not supported. Note that in the case of an integrated setup, the decision for numeric and alphanumeric codes must be taken before all integrated applications are used.

2.2 Functional Flow

The following diagram depicts the functional flow of the Oracle Insurance Accounting Analyzer application:

Figure 2-1 The Functional Flow of the Oracle Insurance Accounting Analyzer Application



3

Exploring Oracle Insurance Accounting Analyzer Application

This chapter provides the functional as well as a business overview of Oracle Insurance Accounting Analyzer.

3.1 Level of Aggregation

This section provides details about aggregating insurance contracts into groups.

To understand how Oracle Insurance Accounting Application features Level of Aggregation, see [Level of Aggregation](#).

3.1.1 Overview

IFRS 17 mandates group insurance contracts to reduce risks. This process is referred to as Risk Pooling. This grouping also helps in determining the profitability of the insurance contracts in the group.

What happens, if the insurance contracts are not grouped? At inception, the individual contracts are treated equally, and the probability of claim is also distributed equally. However, on subsequent measurements, the probability of claiming individual contracts may increase (expected cash outflows are increased) or decrease (expected cash outflows are decreased). The increase in the probability of claiming individual contracts marks a contract as onerous and is recognized immediately in the profit or loss. Also, the decrease in the probability of claiming individual contracts increases the CSM and is marked as profitable over the coverage period.

What happens, if the insurance contracts are grouped? The contracts in the groups are measured collectively and thus the change in expected cash outflows and the CSM remains unaffected (continue to recognize over current and future coverage periods). These profits are recognized over the coverage period.

3.1.2 Identifying Portfolios of Insurance Contracts

To group the insurance contracts, as the first step the portfolios must be identified. Contracts in the same product line are expected to possess similar risks and can be managed together. Therefore, such contracts in the same product line are grouped in the same portfolio.

For example:

- Whole life insurance
- Annuities
- Car insurance

Portfolios of contracts are divided into groups of a minimum of the following:

- Onerous at initial recognition

- No risk of being onerous
- Remaining contracts in the portfolio

IFRS 17 permits these groups to be further subdivided. For example, you can create sub-groups based on different levels of profitability.

The level at which to perform grouping assessment includes the following:

- An entity may assess a set of contracts if reasonable and supportable information enables it to conclude the contracts will be in the same group.
- Otherwise, groups are determined by considering individual contracts.
- Multiple sets or individual contracts can form a group.

 **Note:**

If the requirements of IFRS 17 are met, a group can be formed with any number of contracts or an individual contract.

3.1.3 Grouping Contracts at Initial Recognition According to Expected Profitability

Initial recognition of insurance contracts is the process of grouping the insurance contracts that are subject to similar risks. The initial recognition is performed at the beginning of the coverage period of the group of contracts (Policy Inception). During initial recognition, an insurance contract can be part of an existing group of insurance contracts if all the contracts have similarly expected profitability at the time of initial recognition and are issued within one year.

 **Note:**

Insurance contracts that are issued more than one year apart should not be a part of the same group.

Once the initial recognition of a group of insurance contracts is completed, the carrying amount of the group at each reporting date is calculated as the sum of the liability for remaining coverage and the liability for incurred claims comprising the Fulfillment Cash Flows related to past service allocated to the group at that date.

The Liability for remaining coverage is comprised of the fulfillment cash flows allocated to the group at that date and the Contractual Service Margin (CSM) of the group at that date. CSM is the unearned profits recognized over the coverage period.

The requirements on when to recognize a group of reinsurance contracts held are different depending on whether the reinsurance contract held covers the losses of separate insurance contracts on a proportionate basis, proportionate reinsurance contracts, or the reinsurance contract held covers aggregate losses from underlying contracts over a specified amount, such as non-proportionate reinsurance contracts.

A group of proportionate reinsurance contracts held is recognized at the later of the beginning of the coverage period of the group or the initial recognition of any underlying insurance contract. This means an entity will not recognize a group of proportionate reinsurance contracts held until it has recognized at least one of the underlying insurance contracts. A group of non-proportionate reinsurance contracts held is recognized at the beginning of the coverage period of the group.

3.1.3.1 Onerous Assessment

Onerous assessment includes multiple levels of processing. These include measuring an insurance contract or a set of insurance contracts at initial recognition. If they are found to be onerous, then they are marked as onerous at initial recognition. If not, the assessment to determine which of the following groups, should these contracts or groups of contracts belong to, is performed:

- Remaining contracts in the portfolio.
- No significant possibility of becoming onerous at initial recognition.

Facts and circumstances can indicate if the contracts might form an onerous group even before typical initial recognition. This process is known as Early Recognition.

Note:

Contracts can fall into different groups because of legal or regulatory constraints, based on the ability to set different prices or levels of benefit for policyholders with different characteristics. Then under IFRS 17, an entity may include these contracts in the same group, by following all other IFRS 17 grouping requirements.

3.1.3.2 Onerous Classification

The insurance contracts or cohorts' onerous classification is performed in the application by checking whether the contracts are net outflow at inception. If the contracts are profitable at inception, then the CSM is projected into the future by using different assumption scenarios. For any projected period, a loss is recognized then the contract is marked as profitable with a significant possibility of turning onerous.

3.1.4 Forming the Cohorts

IFRS 17 requirements mandate that contracts issued more than one year apart should not be included in the same group. To achieve this, groups can be further divided as required. Each of these groups can include contracts issued over any length of time up to one year. This period does not need to be restricted or aligned with the reporting period of the entity. This requirement is known as the Annual Cohort Requirement.

The contracts in the cohorts can be of less than one year as well. For example, if an entity manages contracts in quarterly cohorts it could choose to have groups issued within a reporting quarter.

3.1.5 Reinsurance Contracts Held

A reinsurance contract held cannot be considered onerous by applying IFRS 17. Therefore, the requirements for dividing a portfolio into groups are modified for reinsurance contracts

held. For a group of reinsurance contracts held, an insurer expects either to incur a net cost of purchasing the reinsurance or, sometimes, make a net gain from purchasing the reinsurance. Applying the grouping requirements to reinsurance contracts held, at a minimum, a portfolio is divided into the following:

A group of contracts on which there is a net gain at initial recognition if any.

- A group of contracts on which at initial recognition there is no significant possibility of a net gain arising subsequently if any.
- A group of remaining contracts in the portfolio if any.

For some reinsurance contracts held, applying the requirements in IFRS 17 will result in a group that comprises a single contract.

3.2 General Measurement Model (GMM)

This section provides details about the General Measurement Model. IFRS 17 introduces the General Measurement Model that provides pertinent information about the future cash flows and profitability of insurance contracts. The General Measurement Model provides a wide-ranging and intelligent structure with various features of Insurance Contracts and the opportunities to make them profitable.

3.2.1 Overview

In IFRS, insurance contracts are grouped as profitable and onerous to make it easier for insurers to evaluate their profit or loss. Fulfillment cash flows and contractual service margin are two parameters that are considered while calculating the liability of the remaining insurance coverage, and thereby the profit or loss.



Note:

IFRS 17 requires financial institutions to update the fulfillment cash flows at each reporting date by using current estimates that are consistent with relevant market information.

3.2.2 Performing Initial Measurement

The asset or liability measurement is performed by adding the fulfillment cash flows and the contractual service margin after the initial recognition of insurance contracts.

- Fulfillment cash flows are the current estimate of amounts that the insurer expects to collect from premiums and payout for claims, benefits, and expenses, including an adjustment for the timing and risk of those cash flows.
- The contractual service margin is the expected profit for providing future insurance coverage (unearned profit).

The measurement of the fulfillment cash flows reflects the current value of any interest-rate guarantees and financial options included in the insurance contracts.

3.2.3 Performing Successive Measurements

After the initial asset or liability measurement at inception, subsequent measurements of ongoing group insurance contracts are also performed. The total liability of a group of insurance contracts is comprised of the liability of the remaining coverage and the liability for incurred claims. The liability for remaining coverage is calculated as the sum of fulfillment cash flows of the coverage to be provided in the future and the remaining CSM.

The liability for incurred claims is measured as the fulfillment cash flows for claims and expenses already incurred but not yet paid.

The fulfillment cash flows are measured again on each reporting date to reflect estimates based on current assumptions. This measurement applies the same requirements that were applied for the initial measurement. Changes in estimates of the fulfillment cash flows are reflected in profit or loss, other comprehensive income, or in some cases, the CSM is adjusted.

3.2.4 Reinsurance Contracts Held

This section provides detailed information about the Reinsurance Contracts Held feature.

3.2.4.1 Estimates of Future Cash Flows

The amount an entity pays for a reinsurance contract held consists of the premiums it pays minus any amounts paid by the reinsurer to the entity as compensation for expenses incurred, for example, ceding commissions. The amount an entity recognizes for reinsurance contracts held can be viewed as the share of the reinsurer for the risk-adjusted expected present value of the cash flows generated by the underlying insurance contracts and a CSM that makes the initial measurement of the reinsurance asset equal to the amount the entity pays for the reinsurance contract.

Consistent assumptions are used when measuring estimates of the present value of future cash flows for a group of reinsurance contracts held and estimates of the present value of future cash flows for the group(s) of underlying insurance contracts. This includes any associated adjustments for the financial risk and the time value of money arising from the reinsurance contracts held. As a result, the cash flows used to measure the reinsurance contracts held reflect the extent to which those cash flows depend on the cash flows of the underlying contracts that the reinsurance contract held covers.

Also, the expected present value of future cash flows includes an adjustment for the risk that the reinsurer may fail to satisfy its obligations under the reinsurance contract held. Changes in the fulfillment of cash flows that result from changes in the risk of non-performance by the reinsurer do not adjust the contractual service margin. Instead, these changes are reflected in profit or loss when they occur.

3.2.4.2 Risk Adjustment for Non-financial Risk

The requirements in IFRS 17 for risk adjustment for non-financial risk are modified for reinsurance contracts held. For reinsurance contracts held, the risk adjustment for non-financial risk represents the amount of risk being transferred by the holder of the group of reinsurance contracts to the reinsurer.

3.2.4.3 Contractual Service Margin

The contractual service margin for a reinsurance contract held represents the cost of purchasing reinsurance. This is different from the contractual service margin for underlying insurance contracts that represent unearned profit on those contracts. The cost of purchasing reinsurance is recognized as services are received under the reinsurance contract held. As an exception, if the reinsurance contract held covers events that have already occurred, the net cost at initial recognition is recognized immediately in profit or loss.

The amount an entity pays for reinsurance typically exceeds the expected present value of cash flows generated from that reinsurance plus the risk adjustment for non-financial risk. As such, the contractual service margin for a group of reinsurance contracts held at initial recognition typically represents a net cost of purchasing reinsurance.

3.3 Variable Fee Approach (VFA)

The Variable Fee Approach is applied to direct participating contracts. It is defined by three criteria and is based on policyholders sharing in the profit from an identified pool of underlying items.

3.3.1 Overview

Variable Fee Approach (VFA) is applied to direct participating contracts. The Variable Fee Approach (VFA) is defined by these criteria, based on policyholders being entitled to a significant share in the profit from an identified pool of underlying items:

- The contractual terms specify that the policyholder participates in a share of an identified pool of underlying items.
- The entity expects to pay the policyholder an amount equal to a substantial share of the fair value returns from the underlying items.
- The entity expects a substantial proportion of any change in the amounts to be paid to the policyholder to vary with the change in the fair value of the underlying items.

A variable fee is the insurance contract liability based on the obligation for the entity to pay the policyholder an amount equal to the value of the underlying items and the net of a consideration charged for the contract.

This approach requires that changes to the estimate of the future fees an entity expects to earn from directly participating contract policyholders be adjusted against the CSM. The CSM on direct participating contracts would be recognized in profit or loss as part of the insurance service results based on the passage of time of the entity.

This flexible approach helps to mitigate accounting mismatches. This approach matches assets and liabilities. According to VFA, there is no direct impact on profit and loss. Also, CSM is being released over the contract period. In VFA, the discounting rate will be equal to the current interest rate.

3.3.2 Reinsurance Contracts Held

For reinsurance contracts held, the entity and the reinsurer do not share in the returns on underlying items and so the VFA criteria are not met, even if the underlying insurance contracts issued are VFA contracts. The contractual service margin for a group of reinsurance contracts held represents the net cost (or net gain) of purchasing reinsurance, considering the rights and obligations of the entity under the reinsurance contract. The insurer does not receive investment-related services from the reinsurer.

3.4 Premium Allocation Approach (PAA)

The Premium Allocation Approach (PAA) is similar to existing approaches for non-life insurance products. The Premium Allocation Approach only applies over the coverage period, not over the settlement period.

3.4.1 Overview

This section defines how the contract boundary is critical to analyzing whether an insurer can use the PAA for some contracts. The PAA, or simplified approach, can be used when the contract coverage period, including premiums included in the contract boundary, is one year or less or if the PAA produces a liability.

The first step to assess its use is to define the contract boundary and the coverage period. Many non-life insurance contracts meet the first criteria by having a coverage period of one year or less. However, contracts with longer coverage periods, such as surety, engineering, construction, or lenders' mortgage insurance will need to demonstrate they meet the second criterion.

Non-life insurers in this scenario will need to develop more complex modeling than they currently apply, requiring more data and the development of long-term assumptions. This also means insurers will present financial statements with a mix of valuation techniques, complicating the way results are analyzed and communicated.

The premium allocation approach assumes that no contracts are onerous at initial recognition unless facts and circumstances indicate otherwise. Assessment of whether an individual or a set of contracts belongs to those groups is based on the likelihood of changes in applicable facts and circumstances.

Longer-term non-life contracts, such as construction, engineering, and lenders' mortgage insurance, may not meet the criteria. As a result, the insurer will face additional complexity in its valuation, modeling, and associated processes. Some life insurance contracts currently using long-duration measurement models may qualify to be able to use the PAA approach, which simplifies the modeling required but may also lead to unexpected results.

3.4.2 Reinsurance Contracts Held

An entity may use the premium allocation approach to simplify the measurement of a group of reinsurance contracts held. If at the inception of the group, the entity reasonably expects that the resulting measurement would not differ materially from the measurement applying the general model or the coverage period for each contract in the group of reinsurance contracts held is one year or less.

Because groups of reinsurance contracts held are separate from groups of underlying insurance contracts, the assessment of whether a group of reinsurance contracts meets the

conditions for applying the premium allocation approach may differ from the assessment of whether the group(s) of underlying contracts meet(s) those conditions.

3.5 Long Duration Contracts

A long-duration contract or long-duration targeted improvement (LDTI) is one that is generally not subject to unilateral changes in its provisions and requires the performance of various functions and services, including insurance protection, for an extended period. Examples include contracts that are non-cancellable or guaranteed renewable by the insurer, such as most term and whole life insurance and payout annuity contracts.

According to the revised guidance, the non-participating traditional insurance contracts and limited-payment contracts that are measured using the net-level premium measurement approach are covered. Annual or more frequent updating of insurance assumptions is required, with the impact on the liability recognized on a retrospective catch-up basis as a separate component of benefit expense. There is no provision for adverse deviation. The net premium ratio is capped at 100%, which replaces the premium deficiency test. Contracts from different issue years will no longer be permitted to be grouped, effectively resulting in a lower level of aggregation for determining contracts in a loss position.

The discount rate is standardized to an upper-medium grade (low credit risk) fixed-income corporate instrument yield (single A) that reflects the duration characteristics of the liability rather than expected investment yields. The discount rate is required to be updated at each reporting date, with the effect of discount rate changes on the liability recorded in other comprehensive income (OCI). The contract inception date discount rate is locked in for benefit expense purposes.

For the LDTI transition, the application computes the Net Premium Ratio and Benefit Ratio in the following way:

- **Net Premium Ratio:** If the transition method is *Full Retrospective*, then the net premium as on inception is computed. If the transition method is *Modified Retrospective*, then the net premium as on the transition date is computed by using the net premium ratio formula that is configured against the Transition Date.
- **Benefit Ratio:** If the transition method is *FullRetrospective*, then the Benefit Ratio as on inception is computed. If the transition method chosen is modified retrospective then the Benefit Ratio as on the transition date is computed by using the Benefit Ratio formula that is configured against the Transition Date.

3.6 Subledger

The Subledger function enables you to pass IFRS 17-compliant journal entries that are based on the results of Contractual Service Margin (CSM) calculations. The solution has seamless connectivity between the CSM engine and the sub-ledger function. The CSM results, which are available post-execution, allow you to execute the sub-ledger definitions.

The Subledger function picks up data from the relevant tables and passes entries by using the pre-approved accounting rules. The entries are passed only for the runs that are marked for reporting.

The Subledger function comes with pre-coded IFRS 17 compliant accounting rules that are configurable and can be customized. In terms of output, the solution comes

with ready-to-use reports including a journal entry report and a ledger closing balance report. Both these reports are available at the selected granularity levels.

3.7 Exchange Rate

The Exchange Rate feature supports the ability to convert the foreign currency expected cash flows or actual transactions into the functional currency by using one of the Spot Exchange Rates supported by the Oracle Insurance Accounting Analyzer Application. The user can indicate the Exchange Rate Type against each input variable in the calculation preference configuration. The application uses the Exchange Rate Type to convert the foreign currency cash flows attached to that input variable into the Functional Currency using the same rate before executing the IFRS17 computations. The application also supports viewing the IFRS17 results in different reporting currencies configured as per legal entity.

3.8 Acquired Contracts

Acquired Insurance Contracts and Reinsurance held contracts in a business are treated as if they had been issued by the acquirer at the date of the transaction. The groups of contracts acquired are identified based on the level of aggregation requirements. This determines the issued CSM for Insurance Contracts and Reinsurance held contracts at the date of the transaction. For Onerous Contracts, the difference between the consideration received or paid and the fulfillment cash flows are treated differently. The application comes with the box logic, configured in the Calculation Preference Acquired Contracts templates to estimate the CSM and the loss as on the Transaction Date for the acquired business.

The groups of contracts acquired are identified based on the level of aggregation requirements. This determines the issued CSM for Insurance Contracts and Reinsurance held contracts at the date of the transaction.

Any consideration received for the contracts is used as a proxy for premiums received. This excludes any consideration for other assets and liabilities that are acquired in the same transaction.

For contracts acquired in a business combination, the Fair Value at the Transaction Date is considered. This Fair Value is determined by using the IFRS 13 requirements, except for the requirement where the Fair Value of a financial liability with a demand feature must not be less than the amount payable on demand.

For Onerous Contracts, the difference between the consideration received or paid and the fulfillment cash flows are treated differently.

3.9 Year-To-Date (YTD)

The Oracle Insurance Accounting Analyzer Application supports Year-to-Date Reporting irrespective of whether the Input Cash Flow or Variable Data is given on a Year-to-Date basis or an Incremental Basis. This document provides detailed information on the Year-to-Date Feature. See the Oracle Insurance Accounting Analyzer Year-to-Date Feature document on [MOS](#).

4

Application Workflow

This chapter provides the application workflow of various modules.

4.1 Application Configuration

Use the application configuration screen to configure the Seeded Data in the **setup_master** table. The changes made to this table in the **Application Configuration** window have an impact on the insurance cash flow loader, the discounting engine, and the liability calculation run.

4.1.1 Access Application Configuration

You can access the Application Configuration window by clicking the Application Configuration element from the left pane in the application. When you click this element, the Application Configuration window appears:

Figure 4-1 The Application Configuration window

Property Name	Property Value
Application Type *	IFRS17 & LDTI
Frequency for Retrospective calculation(including net premium ratio) during LDTI Liability calculation run *	Annually
Day for Retrospective calculation during LDTI Liability calculation run. If the value is 25, it means retrospective calculation will be executed if FIC_MIS_DATE is on and after 25th of the frequency month specified in IRL_RETROSPECTIVE_FREQUENCY *	25
IRC Forward Rate Max Term *	30
Degree of Parallelism for the execution of OT *	1
Transition FRA Batch wait time *	10
Flag for assumption scenario projection index *	Annually
Transition Date *	12/31/2020
Flag for computing all input variables or input variables which are associated to the template *	No
This flag indicates Consolidation Criteria. List of Values are E -> Computation based on Solo data, N -> Consolidated data as Input. *	Consolidated data as Input

Figure 4-2 The Application Configuration window (continued)

Property Name	Folder	Property Value
General Ledger Hierarchy applicable for Subledger *	8A8156G	GL_ACCOUNT

This window displays the current configuration for the seeded data in the **setup_master** table. After you modify the values in the **Application Configuration** pane, you can save your changes.

4.1.2 Configure the Seeded Data

Perform the following steps to modify the seeded data in the **Application Configuration** window:

1. Populate the **Application Configuration** Form as tabulated.

Table 4-1 The Application Configuration Form

Property Name	Description
<i>Fields marked with an * are mandatory</i>	
Application Type*	Select the Application Type from the drop-down list. Available options are: <ul style="list-style-type: none"> • IFRS17 • LDTI • IFRS17 & LDTI Depending on the selection, only the definitions related to the selected application type will appear in the application.
Frequency for Retrospective calculation(including net premium ratio) during LDTI Liability calculation run*	Specify the frequency at which the LDTI calculation run needs to be executed retrospectively for the past data. This must also be provided as an input at the same frequency. Select the required frequency from the drop-down list. Available options are: <ul style="list-style-type: none"> • Annually • Half Yearly • Monthly • Quarterly
Day for Retrospective calculation during LDTI Liability calculation Run, If the value is 25, it means retrospective calculation will be executed if FIC_MIS_DATE is on and after the 25th of the frequency month specified in IIA_RETROSPECTIVE_FREQUENCY*	Enter a value in this field.
IRC Forward Rate Max Term*	Enter a value in this field. This is the maximum term until which the Forward Rates are computed.
Degree of Parallelism for the execution of DT*	Enter a value in this field. The value in this field indicates the Degree of Parallelism for the execution of DT.
Transition FRA Batch wait time*	Enter a value in this field.
Flag for assumption scenario projection index*	Select the required Frequency Flag from the drop-down list. Available options are: <ul style="list-style-type: none"> • Annually • Half Yearly • Monthly • Quarterly

Table 4-1 (Cont.) The Application Configuration Form

Property Name	Description
Transition Date*	<p>Use this field to specify the transition date that must be used for the Transitional Balance Computations by using the Transition Calculation Templates</p> <p>Click Calendar in this field and select the transition date from the calendar.</p>
Flag for computing all input variables or input variables that are associated with the template*	<p>Select either <i>Yes</i> or <i>No</i>. This flag indicates whether the Discounting Engine must compute all Input Variables or only the Input Variables that are referred to in the templates used in the Liability Calculation runs.</p>
This flag indicates Consolidation Criteria. List of Values are E -> Computation based on Solo data, N -> Consolidated data as Input*	<p>Depending on the value selected in this field, the default Run Type is displayed in the Aggregation Level window :</p> <ul style="list-style-type: none"> <p>Consolidated data as Input: If this option is selected, then the new flow of solo or consolidated is executed, where the solo or consolidated level cohorts are given as input. Additionally, if the Computation based on the Solo Data value is selected, then the default Run Type is Solo.</p> <p>Solo or Consolidated cohorts are identified based on the value of n_cohort_cons_type in Stg_Ins_Group_Dimension_Map. The value <i>0</i> indicates a <i>Solo</i> cohort and the value <i>1</i> indicates <i>Consolidated</i> cohorts. If the Run Type is <i>Solo</i>, then only Solo cohorts are selected for computation. If the Run Type is <i>Consolidated</i> then only Consolidated cohorts are selected for computation.</p> <p>Computation based on Solo data: If this option is selected, then the existing flow is executed where the child-level entity-linked cohorts are fetched for the group entity run. The inter-company taxations for reinsurance held are netted off. Additionally, if the Consolidated Data as Input value is selected, then the default Run Type is Consolidated.</p> <p>The value of n_cohort_cons_type in Stg_Ins_Group_Dimension_Map is not considered when this option is selected.</p> <p>Note: In the Aggregation Level screen, when creating a new Level of Aggregation Definition, the default RunType is <i>Solo</i> and this field is disabled. In case the RunType was selected as <i>Consolidated</i> for an LOA, then this field is disabled when you try to modify an LOA.</p>

General Ledger Hierarchy pane

Table 4-1 (Cont.) The Application Configuration Form

Property Name	Description
General Ledger Hierarchy applicable for Subledger*	This is the Ledger Account Hierarchy that is used by the Subledger Definition Select a folder and a property value from the Folder and PropertyValue Columns, respectively.

4.2 Level of Aggregation

IFRS17 mandates insurance companies to recognize the group of insurance contracts that are managed together. All insurance products that share similar risks can be set together by using the Level of Aggregation function of the Oracle Financial Services Insurance Accounting Analyzer application. This helps you to set portfolios and indicate the basis on which the underlying insurance contracts have to be grouped for measurement and reporting the estimates based on IFRS 17 requirements.

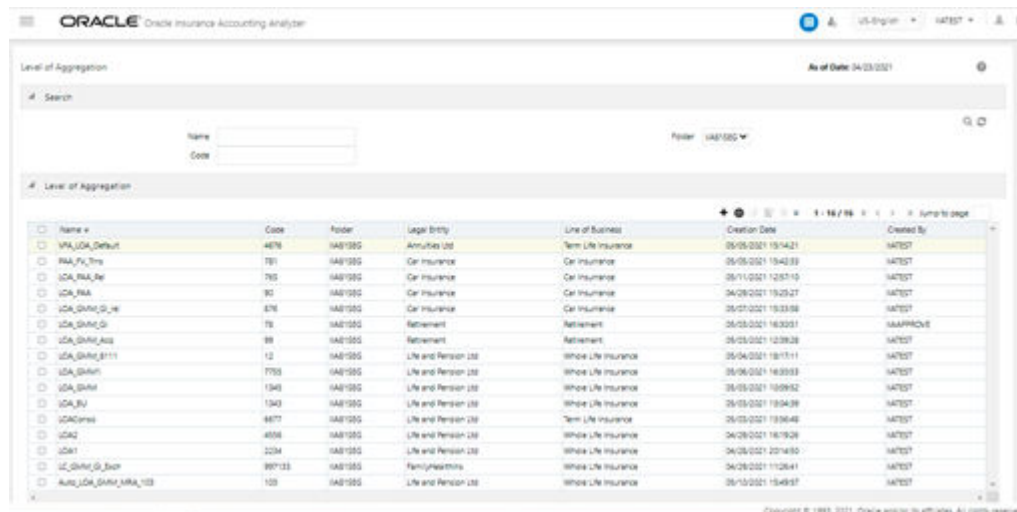
Insurance companies possess a large portfolio of contracts that have to be managed and assessed for net liabilities. The Level of Aggregation function enables insurance companies to identify and group similar insurance contracts. The aggregation of the contractual service margin and net liability is derived from the individual contracts within the level of aggregation.

The extent to which contracts are aggregated may have a significant impact on the statement of comprehensive income of an insurance entity and its systems, processes, and data. The insurance contracts can be grouped within a legal entity and line of business, based on other parameters such as geography, year of inception, and remaining term.

4.2.1 Access Level of Aggregation

You can access the Level of Aggregation window by clicking the Level of Aggregation element from the left pane in the application. When you click this element, the Level of Aggregation window is displayed:

Figure 4-3 The Level of Aggregation Window



This window displays the existing level of aggregation definitions in the **Aggregation Summary** table. It also enables you to define a new level of aggregation, edit the existing definitions, and view the details of the existing definitions.

4.2.2 Search for Level of Aggregation Definitions

The Search feature enables you to filter the list of existing definitions and find the definitions that you require. To search for definitions, enter the keyword in the Name field, or Code field, or select a folder from the drop-down list adjacent to the Folder field before clicking Search.

The list of level of aggregation definitions in the **Aggregation Summary** table is refreshed and the definitions that match your search criteria are displayed.

4.2.3 Create a New Level of Aggregation Definition

Perform the following steps to create a new level of aggregation definition:

1. In the **Level of Aggregation** table, click **Add** to open the **Aggregation Level** Window.
2. Populate the **Aggregation Level** pane.

Table 4-2 The Aggregation Level form

Field	Description
Fields marked with asterisks (*) in the window are mandatory.	
Aggregation Level pane	
Name*	Enter a name for the Level of Aggregation Definition.
Description	Enter a short description of the Level of Aggregation Definition.
Folder*	Select a folder from the drop-down list.

Table 4-2 (Cont.) The Aggregation Level form

Field	Description
Legal Entity*	Click HierarchySelection adjacent to this field. Select the required Legal Entity from the Hierarchy Selection Window. For more information, see Hierarchy Selection .
Line of Business*	Click HierarchySelection adjacent to this field. Select the required Line of Business from the Hierarchy Selection Window. For more information, see Hierarchy Selection .
Code*	Enter the code for Calculation Preferences.
Portfolio Dimensions pane	
All the fields in this pane require you to enable or disable the fields using the enable or disable options.	
Geography	Click the icon to enable this field. Click HierarchySelection adjacent to the text field. Select the required Geography from the HierarchySelection Window. For more information, see Hierarchy Selection
Product*	Click HierarchySelection adjacent to this field. Select the required LegalEntity from the HierarchySelection Window. For more information, see Hierarchy Selection .
Currency*	Select the required currency from the drop-down list.
Coverage Type	Select the required coverage types from the drop-down list. The values in this field are seeded and come from the Staging Tables. The data is then moved to the Dimension Tables. Once these actions are completed, the values are populated in this field.
Policy Term	Select the policy term from the drop-down list. The values in this field are seeded and come from the Staging Tables. The data is then moved to the Dimension Tables. Once these actions are completed, the values are populated in this field.
Cohort Period*	Select the Cohort Period from the drop-down list. The available options are: <ul style="list-style-type: none"> • Annually • Half Yearly • Quarterly • Monthly You can select the Cohort Duration based on the financial year. If the Cohort Duration is selected as Annual, then all the contracts which are issued within one year are grouped. For example, if the financial year starts in April, then all the contracts commencing from April to March are grouped as a single cohort.

Table 4-2 (Cont.) The Aggregation Level form

Field	Description
Run Type	<p>Depending on the value selected in the Application Configuration section for the</p> <p>This flag indicates Consolidation Criteria. List of Values are E -> Computation based on Solo data, N -> Consolidated data as an Input field, and the default Run Type is displayed:</p> <ul style="list-style-type: none"> • If the <i>Computation based on Solo data</i> value was selected, then the default Run Type is <i>Solo</i> and this field is disabled. • In case the Run Type was selected as <i>Consolidated</i> for an LOA, then this field is disabled when you try to modify an LOA. If the <i>Consolidated data as Input</i> value was selected in the Application Configuration screen, then the default Run Type is <i>Consolidated</i>.
Reinsurance Held	Click the icon to enable reinsurance for the Aggregation Level.
Fund Type	<p>Select the required fund type from the drop-down list.</p> <p>The values in this field are seeded and come from the Staging Tables. The data is then moved to the Dimension Tables. Once these actions are completed, the values are populated in this field.</p>
Premium Frequency	<p>Select the required premium frequency from the drop-down list.</p> <p>The values in this field are seeded and come from the Staging Tables. The data is then moved to the Dimension Tables. Once these actions are completed, the values are populated in this field.</p>
Distribution Channel	<p>Select the required distribution channel by clicking the Hierarchy Icon adjacent to this field.</p> <p>The values in this field are seeded and come from the Staging Tables. The data is then moved to the Dimension Tables. Once these actions are completed, the values are populated in this field.</p>
Business Unit	<p>Click the icon to enable the Business Unit Dimension.</p> <p>Click HierarchySelection adjacent to this field. Select the required Business Unit from the HierarchySelection Window.</p> <p>For more information, see Hierarchy Selection.</p>

Table 4-2 (Cont.) The Aggregation Level form

Field	Description
Industry Sector	Select the required industry sector from the drop-down list. The values in this field are seeded and come from the Staging Tables. The data is then moved to the Dimension Tables. Once these actions are completed, the values are populated in this field.

- Click **Save**.
The saved definition is displayed in the **Aggregation Summary** table in the **Level of Aggregation** Window.

The **Audit Trail** pane at the bottom of the **Definition** window displays the **Created By**, **Creation Date**, **Last Modified By**, and **Last Modification Date** details. The **User Comments** field enables you to add additional information as a comment.

4.2.4 Edit Level of Aggregation Definition

Perform the following steps to edit a level of aggregation definition:

- From the **Aggregation Summary** table, select the checkbox adjacent to the level of aggregation definition that you want to edit.
- Click **Edit**, to open the **Aggregation Level** Window.
- Update the required fields. For more information, see [Create a New Level of Aggregation Definition](#).

Note:

You cannot modify definitions that are in *Approved* or *In Use* status.

- Click **Save**.
The saved definition is displayed in the **Aggregation Summary** table of the **Level of Aggregation** Window.

4.2.5 View Level of Aggregation Definition

Perform the following steps to view a new level of aggregation definition:

- From the **Aggregation Summary** Window, select the checkbox adjacent to the level of aggregation definition that you want to view.
- Click **View**, to open the **Aggregation Level** Window.

Note:

You cannot edit the fields in View mode

- Click **Cancel** to go back to the **Aggregation Summary** Window.

4.3 Calculation Preferences

One of the core requirements of IFRS17 is to calculate the insurance liabilities in such a way that each component of the liability is segregated explicitly so that those are visible to you. For example, in the General Measurement Model, the entity is asked to distinctly provide the best estimate of liability cash flows, the effect of discounting, the risk adjustment performed, and the best estimates. Further to this requirement, the entity is also required to study the movement analysis of each of these breakups between each reporting date.

As a mandate from IFRS 17, Insurance companies are required to provide the disclosures for every reporting period. IFRS 17 requires specific disclosure about the nature of risks from insurance contracts, any assumptions or judgments made, and the actual amounts recognized in the financial statements. However, IFRS 17 has specified the approach from a broader perspective which can be implemented in different ways by each organization.

The Calculation Preferences window enables insurance companies to define the required formulas to arrive at the contractual service margin, net liability, and loss components in their way, based on various parameters and variables. This provides the ability to implement the disclosure requirements according to the processes and assumptions. The application provides a default set of formulas as well.

4.3.1 Access Calculation Preferences

You can access the Calculation Preferences window by clicking the Calculation Preferences element from the left-hand side menu. When you click this element, the Calculation Preferences window is displayed:

Figure 4-4 The Calculation Preferences Window

Name	Folder	Method	Creation Date	Created By	Default	Reinsurance Held	Workflow status
VFA_MRA_DEFAULT_FX	IAB1SEG	Variable Fee Approach	08/05/2021 00:00:00	SYSADMN	No	No	Approved
VFA_MRA_DEFAULT	IAB1SEG	Variable Fee Approach	08/12/2021 00:00:00	SYSADMN	Yes	No	Approved
VFA_MRA_DEFAULT	IAB1SEG	Variable Fee Approach	08/04/2021 00:00:00	SYSADMN	No	No	Approved
VFA_FVA_DEFAULT_FX	IAB1SEG	Variable Fee Approach	08/05/2021 00:00:00	SYSADMN	No	No	Approved
VFA_FVA_DEFAULT	IAB1SEG	Variable Fee Approach	08/12/2021 00:00:00	SYSADMN	Yes	No	Approved
VFA_FVA_DEFAULT	IAB1SEG	Variable Fee Approach	08/04/2021 00:00:00	SYSADMN	No	No	Approved
VFA_FRA_DEFAULT_FX	IAB1SEG	Variable Fee Approach	08/05/2021 00:00:00	SYSADMN	No	No	Approved

This window displays the existing calculation preferences definitions in the **Calculation Preferences** table. This window also enables you to define new calculation preferences, edit the existing definitions, and view the details of the existing definitions.

4.3.2 Search for a Calculation Preferences Definitions

The search feature enables you to filter the list of existing definitions and find the definitions that you require. To search for definitions, enter the keyword in the **Name** field or select a value from the Folder, **Method**, and **ReinsuranceHeld** drop-down lists before clicking Search.

The list of calculation preference definitions in the Calculation Preferences table is refreshed and the definitions that match your search criteria are displayed.

4.3.3 Create a New Calculation Preferences Definition

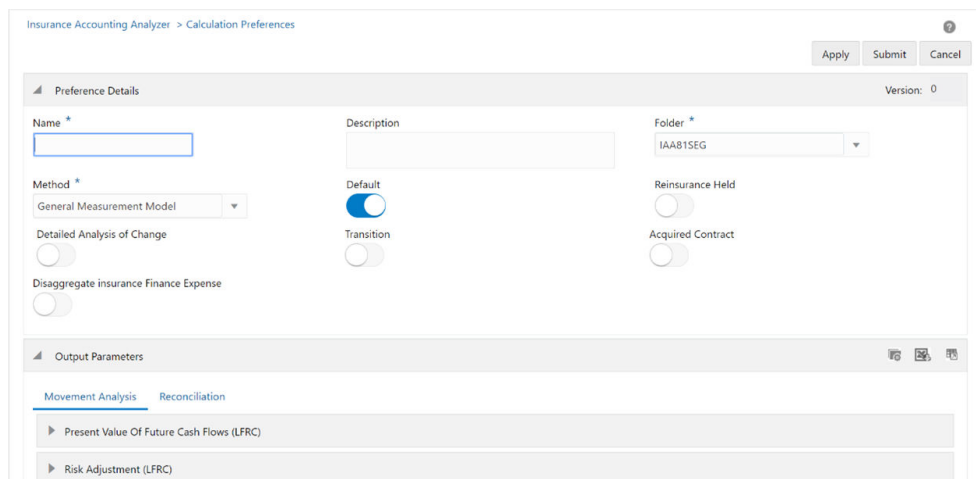
Perform the following steps to create a new Calculation Preference Definition:

Note:

You must complete mapping the financial element and transaction type to the Cash Flow type as part of the process for calculating the Input Variables. For more information, see [Dimension Management](#) and [Batch Execution](#).

1. In the **Calculation Preference** Window, click **Add** to open the **Calculation Preferences** Window.

Figure 4-5 The Calculation Preferences Window



If the Insurance Accounting Analyzer Extension Pack License is activated, then the Extension Pack slider is available. For more information, see the Oracle Insurance Accounting Analyzer Extension Pack documentation on [OHC](#).

Figure 4-6 The Extension Pack slider Window

2. Populate the **Preferences Details** pane as described in the following table.

Field	Description
Name	Enter a name for the Calculation Preference Definition.
Description	Enter a short description of the Calculation Preference Definition.
Folder	Select a folder from the drop-down list.
Method	Select a method from the drop-down list. The application supports the following methods: <ul style="list-style-type: none"> • General Measurement Model • Long Duration Contracts • Premium Allocation Approach • Variable Fee Approach
Default	Click the slider to mark the definitions as default. This slider is enabled by default. Note: For Insurance Contracts, ensure that there is one default definition present per folder and method. In the case of Reinsurance, this criterion is updated per folder, Reinsurance Type, and Method.
Reinsurance Held	Click the slider to enable the Reinsurance Held Feature. On enabling this option, the Reinsurance Type Field appears.
Detailed Analysis of Change	Click the slider to enable the Detailed Analysis of Change Feature.
Transition	Click the slider to enable the Transition Method drop-down list.

Field	Description
Extension Pack	<p>Click the Extension Pack slider to use the new Output Variables that were created on the Calculation Preference Configuration page. When this feature is enabled, the Detailed Analysis of Change, Transition, Acquired Contract, and Disaggregate Insurance Finance Expense sliders are disabled.</p> <p>Note: This feature is only available if the Insurance Accounting Analyzer Extension Pack License is activated.</p>
Acquired Contract	<p>Click the slider to enable acquired contracts for the Calculation Preference Definition.</p> <p>Note: This field is not available if the Calculation Method is <i>Long Duration Contracts</i> or if the Transition Method is not <i>Full Retrospective</i>.</p>
Reinsurance Type	<p>Select the type of Reinsurance Contract from the drop-down list. Available Options are:</p> <ul style="list-style-type: none"> • Prospective • Retrospective <p>Note: This field is displayed only if you have enabled the Reinsurance Held Option.</p>
Transition Method	<p>Select the Transition Method from the drop-down list. Available options for the GMM, PAA, and VFA methods for Direct Insurance are:</p> <ul style="list-style-type: none"> • Fair Value Approach • Full Retrospective • Modified Retrospective <p>Available options for the GMM, and PAA methods for Reinsurance are:</p> <ul style="list-style-type: none"> • Fair Value Approach • Full Retrospective <p>Available methods for the LDTI method are:</p> <ul style="list-style-type: none"> • Full Retrospective * • Modified Retrospective** <p>* On selecting the Full Retrospective Method, you can execute the retrospectively roll forward rates based on the user-provided dates.</p> <p>** On selecting the <i>Modified Retrospective Method</i>, you can configure the opening balance formula and this formula is used to compute the balance.</p> <p>Note: This field is displayed only if you have enabled the Transition Option.</p>

Field	Description
Disaggregate insurance Finance Expenses	<p>Click the slider if you want to disaggregate insurance finance expenses.</p> <p>When you enable this option, the DisaggregateType Field is enabled.</p> <p>Note: This field is available only if you have selected the General Measurement Model Method from the Method drop-down list.</p> <p>After copying a default template where the Disaggregate insurance finance or expense Field is disabled, ensure that the Disaggregate insurance finance or expense Field is not enabled because the validation of the template will fail. This is because the output variables specific to Disaggregate insurance finance or expense features will be present in the expressions. Therefore, the correct approach, in this case, would be to copy a default template where Disaggregate insurance finance or expense is enabled by default.</p>
Disaggregate insurance Finance Expense For Liability For Incurred claims	<p>Click the slider if you want to Disaggregate Insurance Finance Expenses.</p> <p>When you enable this option, the DisaggregateType Field is enabled.</p> <p>Note: This field is available only if you have selected the Premium Allocation Approach method from the Method drop-down list.</p>
Disaggregate Type	<p>Select the Disaggregate Type from the drop-down list. The available options are:</p> <ul style="list-style-type: none"> • Based on Inception Discount Rate • Constant Rate • Projected Crediting Rate • Proportional <p>Note: This field is available under the following conditions:</p> <ul style="list-style-type: none"> • The General Measurement Model Method is selected and the Disaggregate insurance Finance Expense Field is enabled. • The Premium Allocation Approach Method is selected and the Disaggregate Insurance Finance Expense For Liability For Incurred claims is enabled.
Include Risk Adjustment	<p>Click the slider to include the risk adjustment.</p> <p>Note: This field is available only if you selected the General Measurement Model in the Method field and have enabled the Disaggregate insurance Finance Expense Field.</p>
Limited Payment Contract	<p>Click the slider if you want to enable a limited payment contract.</p> <p>Note: This field is available only if you have selected Long-Duration Contracts from the Method drop-down list.</p>

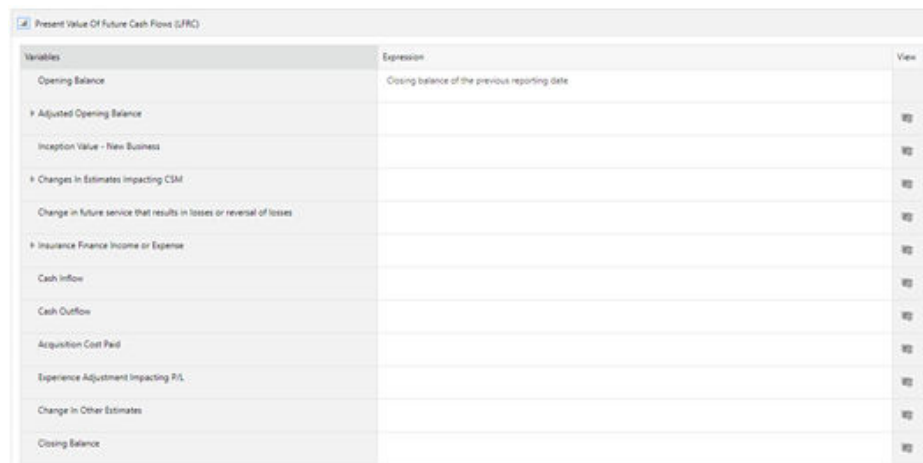
3. The **Output Parameters** pane displays the output parameters for the method that you have selected in the **Preference Details** pane. In this example, we are using the non-Transition **General Measurement Model** Method with the **Present Value of Future Cash Flows (LFRC)** pane in the **Movement Analysis** tab example:












 **Note:**

You can choose an output parameter in any sequence that you require and can also view the same.

- a. The **Present Value of Future Cash Flows (LFRC)** pane contains the following variables:

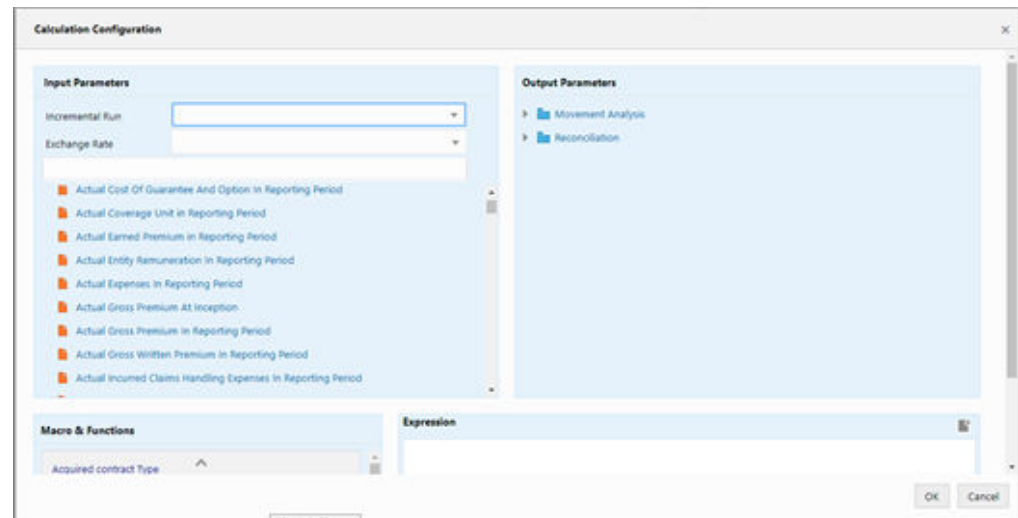
Figure 4-7 The Present Value of Future Cash Flows (LFRC) Pane



Variables	Expression	View
Opening Balance	Closing balance of the previous reporting date	
Adjusted Opening Balance		
Inception Value - New Business		
Changes in Estimates Impacting CSM		
Change in future service that results in losses or reversal of losses		
Insurance Finance Income or Expense		
Cash Inflow		
Cash Outflow		
Acquisition Cost Paid		
Experience Adjustment Impacting P/L		
Change in Other Estimates		
Closing Balance		

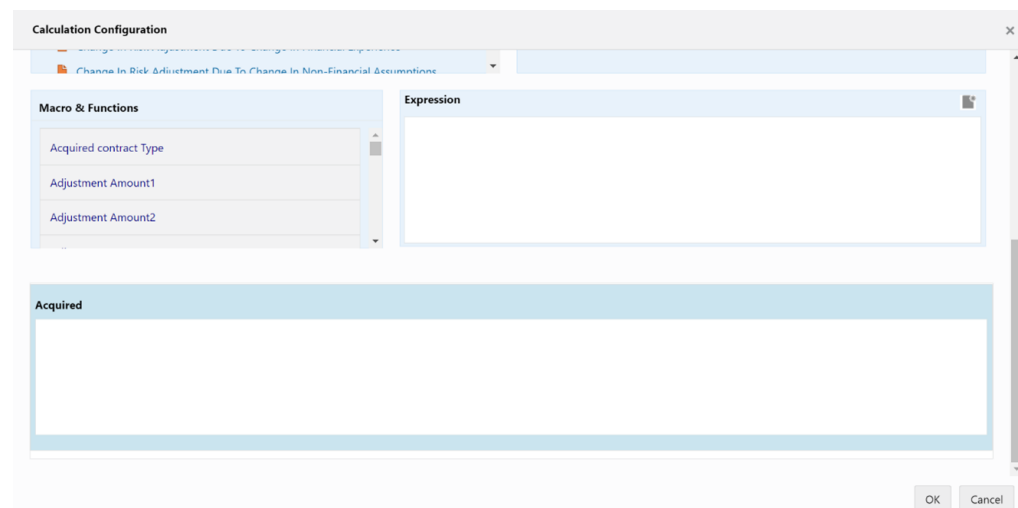
- b. The **OpeningBalance** Field is uneditable for non-Transition Templates.
- c. For Fair Value and Modified Retrospective Transition Templates, the **TransitionalBalance** Field is editable and formula-driven. Similarly, the **OpeningBalance** Field is editable and formula-driven for non-Transition Acquired Templates. The **TransitionalBalance** Field is code-driven to take the Closing Balance of the Previous Reporting Period for Full-Retrospective Approach Templates. For Full Retrospective Acquired Transition Templates, the **TransitionalBalance** Field is editable and formula-driven only for the first retrospective execution and is code-driven to take the Closing Balance of the Previous Reporting Period from the second retrospective execution onwards.
- d. Click Expression Builder adjacent to the **OutputParameters** pane to open the Calculation Configuration window.
- e. Except for other macros that are variables, Interest Accretion Macros are functions and only accept one pair of opening and closing parenthesis. For example, $(-10 * B - C + D + E)$ or precisely $[Interest\ Accretion\ Using\ Locked\ In\ Rate]([A]+10*[B\{Credit\ Risk\}])$ is accepted, while $((-10 * B) - C + D + E)$ is not. If a formula has been modified in an application outside of the IAA Application, first paste the modified formula in Notepad++ and then change the encoding to ANSI and check the formula for any special characters before copying and pasting it back into the IAA Application.

Figure 4-8 The Expression Window



- f. The **Acquired** field in the **CalculationConfiguration** window is available for Extension Pack. For each approach, you can give an Expression in a single Template. Click the **Acquired** field and then select the required Input Parameters from the list to populate the Acquired field pane.

Figure 4-9 The Acquired field in the Calculation Configuration window



- g. In the **Incremental Run** drop-down list, select an Incremental Run. You can link an Input Variable to multiple assumptions for a single expression. The available options are:
- Closing Position
 - Credit Risk
 - Current Accident Year Current Accident Period
 - Current Accident Year Prior Accident Period
 - Economic Assumptions

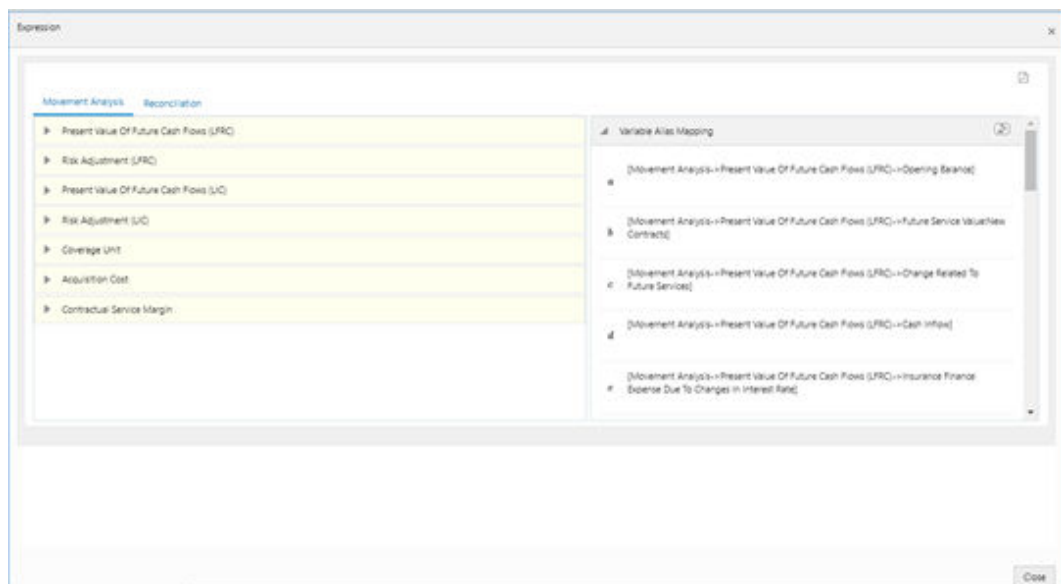
- Economic Experience
 - Experience Adjustment-Lapse
 - Experience Adjustment-Morbidity
 - Experience Adjustment-Mortality
 - Experience Adjustment-Others
 - Future Inflation Assumption
 - Lapse Assumption
 - Market Volatility
 - Morbidity Assumption
 - Mortality Assumption
 - New Business
 - Non Economic Experience
 - Non Economic Assumptions
 - Opening Adjustment
 - Opening Position
 - Other Future Assumptions
- h.** In the **Exchange Rate** drop-down list, select an Exchange Rate. The available options are:
- Average Exchange Rate
 - Closing Exchange Rate
 - Opening Exchange Rate
 - Transaction Date Exchange Rate
- i.** In the Input Parameters pane, select the required Input Parameters from the list to populate the Expression pane.
- j.** In the Output Parameters pane, select the required output parameters from the list to populate the Expression pane.
- k.** In the Macro & Functions pane, select the required Macros and Functions. Click the **Previous** icon to toggle between the list of Macros and Functions. For more information about Macros, see the **Oracle Financial Services Insurance Accounting Analyzer Macros** Document on [MOS](#).
- l.** After you have built your Expression, click **OK**. The expression appears in the text field of the OutputParameter.
- m.** Additionally, click the **Download** icon to download the expressions in an Excel file.
- n.** Click **Import** if you want to import formulae from an Excel file. When the import window appears, add the modified template and click Import. You can view the imported formula in the **Output Parameters** pane.

 **Note:**

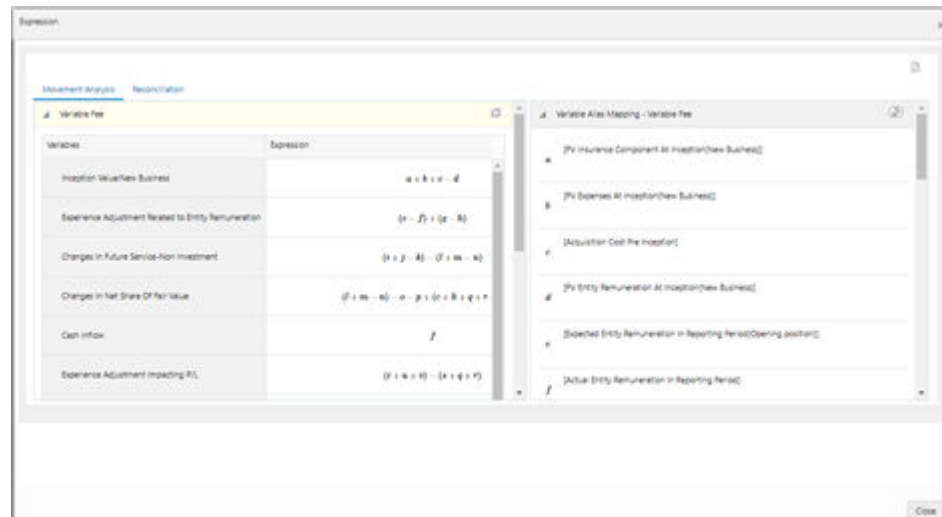
A new Excel file must be used with the worksheets for the sections used in the application, for example, *Movement Analysis* and *Reconciliation*. Under each worksheet, the names of the subsections, for example, *Present Value of Future Cash Flows (LFRC)*. Each line item, for example, *OpeningBalance*, under each subsection, should exactly match the values on the application.

4. In the **Output Parameters** pane, click **View** to open the **Expression Window**.

Figure 4-10 The Expression Window



5. In the Expression window, you can perform the following actions:
 - a. Select the required output parameter to view the expressions in the **Movement Analysis** and **Reconciliation** tabs in the form of a mathematical formula.

Figure 4-11 The Expression Window with the Variable Expanded for Viewing the Formula

- b. Select an Expression, and then click **Show Formula for this section** to view the formula for the Expression.
 - c. The **Variable Alias Mapping** pane displays the full value for each character and symbol. You can click **Clear Filter** to clear the filter.
 - d. In the upper-right corner of this window, you can click **Download** to download all the expressions in this window in a PDF format to your local system.
6. After configuring the Output Parameters, click **Apply** and then click **Submit**.
 7. The saved definition is displayed in the **Calculation Preferences** table on the Calculation Preferences window.

The **Audit Trail** pane at the bottom of the **Definition** window displays the **Created By**, **Creation Date**, **last modified by**, and **Last modification date** details. The **User Comments** field enables you to add additional information as a comment.

4.3.4 Edit a Calculation Preferences Definition

Perform the following steps to edit a calculation preference definition:

Note:

You cannot modify the definitions that are in an Approved or Use status or customized templates. For customized templates, perform the steps mentioned in the [Create a New Version of a Calculation Preference Definition](#).

1. In the **Calculation Preference** table, select the checkbox adjacent to the calculation preference definition that you want to edit.
2. Click **Edit**, to open the **Calculation Preferences** window.
3. Update the required fields. For more information, see [Create a New Version of a Calculation Preference Definition](#).

4. Click **Save**.

The saved definition is displayed in the **Calculation Preferences Summary** table of the **Calculation Preferences** window.

The **Audit Trail** pane at the bottom of the **Definition** window displays the **Created By**, **Creation Date**, **last modified by**, and **Last modification date** details. The **User Comments** field enables you to add additional information as a comment.

4.3.5 View a Calculation Preferences Definition

Perform the following steps to create a new calculation preference definition:

1. From the **Calculation Preferences Summary** window, select the checkbox adjacent to the calculation preference definition you want to view.
2. Click **View**, to open the **Calculation Preference** window.

Note:

You cannot edit any of the fields in *View* mode.

3. Click **Cancel** to go back to the **Calculation Preferences Summary** window.

4.3.6 View the History of a Calculation Preference Definition

Perform the following steps to view the history of a new calculation preference definition:

1. From the **Calculation Preferences** window, select the checkbox adjacent to the calculation preference definition you want to view the version history of the template.
2. Click **VersionHistory**, to open the **VersionHistory** window.

Figure 4-12 The Version History Window



3. Select the Version and click **Make Active** to activate a calculation preference for a given date. The **Make Active** button is only enabled if the template contains the same *EffectiveDate* for different versions.

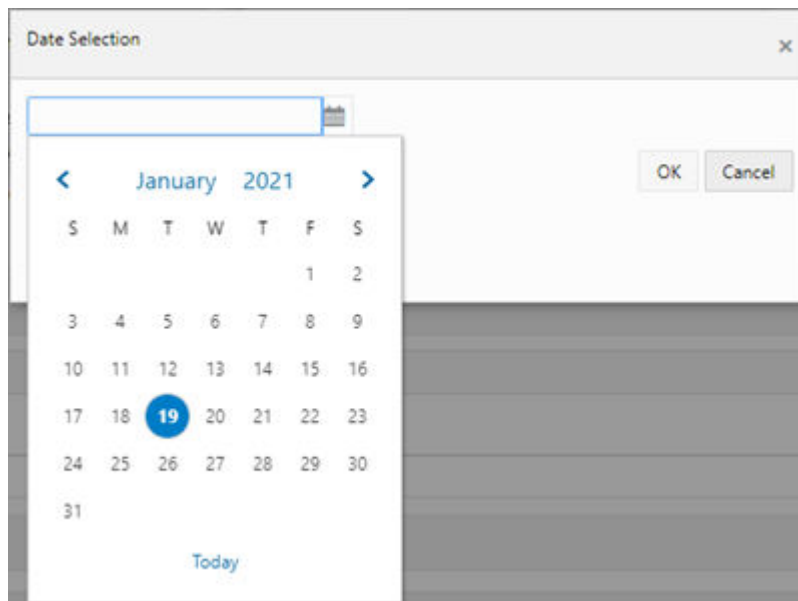
 **Note:**

You can only activate one calculation preference definition for a given date. For example, you have created three calculation preference definitions for the dates *01-Jan-2021*, *Calculation01*, *Calculation02*, and *Calculation03*. If you activate *Calculation01*, then the other versions will be inactive. the other versions will be inactive.

If the definition contains different effective dates then the latest date will be active.

4. Click **Details Version** to view the details of the calculation preference definition.
5. Click **Execute** to open the **DateSelection** window.

Figure 4-13 The Date Selection Window



6. In the calendar, select the required date, and then click **OK**. The definition goes to a *Draft* state. The editable fields can be modified
7. After modifying the required fields, click **OK** to send the definition for approval.
8. After the definition is approved, it can be used for the CSM runs.
9. Click **Cancel** to return to the **CalculationPreferenceSummary** window.

Only approved definitions are used in a liability calculation definition.

4.3.7 Create a New Version of a Calculation Preference Definition

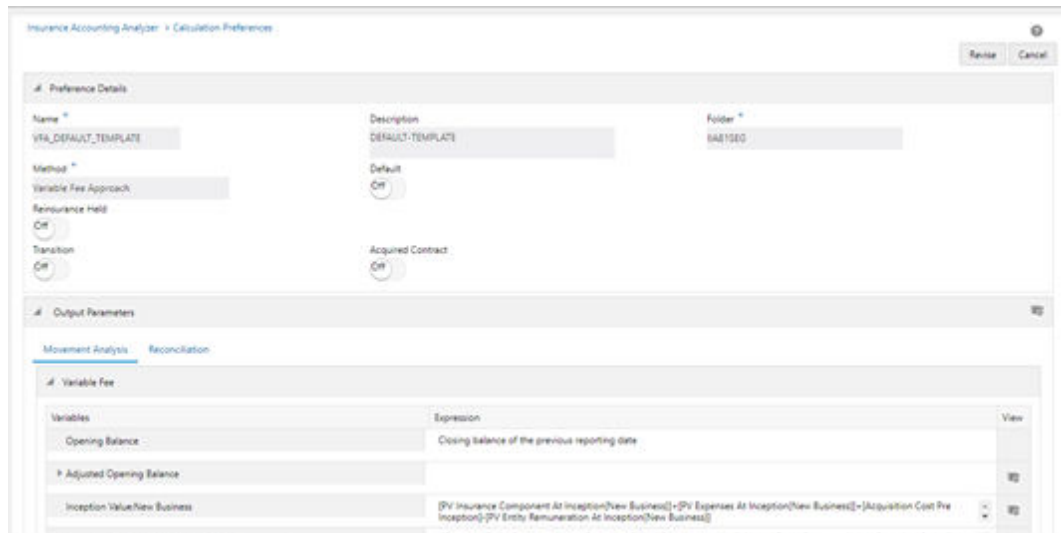
Perform the following steps to create a new version of a calculation preference definition that contains out-of-box templates:

 **Note:**

These steps are only applicable to default-customized templates.

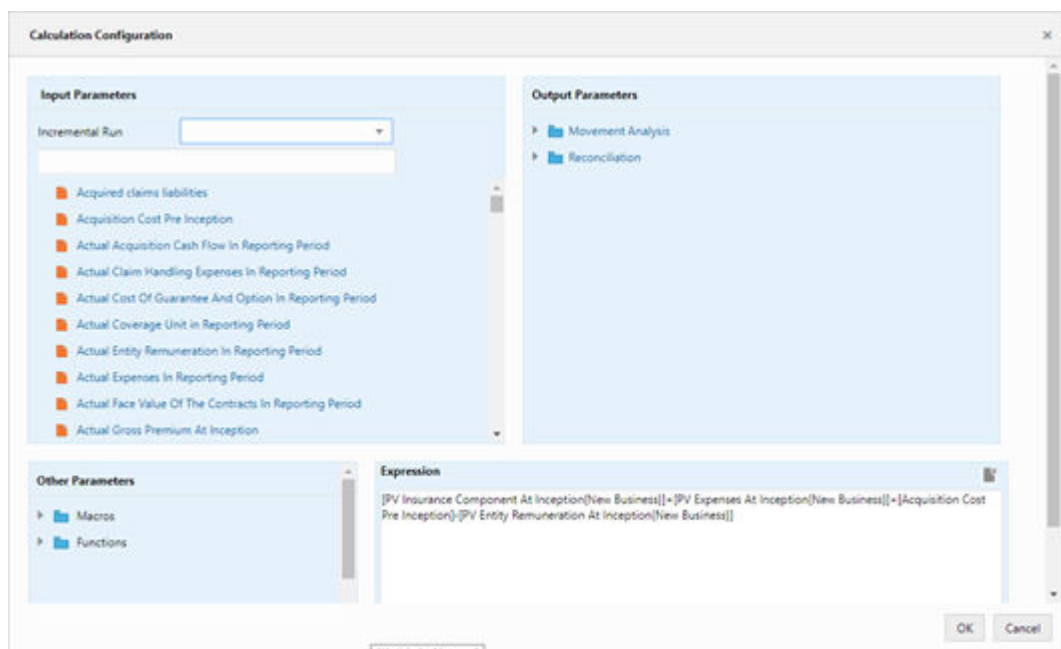
1. From the **Calculation Preferences Summary** window, select the checkbox adjacent to the calculation preference definition you want to revise.
2. Click **Create New Version**, to open the **CalculationPreference** window.

Figure 4-14 The Calculation Preference Definition Window



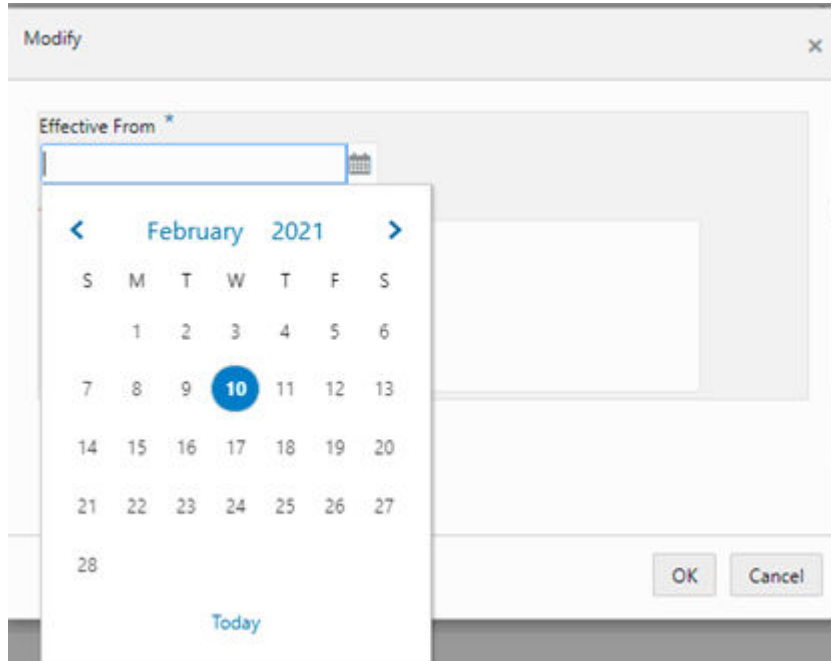
3. Click **Expression Builder** adjacent to the Output Parameter to open the Calculation Configuration window.

Figure 4-15 The Calculation Configuration Window



4. Modify the formula as required and then click **OK**.
5. Click **Modify** to open the **Modify** window.

Figure 4-16 The Modify Window



6. In the calendar, select the required date. The execution date must be less than or equal to the **FIC_MIS** date. The definition goes to a *Draft* state. The editable fields can be modified
7. After modifying the required fields, click **OK** to send the definition for approval.
8. After the definition is approved, run the CSM runs. The definition ID in the **AuditTrail** section is updated with the new version ID.
9. Click **Submit** to send the definition for approval.

4.3.8 Copy a Calculation Preferences Definition

Perform the following steps to copy a calculation preference definition:

1. In the **Calculation Preference Summary** table, select the checkbox adjacent to the calculation preference definition that you want to copy.
2. Click **Copy**, to open the **Save As** window.
3. Enter values in the **Name**, **Description**, and **Folder** fields.
4. Click **Save**.

The saved definition is displayed in the **Calculation Preferences Summary** table on the **Calculation Preferences** window.

You can further edit the definition and submit it for approval.

The Audit Trail pane at the bottom of the Definition window displays the Created By, Creation Date, last modified by, and Last modification date details. The **User Comments** field enables you to add additional information as a comment.

4.3.9 Retire Calculation Preferences Definition

Perform the following steps to disable unwanted calculation preference definitions:

1. In the **Calculation Preference Summary** table, select the checkbox adjacent to the Calculation Preference definition you want to retire.
2. Click **Retire**, to open the **Calculation Preference Summary** Details window.
3. Update the required Output Parameters.
4. Click **Retire**.
The retired definition is displayed in the **Calculation Preferences Summary** table of the **Calculation Preferences** window.

The Workflow status of the retired definition changes to *Retired*.

The **Audit Trail** pane at the bottom of the **Definition** window displays the **Created By**, **Creation Date**, **last modified by**, and **Last modification date** details. The **User Comments** field enables you to add additional information as a comment.

4.4 Liability Calculations

The liability arising from insurance contracts under IFRS 17 has to be considered in the books of accounts. The net liability is calculated by using the present value of the cash flows of the contract, risk adjustment, and assumption. The computation logic configured in the calculation templates linked to the liability run will be used for computing the IFRS17 estimates including the roll forward. (add the write-up here) The liability calculations allow you to set up the level of aggregations, the assumptions, and the method that will be considered for the calculation of the net liability for each of the contracts under the level of aggregation. This can be performed once the level of aggregation and assumptions are created. The same run can be executed for each reporting period, which calculates the CSM, net liabilities, and so on, for the respective reporting period.

After setting up the level of aggregation, the assumption set per level of aggregation, and calculation preference, you can execute the calculation for all the selected levels of aggregations selected per calculation method. The liability calculation is triggered and the output is generated and then used to generate the IFRS17 reports.

You can provide multiple scenarios for performing the IFRS17 executions. Each scenario can be marked as either a base scenario or what-if analysis or scenario for onerous classification.

The base scenario will be used for calculating the actual results on the execution date. The onerous classification scenarios are used for calculating the onerous classification at inception. The what-if analysis will be used in calculating the IFRS17 liability trends for the current period and future periods that will, in turn, be used for comparison and other management purposes. The calculation results from the base scenario will be used for accounting.

4.4.1 Map a User to a User Group to Approve the Liability Calculation

Before you approve a liability calculation definition, perform the following user role mappings and approvals:

1. Log in as a System Administrator.

2. Navigate to **Identity Management**, then **Security Management**, then **User Administrator**, and then **User Maintenance**.
3. Create two new user definitions, one for the login user, *User 1*, and one for approving the liability calculation, *User 2*. For more information, see the **User Maintenance** section in the [OFS Analytical Applications Infrastructure User Guide](#).
4. Log in as a System Authorizer.
5. Navigate to **Identity Management**, then **Security Management**, then **User Administrator**, and then **User Authorization**.
6. Authorize the user, *User 1*, that you created in **Step 3**. For more information about authorizing a user, see the **User Authorization** section in the [OFS Analytical Applications Infrastructure User Guide](#).
7. Log in as a System Administrator.
8. Navigate to **Identity Management**, then **Security Management**, then **User Administrator**, and then **User User Group Map**.
9. Map the user, *User 2*, that was created to approve the liability calculation to the **IIA Application Approver Group**. For more information about mapping a user to a user group, see the **User User Group Map** section in the [OFS Analytical Applications Infrastructure User Guide](#).
10. Log in as a System Authorizer.
11. Authorize the mappings that you performed in **Step 9**. For more information about authorizing a user, *User 2*, see the **User Authorization** section in the [OFS Analytical Applications Infrastructure User Guide](#).

4.4.2 Access Liability Calculations

You can access the **Liability Calculations** window by clicking the **Liability Calculations** element from the left-hand side menu. When you click this element, the **Liability Calculations** window is displayed:

Figure 4-17 The Liability Calculation Window

Name	Folder	Method	Legal Entity	Line of Business	Creation Date	Created By	Workflow status	Reinsurance Held	Status
Test_inbox	IAB15EG	General Measurement Model	Car Insurance	Car Insurance	05/04/2021 10:33:05	IATEST	Approved	No	
test_gmm_ver	IAB15EG	General Measurement Model	Life and Pension Ltd	Whole Life Insurance	05/03/2021 18:09:46	IATEST	Approved	No	Success
LDTI_Retro	IAB15EG	Long Duration Contracts	Life and Pension Ltd	Whole Life Insurance	04/28/2021 25:19:19	IATEST	Approved	No	Success
LC_VFA_Default	IAB15EG	Variable Fee Approach	Annuities Ltd	Term Life Insurance	05/05/2021 15:19:09	IATEST	Approved	No	Success
LC_PAA_Trnd_Fin	IAB15EG	Premium Allocation Approach	Car Insurance	Car Insurance	05/05/2021 15:44:30	IATEST	Approved	No	Success
LC_PAA_Tms_B111N	IAB15EG	Premium Allocation Approach	Car Insurance	Car Insurance	04/29/2021 16:36:57	IAPPROVE	Pending for Approval	No	
LC_PAA_TRANS_B111	IAB15EG	Premium Allocation Approach	Car Insurance	Car Insurance	04/26/2021 16:28:10	IATEST	Approved	No	Success
LC_PAA_Rei_Retro_B111	IAB15EG	Premium Allocation Approach	Car Insurance	Car Insurance	05/11/2021 13:37:44	IATEST	Approved	Yes	Failed
LC_PAA_Rei_B111	IAB15EG	Premium Allocation Approach	Car Insurance	Car Insurance	05/11/2021 13:05:23	IATEST	Approved	Yes	Success
LC_PAA_Own_Def	IAB15EG	Premium Allocation Approach	Car Insurance	Car Insurance	05/01/2021 17:15:17	IATEST	Approved	No	Success

This window displays the existing liability calculation definitions in the Liability Calculations Summary table. This window also enables you to define new liability calculations, edit the existing definitions, and view the details of the existing definitions.

4.4.3 Search for Liability Calculation Definitions

The search feature enables you to filter the list of existing definitions and find the definitions that you require. To search for definitions, enter the keyword in the **Name** field or select a value from the Folder, **Method**, and **ReinsuranceHeld** drop-down lists before clicking Search.

The list of liability calculation definitions in the Liability Calculations Summary table is refreshed and the definitions that match your search criteria are displayed.

4.4.4 Create a New Liability Calculation Definition

Perform the following steps to create a new Liability Calculation Definition:

1. In the **Liability Calculations** table, click **Add** to open the **Liability Calculation** Window.

Figure 4-18 The Liability Calculation Window

2. Populate the **LiabilityCalculation Definition** pane.

Table 4-3 The Liability Calculation Definition Pane

Field	Description
<i>Details</i> pane	
Name	Enter a name for the Liability Calculation Definition.
Description	Enter a short description of the Liability Calculation Definition.
Folder	Select a folder from the drop-down list.

Table 4-3 (Cont.) The Liability Calculation Definition Pane

Field	Description
Legal Entity	<p>Click Hierarchy Selection adjacent to this field. Select the required Legal Entity from the HierarchySelection Window.</p> <p>For more information, see Hierarchy Selection.</p>
Line of Business	<p>Click Hierarchy Selection adjacent to this field. Select the required Legal Entity from the Hierarchy Selection Window.</p> <p>The application supports the selection of multiple hierarchies in the Hierarchy Selection window for a single Liability Calculation. Select the desired number of LOBs in this window and then click OK. Multiple LOBs are added to this field.</p> <p>For more information, see Hierarchy Selection.</p>
Run Type	<p>Select a Run type from the drop-down list. The available options are:</p> <ul style="list-style-type: none"> • Solo • Consolidated
Reinsurance Held	<p>Click the icon to enable the Reinsurance Held Feature.</p> <p>When enabled, the Transition and Include Retrospective Reinsurance Fields appear.</p>
Transition	<p>Click the icon to enable the Transition Feature.</p> <p>On enabling this option, the Transition Method and Transition Calculation Preference drop-down lists are displayed in the Direct Insurance pane.</p>
Acquired Contract	<p>Click the icon to enable the Acquired Contract for the Liability Calculation Definition. If enabled, then an additional template for direct insurance for a selected method can be chosen; one for <i>Reinsurance Held</i> and one for <i>Full Retrospective</i>.</p>
Execution Type*	<p>Select either <i>Incremental</i> or <i>YTD</i>.</p> <p>For more information on the YTD feature, see the YTD Feature Document on MOS.</p>
Projection In Years	<p>Enter the number of years for which the data must be projected. When you add a value in this field, the ProjectionFrequency field appears.</p> <p>Note: This field only appears if the ReinsuranceHeld field is enabled.</p>
Extension Pack	<p>Click the Extension Pack slider to use the new Output Variables that were created on the Calculation Preference Configuration page.</p> <p>Note: This feature is only available if the Insurance Accounting Analyzer Extension Pack License is activated.</p>

Table 4-3 (Cont.) The Liability Calculation Definition Pane

Field	Description
Projection Frequency	<p>Select a Projection Frequency from the drop-down list. The available projection frequencies are:</p> <ul style="list-style-type: none"> • Annually • Half Yearly • Monthly • Quarterly <p>Note: This field is available only if you entered a value in the Projection in Years Field.</p>
<i>DirectInsurance</i> pane	
Calculation Method	<p>Select a method from the drop-down list. The available methods are:</p> <ul style="list-style-type: none"> • General Measurement Model • Long Duration Contracts • Premium Allocation Approach • Variable Fee Approach
Calculation Preference	<p>Select a value from the drop-down list.</p> <p>Note: PAA YTD Templates work only when input variable data is given as a download. Therefore, when PAA YTD Templates are selected, then do not select 'Compute Expected and Actual' and 'Compute Expected' under the 'Calculate Input Variable' within a 'Level of Aggregation' selection.</p>
Acquired Contract Calculation Preference	<p>Select a value from the drop-down list.</p> <p>Note: This field is displayed only if you have enabled the Acquired Contract Option.</p>
Transition Method	<p>Select the type of transition method from the drop-down list. The available options are:</p> <ul style="list-style-type: none"> • Fair Value Approach • Full Retrospective • Modified Retrospective <p>Note: This field is displayed only if you have enabled the Transition Option.</p>
Transition Calculation Preference	<p>Depending on the method that you selected in the Insurance Contract Calculation Method field, the Transition Calculation Method field is populated with the required values.</p> <p>Select the type of Transition Calculation Preference from the drop-down list.</p> <p>Note: This field is displayed only if you have enabled the Transition Option.</p>
Include Retrospective Reinsurance	<p>Click the icon to enable the Retrospective Reinsurance Contract pane.</p> <p>Note: This field is available only if you enabled the Reinsurance Held Field.</p>

Table 4-3 (Cont.) The Liability Calculation Definition Pane

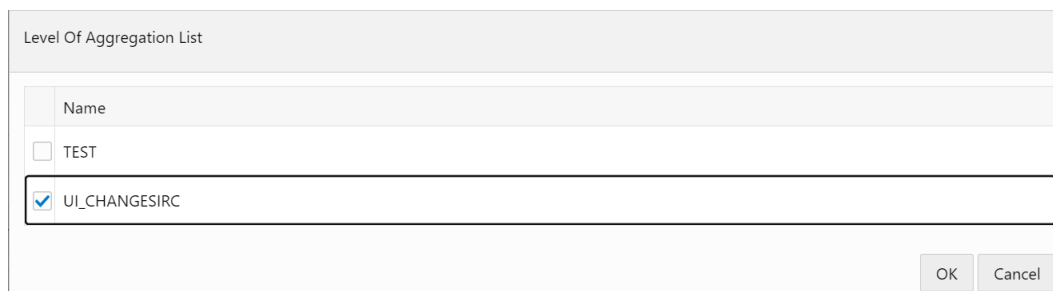
Field	Description
Transition Acquired Contract Calculation Preference	Select a Template from the drop-down list. Note: This field is available only if you selected <i>Full Retrospective</i> from the TransitionMethod drop-down list.
<i>Prospective Reinsurance Contract</i>	This page is available only if you enabled the Reinsurance Held Field .
Calculation Method	Select a method from the drop-down list. The available methods are: <ul style="list-style-type: none"> • General Measurement Model • Long Duration Contracts • Premium Allocation Approach • Variable Fee Approach
Calculation Preference	Select a value from the drop-down list. Note: PAA YTD Templates work only when input variable data is given as a download. Therefore, when PAA YTD Templates are selected, then do not select ' <i>Compute Expected and Actual</i> ' and ' <i>Compute Expected</i> ' under the ' <i>Calculate Input Variable</i> ' within a ' <i>Level of Aggregation</i> ' selection.
Acquired Contract Calculation Preference	Select a value from the drop-down list. Note: This field is displayed only if you have enabled the Acquired Contract Option .
Transition Method	Select the type of transition method from the drop-down list. The available options are: <ul style="list-style-type: none"> • Fair Value Approach • Full Retrospective If the FullRetrospective Method is selected and the AcquiredContract Feature is enabled, then for Direct Insurance two Acquired Contract Templates are Configurable, one for regular use and one for transition. Note: This field is displayed only if you have enabled the Transition Option.
Transition Calculation Preference	Depending on the method that you selected in the Insurance Contract Calculation Method field, the Transition Calculation Method field is populated with the required values. Select the type of Transition Calculation Preference from the drop-down list. Note: This field is displayed only if you have enabled the Transition Option.
Transition Acquired Contract Calculation Preference	Select a Template from the drop-down list. Note: This field is available only if you selected <i>Full Retrospective</i> from the TransitionMethod drop-down list.
<i>Retrospective Reinsurance Contract pane.</i>	This pane is available only if you enabled the Include Retrospective Reinsurance Field .

Table 4-3 (Cont.) The Liability Calculation Definition Pane

Field	Description
Calculation Method	Select a method from the drop-down list. The available methods are: <ul style="list-style-type: none"> • General Measurement Model • Premium Allocation Approach
Calculation Preference	Select a value from the drop-down list. Note: PAA YTD Templates work only when input variable data is given as a download. Therefore, when PAA YTD Templates are selected, then do not select 'Compute Expected and Actual' and 'Compute Expected' under the 'Calculate Input Variable' within a 'Level of Aggregation' selection.
Acquired Contract Calculation Preference	Select a value from the drop-down list. Note: This field is displayed only if you have enabled the Acquired Contract Option.
Transition Method	Select the type of transition method from the drop-down list. The available options are: <ul style="list-style-type: none"> • Fair Value Approach • Full Retrospective Note: This field is displayed only if you have enabled the Transition Option.
Transition Calculation Preference	Depending on the method that you selected in the Insurance Contract Calculation Method field, the Transition Calculation Method Field is populated with the required values. Select the type of Transition Calculation Preference from the drop-down list. Note: This field is displayed only if you have enabled the Transition Option.
Transition Acquired Contract Calculation Preference	Select a Template from the drop-down list. Note: This field is available only if you selected <i>Full Retrospective</i> from the TransitionMethod drop-down list.

3. In the Level of Aggregation pane, click Add and select the required level of aggregation definitions from the Level of Aggregation list. For more information, see [Level of Aggregation](#).

Figure 4-19 The Level of Aggregation List Window



The LOA is added to the **Level of Aggregation** pane.

Figure 4-20 The Level of Aggregation List Window

Name	Description	Calculate Input Variable	Assumptions
<input type="checkbox"/> UI_CHANGESIRC	UI_CHANGESIRC	Compute Expected and Actual	

- a. In the **Assumptions** column, click **Launch Hierarchy** to launch the scenarios tiles in a window.

Figure 4-21 The Scenarios Tiles Window

WO SCN2 Scenario Name Onerous and what if analysis Type Name	O SCN3 Scenario Name Onerous Classification Type Name	B SCN1 Scenario Name Base Scenario Type Name
W SCN4 Scenario Name What if Analysis Type Name	W WA1 Scenario Name What if Analysis Type Name	W WA2 Scenario Name What if Analysis Type Name
W WA3 Scenario Name What if Analysis Type Name		

- b. For each desired scenario, click the View icon to open the **Assumption** window.

Figure 4-22 The Assumptions Window

The screenshot shows a software window titled "Assumption" with the LOA identifier "LOA: UI_CHANGESIRC". It is divided into two main sections: "Direct Insurance" and "Prospective Reinsurance Contract". Each section contains a grid of dropdown menus for configuring assumptions. The "Direct Insurance" section includes fields for Interest Rate Curve, Adjustment Factor 1, Adjustment Factor 2, Adjustment Factor 3, Adjustment Factor 4, Adjustment Factor 5, Adjustment Amount 1, Adjustment Amount 2, and Adjustment Amount 3. The "Prospective Reinsurance Contract" section contains an identical set of fields.

- c. Populate the **Assumption Form**.

Table 4-4 The LOA Assumptions and the Rates Window

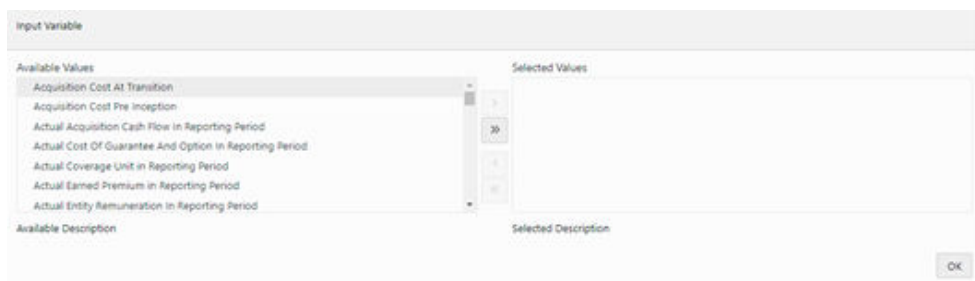
Field	Description
<i>Direct Insurance and Prospective Reinsurance Contract panes</i>	
Interest Rate Curve	Select an Interest Rate curve from the drop-down list.
Amortization Rate	Select an Amortization Rate from the drop-down list.
Adjustment Factor 1	Select an Adjustment Factor from the drop-down list.
Adjustment Factor 2	Select an Adjustment Factor from the drop-down list.
Adjustment Factor 3	Select an Adjustment Factor from the drop-down list.
Adjustment Factor 4	Select an Adjustment Factor from the drop-down list.
Adjustment Factor 5	Select an Adjustment Factor from the drop-down list.
Adjustment Amount 1	Select an Adjustment Factor amount from the drop-down list.
Adjustment Amount 2	Select an Adjustment Factor amount from the drop-down list.
Adjustment Amount 3	Select an Adjustment Factor amount from the drop-down list.

Table 4-4 (Cont.) The LOA Assumptions and the Rates Window

Field	Description
Premium Recognition Pattern	Select a Premium Recognition Pattern from the drop-down list. Note: This field appears in the DirectInsurance pane. This field is available only if you selected the PremiumAllocationApproach Method in the InsuranceContractCalculationMethod Field.
<i>Transition Configuration</i> pane	
Initial Recognition Date	Click Calendar in this field and select the Initial Recognition Date from the Calendar.

- d. Click **OK**.
 - e. Close the scenarios window to navigate back to the **Liability Calculations (Create)** Window.
4. If you want to delete a Level of Aggregation from the Level of Aggregation pane, select the required Level of Aggregation and then click the **Delete** icon.
 5. Click the **View Variables** icon to open the **Input Variable** Window. This icon is only available if the Oracle Insurance Accounting Analyzer Application is integrated with the Oracle Financial Services Profitability Management Pack (OFS PFT).

Figure 4-23 The Input Variable Window



6. In the **Available Values** section, select a value and then click the **Move** icon to include it in the **Selected Values** section.
7. Click **OK**.
8. In the **Calculate Input Variable** Column, against the required LOA, you select one of the following options from the drop-down list:
 - Compute Expected and Actual
 - Compute Actual
 - Compute Expected
 - Download Expected and Actual
9. In the **Assumptions** Column, click **Launch Hierarchy** adjacent to the LOA to open the **LOA Assumptions and the Rates** window.

Figure 4-24 The Assumptions Window

10. Populate the **LOA Assumptions and the Rates Window Form**.

Table 4-5 The LOA Assumptions and the Rates Window

Field	Description
<i>Direct Insurance and Prospective Reinsurance Contract panes</i>	
Interest Rate Curve	Select an Interest Rate curve from the drop-down list.
Amortization Rate	Select an Amortization Rate from the drop-down list.
Adjustment Factor 1	Select an Adjustment Factor from the drop-down list.
Adjustment Factor 2	Select an Adjustment Factor from the drop-down list.
Adjustment Factor 3	Select an Adjustment Factor from the drop-down list.
Adjustment Factor 4	Select an Adjustment Factor from the drop-down list.
Adjustment Factor 5	Select an Adjustment Factor from the drop-down list.
Adjustment Amount 1	Select an Adjustment Factor amount from the drop-down list.
Adjustment Amount 2	Select an Adjustment Factor amount from the drop-down list.
Adjustment Amount 3	Select an Adjustment Factor amount from the drop-down list.

Table 4-5 (Cont.) The LOA Assumptions and the Rates Window

Field	Description
Premium Recognition Pattern	Select a Premium Recognition Pattern from the drop-down list. Note: This field appears in the DirectInsurance pane. This field is available only if you selected the PremiumAllocationApproach Method in the InsuranceContractCalculationMethod Field.
<i>Transition Configuration</i> pane	
Initial Recognition Date	Click Calendar in this field and select the Initial Recognition Date from the Calendar.

11. Click OK.
12. Click **Save** and then click **Submit**.
The saved definition is displayed in the AggregationSummary Table on the LevelofAggregation window.
13. Click Submit.
14. For more information about OFS PFT, see [Oracle Financial Services Profitability Management Pack User Guide](#).

The Audit Trail pane at the bottom of the Definition window displays the Created By, Creation Date, last modified by, and Last modification date details. The **User Comments** field enables you to add additional information as a comment.

4.4.5 Edit Liability Calculation Definition

Perform the following steps to edit a liability calculation definition:

1. In the **Liability Calculations Summary** table, select the checkbox adjacent to the liability calculation definition you want to edit.
2. Click **Edit**, to open the **Liability Calculations Edit** Window.
3. Update the required fields. For more information, see [Create a New Liability Calculation Definition](#).
4. Click **Save**.
The saved definition is displayed in the LiabilityCalculationsSummary table of the LiabilityCalculations window.

The **Audit Trail** pane at the bottom of the definition window displays the **Created By**, **Creation Date**, **last modified by**, and **Last modification date details**. The **User Comments** field enables you to add additional information as a comment.

4.4.6 View Liability Calculation Definition

Perform the following steps to view liability calculation definitions:

1. In the **Liability Calculations Summary** Window, select the checkbox adjacent to the Liability Calculation definition you want to view.
2. Click **View**, to open the **Liability Calculations** window.

 **Note:**

You cannot edit any of the fields in *View* mode.

3. Click **Cancel** to go back to the **Liability Calculations Summary** window.

4.4.7 Approve a Liability Calculation

Perform the following steps to approve a liability calculation:

 **Note:**

Only users that are mapped to the *IIA Application Approver Group* can approve a Liability Calculation. For more information, see [Create and Map a User to the Liability Calculation Roles and Groups](#).

1. Log in as a user that is mapped to the **IIA Application Approver Group**.
2. In the **Liability Calculations Summary** window, select the checkbox adjacent to the Liability Calculation definition you want to view.

 **Note:**

You can approve only liability calculations that are in the *Pending for Approval* status.

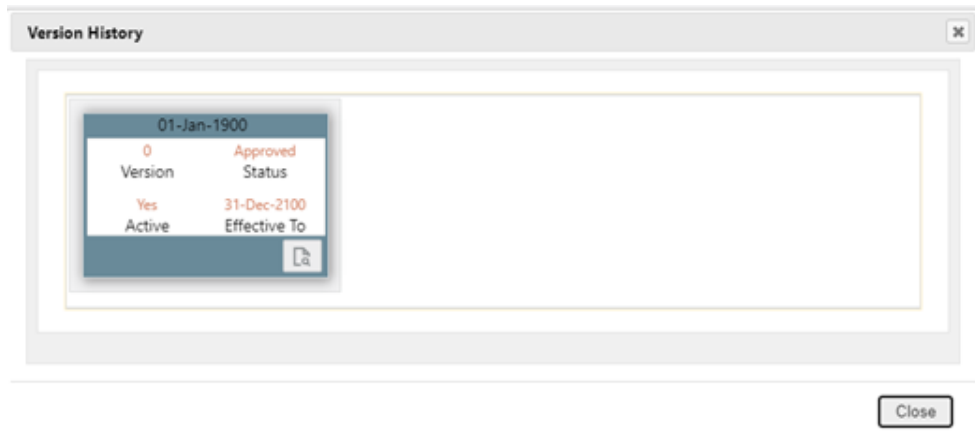
3. Click **View**, to open the Liability Calculations window.
4. Click **Approve**.
5. In the pop-up window, in the **Give your comments** pane, enter a justification in the **Justification** field.
6. Click **Approve**.
The status of the selected liability calculation now appears as *Approved*.

4.4.8 View the History of a Liability Calculation Definition

Perform the following steps to view the history of a new liability calculation definition:

1. From the **Liability Calculations** window, select the checkbox adjacent to the liability calculation definition that you want to view the version history of.
2. Click **Version History**, to open the **Version History** window.

Figure 4-25 The Version History Window



3. Select the Version and click **Make Active** to activate a liability calculation for a given date.

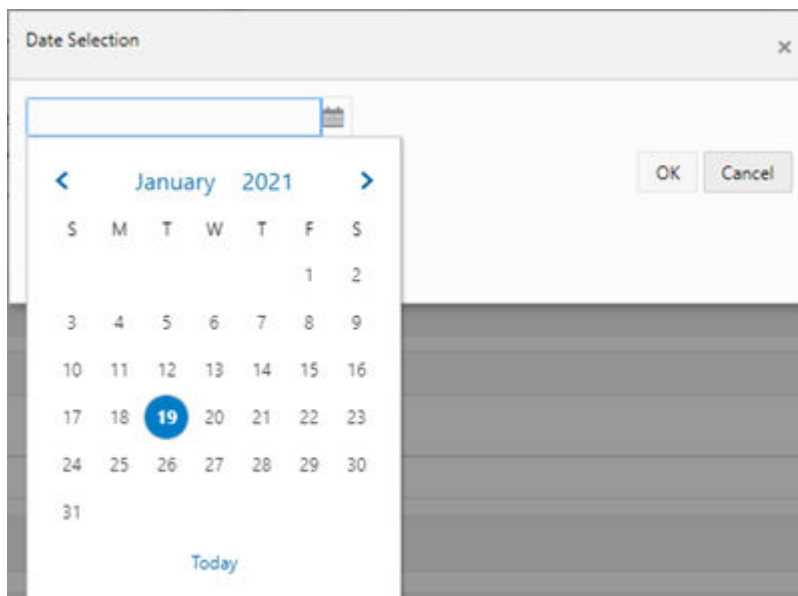
 **Note:**

You can only activate one liability calculation definition for a given date. For example, you have created three liability calculation definitions for the dates *01-Jan-2021*, *LC01*, *LC02*, and *LC03*. If you activate *LC01*, the other versions will be inactive.

If the definition contains different effective dates then the latest date will be active.

4. Click the **Details** icon to open the **LiabilityCalculations** page.
5. Click **Execute** to open the **DateSelection** window.

Figure 4-26 The Date Selection Window



6. In the calendar, select the required date, and then click **OK**. The definition goes to a *Draft* state. The editable fields can be modified
7. After modifying the required fields, click **OK** to send the definition for approval.
8. After the definition is approved, it can be used for the CSM runs.
9. Click **Cancel** to return to the **LiabilityCalculationSummary** window.

4.4.9 Create a new Version of a Liability Calculation Definition

Perform the following steps to create a new version of a liability definition:



Note:

You can only revise liability definitions that contain templates.

1. From the **Liability Calculations** window, select the checkbox adjacent to the liability calculation that you want to revise.
2. Click **Create New Version** , to open the **Liability Calculation** window.

Figure 4-27 The Liability Calculation Window

The screenshot shows the 'Insurance Accounting Analyzer - Liability Calculations' window. The 'Details' section includes the following fields:

- Name: TEST_LDT_FRA_HOPING_VER
- Description: [Empty]
- Folder: IAB156G
- Legal Entity: Life and Pensions Ltd
- Line of Business: Whole Life Insurance
- Run Type: Solo
- Reinsurance Held: Off
- Transition: On
- Projection Frequency: Annually
- Projection In Years: 2

The 'Direct Insurance' section includes:

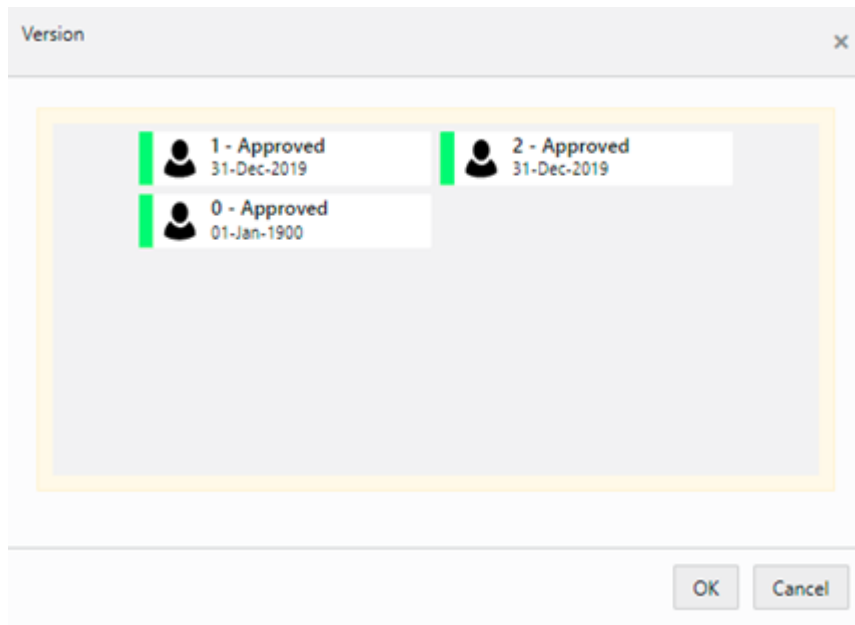
- Calculation Method: Long Duration Contracts
- Calculation Preference: LDT_Mar_Link_Template
- Transition Method: Full Retrospective
- Transition Calculation Preference: test_LDT_out_fra_jrj

The 'Level of Aggregation' table has the following structure:

Name	Description	Calculate Input Variable	Assumptions
test_ldt_fra_ver		Calculate Forward and Actual	

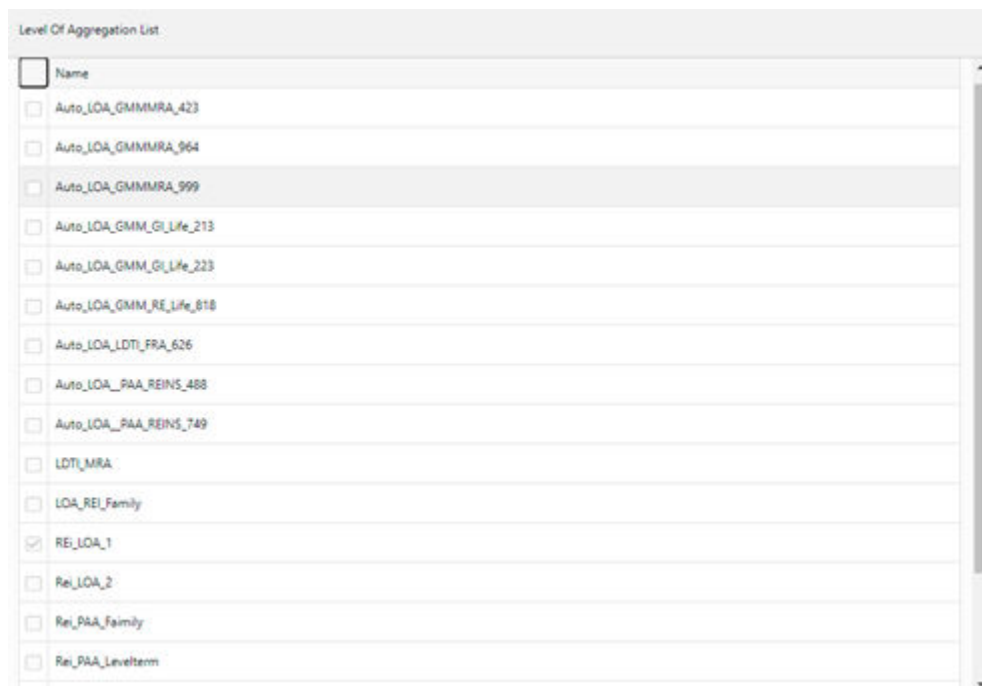
3. The details pane contains the version number of the liability calculation definition. Additionally, click the **View Version** icon to view the versions and status of the liability calculation definition.

Figure 4-28 The Version Window

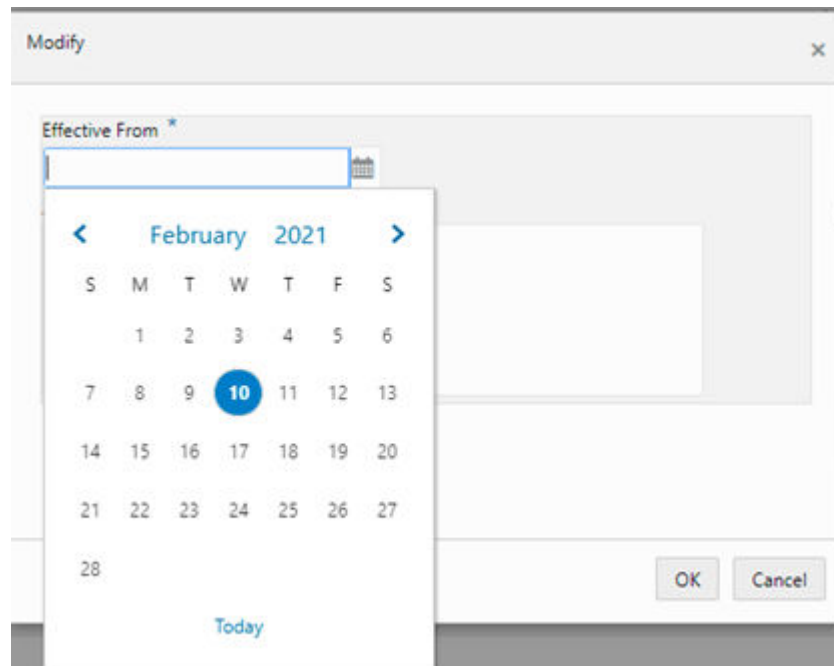


4. Click the **Add** icon to open the **Level of Aggregation List** window.

Figure 4-29 The Level of Aggregation List Window



5. Select the required LOA and then click **OK**.
6. Click **Modify** to open the **Modify** window.

Figure 4-30 The Modify Window

7. In the calendar, select the required date. The execution date must be less than the **FIC_MIS** date. The definition goes to a *Draft* state. The editable fields can be modified
8. After modifying the required fields, click OK to send the definition for approval.
9. After the definition is approved, it can be used for the CSM runs. The definition ID in the **Audit Trail** section is updated with the new version ID.
10. Click **OK**.

4.4.10 Run Liability Calculation Definition

Perform the following steps to run the liability calculation definition:



Note:

You can run only Approved definitions.

1. In the **Liability Calculations Summary** table, select the checkbox adjacent to the Liability Calculation definition that you want to run.
2. In the **Date Selection** window, use the calendar icon to select the required date in the **Date** field.
3. In the **Liability Calculation - View** window, click **OK**.
The selected LiabilityCalculation definition is marked for execution.

There is no restriction on the execution frequency of the run. The projection frequency is provided while configuring the run. For example, the execution date is 15th January 2018 and the projection frequency is quarterly, the actual data is calculated on 15th January and the CSM projection is performed on 15th April, 15th July, and so on.

If you want to compare the projections of two runs, the actual execution frequency of those two runs should be the same to get the desired results.

4.4.11 Copy Liability Calculation Definition

Perform the following steps to use an existing definition to create a new liability calculation definition:

1. In the **Liability Calculation Summary** table, select the checkbox adjacent to the liability calculation definition that you want to copy.
2. Click **Copy** to open the **Save As** window.
3. Enter values in the **Name** and **Description** fields.
4. Click **Save**.
The saved definition is displayed in the **Liability Calculation Summary** table on the **Liability Calculation** window. You can further edit the definition and submit it for approval.

The **Audit Trail** pane at the bottom of the definition window displays the **Created By**, **Creation Date**, **last modified by**, and **Last modification date details**. The **User Comments** field enables you to add additional information as a comment.

4.4.12 Retire Liability Calculation Definition

Perform the following steps to disable unwanted liability calculation definitions:

1. In the **Liability Calculations Summary** table, select the checkbox adjacent to the Liability Calculation definition that you want to retire.

 **Note:**

You cannot retire the definitions in *Success* or *Failed* statuses.

2. Click **Retire**, to open the **Liability Calculations Summary Details** window.
3. Update the required level of aggregation details.
4. Click **Retire**.
The retired definition is displayed in the **Liability Calculations Summary** table on the **Liability Calculations** window.

The Workflow status of the retired definitions is changed to *Retired*.

The **Audit Trail** pane at the bottom of the definition window displays the **Created By**, **Creation Date**, **last modified by**, and **Last modification date details**. The **User Comments** field enables you to add additional information as a comment.

4.5 Variable Maintenance

There are different input and output variables used in the formula for calculating net liabilities and CSM. These variables differ based on the approach selected or assumptions made. In the standard product, the variables that are needed for the formula are defined. However, new variables can be created by using the VariableMaintenance window for different financial elements.

4.5.1 Access Variable Maintenance

You can access the VariableMaintenance window by clicking the VariableMaintenance element from the left-hand side menu. When you click this element, the VariableMaintenance window is displayed:

Figure 4-31 The Variable Maintenance Window

Code	Calculation Moment	Action Type	Discount Rate	Cash Flow	Cash Flow Boundary	Calculation Pr
<input type="checkbox"/> N_ACG_COST_AT_INCEPTION	Inception Date	Sum Of Actual CashFlow			Start Of Report Period to Current Report Date	Ongoing Basis
<input type="checkbox"/> N_TRNS_EST_ACG_COST_INT_REC	Initial Recognition (MRA)	Sum Of Assumed CashFlow		Initial Recognition (MRA) Date	Initial Recognition (MRA) to Transition	At Initial Recog
<input type="checkbox"/> N_ACG_COST_PRE_INCEPTION	Inception Date	Sum Of Actual CashFlow			Before Inception Date	Ongoing Basis
<input type="checkbox"/> N_ORIG_ACG_CASH_FLOW_AMRT	Inception Date	Sum Of Actual CashFlow			Before Inception Date	At Inception

This window displays the existing variables in the Variables table. The variables are listed in the ascending order of their code values. This window also enables you to create new variables.

4.5.2 Search for a Variable

The Search feature enables you to filter the list of existing definitions and find the definitions that you require. To search for definitions, select the required values from the fields, also select the application type from the **ApplicationType** field to view only *IFRS17* or *LDTI* variables, and click Search.

The list of variables in the Variables table is refreshed and the variables that match your search criteria are displayed.



Note:

You can create variables only from the first window.

4.5.3 Create a New Variable for IFRS17

Perform the following steps to create new variables for IFRS17:

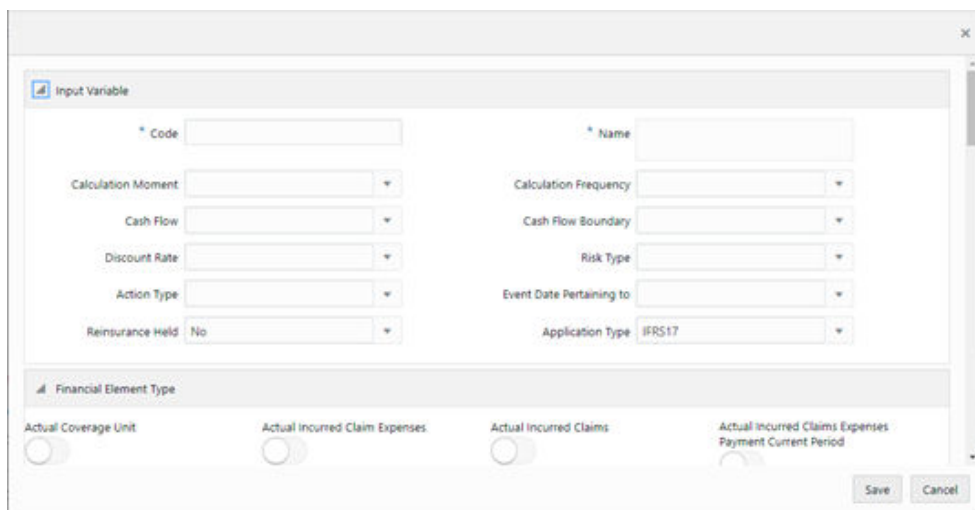
 **Note:**

When creating out-of-box variables, use the word '*frm*' instead of '*from*'. If a custom template contains the word '*from*' then you will encounter an error when creating a new version of a calculation preference definition. Before you create a new variable from the VariableMaintenance screen, you must add the corresponding direct and re-insurance variable columns in the following tables in the Erwin Data Model:

1. For direct insurance variables, add the corresponding variable column to the following tables:
 - FSI_INS_CONTRACT_INPUT_DETAIL
 - FSI_INS_GROUP_INPUT_DETAIL
 - FCT_INS_ACSTVAL_DIRCONT_DTLS
 - FCT_INS_ACSTVAL_DIRGROUP_DTLS
2. For re-insurance input variables, add the corresponding variable column to the following tables:
 - FSI_RI_CONTRACT_INPUT_DETAIL
 - FSI_RI_GROUP_INPUT_DETAIL
 - FCT_INS_ACSTVAL_RICONT_DTLS
 - FCT_INS_ACSTVAL_RIGROUP_DTLS
3. Upload the Erwin Data Model.

1. In the **Variables** table, click **Add** to open the **New Variable** window.

Figure 4-32 The New Variable Window



2. Populate the **Input Variable** form.

Table 4-6 The Input Variable pane

Field	Description
Code	Enter a code for the variable. The code must be alphanumeric and must begin with an alphabet.
Name	Enter a name for the variable.
Calculation Moment	Select a calculation moment from the drop-down list. The available options are: <ul style="list-style-type: none">• End Of Report Period*• Inception Date• Initial Recognition (MRA)• Ongoing Basis• Point of Incurrence• Start of Report Period*• Transition Date
Cash Flow	Select a cash flow from the drop-down list. The available options are: <ul style="list-style-type: none">• Current Report Date• Inception Date• Initial Recognition (MRA) Date• Point of incurrence• Start of Report Period• Transition Date
Calculation Frequency	Select a calculation frequency from the drop-down list. The available options are: <ul style="list-style-type: none">• At Inception• At Initial Recognition• At Transition• Ongoing Basis
Discount Rate	Select a discount rate from the drop-down list. The available options are: <ul style="list-style-type: none">• Current Report Date• Inception Date• Incurred Claim Date• Locked in Date• Point of Incurrence• Start of Report Date• Transition Rate

Table 4-6 (Cont.) The Input Variable pane

Field	Description
Cash Flow Boundary	Select a cash flow boundary from the drop-down list. The available options are: <ul style="list-style-type: none"> • At Current Report Date • At Start of Report Date • At Transition • Before Inception Date • Current Report Date Onwards • Inception Date Onwards • Inception Date to Current Report Date • Inception Date to Current Report Date • Inception Date to Start Of Report Period • Initial Recognition (MRA) to Transition • On and Before Inception Date • Point of Incurrence onwards • Start of Report Period Onwards • Start of Report Period to Current Report Date • Transition Date Onwards
Action Type	Select an action type from the drop-down list. The available options are: <ul style="list-style-type: none"> • PV of Actual Cash Flow* • PV of Assumed Cash Flow* • Sum of Actual Cash Flow • Sum of Assumed Cash Flow
Event Date Pertaining to	Select an action type from the drop-down list. The available option is: <ul style="list-style-type: none"> • Prior to Current Reporting Period
Risk Type	Select a risk type from the drop-down list. The available options are: <ul style="list-style-type: none"> • Expired • Unexpired
Reinsurance Held	Select yes or no from the drop-down list.
Application Type	Select an application type from the drop-down list. The available options are: <ul style="list-style-type: none"> • IFRS17 • LDTI

*Note the following conditions for the disallowed cash-flow boundaries for the following calculation moments and action types:

Calculation Moment	Action Type	Disallowed cash-flow boundaries
--------------------	-------------	---------------------------------

Table 4-6 (Cont.) The Input Variable pane

Field	Description
Start Of Report Period	PV Of Actual CashFlow <ul style="list-style-type: none"> • Inception Date Onwards • Inception Date to Start Of Report Period • Inception Date to Current Report Date • Start Of Report Period Onwards (Only if the value in the Calculation Moment is End Of Report Period) • Start Of Report Period to Current Report Date (Only if the value in the Calculation Moment is End Of Report Period) • On and Before Inception

3. Under the **Financial Element Type** pane, click the icon to enable the required cash flow types. For more information on the available financial element types, see [List of Financial Element Types](#).
4. Click **Save**.
The saved definition is displayed in the **Variables** table on the Variable Maintenance window.

4.5.4 Create a New Variable for LDTI

Perform the following steps to create new variables for LDTI:

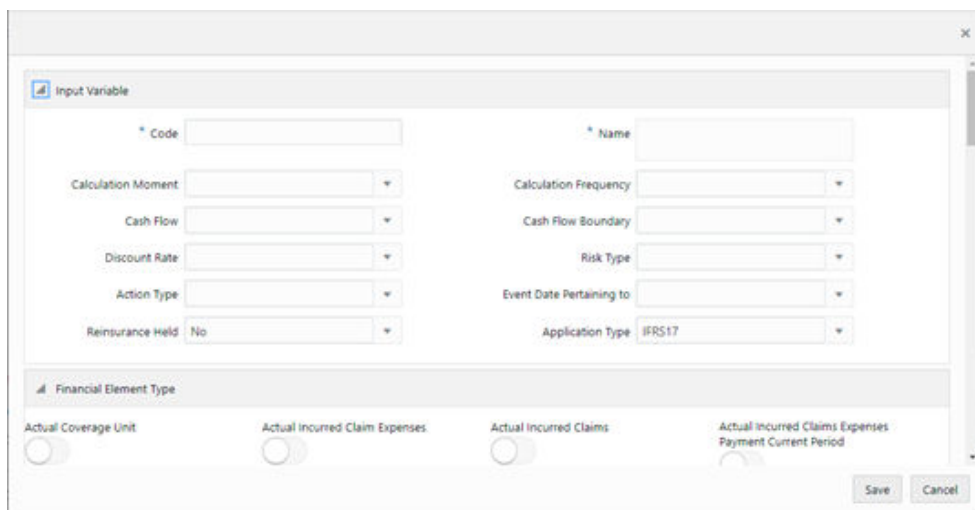
 **Note:**

When creating out-of-box variables, use the word '*frm*' instead of '*from*'. If a custom template contains the word '*from*' then you will encounter an error when creating a new version of a calculation preference definition. Before you create a new variable from the VariableMaintenance screen, you must add the corresponding direct and re-insurance variable columns in the following tables in the Erwin Data Model:

1. For direct insurance variables, add the corresponding variable column to the following tables:
 - FSI_LDTI_CONTRACT_INPUT_DETAIL
 - FSI_LDTI_GROUP_INPUT_DETAIL
 - FCT_LDTI_ACSTVAL_DIRCONT_DTLS
 - FCT_LDTI_ACSTVAL_DIRGROUP_DTLS
2. For re-insurance input variables, add the corresponding variable column to the following tables:
 - FSI_LDTI_RI_CNTRT_INPUT_DETAIL
 - FSI_LDTI_RI_GROUP_INPUT_DETAIL
 - FCT_LDTI_ACSTVAL_RICONT_DTLS
 - FCT_LDTI_ACSTVAL_RIGROUP_DTLS
3. Upload the Erwin Data Model.

1. In the **Variables** table, click **Add** to open the **New Variable** Window.

Figure 4-33 The New Variable Window



2. Populate the **Input Variable** form.

Table 4-7 The Input Variable pane

Field	Description
Code	Enter a code for the variable. The code must be alphanumeric and must begin with an alphabet.
Name	Enter a name for the variable.
Calculation Moment	Select a calculation moment from the drop-down list. The available options are: <ul style="list-style-type: none">• End Of Report Period*• Inception Date• Initial Recognition (MRA)• Ongoing Basis• Point of Incurrence• Start of Report Period*• Transition Date
Cash Flow	Select a cash flow from the drop-down list. The available options are: <ul style="list-style-type: none">• Current Report Date• Inception Date• Initial Recognition (MRA) Date• Point of Incurrence• Start of Report Period• Transition Date
Calculation Frequency	Select a calculation frequency from the drop-down list. The available options are: <ul style="list-style-type: none">• At Inception• At Initial Recognition• At Transition• Ongoing Basis
Discount Rate	Select a discount rate from the drop-down list. The available options are: <ul style="list-style-type: none">• Current Report Date• Inception Date• Incurred Claim Date• Locked in Date• Point of Incurrence• Start of Report Date• Transition Rate

Table 4-7 (Cont.) The Input Variable pane

Field	Description
Cash Flow Boundary	<p>Select a cash flow boundary from the drop-down list. The available options are:</p> <ul style="list-style-type: none"> • At Current Report Date • At Start of Report Date • At Transition • Before Inception Date • Current Report Date Onwards • Inception Date Onwards • Inception Date to Current Report Date • Inception Date to Current Report Date • Inception Date to Start Of Report Period • Initial Recognition (MRA) to Transition • On and Before Inception Date • Point of Incurrence onwards • Start of Report Period Onwards • Start of Report Period to Current Report Date • Transition Date Onwards
Action Type	<p>Select an action type from the drop-down list. The available options are:</p> <ul style="list-style-type: none"> • PV of Actual Cash Flow* • PV of Assumed Cash Flow* • Sum of Actual Cash Flow • Sum of Assumed Cash Flow
Event Date Pertaining to	<p>Select an action type from the drop-down list. The available option is:</p> <ul style="list-style-type: none"> • Prior to Current Reporting Period
Risk Type	<p>Select a risk type from the drop-down list. The available options are:</p> <ul style="list-style-type: none"> • Expired • Unexpired
Reinsurance Held	Select yes or no from the drop-down list.
Application Type	<p>Select an application type from the drop-down list. The available options are:</p> <ul style="list-style-type: none"> • IFRS17 • LDTI

*Note the following conditions for the disallowed cash-flow boundaries for the following calculation moments and action types:

Calculation Moment	Action Type	Disallowed cash-flow boundaries
--------------------	-------------	---------------------------------

Table 4-7 (Cont.) The Input Variable pane

Field	Description	
Start Of Report Period	PV Of Actual CashFlow	<ul style="list-style-type: none"> • Inception Date Onwards • Inception Date to Start Of Report Period • Inception Date to Current Report Date • Start Of Report Period Onwards (Only if the value in the Calculation Moment is End Of Report Period) • Start Of Report Period to Current Report Date (Only if the value in the • Calculation Moment is End Of Report Period) • On and Before Inception

3. Under the **Financial Element Type** pane, click the icon to enable the required cash flow types. For more information on the available financial element types, see [List of Financial Element Types](#).
4. Click **Save**.
The saved definition is displayed in the **Variables** table on the Variable Maintenance window.

4.5.5 Edit a Variable

Perform the following steps to edit variables:

1. In the **Variables** table, select the checkbox adjacent to the Variable that you want to edit.
2. Click **Edit**, to open the **Variable** Window.
3. Update the required fields. For more information, see [Create a New Variable](#).
4. Click **Save**.

The saved definition is displayed.

4.5.6 View a Variable

Perform the following steps to view variables:

1. In the **Variables** table, select the checkbox adjacent to the variable that you want to view.
2. Click **View**, to open the **Variables** Window.
3. Click **Cancel** to go back to the **Variables** Window.

4.5.7 Delete a Variable

Perform the following steps to delete a variable:

1. In the **Variables** table, select the checkbox adjacent to the variable that you want to delete.
2. Click **Delete**.

3. Click **Yes**.
The selected variables are removed from the **Variable Maintenance** Window.

 **Note:**

When you delete a variable, you must delete them in the corresponding columns and tables that are added in the Erwin data model.

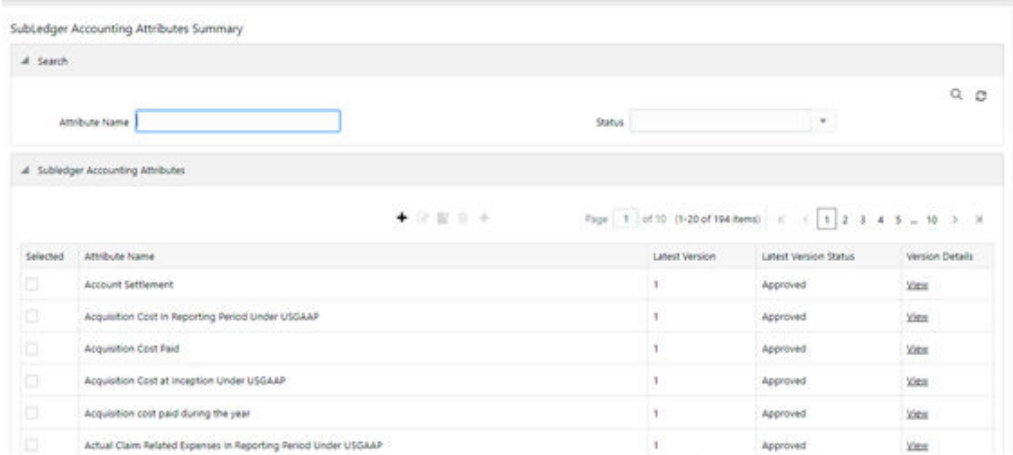
4.6 Subledger Attributes

The Subledger Attributes feature allows users to enter new or edit or delete existing accounting attribute mappings into the system. The feature has an interface that provides the users with an exhaustive list of input and output variables to choose from and create formulae with the two in the expression box. Once the accounting mappings are created, the users can use those in creating accounting attributes in the Subledger definitions.

4.6.1 Access Subledger Attributes

You can access the **Subledger Attributes** window by clicking the **Subledger Attributes** element from the left-hand side menu. When you click this element, the **Subledger Accounting Attributes Summary** window is displayed:

Figure 4-34 The Subledger Accounting Attributes Summary Window



Selected	Attribute Name	Latest Version	Latest Version Status	Version Details
<input type="checkbox"/>	Account Settlement	1	Approved	View
<input type="checkbox"/>	Acquisition Cost in Reporting Period Under USGAAP	1	Approved	View
<input type="checkbox"/>	Acquisition Cost Paid	1	Approved	View
<input type="checkbox"/>	Acquisition Cost at Inception Under USGAAP	1	Approved	View
<input type="checkbox"/>	Acquisition cost paid during the year	1	Approved	View
<input type="checkbox"/>	Actual Claim Related Expenses in Reporting Period Under USGAAP	1	Approved	View

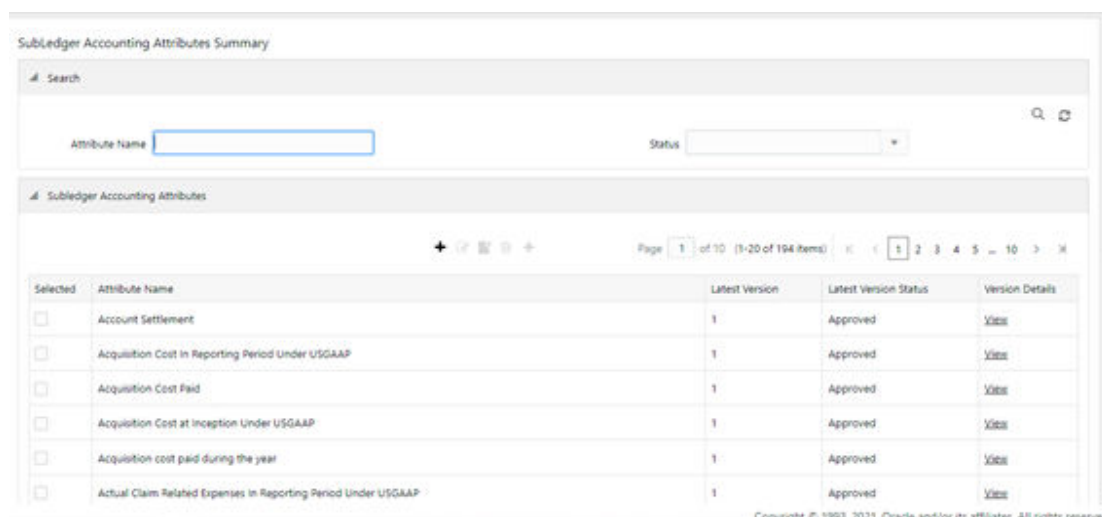
Copyright © 1993, 2021, Oracle and/or its affiliates. All rights reserved.

This window displays the existing sub-ledger attributes in the **Subledger Accounting Attributes** pane. This window also enables you to define new sub-ledger accounting attributes, edit the existing attributes, and view the details of existing attributes.

4.6.2 Search for Subledger Accounting Attributes

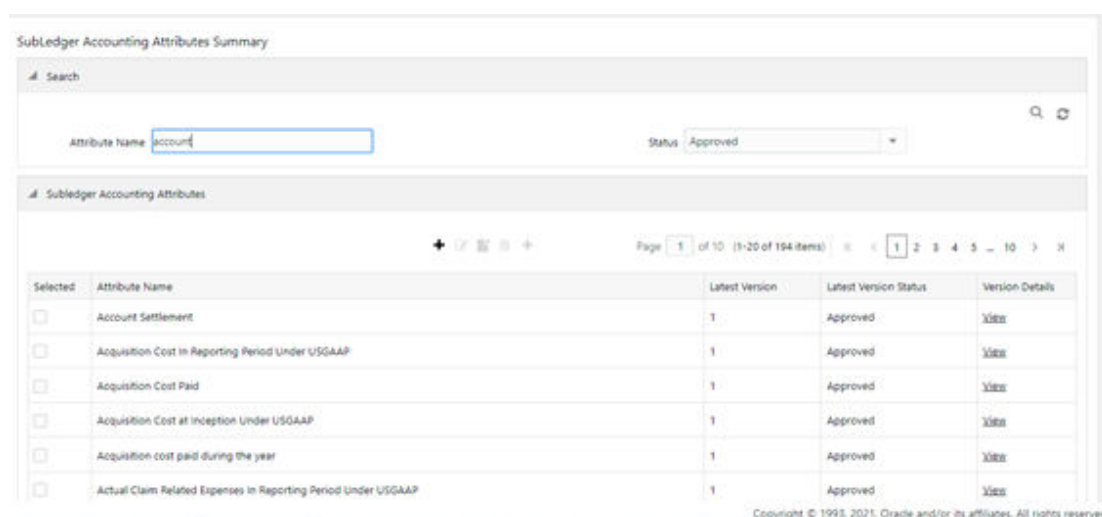
The **Search** feature enables you to filter the list of existing definitions and find the definitions that you require.

Figure 4-35 The Subledger Accounting Attributes Summary Window



To search for an attribute name, enter an attribute and debit or credit source name in the **Attribute Name** and **Debit/Credit Source Name** fields respectively, and click Search.

Figure 4-36 The Subledger Accounting Attributes Search Results



The list of sub-ledger accounting attributes in the **Subledger Accounting Attributes** pane is refreshed and the attributes that match your search criteria are displayed.

4.6.3 Create a New Subledger Accounting Attribute

The Subledger Attributes feature enables you to create new subledger accounting attributes. Ensure that the same source name is not used for two source mappings. Also, when creating a new attribute, use a unique name. If the name of an existing attribute is used, then you might encounter upgrade issues.

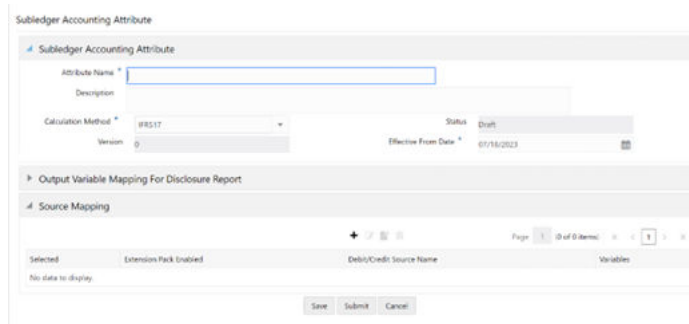
 **Note:**

For executing Subledger Definition when using versioned attributes the **fic_mis_date** must be between the **EffectiveFromStart** and **EffectivetoDate**.

Perform the following steps to create new sub-ledger definitions:

1. In the **Subledger Accounting Attributes** pane, click **Add** to open the **Subledger Accounting Attribute** window.

Figure 4-37 The Subledger Accounting Attribute Window



2. Populate the **Subledger Accounting Attribute** form as tabulated.

Table 4-8 The Subledger Accounting Attribute pane

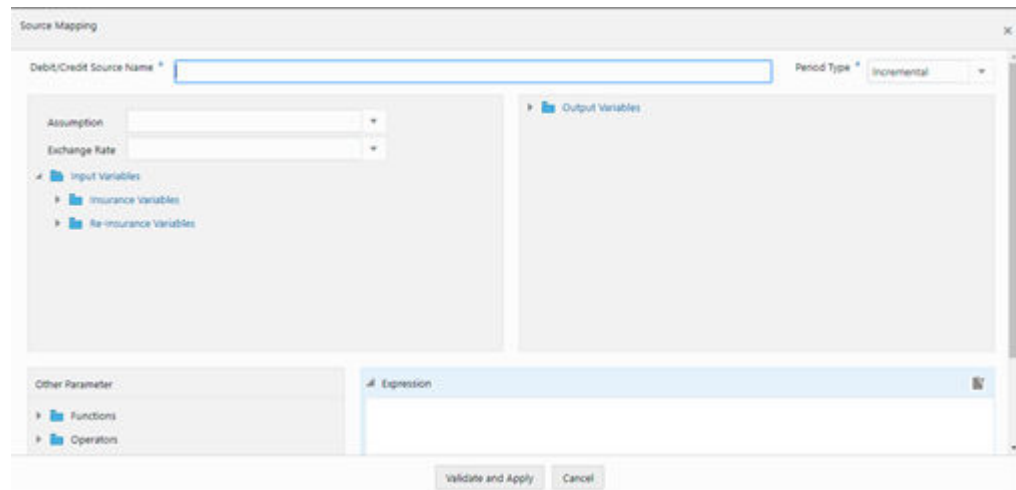
Field	Description
Attribute Name*	Enter a name for the Subledger Attribute. This is a mandatory field.
Description	Enter a description for the Subledger Attribute.
Calculation Method*	Select either <i>IFRS17</i> or <i>LDTI</i> . Depending on this selection, only Subledger Attributes about the selected Calculation Method appear in the Subleder Feature. This is a mandatory field.
Status	Displays the status of the Subledger Attribute. The status is always <i>Draft</i> by default when the Subledger Attribute is being created.
Version	For a newly created Subledger Attribute, the value is <i>0</i> . Every time a Subledger Attribute is modified and saved, this value is updated.
Effective From Date*	Select a date by clicking the Calendar icon to set the date from when the Subledger Accounting Attribute will be effective.

Table 4-8 (Cont.) The Subledger Accounting Attribute pane

Field	Description
Extension Pack Enabled	<p>This button only appears if the Oracle Insurance Accounting Analyzer application license is activated.</p> <p>On enabling this feature, while creating customized attributes, extension pack output variables will be available in the Output Variables section of the Source Mapping window.</p>

3. In the **SourceMapping** pane, click **Add** to open the **Source Mapping** Window.

Figure 4-38 The Source Mapping Window



4. Populate the **Source Mapping** form as tabulated.

Table 4-9 The Source Mapping pane

Field	Description
Debit/Credit Source Name*	<p>Enter a name for the Debit or Credit Source. This is a mandatory field.</p>
Period Type*	<p>Select a value from the drop-down field:</p> <ul style="list-style-type: none"> • Incremental • YTD <p>This is a mandatory field.</p>

Table 4-9 (Cont.) The Source Mapping pane

Field	Description
Assumption	<p>Select an Assumption from the drop-down list. The available Assumptions are:</p> <ul style="list-style-type: none"> • Closing Position • Credit Risk • Current Accident Year Current Accident Period • Current Accident Year Prior Accident Period • Economic Assumptions • Economic Experience • Experience Adjustment – Lapse • Experience Adjustment – Morbidity • Experience Adjustment – Mortality • Experience Adjustment – Others • Future Inflation Assumption • Lapse Assumption • Market Volatility • Morbidity Assumption • Mortality Assumption • New Business • Non Economic Assumptions • Non Economic Experience • Opening Adjustment • Opening Position • Other Future Assumptions <p>If no assumption is selected, then the default value is <i>Others</i> to the system.</p>
Exchange Rate	<p>Select an Exchange Rate from the drop-down list. The available options are:</p> <ul style="list-style-type: none"> • Average Exchange Rate • Closing Exchange Rate • Opening Exchange Rate • Transaction Date Exchange Rate
Input Variables	<p>Select the required Input Variables from the list to populate the Expression pane.</p>
Output Variables	<p>Select the required Output Variables from the list to populate the Expression pane.</p> <p>If the Extension Pack Enabled feature was enabled, then extension pack output variables will be available in the Output Variables section of the Source Mapping window.</p>
Functions	<p>Select the required Functions from the drop-down list. The available Functions are:</p> <ul style="list-style-type: none"> • AND • ABS • Case • Floor • Greatest • Least • MOD • OR

Table 4-9 (Cont.) The Source Mapping pane

Field	Description
Operators	Select the required Operators from the drop-down list. The available Operators are: <ul style="list-style-type: none"> • Equal • Greater Than • Minus • Less Than • Plus

5. Click **Validate** and **Apply**.
If you have not entered a value in the **Debit/Credit Source Name** field or added values in the **Expression** field, then an error message appears.
6. Click **Save** in the **Accounting Attribute Definition** window.

4.6.4 Edit a Subledger Attribute

Perform the following steps to edit a Subledger Attribute:

1. In the **Subledger Accounting Attributes** table, select the checkbox adjacent to the subledger attribute that you want to edit.
2. Click **Edit**, to open the **Subledger Accounting Attributes** window.
3. Update the required fields. For more information, see Create a New Subledger Accounting Attribute.
4. Click **Save**.
The saved attribute is displayed in the **Subledger Accounting Attributes** pane on the **Subledger Accounting Attributes Summary** window.

4.6.5 Create a New Version of a Subledger Attribute

Perform the following steps to add a new version of a Subledger Attribute:

1. On the **Subledger Accounting Attributes** pane, select the desired Subledger Attribute and click **New Version**, to open the Subledger Accounting Attribute window.
2. Modify the **Effective From Date** Field.
3. In the **Source Mapping** pane, modify or add a new source mapping.
4. Click **Save** and then click **Submit**.
A new version of the Subledger Attribute is created.

4.6.6 View a Subledger Attribute Version

Perform the following steps to view the version of a Subledger Attribute:

1. On the **Subledger Accounting Attributes** pane, in the **Version Details** column, click **View** to open the **Version Details** window.

Figure 4-39 The Source Mapping Window

The screenshot shows a window titled 'Version Details' with a search bar containing 'Account Settlement'. Below the search bar is a table with the following data:

Selected	Version Number	Effective From	Effective To	Status	Created By	Created Date	Approved By	Approved Date	Removal Status
<input type="checkbox"/>	1	01-Jan-1900	31-Dec-9999	Approved	SYSADMIN	05-Aug-2021	SYSADMIN	05-Aug-2021	No

Page 1 of 1 (1 of 1 items)

2. Click the **Selected Column** to select the Subledger Definition. The **Edit**, **View**, and **Delete** buttons are enabled.
3. Click **Edit** if you want to modify the Definition.
4. Click **View** to view the Definition.
5. Additionally, click **Delete** to delete the version of the Definition.

4.6.7 View a Subledger Attribute

Perform the following steps to view a Subledger Attribute:

1. In the **Subledger Accounting Attributes** table, select the checkbox adjacent to the Subledger attribute that you want to view.
2. Click **View**, to open the **Subledger Accounting Attributes** window.
3. Click **Cancel** to go back to the **Subledger Accounting Attributes Summary** window.

4.6.8 Delete a Subledger Attribute

Only Subledger attributes that are not used by a Subledger definition are available for deletion. If you try to delete a Subledger Attribute that is used by a Subledger definition, then an error message appears indicating the same. Perform the following steps to delete a Subledger Attribute:

Note:

Subledger Accounting Attribute versions that have been approved by the Checker can be deleted.

1. In the Subledger **Accounting Attributes** table, select the checkbox adjacent to the Subledger Attribute that you want to view.
2. Click **Delete**.
3. Click **Yes**.
The selected Subledger Attributes are deleted.

4.7 Subledger

The granular level of data stored in the Subledger can be used to generate the accounting entries. It uses data along with implied allocations from expenses, taxes,

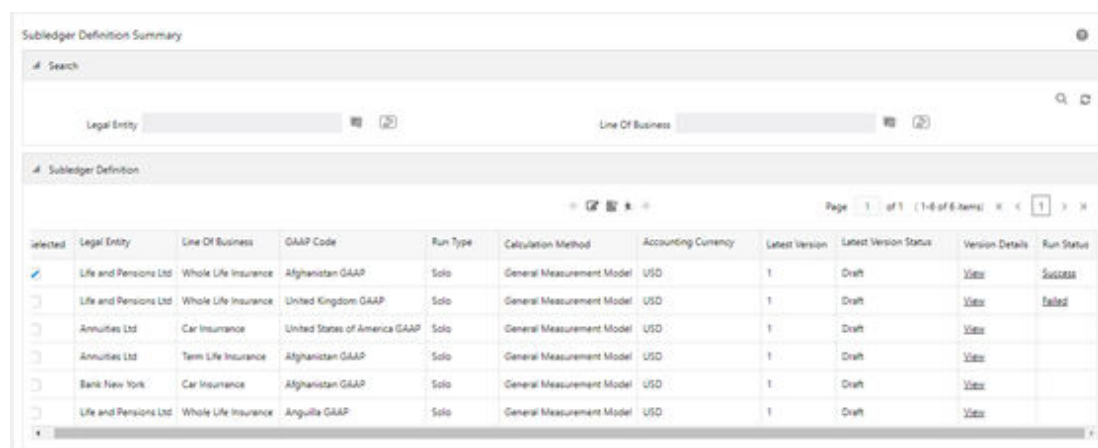
investment income, and so on. The Subledger generates bookings and reports to feed out to general ledgers, management reporting, and analysis tools. By maintaining detailed data and handling complex calculations and reconciliations, it takes stress off general ledgers. Note that the application only picks up data from the base insurance scenario that is marked for reporting. This scenario is set on the Liability Calculation screen, for more information see the [Create a Liability Calculation Definition](#) section. The application also picks up more than one set of data per LOA for Subledger processing. This allows for GL consolidation, and cloud migration, and provides the accuracy and suitability of ledger data.

Subledger supports currency conversion. To enable or use this feature, the user must select the currency as reporting currency while creating the Subledger definition. Please note that the system should also have the currency rate for the currency conversion as per the **fic_mis_date** before calling the Subledger Run to add the journal balances as per the selected reporting currency.

4.7.1 Access Subledger

You can access the Subledger window by clicking the Subledger element from the left-hand side menu. When you click this element, the Subledger window is displayed:

Figure 4-40 The Subledger Definition Summary Window



The screenshot shows the 'Subledger Definition Summary' window. It features a search bar at the top with 'Legal Entity' and 'Line Of Business' filters. Below the search bar is a table titled 'Subledger Definition' with the following columns: Selected, Legal Entity, Line Of Business, GAAP Code, Run Type, Calculation Method, Accounting Currency, Latest Version, Latest Version Status, Version Details, and Run Status. The table contains six rows of data.

Selected	Legal Entity	Line Of Business	GAAP Code	Run Type	Calculation Method	Accounting Currency	Latest Version	Latest Version Status	Version Details	Run Status
<input checked="" type="checkbox"/>	Life and Pensions Ltd	Whole Life Insurance	Afghanistan GAAP	Solo	General Measurement Model	USD	1	Draft	View	Success
<input type="checkbox"/>	Life and Pensions Ltd	Whole Life Insurance	United Kingdom GAAP	Solo	General Measurement Model	USD	1	Draft	View	Failed
<input type="checkbox"/>	Annuities Ltd	Car Insurance	United States of America GAAP	Solo	General Measurement Model	USD	1	Draft	View	
<input type="checkbox"/>	Annuities Ltd	Term Life Insurance	Afghanistan GAAP	Solo	General Measurement Model	USD	1	Draft	View	
<input type="checkbox"/>	Bank New York	Car Insurance	Afghanistan GAAP	Solo	General Measurement Model	USD	1	Draft	View	
<input type="checkbox"/>	Life and Pensions Ltd	Whole Life Insurance	Anguilla GAAP	Solo	General Measurement Model	USD	1	Draft	View	

This window displays the existing sub-ledger definitions in the SubledgerDefinition pane. This window also enables you to define a new sub-ledger, edit the existing definitions, view the details of the existing definition, run the definitions, and create new versions of the existing definitions.

4.7.2 Search for Subledger Definitions

The Search feature enables you to filter the list of existing definitions and find the definitions that you require.

Figure 4-41 The Subledger Definition Search Results

Selected	Legal Entity	Line Of Business	GAAP Code	Run Type	Calculation Method	Accounting Currency	Latest Version	Latest Version Status	Version Details
<input type="checkbox"/>	Car Insurance	Car Insurance	Afghanistan GAAP	Solo	General Measurement Model	USD	1	Draft	View

To search for definitions, select the required items from the Legal Entity and Line Of Business fields, and click Search. The list of sub-ledger definitions in the Subledger Definition table is refreshed and the definitions that match your search criteria are displayed.

4.7.3 Map the Subledger Roles and Groups

Before you create Subledger definitions, perform the following user role and group mappings and approvals:

1. Log in as a System Administrator.
2. Navigate to Identity Management, then Security Management, then User Administrator, and then User Maintenance.
3. Add a new user definition. For more information, see the **User Maintenance** section in the [OFS Analytical Applications Infrastructure User Guide](#).
4. Log in as a System Authorizer.
5. Navigate to Identity Management, then Security Management, then User Administrator, and then User Authorization.
6. Authorize the user that you created in step 3. For more information about authorizing a user, see the User Authorization section in the [OFS Analytical Applications Infrastructure User Guide](#).
7. Log in as a System Administrator.
8. Navigate to Identity Management, then Security Management, then User Administrator, and then User User Group Map.
9. Map the user to the IIA Application Approver Group and IIA Application Analyst Group. For more information about mapping a user to a user group, see the **User User Group Map** section in the [OFS Analytical Applications Infrastructure User Guide](#).
10. Navigate to Identity Management, then Security Management, then User Administrator, and then User Group Role Map.
11. Map the User Group UGIIAANALYST to Sub Ledger Maker, and then map the User Group UGIIAAPPROVER to Sub Ledger Checker. For more information about mapping a user group, see the **User Group Role Map** section in the [OFS Analytical Applications Infrastructure User Guide](#).

12. Log in as a System Authorizer.
13. Authorize the mappings that you performed in step 11. For more information about authorizing a user, see the **User Authorization** section in the [OFS Analytical Applications Infrastructure User Guide](#).

 **Note:**

You can use the same user that you created in the preceding steps for performing actions in the Subledger Manual Adjustment feature.

4.7.4 Create New Subledger Definition

 **Note:**

When creating a Subledger definition with a Subledger Attribute, it can only be created with an Approved Subledger Attribute.

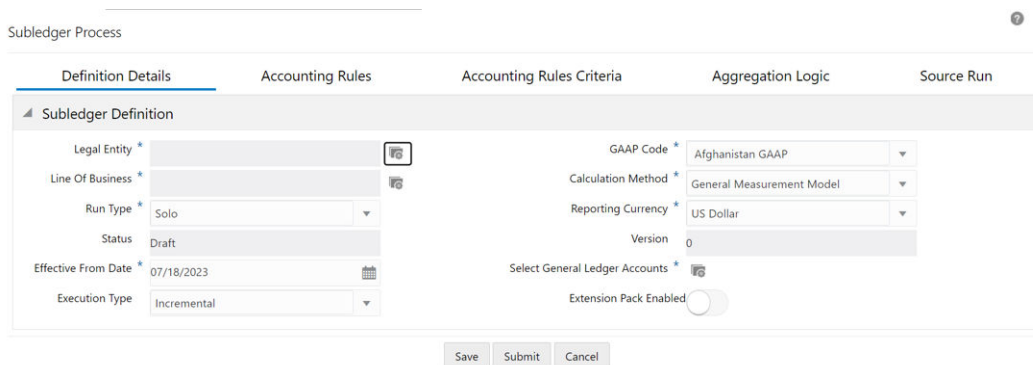
Perform the following steps to create new sub-ledger definitions:

 **Note:**

If you want to import definitions created by you, then see the Object Migration section in the [OFS Analytical Applications Infrastructure User Guide](#).

1. In the **Subledger Definition** pane, click **Add** to open the **Subledger Process** window.


Figure 4-42 The Subledger Process Window




Subledger Process

Definition Details Accounting Rules Accounting Rules Criteria Aggregation Logic Source Run


Subledger Definition

Legal Entity * 

Line Of Business * 

Run Type * Solo

Status Draft

Effective From Date * 07/18/2023 


Execution Type Incremental

GAAP Code * Afghanistan GAAP

Calculation Method * General Measurement Model

Reporting Currency * US Dollar

Version 0

Select General Ledger Accounts * 

Extension Pack Enabled

Save Submit Cancel

2. Populate the **Subledger Definition** pane in the **Definition Details** tab.

Table 4-10 The Subledger Definition pane

Field	Description
Fields marked with asterisks (*) in the window are mandatory.	
Legal Entity*	Click Hierarchy Selection adjacent to this field. Select the required Legal Entity from the Hierarchy Selection Window. For more information, see Hierarchy Selection .
GAAP Code*	Select a GAAPCode from the drop-down list.
Line of Business*	Click Hierarchy Selection adjacent to this field. Select the required Legal Entity from the Hierarchy Selection Window. For more information, see Hierarchy Selection .
Calculation Method	Select a calculation method from the drop-down list. The available methods are: <ul style="list-style-type: none"> • General Measurement Model • General Measurement Model Reinsurance • Long Duration Contracts • Premium Allocation Approach • Premium Allocation Approach Reinsurance • Variable Fee Approach
Status	This field is not editable and is in the Draft status when a Subledger Definition is being created.
Run Type	Select either Solo or Consolidated from the drop-down list.
Reporting Currency	Select a currency from the drop-down list.
Version	When creating a definition, the version is set to 0. You cannot change this value.
Effective From Date	Select an effective date from the Calendar icon.
Select General Ledger Accounts	Click Hierarchy Selection to select a value from the following fields: Note: You must create the members and hierarchies in the Member and Hierarchy Maintenance window to populate data in this field. For more information about creating members and hierarchies, see the OFS Analytical Applications Infrastructure User Guide . <ul style="list-style-type: none"> • Hierarchy Folder: Select a hierarchy folder from the drop-down. • Hierarchy: Select a hierarchy from the drop-down. • Members: Add or remove members from the Selected Members pane. By default, all accounts will appear in this list.

Table 4-10 (Cont.) The Subledger Definition pane

Field	Description
Execution Type	This feature enables the execution of Incremental or YTD runs as per the respective calculations and produces entries that are aligned with the CSM engine-generated disclosures. Select either <i>Incremental</i> or <i>YTD</i> from the drop-down list. Note: Once a definition is saved, the Execution Type cannot be changed
Extension Pack Enabled	When this feature is enabled, Liability Calculation definitions that were created with the Extension Pack feature enabled in the Liability Calculations screen will be available.

- Click **Save**.
- Select the **Accounting Rules** tab.

Figure 4-43 The Accounting Rules Tab

The screenshot shows the 'Subledger Process' window with the 'Accounting Rules' tab selected. The 'Import Accounting Rules' section contains the following fields:

- Legal Entity*: Life and Pensions Ltd
- Line Of Business*: Life Insurance
- Run Type*: Solo
- GAAP Code*: Afghanistan GAAP
- Calculation Method*: General Measurement Model
- Version: [dropdown]

An 'Import' button is located below the fields. At the bottom of the window, there are 'Save', 'Submit', and 'Cancel' buttons.

- Populate the **Import Accounting Rules** pane in the **Accounting Rules** tab.

Table 4-11 The Import Accounting Rules pane

Field	Description
Fields marked with asterisks (*) in the window are mandatory.	
Legal Entity*	Click the Hierarchy Selection adjacent to this field. Select the required Legal Entity from the Hierarchy Selection Window. For more information, see Hierarchy Selection .
GAAP Code*	Select a GAAP Code from the drop-down list.
Line of Business*	Click Hierarchy Selection adjacent to this field. Select the required Legal Entity from the Hierarchy Selection Window. For more information, see Hierarchy Selection .

Table 4-11 (Cont.) The Import Accounting Rules pane

Field	Description
Calculation Method*	Select a calculation method from the drop-down list. The available methods are: <ul style="list-style-type: none"> • General Measurement Model • General Measurement Model Reinsurance • Long Duration Contracts • Premium Allocation Approach • Premium Allocation Approach Reinsurance • Variable Fee Approach
Run Type*	Select either Solo or Consolidated from the drop-down list.
Version*	When creating a definition, the version is set to 0. You cannot change this value.

- On the **Accounting Rules** page, select the drop-down arrow to expand the table.

Figure 4-44 The Accounting Rules Tab with the Expanded Accounting Rules pane

The screenshot shows the 'Accounting Rules' pane in the 'Subledger Process' application. The pane is expanded to show a table with the following columns: Accounting Attributes, Debit Account, Debit Source Name, Credit Account, and Credit Source Name. The table contains 11 rows of accounting rules, with the first row highlighted in yellow. The first row is: 1. Account Settlement. The other rows are: 2. Acquisition cost paid during the year; 3. Assumption change impact on Investment Component; 4. Assumption change impact on withdrawal benefits; 5. CSM Interest Accretion; 6. CSM Release to Insurance Revenue; 7. CSM from Entity share; 8. Changes in financial assumptions - Favourable; 9. Changes in financial assumptions - Un-favourable; 10. Changes related to future services - Change In, Non-Financial Experience (Un-favourable); 11. Changes related to future services - Change In, Non-Financial Experience (Favourable).

- Populate the **Accounting Rules** pane.

Table 4-12 The Accounting Rules pane

Field	Description
Hide Empty Rows	Click Enable if you want to hide empty rows. When enabled, the empty rows in the Accounting Rules table are hidden.
Accounting Attributes	Select an attribute from the drop-down list.
Debit Account	Select a debit account from the drop-down list.
Debit Source Account	Select a credit account from the drop-down list.

Table 4-12 (Cont.) The Accounting Rules pane

Field	Description
Credit Account	Select a debit account from the drop-down list.
Credit Source Account	Select a credit account from the drop-down list.
Modify Accounts for Opposite Signage	Select this checkbox if you want to modify accounts for opposite signage.
Journal Comments	Enter the required journal comments for the sub-ledger.
Workflow Comments	Enter the required workflow comments for the sub-ledger.

The pane allows you to perform the following actions:

- Insert a new row before
 - Insert a new row after
 - Delete selected rows
 - Copy
 - Export the entries into an Excel spreadsheet that is automatically downloaded into your system.
8. If you want to view the information about the GL accounts and account attributes, in the upper-right corner of the table, click the icon to download the Excel file.
 9. Additionally, click **Export Accounting Rules** to download the Excel file on your system.
 - Fill the Excel file with the required data.
 - Copy the data from Excel and paste it into the respective columns in the **Copy Accounting Rules** pane.

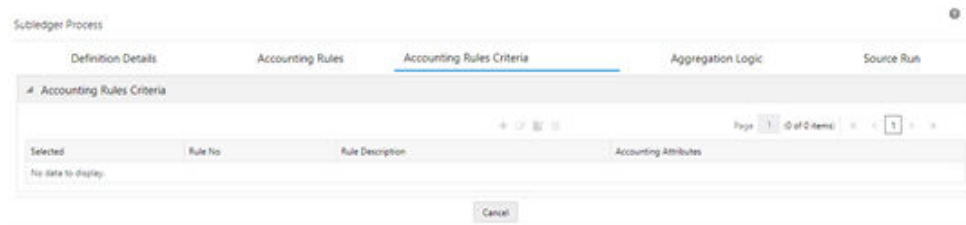
 **Note:**

You must ensure the following:

- The data in the columns in the application must exactly match the data as per the columns in the Accounting Rules Excel. If the rules data was not added correctly, then the system will give you a validation error and you must add the rules data correctly in the corresponding columns in the application.
- Your system must contain the same GL entries as per the entries in the Debit Account column in the Accounting Rules Excel. If you copy and paste a GL entry that your system does not contain from Excel into the Debit Account column in the application, then the system will not validate it.

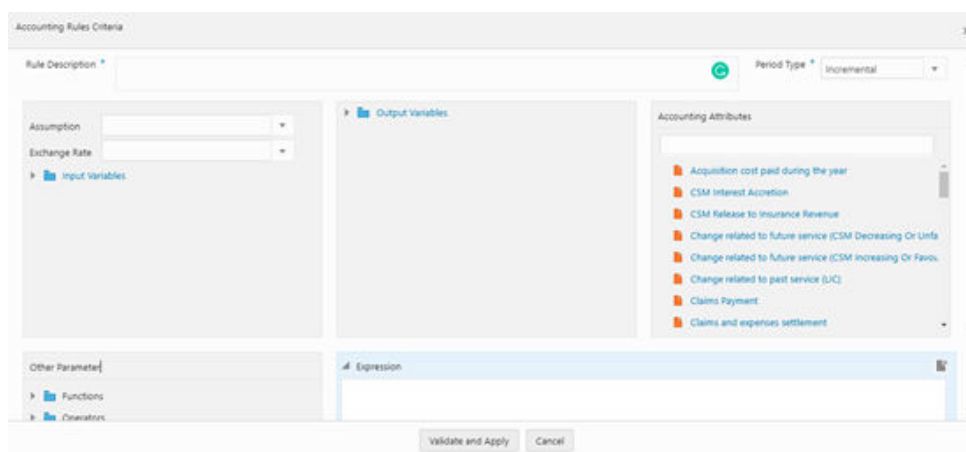
10. Click **Save**.
11. Click the **Accounting Rules Criteria** tab.

Figure 4-45 The Accounting Rules Criteria tab



12. Click **Add** to open the **Accounting Rules Criteria** Window.

Figure 4-46 The Accounting Rules Criteria Window



- a. In the **Assumptions** drop-down list, select an assumption. You can link an input variable to multiple assumptions for a single expression. The available options are:
 - Closing Position
 - Credit Risk
 - Current Accident Year Accident Period
 - Current Accident Year Prior Accident Period
 - Economic Assumptions
 - Economic Experience
 - Experience Adjustment – Lapse
 - Experience Adjustment – Morbidity
 - Experience Adjustment – Mortality
 - Experience Adjustment – Others
 - Future Inflation Assumption
 - Lapse Assumption
 - Market Volatility

- Morbidity Assumption
 - Mortality Assumption
 - New Business
 - Non Economic Assumptions
 - Non-Economic Experience
 - Opening Adjustment
 - Opening position
 - Other Future Assumptions
- b. In the **Period Type** drop-down list, select either *Incremental* or *YTD*.
- c. In the Input Variables pane, select the required input variables from the list to populate the Expression pane.
- d. In the Output Variables pane, select the required output variables from the list to populate the Expression pane.
- e. In the Accounting Attributes pane, select the required accounting attribute from the list to populate the Expression pane.
- f. In the Other Parameters pane, select the required functions and operators. The following are the available functions and operators:
- Functions
 - AND
 - ABS
 - Case
 - Floor
 - Greatest
 - Least
 - MOD
 - OR
 - Operators
 - Greater than
 - Plus
 - Minus
 - Less Than
 - Equal
- g. After you have built your Expression, click **Validate** and **Apply**.
13. Click **OK**.
The condition is added to the accounting attribute.

 **Note:**

A condition can be mapped to multiple attributes but an accounting attribute can be mapped only to a single condition. For example, you have created Condition A and Condition B. You have mapped Condition A to Accounting Attributes A1, A2, and A3. But the same accounting attributes cannot be mapped to Condition B.

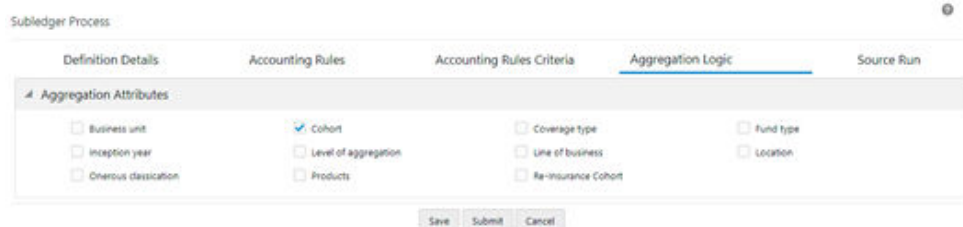
14. Click the **Aggregation Logic** tab.
The AggregationAttributes tab is displayed and contains the Cohort, Coveragetype, Inceptionyear, Levelofaggregation, Lineofbusiness, Location, Onerousclassification, and Productsattributes.

This tab allows you to aggregate the results and pass journal entries at a chosen consolidated level. Consolidated entries might give added insights into the impact of changes on the chosen grouping.

 **Note:**

Only those credit and debit general ledgers' total balances that are associated with an accounting attribute are checked and added to the journal entry. This ensures that only balanced journal entries are passed. If there is an imbalance between the accounting attributes, then the accounting attributes' general ledger balances will not be passed to the journal entries.

Figure 4-47 The Aggregation Logic Tab



Subledger Process

Definition Details Accounting Rules Accounting Rules Criteria **Aggregation Logic** Source Run

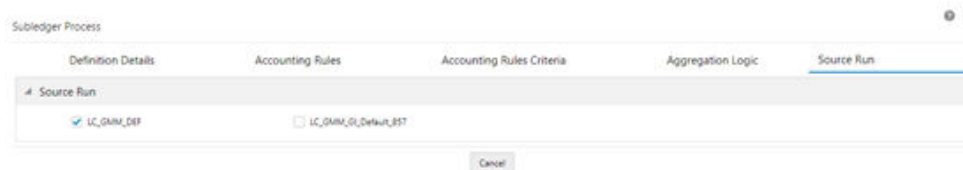
Aggregation Attributes

<input type="checkbox"/> Business unit	<input checked="" type="checkbox"/> Cohort	<input type="checkbox"/> Coverage type	<input type="checkbox"/> Fund type
<input type="checkbox"/> Inception year	<input type="checkbox"/> Level of aggregation	<input type="checkbox"/> Line of business	<input type="checkbox"/> Location
<input type="checkbox"/> Onerous classification	<input type="checkbox"/> Products	<input type="checkbox"/> Re-insurance Cohort	

Save Submit Cancel

15. Select the checkbox(s) adjacent to the required attributes.
16. Click **Save**.
17. Click the **Source Run** tab.

Figure 4-48 The Source Run Tab



Subledger Process

Definition Details Accounting Rules Accounting Rules Criteria Aggregation Logic **Source Run**

Source Run

<input checked="" type="checkbox"/> LC_GMM_DEF	<input type="checkbox"/> LC_GMM_GL_Defun_BST
--	--

Cancel

18. Select the required source runs. This is the list of CSM or Liability Calculation runs that have been executed. The source runs that appear in this tab, depending on

the values that you selected in the **Legal Entity, Line of Business, Calculation Method, Run Type**, fields in the **Definition Details** tab.

19. Click **Save**.
20. If you want to send it to the approver then click **Submit**.
After a subledger definition has been submitted for approval, you cannot modify any fields. You can modify the fields only if the Approver has rejected the Subledger Definition.

The **Audit Trail** pane at the bottom of the Definition window displays the **Created By, Creation Date, last modified by, and Last modification date details**. The **User Comments** field enables you to add additional information as a comment.

4.7.5 Edit a Subledger Definition

Perform the following steps to edit Subledger Definitions:

1. In the **Subledger Definition** table, select the checkbox adjacent to the subledger definition that you want to edit.
2. Click **Edit**, to open the **Subledger Process** window.
3. Update the required fields. For more information, see [Create a New Subledger Definition](#).
4. Click **Save**.
The saved definition is displayed in the Subledger Definition table on the Subledger Definition Summary window.

The **Audit Trail** pane at the bottom of the Definition window displays the **Created By, Creation Date, last modified by, and Last modification date details**. The **User Comments** field enables you to add additional information as a comment.

4.7.6 View a Subledger Definition

Perform the following steps to view Subledger Definitions:

1. In the **Subledger Definition** Window, select the checkbox adjacent to the Subledger Definition that you want to view.
2. Click **View**, to open the **Subledger Process** window.
3. Click **Cancel** to go back to the **Subledger Definition** window.

4.7.7 Execute a Subledger Definition

Perform the following steps to execute subledger definitions:

1. In the Subledger Definition table, select the checkbox adjacent to the Subledger Definition that you want to run.
2. Click **Run**, to open the **Execute** window.

Figure 4-49 The Execute Window

3. In the **Date Selection** window, click the **Calendar** icon and select a date.
4. In the **Version no** field, enter a version of the definition that you want to execute.
5. In the **Execution Description** field, enter a description.
6. Click **Execute**.
The selected Subledger Definition is marked for execution.

4.7.8 View a Subledger Error Log

The Subledger Error Logs can be viewed from the **Batch Monitor** screen from **Common Object Maintenance** and the **Subledger Definition Summary** page. To view the Subledger Error Log from the **BatchMonitor** screen, see the [OFS Analytical Applications Infrastructure User Guide](#). Perform the following steps to view Subledger Error Logs from the **Subledger Definition Summary** page:

1. On the **Subledger Definition Summary** page, in the **Run Status** column, select the status link corresponding to the sub-ledger definition that you want to view the error log for. The **View Logger** window appears.

Figure 4-50 The View Logger Window

2. Click the **Log File** drop-down list to select a log file.
3. Click **View Log** to populate the **Log File Components** pane.
4. Additionally, you can click **Download** if you want to download the selected log file.
5. Click **Close** to go back to the **Subledger Definition** window.

4.7.9 Finalize a Subledger Run

Finalizing a Subledger Run enables you to conclude the journal entries of the Associated Base Run and Manual Adjustment Run. You cannot finalize a run more than once. Finalization of a Subledger Run is done sequentially in the application, that is, only when the prior year's run is finalized, then only can the current year's Subledger Run be finalized. Before finalizing a Subledger Run; run the base Subledger and approve it, then approve and run the Subledger Manual Adjustment (if any), then finalize the approval through the maker and checker process. Note that a Subledger Manual Adjustment Definition can only be modified before the run is finalized.

To finalize a Subledger run from the Subledger Definition Summary window, perform the following steps:



Note:

You cannot finalize a Subledger Run that contains imbalanced journals.

1. Log in as a Maker.
2. In the **Subledger Definition** table, select the Subledger Definition that you want to send for approval to finalize.

Figure 4-51 The Subledger Definition pane

Selected	Legal Entity	Line Of Business	GAAP Code	Run Type	Calculation Method	Accounting Currency	Latest Version	Latest Version Status	Version Details
<input type="checkbox"/>	Car Insurance	Car Insurance	Afghanistan GAAP	Solo	General Measurement Model	USD	1	Draft	View

3. In the **Version Details** column, click **View** to open the **Version Details** pane.

Figure 4-52 The Version Details pane

Version Number	Effective From	Effective To	Status	Created By	Created Date	Approved By	Approved Date	Number of Executions	View / Modify
1	01-Apr-2020	01-Jan-9999	Draft	HATEST	21-May-2020			0	View / Edit

- In the Number of Executions column, click the link to open the Finalize pane. The number in the Number of Executions column corresponds to the number of source runs that you selected in the Source Run Tab of the Subledger Process page. The Run is picked from the most recent FIC MIS date.

Figure 4-53 The Finalize pane

Selected	Execution ID	Source Run	Execution Description	As Of Date	Status	Finalize Status
<input type="checkbox"/>	OFSINFODOM_SLAcc_1_202520_20200630_1		OFSINFODOM_SLAcc_1_202520_20200630	30-Jun-2020	Draft	No

Page 1 of 1 (1 of 1 items)

- In the Selected column, select the check box adjacent to the sub-ledger to run that you want to send for approval, and then click **Submit**. The selected Subledger Run is sent for approval.
- After the Subledger Approver has approved the Subledger Run for finalization, repeat steps **2**, **3**, and **4**.
- In the Selected column, select the check box adjacent to the Subledger to run that you want to finalize, and then click **Finalize**. A message appears, confirming that the version was successfully finalized. You can also download the .txt file containing the imbalanced journals for a selected date.

4.7.10 Create a New Version of the Subledger Definition

Perform the following steps to create a new version of an existing Subledger Definition:

- In the **Subledger Definition** table, select the checkbox adjacent to the Subledger Definition that you want to edit.
- Click **New Version**, to open the **Subledger Process** window.

Note:

You can create new versions only for the Approved definitions.

- Update the required fields. For more information, see [Create New Subledger Definition](#).
- Click **Save**. The saved definition is displayed in the Subledger Definition table of the Subledger Definition Summary window.

4.7.11 Delete a Subledger Definition

Perform the following steps to delete a Subledger Definition:

Note:

A Subledger definition can only be deleted when the definition is in the Draft or Rejected or Pending for Approval state.

1. In the Subledger **Definition Summary** table, select the checkbox adjacent to the Subledger Definition that you want to view.
2. Click **Delete**.
3. Click **Yes**.

The selected Subledger Definitions are deleted.

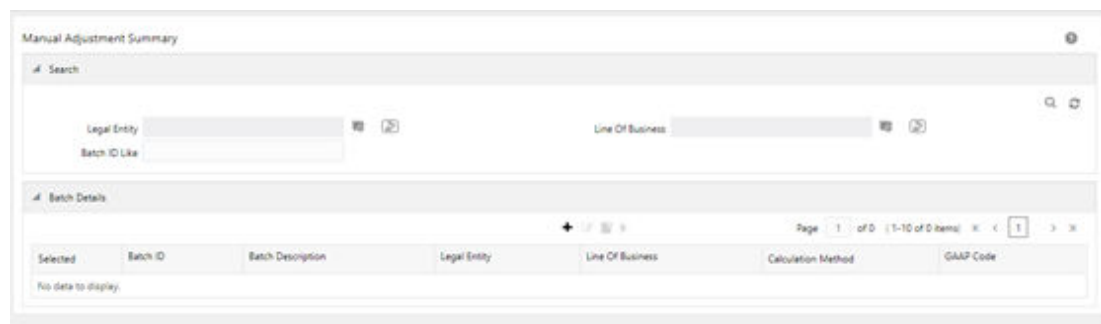
4.8 Subledger Manual Adjustment

The SubledgerManualAdjustment enables you to update the batch details of approved Subledger Definitions. Complete all the Manual Adjustment tasks before finalizing a Subledger Definition as a Subledger Manual Adjustment definition can only be modified before the run is finalized.

4.8.1 Access Subledger Manual Adjustment

You can access the **Subledger Manual Adjustment** window by clicking the **Subledger Manual Adjustment** element from the left-hand side menu. When you click this element, the **Manual Adjustment Summary** window is displayed:

Figure 4-54 The Manual Adjustment Summary Window



This window displays the existing Subledger Manual Adjustment definitions in the Batch Details table. This window also enables you to define the new Subledger Manual Adjustment Definition, edit the existing definitions, view the details of the existing definition, and run the definitions.

4.8.2 Search for Subledger Manual Adjustment Definitions

The Search feature enables you to filter the list of existing definitions and find the definitions that you require. To search for definitions, enter the required keywords in the Legal Entity, Line Of Business, and Batch ID Like fields, and click **Search**.

The list of subledger manual adjustment definitions in the Batch Details table is refreshed and the definitions that match your search criteria are displayed.

4.8.3 Create New Subledger Manual Adjustment Definition

Perform the following steps to create new subledger manual adjustment definitions:

1. In the **Subledger Manual Adjustment** table, click **Add**, to open the **Subledger Manual Adjustment** window.

Figure 4-55 The Subledger Manual Adjustment Window



2. Populate the **Subledger Definition Details** pane.

Table 4-13 The Subledger Definition Details pane

Field	Description
Fields marked with asterisks (*) in the window are mandatory.	
Hierarchy Folder	Select a folder from the drop-down list.
Legal Entity	Click Hierarchy Selection adjacent to this field. Select the required Legal Entity from the Hierarchy Selection window. For more information, see Hierarchy Selection .
Line of Business	Click Hierarchy Selection adjacent to this field. Select the required Legal Entity from the Hierarchy Selection window. For more information, see Hierarchy Selection .
GAAP Code	Click the drop-down list adjacent to this field and select a GAAPCode.
Calculation Method	Click the drop-down list adjacent to this field. The available methods are: <ul style="list-style-type: none"> • General Measurement Model • Long Duration Contracts • Premium Allocation Approach • Variable Fee Approach
Run Type	Click the drop-down list adjacent to this field and select the option either Solo or Consolidated.

3. Click the **Search** icon.
4. Click the drop-down list adjacent to the **Reporting Currency** field and select a currency.
5. Click the drop-down list adjacent to the **Status** field and select a status.

6. Click the **calendar** icon adjacent to the **FIC MIS Date** field and select a date from the calendar.
All the executions performed on the selected date are displayed in the ExecutionID dropdown.
7. Click the drop-down list adjacent to the **Execution ID** field and select an execution ID.
8. Click **Submit**.
9. Click **Save**.

4.8.4 Edit a Subledger Manual Adjustment Definition

Perform the following steps to edit subledger manual adjustment definitions:

1. From the **Batch Details** table, select the checkbox adjacent to the Subledger Manual Adjustment definition you want to edit.
2. Click **Edit**. To open the **Subledger Manual Adjustment** window.
3. Update the required fields. For more information, see [Create a New Subledger Manual Adjustment Definition](#).
4. Click **Save**.
The saved definition is displayed in the Batch Details table on the Manual Adjustment Summary window.

4.8.5 View a Subledger Manual Adjustment Definition

Perform the following steps to view subledger manual adjustment definitions:

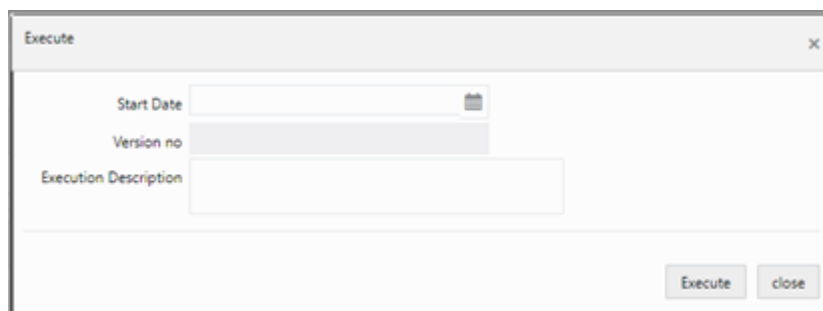
1. In the **Batch Details** Window, select the checkbox adjacent to the Subledger Manual Adjustment definition that you want to view.
2. Click **View** to open the **Subledger Manual Adjustment** window.
This window displays the aggregation attributes and accounting rules details as well.
3. Click **Cancel** to go back to the **Batch Details** window.

4.8.6 Run Subledger Manual Adjustment Definition

Perform the following steps to run Subledger Manual Adjustment definitions:

1. In the **Batch Details** table, select the checkbox adjacent to the Subledger Manual Adjustment.
2. Click **Run**.

Figure 4-56 The Execute Window



The screenshot shows a window titled "Execute" with a close button (X) in the top right corner. The window contains three input fields: "Start Date" with a calendar icon, "Version no" with a dropdown arrow, and "Execution Description" with a text area. At the bottom right, there are two buttons: "Execute" and "close".

3. In the **Execution** window, enter the start date in the **Start Date** field.
4. In the **Execution Description** field, enter a description.
5. Click **Execute**.
The selected Subledger Manual Adjustment definition is marked for execution.

5

Oracle Insurance Accounting Analyzer Reports

The Oracle Financial Services Insurance Accounting Analyzer Application includes pre-packaged reports, which cater to disclosure requirements under IFRS 17. It also includes reports, which are created to help management in strategic decisions. All the disclosure reports can be exported to different formats like PDF, CSV, Excel, and so on. Dedicated Disclosure Reports

The IFRS 17 guidelines lay specific emphasis on the disclosure of key financial data while keeping the scope open on what constitutes an appropriate disclosure. The Application has a range of disclosure reports to track the Movement Analysis, Reconciliations, and Statement of Accounts. For detailed information on the reports in the application, see the Oracle Insurance Accounting Analyzer Reports document on [MOS](#).

6

Annexure – Technical Details

This section contains information about the technical details of the Oracle Insurance Accounting Analyzer Application.

6.1 Discounting Engine Interest Rates Decimal Values

When computing interest rates in the discounting engine, the Excel used for computing the interest rates contains a precision of 15 places after the decimal. However, the application stores the value with a precision of 6 places after the decimal.

For example;

The value of the interest rate in your Excel is 0.233294437146026, however, the application will store this value as 0.233294.

6.2 Discounting Engine Cash Flows Decimal Values

When computing Cash Flows in the discounting engine, the Excel used for computing the cash flows contains a precision of 15 places after the decimal. However, the application computes the values with a precision of 31 places after the decimal.

For example;

For a Cash Flow amount of 591032.98, if the discounting is done for 6 months considering the rate for every term as 0.233294, the discounted value calculated by the application will be 582827.0470511801010228550497950952 whereas the value calculated in excel will be 582827.0457552210000.

Hence, for a sufficiently large value of Cash Flow amount, there might be a difference in Excel calculated value and the value calculated by the application

7

Viewing the Logging Details for Discounting Engine

After you perform any action in the discounting engine or the liability calculations, all the logging details are stored in, the FSI_IIA_DEBUG_MESSAGE_LOG table in the atomic schema and you can view the logging details. The following are the logging details for this process:

- **Log File Name** : DISCOUNTING_[INFODOM NAME]_INPUT_VARIABLE_CALC_[LC OBJECT_ID]_[EXECUTION_DATE]_1_Task1
- **Log File Path** : /scratch/ofsaifrs/OFSAHOME/ftpshare/logs
(This path is configured by using the OFSAALogger.xml file that is present in the \$FIC_DB_HOME/conf directory)

You can also view or download the Log File by navigating to Common Object Maintenance, then Operations, and then Batch Monitor.

8

Create the Distribution Channel Members

Navigate to **CommonObjectMaintenance**, select **DimensionManagement**, and then select **Member** to open the **Members** Page. Create members for the *DistributionChannel* Dimension by selecting the **Insurance Distribution Channel** Dimension by clicking the Hierarchy icon adjacent to the **Dimension** Field. For more information on creating a Member Definition, see the **Adding Member Definition** Section in the [OFS Analytical Applications Infrastructure User Guide](#).

9

List of Financial Element Types and Codes

This section provides a list of the financial element types that are available in the **Oracle Insurance Accounting Analyzer** application. For more information, see the [Create a New Variable](#) section.

- Acquisition Cash Flow Asset Derecognition - 1 to 2 years
- Acquisition Cash Flow Asset Derecognition - 10 years and above
- Acquisition Cash Flow Asset Derecognition - 2 to 3 years
- Acquisition Cash Flow Asset Derecognition - 3 to 4 years
- Acquisition Cash Flow Asset Derecognition - 4 to 5 years
- Acquisition Cash Flow Asset Derecognition - 5 to 10 years
- Acquisition Cash Flow Asset Impairment
- Acquisition Cash Flow Asset Movement
- Acquisition Cash Flow Asset Recognition
- Actual Coverage Unit
- Actual Incurred Claim Expenses
- Actual Incurred Claims
- Actual Incurred Claims Expenses Payment Current Period
- Actual Incurred Claims Expenses Payment Prior Period
- Actual Incurred Claims Expenses Prior Period
- Actual Incurred Claims Payment Current Period
- Actual Incurred Claims Payment Prior Period
- Actual Incurred Claims Prior Period
- Actual Reinsurance Coverage Unit
- Additional Liability
- Additional Reserve
- Adjustment Amount AL
- Adjustment Amount Future Benefit
- Adjustment Amount Net Prem
- Adjustment Amount PAB
- Adjustment Amount SAB
- Amortized Acquisition Cost
- Annuity Payout
- Assumed Incurred Claim Expense

-
- Assumed Incurred Claims
 - Assumed Payout Incurred Claim Expense
 - Assumed Payout Incurred Claims
 - Bonus
 - CSM
 - Carry Over Transition Estimate
 - Cash Surrender Value
 - Claim Related Expenses
 - Claims Outstanding
 - Commission Refund
 - Contractual Face Value
 - Coverage Unit
 - Credit Rate
 - Current Reinsurance Claims Expenses Recoverable End Of Reporting Period Non Performance Risk
 - Current Reinsurance Claims Expenses Recoverable Point Of Incurrence Non Performance Risk
 - Current Reinsurance Claims Expenses Recoverable Start Of Reporting Period Non Performance Risk
 - Current Reinsurance Claims Recoverable End Of Reporting Period Non Performance Risk
 - Current Reinsurance Claims Recoverable Point Of Incurrence Non Performance Risk
 - Current Reinsurance Claims Recoverable Start Of Reporting Period Non Performance Risk
 - Deferred Profit Liability
 - Earned Premium
 - Entity Remuneration
 - Estimated Liability
 - Estimated Losses
 - Estimated cash Inflow
 - Excess Payout
 - Expense Charges
 - Fair Value
 - Finance Expense
 - Finance Income
 - Future Benefit
 - General Claim Payout
 - General Claims

- Gross Premium
- Incurred Claims Current Period
- Incurred Claims Expenses Current Period
- Incurred Claims Expenses Prior Period
- Incurred Claims Prior Period
- Initial Expense
- Investment Income
- Investment-Linked Insurance Event Payout
- Investment Linked Maturity Payout
- Investment Linked Payout
- Investment Linked Withdrawal Payout
- Maintenance And Fixed Expense
- Market Risk Benefit
- Maturity Payout
- Morbidity Charges
- Morbidity Claim Payout
- Mortality Charges
- Mortality Claim Payout
- Net Amount At Risk
- Net Premium
- Option and Guarantee Cost
- Other Charges
- Policy Cancellation
- Policyholder Account Balance
- Premium Received
- Premium Refund
- Prior Reinsurance Claims Expenses Recoverable End Of Reporting Period Non Performance Risk
- Prior Reinsurance Claims Expenses Recoverable Point Of Incurrence Non Performance Risk
- Prior Reinsurance Claims Expenses Recoverable Start Of Reporting Period Non Performance Risk
- Prior Reinsurance Claims Recoverable End Of Reporting Period Non Performance Risk
- Prior Reinsurance Claims Recoverable Point Of Incurrence Non Performance Risk
- Prior Reinsurance Claims Recoverable Start Of Reporting Period Non Performance Risk
- Profit Sharing
- Recoveries
- Reinsurance Ceding Commission

- Reinsurance Claim Recoverable
- Reinsurance Claims Handling Expenses Recoverable
- Reinsurance Claims Handling Expenses Recoverable Prior Period
- Reinsurance Claims Handling Expenses Recovery
- Reinsurance Claims Handling Expenses Recovery Prior Period
- Reinsurance Coverage Unit
- Reinsurance Credit Risk
- Reinsurance Expense
- Reinsurance Fair Value
- Reinsurance Impairment
- Reinsurance Incurred Claims Expenses Prior Period
- Reinsurance Investment Component
- Reinsurance Premium
- Reinsurance Premium Allocated
- Reinsurance Premium Ceded
- Reinsurance Profit Commission
- Reinsurance Recoverable Prior Period
- Reinsurance Recovery Current Period
- Reinsurance Recovery Prior Period
- Reinsurance Risk Adjustment
- Reinsurance Risk Adjustment For Incurred Claims
- Reinsurance Risk Adjustment For Prior Claims
- Reserve
- Return On Policyholder Fund
- Risk Adjustment
- Risk Adjustment For Incurred Claims
- Risk Adjustment Incurred Claim Current Period
- Risk Adjustment Incurred Claim Prior Period
- Risk Margin
- Risk Margin For Incurred Claims
- Sales Inducement Cost
- Separate Account Balance
- Shareholder Remuneration
- Surrender Charges
- Surrender Payouts
- Tax Payable
- Top Up Premium

- Unit Fund Return

10

Increasing the Cohort ID length

If you want the cohort ID to accept more than 20 characters, you must manually increase the column length in the following tables and columns.

Erwin Data Model Tables and Columns

You must manually increase the column length in the following tables and columns in the Erwin data model. You must also upload the Erwin data model after you make these changes.

Table 10-1 The Tables and Column names to be altered in the Erwin data model:

Table	Column
stg_ins_cohort_assumed_cfs	v_ri_cohort_id
stg_ins_cohort_actuials	v_ri_cohort_id
FSI_RI_GROUP_INPUT_DETAIL	v_ri_group_code
stg_ins_group_dimension_map	v_ri_group_code
stg_ins_group_dimension_map	V_GROUP_CODE
stg_cohort_master	V_COHORT_ID
dim_cohort	V_COHORT_ID
fsi_ins_group_input_detail	GROUP_CODE
fsi_ri_group_input_detail	GROUP_CODE
STG_INS_COHORT_ASSUMED_CFS	V_COHORT_ID
STG_INS_COHORT_ACTUALS	V_COHORT_ID

Script Tables and Columns

You must manually increase the column length in the following tables and columns in the script:

Table 10-2 The Tables and Column names to be altered in the Erwin Data Model

Table	Column
FSI_IFRS17_GROUP_OUTPUT	GROUP_CODE
fsi_ifrs17_group_projections	GROUP_CODE
FSI_IFRS17_GROUP_ONEROUS_DTLS	GROUP_CODE
FSI_IFRS17_RI_GROUP_ONEROUS	GROUP_CODE
FSI_IFRS17_RI_GROUP_OUTPUT	GROUP_CODE
fsi_ins_group_cash_flows	group_id
fsi_ins_group_cash_flows	RI_GROUP_ID

11

References

This section covers the reference topics.

11.1 Hierarchy Selection

When you have selected the FilterType as Hierarchy, define the Filter conditions by doing the following in the HierarchySelection window:

1. From the drop-down list, select the required Dimension.
2. From the drop-down list, select the associated Hierarchy. In the **Hierarchy More** window. You can click **More** to search for a specific Hierarchy.
3. Select any combination of rollup points and leaf (last descendant child) values.
4. In the **New - Filter Details** window you can perform the following:

Table 11-1 The Icons in the New-Filter Details Window


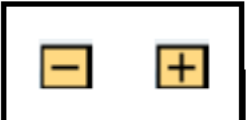
Field	Description
<p>Figure 11-1 Search Icon</p> 	Click this button to search for a hierarchy member using Dimension Member Alphanumeric Code, Dimension Member Numeric Code, Dimension Member Name, or Attribute and by keying in Matching Values in the Search dialog.
<p>Figure 11-2 Expand or Collapse</p> 	Use these icons to expand or collapse the members under a node.

Table 11-1 (Cont.) The Icons in the New-Filter Details Window

Field	Description
-------	-------------

Figure 11-3 Expand or Collapse a Branch

Use these icons to expand a branch or collapse a branch.



Figure 11-4 Focus or Unfocus a Node

Use these icons to focus or unfocus a selected node except the root node.



Figure 11-5 Toggle

Use these icons to toggle the display of NumericCode or Alphanumeric code at the left of the nodes, right of the nodes, or to hide.



- Use the following buttons to select or deselect the members:

Table 11-2




Field	Description
-------	-------------

Figure 11-6 Move icon

Move the selected members to the **Selected Members** pane.



Table 11-2 (Cont.)

Field	Description
Figure 11-7 Move All icon 	Move all the members to the Selected Members pane.
Figure 11-8 Deselect 	Deselect a member selected in the Selected Members pane.
Figure 11-9 Deselect All 	Deselect all the selected members.

-
6. Click **OK** to save the member selection.

12

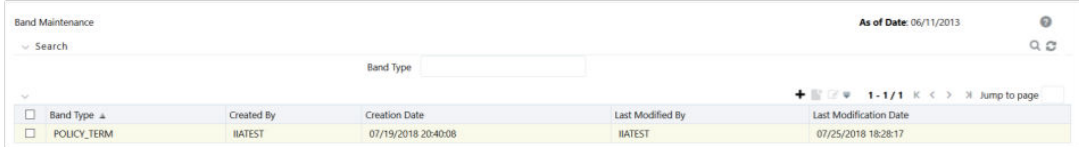
Band Maintenance

This section covers the following topics:

12.1 Access Band Maintenance

You can access the BandMaintenance window by clicking the **Band Maintenance** element under the **Common Object Maintenance** menu from the left-hand side menu. When you click this element, the **Band Maintenance** window appears:

Figure 12-1 The Band Maintenance Window



Band Type	Created By	Creation Date	Last Modified By	Last Modification Date
POLICY_TERM	IIATEST	07/19/2018 20:40:08	IIATEST	07/25/2018 18:28:17

This window displays the existing **Band Type** definitions with the details such as Band Type, Created By, Creation Date, Last Modified By, and Last Modification Date Calculation definitions in the Band Maintenance pane. This window also enables you to define new Band Definition, edit the existing definitions, and view the details of the existing definitions.

12.2 Search for Band Definitions

The **Search** feature enables you to filter the list of existing definitions and find the definitions that you require. To search for definitions, enter the keyword in the **Band Type** field and click Search.

The list of Band Type definitions in the **Band Maintenance** table is refreshed and the definitions that match your search criteria appear.

12.3 Create a New Band Definition

Perform the following steps to create a new Band definition, perform following steps:

1. From the **Band Type** table, click **Add**, to open the **Band Dimension Definition** window.

Figure 12-2 The Band Dimension Definition Window

2. Click the drop-down list adjacent to the **Band Type** field and select a Band Type from the available list.
3. Enter the Band Range by clicking **Add** in the **Band Range Details** table.
4. Enter the **From and To** values for all the band ranges. You can optionally enter descriptions for all the ranges. You can also select the checkbox adjacent to a Band Range and click **Delete** to remove an existing Band Range.
5. Click **Save** to save the definition. The saved definition is displayed in the BandMaintenance table of the BandMaintenance Window.

The Audit Trail pane at the bottom of the definition window displays the Created By, Creation Date, last modified by, and Last modification date details. The User Comments field enables you to add additional information as a comment.

12.4 Edit Band Definition

Perform the following steps to edit an existing Band definition:

1. Select the check box adjacent to the Band definition you want to edit, from the **Band Maintenance** table.
2. Click **Edit** to open the **Band Maintenance** window.
3. Update the required fields. For more information, see [Create a New Band Definition](#).
4. Click **Save** . The saved definition is displayed in the BandMaintenance table of the BandMaintenance window.
- 5.

The Audit Trail pane at the bottom of the definition window displays the Created By, Creation Date, last modified by, and Last modification date details. The User Comments field enables you to add additional information as a comment.

12.5 View Band Definition

Perform the following steps to view an existing Band definition:

1. Select the checkbox adjacent to the Band definition you want to view, from the **Band Maintenance** table.
2. Click **View**.
The **Band-View** window is displayed with the definition details.

 **Note:**

You cannot edit any of the fields in *View* mode.

13

Dimension Management

Dimension Management within the Infrastructure system facilitates you to categorize data into a single object as a Member; define levels and aggregate data to form the Hierarchy, and distinguish each member by defining the required Attributes. For detailed information about dimension management, see the section on DimensionManagement in the [OFS Analytical Applications Infrastructure User Guide](#).

13.1 Access Dimension Management

You can access the **Dimension Management** window by selecting it under the **Common Object Maintenance** menu from the left pane of the application.

13.2 Adding a Member Definition

You can add a member to a dimension by providing it with either a numeric or an alphanumeric code. If you are providing an alphanumeric code, then see the **Adding Member Definition** section in the [OFS Analytical Applications Infrastructure User Guide](#).

13.3 Map the Financial Element or Transaction Type to the Cash Flow Type

Mapping the Financial Element or the Transaction Type to the Cash Flow Type is a prerequisite task before you can execute the Data Loader batch to move assumed Cash Flows and actual transaction data of policies or cohorts to the processing tables.

You can either use the pre-configured dimension member of the Cash Flow type or create your own. For more information, see the section on Dimension Management in the [OFS Analytical Applications Infrastructure User Guide](#).

13.3.1 Map the Financial Element to the Cash Flow Type

Perform the following steps to map the financial element to the cash flow type:

1. Navigate to **Common Object Maintenance**, select **Dimension Management**, and then select **Member**.
2. Click **Add**.
3. In the **Dimension** drop-down, select **Financial Element**.
4. Enter values in the **Alphanumeric Code**, **Numeric Code**, and **Name** fields. Additionally, you can also select the **Generate Code** icon to automatically generate a unique numeric code.
5. In the **Member Attributes** field, in the **Cash flow** type drop-down, select the required member attribute.
6. Click **Save**.

13.3.2 Map the Transaction Type to the Cash Flow Type

Perform the following steps to map the transaction type to the cash flow type:

1. Navigate to **Common Object Maintenance**, select **Dimension Management**, and then select **Member**.
2. Click **Add**.
3. In the **Dimension** drop-down, select **Transaction Type**.
4. Enter values in the **Alphanumeric Code**, **Numeric Code**, and **Name** fields. Additionally, you can also select the **Generate Code** icon to automatically generate a unique numeric code. For more information, see [Oracle Financial Services Analytical Applications Infrastructure User Guide](#).
5. In the **Member Attributes** field, in the **Cash Flow Type** drop-down, select the required member attribute.
6. Click **Save**.

14

Batch Execution

Batch Execution refers to the process of initiating a Batch for current processing. When you submit a batch for execution, a series of commands are sent to the database concerning the defined component parameters. This, in turn, returns an array of update counts (required value definitions) when the commands are executed successfully. For detailed information about batch executions, see the section on BatchExecution in the [OFS Analytical Applications Infrastructure User Guide](#).

This chapter contains information about how to run or execute the batches required in the Oracle Insurance Accounting Analyzer Application.

14.1 Access Batch Execution

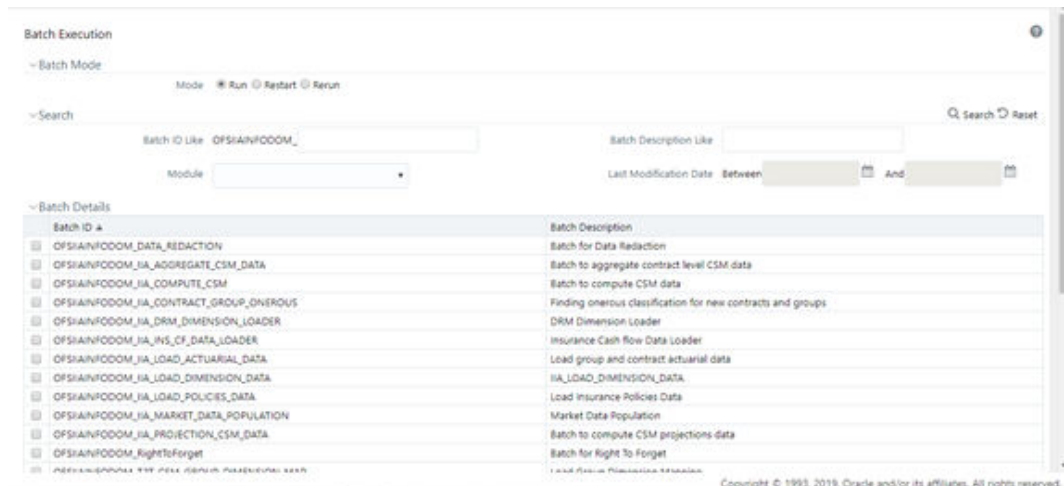
You can access the **Batch Execution** window by navigating to **Common Object Maintenance**, selecting **Operations**, and then selecting **Batch Execution** from the left- pane of the Oracle Insurance Accounting Analyzer Application.

14.2 Run or Execute the Batches

Perform the following steps to execute a batch in the BatchExecution window:

1. In the **Batch Mode** pane, select **Run** to open the **Batch Details** pane.

Figure 14-1 The Batch Details pane



2. Select the checkbox adjacent to the Batch ID that has to be executed. You must execute the following batches in the sequence specified in the following table:

Table 14-1 The Sequence to execute the Batches


Execution Order	Run Name or Batch Id
1	<INFODOM>_IIA_DRM_DIMENSION_LOADER
2	<INFODOM>_IIA_LOAD_DIMENSION_DATA After you load this batch, to map the insurance scenario number used in your STG table to the required insurance scenario type, you must perform the following steps: <ol style="list-style-type: none"> a. Navigate to Common Object Maintenance, select Dimension Management, and then Member. b. In the Dimension drop-down, select Insurance Scenario and then click Edit.
	<p>Figure 14-2 Example of the Insurance Scenario dimension screen</p>  <p>The screenshot shows a web interface for editing a dimension. It includes a 'Member Attributes' section with a table containing 'Insurance Scenario Type' and a 'Save' button.</p>
3	<INFODOM>_IIA_FISCAL_PERIOD_DATA_LOADER This batch moves the data into DIM_FISCAL_PERIODS from FSI_FISCAL_PERIOD_SETUP.
4	<INFODOM>_T2T_CSM_GROUP_DIMENSION_MAP
5	<INFODOM>_IIA_INS_CF_DATA_LOADER
6	<INFODOM>_IIA_LOAD_POLICIES_DATA
7	<INFODOM>_IIA_MARKET_DATA_POPULATION

Table 14-1 (Cont.) The Sequence to execute the Batches

Execution Order	Run Name or Batch Id
8*	<INFODOM>_INPUT_VARIABLE_CALC_<LIABILITY_CALCULATION_ID> This batch only appears in the Batch Execution screen once a Liability Calculation Definition is created in the application.
9*	<INFODOM>_IIA_CALCULATION_<LIABILITY_CALCULATION_ID> This batch only appears in the Batch Execution screen once a Liability Calculation Definition is created in the application.

 **Note:**

If your template contains multiple FIC_MIS_DATES, then the batches <INFODOM>_INPUT_VARIABLE_CALC_<LIABILITY_CALCULATION_ID> and <INFODOM>_IIA_CALCULATION_<LIABILITY_CALCULATION_ID> must be executed in the following sequence:

- For the first FIC_MIS_DATE, execute the <INFODOM>_INPUT_VARIABLE_CALC_<LIABILITY_CALCULATION_ID> batch and then the corresponding FIC_MIS_DATE <INFODOM>_IIA_CALCULATION_<LIABILITY_CALCULATION_ID> batch.
- If the OFS PFTI application has been installed, then for the first FIC_MIS_DATE, execute the <INFODOM>_INPUT_VARIABLE_CALC_<LIABILITY_CALCULATION_ID> and then trigger the allocation rule for the same FIC_MIS_DATE
- For the second FIC_MIS_DATE, execute the second FIC_MIS_DATE <INFODOM>_INPUT_VARIABLE_CALC_<LIABILITY_CALCULATION_ID> batch and then execute corresponding second FIC_MIS_DATE <INFODOM>_IIA_CALCULATION_<LIABILITY_CALCULATION_ID> batch.
- If the LC contains versions, the original batch is applicable for both (<INFODOM>_INPUT_VARIABLE_CALC_<LIABILITY_CALCULATION_ID> and <INFODOM>_IIA_CALCULATION_<LIABILITY_CALCULATION_ID>) all versions.

3. In the **Batch Details** pane, click **Schedule Batch** to define a new batch or modify a pre-defined **Batch Schedule**.
For more information, see the **Batch Scheduler** section in the [OFS Analytical Applications Infrastructure User Guide](#).
4. In the **Task Details** toolbar, click **Exclude** or **Include** to exclude or include a task, or click **Hold** or **Release** to hold or release a task before executing the batch.
For more information, see the **Modify Task Definitions of a Batch** section in the [OFS Analytical Applications Infrastructure User Guide](#).

5. Specify the **Information Date** (mandatory) by clicking the **calendar** icon. The specified date is recorded for reference.

 **Note:**

You can also modify the required task parameters of the selected Batch and include the changes during the Batch Rerun. For more information, see the Specify Task Details in the [OFS Analytical Applications Infrastructure User Guide](#).

6. Click **Execute Batch** and then select **OK** to confirm the batch execution. An information dialog appears indicating that the batch execution was successful. Repeat steps 2 to 6 for all the batches mentioned in step 2.

15

Chapter 1