
Format of the Appointed Actuary's Report for Long-Term Insurance Business

Pursuant to sections 145(1)(d) and (2) and 158(1)(a) of the Insurance Act, 2018 (Act) and regulation 18 of the Insurance (Caribbean Policy Premium Method) Regulations, 2020, (Regulations) the Central Bank of Trinidad and Tobago (Central Bank) outlines the minimum requirements for an appointed actuary's report for long-term insurance business (AAR).

Further, in accordance with section 23(5) of the Act, the requirements outlined above also apply to general insurers registered under the Act to carry on the accident and sickness class of insurance business. For the purposes of this report and in light of section 23(4) of the Act, the appointed actuary of the general insurer should therefore amend the applicable references to long-term insurance business to reflect only the accident and sickness class of insurance business required to be valued.

The requirements¹ provided in this document seek to ensure consistency in reporting and adequate disclosure of information, and will allow the Central Bank to make reasonable comparisons among the insurers. The prescribed format is applicable for AARs produced for the reporting period at **October 31, 2021 and later**.

The actuarial valuation for long-term insurance business should be carried out in accordance with the Regulations and the standards of the Caribbean Actuarial Association and any other actuarial standards that may be specified by the Inspector of Financial Institutions (IOFI).

The appointed actuary is expected to apply judgment in ensuring that the objective of each section of the AAR is properly captured and include any additional information that is deemed pertinent to the valuation. The AAR should also be written in a manner generally understandable to both the insurer's management and the regulator and should be submitted to the IOFI within sixty business days after the insurer's financial year end.

The tables referenced in this report are contained in the excel file titled 'Schedules to the AAR' located on the Central Bank's website at <https://www.central-bank.org.tt/publications/regulatory-returns/insurance-sector-regulatory-return>. The completed excel file must also be submitted to the Central Bank along with the full AAR. All values are to be reported in absolute numbers and in Trinidad and Tobago currency and the exchange rates should be disclosed. Where possible, links have been included in the tables to limit repetitive entries.

The following sections should be included in the AAR:

Contents

1. OVERVIEW
 - 1.1. Overview of the Insurance Company
 - 1.2. Professional Qualifications
 - 1.3. Opinion
 - 1.4. Reliances, Internal Controls, Limitations, Materiality and Applicable Standards

¹ Guided by:

OSFI's Life Memorandum to the Appointed Actuary https://www.osfi-bsif.gc.ca/Eng/fi-if/rtn-rlv/fr-rf/ic-sa/lic-sav/Pages/AA_Memo_2020 and

FSC Jamaica – Requirements for the December 31, 2020 Valuation of actuarial reserves and other policy liabilities of life insurers

2. TOTAL INSURANCE COMPANY DATA
 - 2.1. Summary of Policy Liabilities for Insurance and Investment contracts
 - 2.2. Summary of Other Actuarial Liabilities
 - 2.3. Summary of Provisions for Adverse Deviation
 - 2.4. Summary of Changes in Methods and Assumptions
 - 2.5. Summary of Movement in Policy Liabilities and Other Actuarial Liabilities
 - 2.6. Reconciliation of AAR and Insurance Act Annual Returns
3. DETAILS BY ASSET SEGMENT AND PRODUCT LINE
 - 3.1. Asset Segment Reporting
 - 3.2. Product Line Reporting
4. ADDITIONAL LIABILITY DISCLOSURES
5. ASSET LIABILITY MANAGEMENT (ALM)
6. SOURCE OF EARNINGS
7. PARTICIPATING POLICIES (OPEN AND CLOSED BLOCKS)
8. OTHER DISCLOSURE REQUIREMENTS
9. PRODUCT MAPPING

The requirements for each of the above sections are detailed below:

1. OVERVIEW

1.1. Overview of the Insurance Company

Provide a brief description of the insurer's structure, operations and any changes during the last financial period that are material. This can include, but is not limited to, any acquisitions, new product lines, events that affect the policy liabilities and other actuarial liabilities and any changes in the philosophy towards the valuation process.

1.2. Professional Qualifications

Professional qualifications of the appointed actuary should be disclosed including membership in any professional actuarial bodies and compliance status and the term of appointment as the insurer's actuary. The appointed actuary should also indicate if he/she is a sole practitioner, or a partner, employee or the owner of a company together with a brief description of the company.

1.3. Opinion

The actuarial certificate required pursuant to section 145(2) of the Act and regulation 18 of the Regulations should be prepared in the format outlined in Appendix 1 for an unqualified opinion.

If, however, the appointed actuary is unable to issue an unqualified opinion, the OPINION paragraph in Appendix 1 must explicitly state that it is a qualified opinion and should be adjusted to reflect the necessary qualification. A more detailed description of the reasons for the qualification should be provided in this section.

1.4. Reliance, Internal Controls, Limitations, Materiality and Applicable Standards

This section requires the appointed actuary to disclose the following:

- Persons that were directly involved in the valuation and their role in the work;
- Use of work provided by the insurer or another party;

- Communications with auditor on topics such as data quality, systems, risks, assets, controls, materiality standard etc;
- The methods used to verify and validate policy information and liabilities. In particular, a description of the type of data provided, the review and verification procedures applied and the procedures and steps undertaken to ensure that the valuation data is sufficient, reliable and accurate; and any assumptions made with respect to missing data;
- Valuation system(s) applied;
- A description of any matters for which information was unable to be obtained or for which information provided was not satisfactory², any other limitations or significant approximations used in the valuation and the rationale;
- Materiality standard;
- Consistency with financial reporting and accounting standards; and
- Actuarial standards applied to the valuation of the policy liabilities.

2. TOTAL INSURANCE COMPANY DATA

The required summary information described in the sections below, should be reported in tabular form as specified in the excel file titled "Schedules to the AAR". These tables must be completed in the specified format and should not be altered in any way. If no data is available, the cells in the tables should be left blank.

The tables shown provide an overview of the insurer and its lines of business for the current year and the two years' prior. Information in relation to participating and non-participating business should also be shown separately. If the company carries on insurance business in other territories/jurisdictions, the data should be recorded appropriately for 'Business in Trinidad and Tobago' and 'Business outside of Trinidad and Tobago'.

2.1. Summary of Policy Liabilities for Insurance and Investment contracts

Table 2.1 provides the gross/net policy liabilities for the various product lines. The gross/net policy liabilities and other relevant information reported in the AAR should reconcile to those amounts reported in the Insurance Act Annual Returns.

2.2. Summary of Other Actuarial Liabilities

Table 2.2 provides the other actuarial liabilities, other than those reported in the table above. Note that if the 'other' category is significant, additional disclosure should be provided. These liabilities can include, but are not limited to:

- Outstanding payments under settlement annuities;
- Premiums paid in advance;
- Policyholder dividends due and unpaid;
- Policyholders' amounts on deposit;
- Accrued interest on policies; and
- Any other actuarial liability that should be specified.

2.3. Summary of Provisions for Adverse Deviation

The provisions for adverse deviations (PfADs) are required to be reported by type and for the current year and the two years' prior in Tables 2.3.a and 2.3.b, respectively. The appointed actuary should disclose the order in which the PfADs were calculated including the rationale for any order variations from year to year.

² Pursuant to section 158(2) of the Insurance Act 2018

2.4. Summary of Changes in Methods and Assumptions

This is a historical record related to changes in assumptions during the financial year and the previous two years. A brief description of each change in assumption or method must be included. The impact on the policy liabilities (net of reinsurance) for insurance and investment contracts and on other actuarial liabilities should be shown separately in Tables 2.4a and 2.4b, respectively. The appointed actuary will determine the breakdown of the product lines to be reported under each product group.

The appointed actuary should also disclose where the Caribbean Policy Premium Method was not applied in determining the liabilities for any particular product line.

2.5. Summary of Movement in Policy Liabilities and Other Actuarial Liabilities

A reconciliation of the change in policy liabilities and other actuarial liabilities during the valuation year by the various product groups is required as shown in Table 2.5. Any changes due to “OFFS” such as deaths, surrenders etc. should be reported as negative numbers.

2.6. Reconciliation of AAR and Insurance Act Annual Returns

The amounts reported in the AAR must reconcile with those reported in the Insurance Act Annual Returns and the appointed actuary. The template for the reconciliation is provided in Table 2.6.

3. DETAILS BY ASSET SEGMENT AND PRODUCT LINE

This section documents the details of the assets segments and product lines of the actuarial valuation.

3.1. Asset Segment Reporting

This section should document the segmented assets used to support the valuation interest rates applied to the various product lines. The composition of each asset segment should be provided separately in the report as structured in Table 3.1 so as to show the nature and the value in the returns. The major asset and liability categories should be shown and the method of measurement defined.

The yield rates for the various asset types and the calculation should be disclosed. The way in which these assets support the valuation interest rate used should also be disclosed. If the investment policy has changed, the effect on the liabilities should be discussed. The total assets reported should reconcile to the amounts in the Insurance Act Annual Returns.

3.2. Product Line Reporting

3.2.1. Policy Liabilities – Table 3.2 requires detailed information such as the number of policies, annualized premium, sum insured, liabilities, account values etc. The product groups and generic product lines are hard coded in the table, with an additional column to enter the various policies associated with the product lines reported. Unlocked entry rows within each group are also included to allow the appointed actuary to further breakdown or identify specific products by name or other product line to reflect the same level of granularity as analyzed and reported to management.

3.2.2. Product Descriptions - A description of the product and key features must be disclosed and should include the guarantees, options, benefits, contract durations and other pertinent information. The level of detail in this description should be sufficient to justify the methodology and the assumptions used. The appointed actuary should also indicate for each product, whether they are open, closed or open for new deposits and the key risks in each of the products should be provided.

With regards to investment linked products (insurance and annuities), in addition to the above and if not already stated elsewhere in the report, the appointed actuary should provide the following information:

- Crediting mechanism;
- If the assets are genuinely identifiable and whether the assets are held by the insurer in the general fund, segregated fund or other fund (specify); and
- Risk of tracking errors or mismatches.

Note that if there is not a direct link between the asset yields and the return guaranteed to the policyholder, the details of the investment strategy used should be provided.

3.2.3. New Products - Details on the amount of new business should be provided in the AAR. Where the product is novel or experimental, and relevant experience is not available, the AAR should describe the work performed to measure the risk associated with these new contingencies. The level of detail in this description should be sufficient to justify the methodology and assumptions used.

3.2.4. Reinsurance - A description of the reinsurance structure with respect to the risks and allowances should be included in cases where impact of reinsurance is material. Any new reinsurance arrangement, assumed or ceded, should be disclosed which includes information such as, but not limited to:

- Effective date;
- Expected termination dates;
- Type of reinsurance;
- Recapture provisions; and
- Any significant reserve and capital impact.

The appointed actuary should also disclose how reinsurance was taken into account in determining the policy liabilities, any material financial reinsurance arrangements where there is no significant transfer of risk to the reinsurer and any related party reinsurance arrangements.

3.2.5. Expected Experience Assumptions - The appointed actuary should document all expected experience assumptions used in the valuation along with the corresponding rationale, justification and validation. The list of expected experience assumptions includes, but is not limited to:

- Mortality (inclusive of any improvements);
- Morbidity;
- Interest rate;
- Asset defaults;
- Lapses;
- Expenses;
- Foreign exchange;
- Inflation;
- Renewal/Conversion;
- Disability/Recovery;
- Income taxes; and
- Any other contingencies that are applicable.

Further to the foreign exchange assumption, the appointed actuary should give

additional details on how foreign exchange risk has been addressed in the valuation including the rate of exchange used for the various portion of the business and details concerning the assets and liabilities attached to the foreign currency.

For any significant assumptions which are based on the experience of the insurer, the appointed actuary should disclose both the method of validating the choice used as the assumption and the period upon which the last validation exercise was conducted.

The level and development of key future interest rates and reinvestment assumptions should be disclosed including additional liabilities that were established in accordance with the standards of accepted actuarial practice and the Regulations. The method used to develop the allocation of expenses for each product line should also be provided.

- 3.2.6. Key risks and Sensitivity Testing - Discussions of the most significant risks and the results of sensitivity testing in accordance with the relevant standards of accepted actuarial practice should be disclosed.
- 3.2.7. Provisions for Adverse Deviations – For each assumption, the appointed actuary should disclose and justify the level of margin for adverse deviation used, bearing in mind the applicable range prescribed in the Regulations.
- 3.2.8. Method and Assumption Changes – The valuation method should be stated, including any change to the method and assumptions. A comparison of actual experience compared to expected experience assumptions should be shown separately for each product line. Further, any change in assumption should be described including the effective date of the change and the rationale with supporting evidence for this change. The appointed actuary should use judgment in deciding on the amount of detail to be included in the AAR with respect to the assumption setting process.
- 3.2.9. Policy Guarantees - Interest rate and other guarantees should be disclosed. The appointed actuary should disclose how these are provided for in the policy liabilities. The amounts should also be separately identified in Table 3.2 and should reconcile to the amounts reported in the Capital Adequacy Returns tab 40.036.
- 3.2.10. Other – Any use of implicit assumptions or approximations should be disclosed and supported in the AAR for any product line including any closed blocks of business. For participating and flow through products, the appointed actuary should describe how the policyholder dividends and non-guaranteed elements are reflected in the calculation of the policy liabilities and other actuarial liabilities.

4. ADDITIONAL LIABILITY DISCLOSURES

The appointed actuary should disclose relevant information pertaining to, but not limited to, any product-related guarantees that are not part of the policy contract. This disclosure is required whether or not the appointed actuary holds any liabilities for such guarantees.

5. ASSET LIABILITY MANAGEMENT (ALM)

An overview of the insurer's ALM practice should be included. The appointed actuary should describe how this was used in determining the policy liabilities and other actuarial liabilities.

6. SOURCE OF EARNINGS³

Source of earnings analysis is used to identify and quantify the various sources of an insurer's income. It analyses the difference between actual income and the income that would have been reported had all assumptions at the start of the reporting period been realized during the reporting period. The information required, at a minimum, should be presented in the format shown in Table 6. Companies can provide further details as sub-components, where it is considered appropriate.

Further details on the items to be included are as follows:

- a) Expected Profit on Inforce Business represents the portion of income on the inforce business at the start of the financial period that was expected to be realized based on the best-estimate assumptions being achieved. This includes, but is not limited to:
 - Release of Provisions for Adverse Deviations;
 - Expected net management fees; and
 - Expected net earnings of any deposits.
- b) Impact of New Business entails the income resulting from the sale of any insurance policies during the financial period that is, the difference between the premiums received and the sum of the expenses incurred and allocated.
- c) Experience Gains/Losses emerge due to the differences between the actual experience during the financial period and the expected experience assumptions determined at the start of the financial period.
- d) Changes in Best-Estimate Assumptions and Management Actions which should include the impact in income subsequent to:
 - Best-Estimate Assumptions and Margins for Adverse Deviations - The best-estimate assumptions along with their respective margins for adverse deviations should be reviewed regularly, which can result in changes that impact income.
 - Changes in Methodology - This change can be as a result of new actuarial or accounting standards, or arising from refinements to the current valuation methods. Note that these changes listed are not exhaustive.
 - Correction of Errors identified within the valuation of policy liabilities.
 - Management Actions – These can impact income in various forms, whether it a decision for an acquisition or merger of block(s) of business, changes to expenses and/or fees or exiting from a specific line of business.
- e) The 'Other' category – This represents any portion of the income that has not been explained/addressed in any of the previous groupings and should be specified.
- f) Earnings on surplus represents the net income earned on the company's surplus funds

7. PARTICIPATING POLICIES (OPEN AND CLOSED BLOCKS)

The insurer's policy with regards to dividend distribution on participating policies should be included in the AAR. The AAR should set out, at the very least:

- a) The basis adopted in distribution of surplus between the insurer and the policyholders.
- b) The determination of this basis, whether it be by the instruments constituting the insurer, or by the insurer's articles of association or other rules or by some other method.
- c) The basis of payments of policyholder bonuses or dividends and the amount of such distribution.
- d) The rate of participating bonuses included in the valuation of the policy liabilities.
- e) The amount of participating surplus that arose and was deducted during the inter-valuation period and what remains outstanding as at the valuation date should be disclosed in the report in Table 7.

³ Adopted from OSFI Source of Earnings Disclosure – Revised July 2010

8. OTHER DISCLOSURE REQUIREMENTS

A description on the internal controls used in the valuation process, including peer reviews, should be disclosed in the AAR to ensure that the end result of the valuation process is consistent with all the inputs that goes into the process.

The nature of compensation for the work conducted by the appointed actuary should be disclosed as well as confirmation that the appointed actuary has complied with the standards of accepted actuarial practice and the Regulations.

The appointed actuary should also disclose any special or supplementary reports made to the insurer over the last twelve months that may serve pertinent to any findings from the AAR.

If the appointed actuary was appointed during the last year, the AAR should disclose the following:

- Date of appointment;
- Date of cessation and reason for change of previous appointed actuary;
- Date of notification of appointment to the Central Bank;
- Brief description of the communication with the previous appointed actuary in accordance with section 79(5) of the Act.

9. PRODUCT MAPPING

Table 9 requires identification, by name, of all the products included in the valuation. These are mapped to the various classes of insurance business from Schedule 1 of the Act, the relevant product group and product line using the drop down boxes provided.

APPENDIX 1 - FORMAT OF CERTIFICATE OF APPOINTED ACTUARY

I have examined the financial position and valued the policy liabilities and other actuarial liabilities, and reinsurance recoverables, of *[insurer]* for its statement of financial position as at *[date]* and the corresponding changes in the statement of income for the year then ended XXXX.

I certify that:

- (a) I am currently in good standing with my governing actuarial accreditation body;
- (b) I meet the appropriate qualification standards;
- (c) I am familiar with the actuarial valuation and capital adequacy requirements applicable to insurers carrying on long-term insurance business in Trinidad and Tobago; and
- (d) I have complied with the requirements of the Insurance Act, 2018 and applicable Regulations made thereunder.

In my opinion-

- (a) The methods and procedures used in the verification of the valuation data are sufficient and reliable and fulfil acceptable standards of care;
- (b) The methods and assumptions used to calculate the policy liabilities and other actuarial liabilities are appropriate to the circumstances of the insurer and of the underlying policies and claims; and
- (c) The policy liabilities and other actuarial liabilities represented in the statement of financial position of *[insurer]* amounting to *[\$TT]* and the reinsurance recoverables of *[\$TT]* make proper provision for all policy obligations and the insurance returns fairly presents the results of the valuation.

Name of the appointed actuary
(Include name, title, qualification)

Signature of appointed actuary

Date