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Draft Revised Educational Note

Regulatory Capital Filing Certification

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Draft Revised Educational Note

Regulatory Capital Filing Certification

**Committee on Risk Management and
Capital Requirements**

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Members should be familiar with educational notes. Educational notes describe but do not recommend practice in illustrative situations. They do not constitute standards of practice and are, therefore, not binding. They are, however, intended to illustrate the application (but not necessarily the only application) of the Standards of Practice, so there should be no conflict between them. They are intended to assist actuaries in applying standards of practice in respect of specific matters. Responsibility for the manner of application of standards of practice in specific circumstances remains that of the members.

MEMORANDUM

To: All Fellows, Affiliates, Associates, and Correspondents of the Canadian Institute of Actuaries

From: Faisal Siddiqi, Chair
Practice Council

Marco Fillion, Chairperson
Committee on Risk Management and Capital Requirements

Date: September 12, 2017

Subject: **Draft Revised Educational Note – Regulatory Capital Filing Certification for Life Insurers**

Deadline for comments: **October 14, 2017**

The Committee on Risk Management and Capital Requirements has updated the educational note regarding the certification of regulatory capital filings in Canada to account for the new Life Insurance Capital Adequacy Test (LICAT) guideline effective January 1, 2018.

In accordance with the Canadian Institute of Actuaries' (CIA) Policy on Due Process for the Approval of Guidance Material Other than Standards of Practice and Research Documents, this draft revised educational note was approved by the Committee on Risk Management and Capital Requirements (CMCR), and it received approval from the Practice Council on September 5, 2017 for distribution.

As outlined in subsection 1220 of the Standards of Practice, "The actuary should be familiar with relevant Educational Notes and other designated educational material." That subsection explains further that a "practice that the Educational Notes describe for a situation is not necessarily the only accepted practice for that situation and is not necessarily accepted actuarial practice for a different situation." As well, "Educational Notes are intended to illustrate the application (but not necessarily the only application) of the standards, so there should be no conflict between them."

Questions or comments regarding this draft revised educational note may be directed to Marco Fillion at Marco.Fillion@pwc.com.

This draft revised educational note provides guidance to the Appointed Actuary providing a certification of a regulatory capital filing as outlined in subsection 2470 of the CIA Standards of Practice. The note clarifies areas for regulatory capital filing certification where material judgment or discretion may be required for interpretation of the associated guidelines.

For simplicity, the remainder of this note will refer to the Life Insurance Capital Adequacy Test (LICAT) filing but it is also applicable to the Life Insurance Margin Requirements and Adequacy of Assets in Canada Test (LIMAT) filing as well as the corresponding provincial filing.

1. Introduction

The starting point for certification is a thorough understanding of the regulatory guideline for the regulatory capital filing for which certification is to be provided (e.g., Office of the Superintendent of Financial Institutions (OSFI)). The guidelines include the formal guideline, the filing instructions, and all relevant interpretive bulletins issued by the regulator. The Appointed Actuary would also have a comprehensive knowledge of the company affairs (including capital structure, all commitments and obligations on and off balance sheet assets and liabilities), and would review other educational notes that may be relevant to LICAT.

In providing the opinion, the Appointed Actuary would satisfy himself or herself of the following:

- The integrity of the source data used in the LICAT calculations;
- The appropriate application of these data to the calculation of all components (available capital, surplus allowance, eligible deposits, base solvency buffer)—that is, the completeness and accuracy of the data used in the calculation (for the remainder of this note, “available capital” may be replaced by “available margin” and “base solvency buffer” by “required margin” for life insurers operating on a branch basis);
- The mapping of the data to the relevant LICAT factors, shocks and stresses, and the elements of the methodologies where calculations and projections are required; and
- The accuracy of the calculations.

There are two aspects to be reviewed by the Appointed Actuary:

- a) Areas where the LICAT guidelines themselves require technical calculations that would be reviewed or validated; and
- b) Areas where material judgment has been applied in interpreting the LICAT guidelines.

In addition, the Appointed Actuary would prepare a memorandum to support the LICAT certification.

2. Specific Requirements – Technical

The LICAT guidelines contain a number of areas where the Appointed Actuary is required to perform technical calculations to support the determination of the components (e.g., base solvency buffer, eligible deposits, and surplus allowance). The Appointed Actuary needs to validate not only the technical accuracy of the calculations, but also the application of discretion in the calculations, where the calculations require discretion to be applied. For models approved by the regulator, this means the calculations are being made consistent with

parameters and other aspects of the model approved by the regulator.

Areas where technical calculations would be reviewed or validated include, but are not limited to, the following:

For all calculations:

- i. Data collection and manipulation
- ii. Software and processes utilized in the calculation

Areas related to the calculation of the base solvency buffer

- i. Requirements based on projected cash flows
 - a. Insurance risk – How to handle approximations or manual adjustments for blocks with no cash flows
 - b. Interest rate risk – Re-projecting par dividends and interest sensitive products
 - c. Investment property
- ii. Indexed-linked products
 - a. Correlation between earnings on the portfolio and interest credited to the policyholder
- iii. Designation tests
 - a. Life and death supported business for mortality risk
 - b. Lapse supported and lapse sensitive business for lapse risk
- iv. Credits for pass-through
 - a. Par products
 - b. Adjustable products
- v. Credits for reinsurance and special policyholder arrangements
 - a. Policyholder deposits
 - b. Adjustments for group business
- vi. Use of the total balance sheet approach with respect to segregated fund guarantees
- vii. Diversification credits

Areas related to the calculation of the surplus allowance, eligible deposits, and available capital

- i. Calculation of the surplus allowance
 - a. Refer to the draft educational note [Life Insurance Capital Adequacy Test \(LICAT\) and Capital Adequacy Requirements for Life and Health Insurance \(CARLI\)](#) which provides guidance for the quantification of provisions for adverse deviations for inclusion in the surplus allowance

- ii. Calculation of the eligible deposits
 - a. Unregistered reinsurance
 - b. Reinsurance claims fluctuation reserves
- iii. Deductions from available capital
 - a. Cash value deficiencies
 - b. Policy-by-policy negative reserves and reductions allowed for amounts recoverable on surrender
 - i. Marginal insurance risk requirement calculations
 - c. Deferred tax assets (DTAs)
 - d. Amortization of the impact on available capital on account of the net defined benefit pension plans
 - e. Subsidiaries
- iv. Limited recognition of capital instruments held by third party investor and non-controlling interests

Areas related to the use of approximations for the calculation of the base solvency buffer, surplus allowance, or available capital

- i. Approximations
 - a. Refer to the LICAT guideline on use of approximations

3. Specific Requirements – Interpretation or Judgment

The LICAT framework is one that uses factors, shocks and stresses. As is common with any framework, the written methodology in the guideline cannot envision all balance sheet and risk exposure circumstances and provide guidance on how these circumstances would be reflected in the LICAT calculation. In this situation, judgment must be applied. Those areas that require material interpretation or judgment would be based on accepted actuarial practice. Exercise of judgment should also reflect a thorough understanding of the risk position of the company so that the interpretation reflected in the LICAT calculation is appropriate and consistent with the risk position of the company.

The areas where material interpretation or judgment may be applied in interpreting the guideline, include, but are not limited to, the following:

- i. Meeting conditions
 - a. Qualifying criteria for tier 1 and tier 2 capital;
 - b. Par/adjustable/indexed-linked products;
 - c. Reinsurance risk transfer;
 - d. Use of rating;
 - e. Use of collateral;

- ii. Determination of the initial scenario discount rates
- iii. Treatment of new assets, liabilities, or off-balance sheet instruments

4. Documentation – Requirement for LICAT Memorandum

- i. To support the LICAT certification for the calculation of LICAT components and discretionary items, a LICAT memorandum would be prepared by the Appointed Actuary.
- ii. The LICAT memorandum would be prepared annually as a note to file from the Appointed Actuary. Additional disclosure or filing of the memorandum will be as specified by the regulator.
- iii. The LICAT memorandum would be completed before the provision of a signed opinion provided pursuant to subsection 2470.
- iv. It is not intended that the LICAT memorandum be long and detailed. It is intended to be a concise summary of areas where the Appointed Actuary has applied material judgment, and the outcomes of that judgment. Documentation in the memorandum of the rationale for the judgment could be at a high level and would focus on material items, provided the Appointed Actuary is satisfied that appropriate supporting documentation exists. For example, if the interpretations follow a separately documented internal policy, then reference to that policy would be sufficient.
- v. The LICAT memorandum would briefly outline areas where the Appointed Actuary has applied material judgment in the determination of the components and would outline the specific issues and the interpretation(s) that the Appointed Actuary made, and the rationale for the interpretation. This would include areas within technical calculations where this judgment was applied.
- vi. The LICAT memorandum would inventory the material technical calculations, and would ensure that sufficient supplemental documentation of the calculations exists. Notwithstanding the supplemental documentation, the memorandum would cover any material judgment the Appointed Actuary has made in doing the calculations, including any material approximations.
- vii. The LICAT memorandum would discuss the standard of materiality that has been applied in determining the components of the LICAT calculation.