

Insurance Department

**Minimum Reserve Standards for Individual and
Group Health Insurance Contracts**

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**Minimum Reserve Standards for Individual and
Group Health Insurance Contracts**

Sec. 38a-78-11. Introduction

(a) **Scope.** Sections 38a-78-11 to 38a-78-16, inclusive, of these regulations shall apply to all individual and group health (accident and sickness) insurance coverages except credit insurance.

When an insurer determines that adequacy of its health insurance reserves requires reserves in excess of the minimum standards specified herein, such increased reserves shall be held and shall be considered the minimum reserves for that insurer.

With respect to any block of contracts, or with respect to an insurer's health business as a whole, a prospective gross premium valuation is the ultimate test of reserve adequacy as of a given valuation date. Such a gross premium valuation will take into account, for contracts in force, in a claims status, or in a continuation of benefits status on the valuation date, the present value as of the valuation date of: all expected benefits unpaid, all expected expenses unpaid, and all unearned or expected premiums, adjusted for future premium increases reasonably expected to be put into effect.

Such a gross premium valuation is to be performed whenever a significant doubt exists as to reserve adequacy with respect to any major block of contracts, or with respect to the insurer's health business as a whole. In the event inadequacy is found to exist, immediate loss recognition shall be made and the reserves restored to adequacy. Adequate reserves (inclusive of claim, premium and contract reserves, if any) shall be held with respect to all contracts, regardless of whether contract reserves are required for such contracts under these standards.

Whenever minimum reserves, as defined in these standards, exceed reserve requirements as determined by a prospective gross premium valuation, such minimum reserves remain the minimum requirement under these standards.

(b) **Categories of Reserves.** The following sections set forth minimum standards for three categories of health insurance reserves:

Sec. 38a-78-13. Claim reserves

Sec. 38a-78-14. Premium reserves

Sec. 38a-78-15. Contract reserves

Adequacy of an insurer's health insurance reserves is to be determined on the basis of all three categories combined. However, these standards emphasize the importance of determining appropriate reserves for each of the three categories separately.

(c) **Appendices.** These standards contain two appendices: one is an integral part of the standards, and one is a "supplementary" appendix which is not part of the standards as such, but is included for explanatory and illustrative purposes only.

Appendix A. Specific minimum standards with respect to morbidity, mortality and interest, which apply to claim reserves according to year of incurral and to contract reserves according to year of issue.

Appendix B. (Supplementary) Waiver of Premium Reserves.
(Effective September 28, 1993)

Sec. 38a-78-12. Definitions

As used in Sections 38a-78-11 to 38a-78-16, inclusive of these regulations:

(a) "Annual-Claim Cost" means the net annual cost per unit of benefit before the addition of expenses, including claim settlement expenses, and a margin for profit or contingencies. For example, the annual claim cost for a \$100 monthly disability benefit, for a maximum disability benefit period of one year, with an elimination period of one week, with respect to a male at age 35, in a certain occupation might be \$12, while the gross premium for this benefit might be \$18. The additional \$6 would cover expenses and profit or contingencies.

(b) "Claims Accrued" means that portion of claims incurred on or prior to the valuation date which result in liability of the insurer for the payment of benefits for medical services which have been rendered on or prior to the valuation date.

and for the payment of benefits for days of hospitalization and days of disability which have occurred on or prior to the valuation date, which the insurer has not paid as of the valuation date, but for which it is liable, and will have to pay after the valuation date. This liability is sometimes referred to as a liability for "accrued" benefits. A claim reserve, which represents an estimate of this accrued claim liability, shall be established.

(c) "Claims Reported" means when an insurer has been informed that a claim has been incurred, if the date reported is on or prior to the valuation date, the claim is considered as a reported claim for annual statement purposes.

(d) "Claims Unaccrued" means that portion of claims incurred on or prior to the valuation date which result in liability of the insurer for the payment of benefits for medical services expected to be rendered after the valuation date, and for benefits expected to be payable for days of hospitalization and days of disability occurring after the valuation date. This liability is sometimes referred to as a liability for unaccrued benefits. A claim reserve, which represents an estimate of the unaccrued claim payments expected to be made (which may or may not be discounted with interest), shall be established.

(e) "Claims Unreported" means when an insurer has not been informed, on or before the valuation date, concerning a claim that has been incurred on or prior to the valuation date, the claim is considered as an unreported claim for annual statement purposes.

(f) "Date of Disablement" means the earliest date the insured is considered as being disabled under the definition of disability in the contract, based on a doctor's evaluation or other evidence. Normally this date will coincide with the start of any elimination period.

(g) "Elimination Period" means a specified number of days, weeks, or months starting at the beginning of each period of loss, during which no benefits are payable.

(h) "Guarantee Duration" of a health insurance contract is the maximum number of years the health insurance contract can remain in force on the basis guaranteed in the contract.

(i) "Gross Premium" means the amount of premium charged by the insurer. It includes the net premium (based on claim-cost) for the risk, together with any loading for expenses, profit or contingencies.

(j) "Group Insurance" includes blanket insurance and franchise insurance and any other forms of group insurance.

(k) "Level Premium" means a premium calculated to remain unchanged throughout either the lifetime of the policy, or for some shorter projected period of years. The premium need not be guaranteed; in which case, although it is calculated to remain level, it may be changed if any of the assumptions on which it was based are revised at a later time. Generally, the annual claim costs are expected to increase each year and the insurer, instead of charging premiums that correspondingly increase each year, charges a premium calculated to remain level for a period of years or for the lifetime of the contract. In this case the benefit portion of the premium is more than is needed to provide for the cost of benefits during the earlier years of the policy and less than the actual cost in the later years. The building of a prospective contract reserve is a natural result of level premiums.

(l) "Long-Term Care Insurance" means any insurance policy or rider advertised, marketed, offered or designed to provide coverage for not less than twelve (12) consecutive months for each covered person on an expense incurred, indemnity, prepaid or other basis; for one or more necessary or medically necessary diagnostic,

preventive, therapeutic, rehabilitative, maintenance or personal care services, provided in a setting other than an acute care unit of a hospital. Such term also includes a policy or rider which provides for payment of benefits based upon cognitive impairment or the loss of functional capacity. Long-term care insurance may be issued by insurers, fraternal benefit societies, nonprofit health, hospital, and medical service corporations, prepaid health plans, health care centers, or any similar organization to the extent they are otherwise authorized to issue life or health insurance. Long-term care insurance shall not include any insurance policy which is offered primarily to provide basic Medicare supplement coverage, basic hospital expense coverage, basic medical-surgical expense coverage, hospital confinement indemnity coverage, major medical expense coverage, disability income or related asset-protection coverage, disability income or related asset-protection coverage, accident only coverage, specified disease or specified accident coverage, or limited benefit health coverage.

(m) "Modal Premium" means the premium paid on a contract based on a premium term which could be annual, semi-annual, quarterly, monthly, or weekly. Thus, if the annual premium is \$100 and if, instead, monthly premiums of \$9 are paid then the modal premium is \$9.

(n) "Negative Reserve" means the value of the terminal reserve when it is a negative value. Normally the terminal reserve is a positive value. However, if the values of the benefits are decreasing with advancing age or duration it could be a negative value, called a negative reserve.

(o) "Preliminary Term Reserve Method" means that the valuation net premium for each year falling within the preliminary term period is exactly sufficient to cover the expected incurred claims of that year so that the terminal reserves will be zero at the end of the year. As of the end of the preliminary term period, a new constant valuation net premium (or stream of changing valuation premiums) becomes applicable such that the present value of all such premiums is equal to the present value of all claims expected to be incurred following the end of the preliminary term period.

(p) "Present Value of Amounts Not Yet Due on Claims" means the reserve for "claims unaccrued" (see definition), which may be discounted at interest.

(q) "Reserve" includes all items of benefit liability, whether in the nature of incurred claim liability or in the nature of contract liability relating to future periods of coverage, and whether the liability is accrued or unaccrued. An insurer under its contracts promises benefits which result in:

(1) claims which have been incurred, that is, for which the insurer has become obligated to make payment, on or prior to the valuation date. On these claims, payments expected to be made after the valuation date for accrued and unaccrued benefits are liabilities of the insurer which should be provided for by establishing claim reserves; or

(2) claims which are expected to be incurred after the valuation date. Any present liability of the insurer for these future claims should be provided for by the establishment of contract reserves and unearned premium reserves.

(r) "Terminal Reserve" means the reserve at the end of a contract year, and is defined as the present value of benefits expected to be incurred after that contract year minus the present value of future valuation net premiums.

(s) "Unearned Premium Reserve" means that portion of the premium paid or due to the insurer which is applicable to the period of coverage extending beyond the valuation date. Thus, if an annual premium of \$120 was paid on November 1, \$20 would be earned as of December 31 and the remaining \$100 would be unearned.

The unearned premium reserve could be on a gross basis as in this example, or on a valuation net premium basis.

(t) "Valuation Net Modal Premium" means the modal fraction of the valuation net annual premium that corresponds to the gross modal premium in effect on any contract to which contract reserves apply. Thus, if the mode of payment in effect is quarterly, the valuation net modal premium is the quarterly equivalent of the valuation net annual premium.

(Effective September 28, 1993)

Sec. 38a-78-13. Claim reserves

(a) General.

(1) Claim reserves are required for all incurred but unpaid claims on all health insurance policies.

(2) Appropriate claim expense reserves are required with respect to the estimated expense of settlement of all incurred but unpaid claims.

(3) All such reserves for prior valuation years are to be tested for adequacy and reasonableness along the lines of claim runoff schedules in accordance with the statutory financial statement including consideration of any residual unpaid liability.

(b) Minimum Standards for Claim Reserves.

(1) Disability Income.

(A) Interest. The maximum interest rate for claim reserves is specified in Appendix A.

(B) Morbidity. Minimum standards with respect to morbidity are those specified in Appendix A, except that, at the option of the insurer for the portion of claims payable within (i) three years for group disability income claims, or (ii) two years for all other disability claims, from the date of disablement, reserves may be based on the insurer's experience to the extent that such experience is credible, or, with the approval of the commissioner, upon other assumptions designed to place a sound value on the liabilities.

(C) Duration of Disablement. For contracts with an elimination period, the duration of disablement should be measured as dating from the time that benefits would have begun to accrue had there been no elimination period.

(2) All Other Benefits.

(A) Interest. The maximum interest rate for claim reserves is specified in Appendix A.

(B) Morbidity or Other Contingency. The reserve should be based on the insurer's experience, if such experience is considered credible, or upon other assumptions designed to place a sound value on the liabilities.

(c) **Claim Reserve Methods Generally.** Any generally accepted or reasonable actuarial method or combination of methods may be used to estimate all claim liabilities. The methods used for estimating liabilities generally may be aggregate methods, or various reserve items may be separately valued. Approximations based on groupings and averages may also be employed. Adequacy of the claim reserves, however, shall be determined in the aggregate.

(Effective September 28, 1993; amended December 2, 1998)

Sec. 38a-78-14. Premium reserves

(a) General.

(1) Unearned premium reserves are required for all contracts with respect to the period of coverage for which premiums, other than premiums paid in advance, have been paid beyond the date of valuation.

(2) If premiums due and unpaid are carried as an asset, such premiums must be treated as premiums in force, subject to unearned premium reserve determination. The value of unpaid commissions, premium taxes, and the cost of collection associated with due and unpaid premiums must be carried as an offsetting liability.

(3) The gross premiums paid in advance for a period of coverage commencing after the next premium due date which follows the date of valuation may be appropriately discounted to the valuation date and shall be held either as a separate liability or as an addition to the unearned premium reserve which would otherwise be required as a minimum.

(b) **Minimum Standards for Unearned Premium Reserves.**

(1) The minimum unearned premium reserve with respect to any contract is the pro rata unearned modal premium that applies to the premium period beyond the valuation date, with such premium determined on the basis of:

(A) The valuation net modal premium on the contract reserve basis applying to the contract; or

(B) The gross modal premium for the contract if no contract reserve applies.

(2) However, in no event may the sum of the unearned premium and contract reserves for all contracts of the insurer subject to contract reserve requirements be less than the gross modal unearned premium reserve on all such contracts, as of the date of valuation. Such reserve shall never be less than the expected claims for the period beyond the valuation date represented by such unearned premium reserve, to the extent not provided for elsewhere.

(c) **Premium Reserve Methods Generally.** The insurer may employ suitable approximations and estimates, including, but not limited to groupings, averages and aggregate estimation, in computing premium reserves. Such approximations or estimates should be tested periodically to determine their continuing adequacy and reliability.

(Effective September 28, 1993)

Sec. 38a-78-15. Contract reserves

(a) **General.**

(1) Contract reserves are required, unless otherwise specified in subdivision (2) of subsection (a) of this section for:

(A) all individual and group contracts with which level premiums are used; or

(B) all individual and group contracts with respect to which, due to the gross premium pricing structure at issue, the value of the future benefits at any time exceeds the value of any appropriate future valuation net premiums at that time. The values specified in this subdivision shall be determined on the basis specified in subsection (b) of this section.

(2) Contracts not requiring a contract reserve are:

(A) Contracts which are not guaranteed renewable after one year from issue; or

(B) Contracts already in force on the effective date of these standards for which no contract reserve was required under the immediately preceding standards.

(3) The contract reserve is in addition to claim reserves and premium reserves.

(4) The methods and procedures for contract reserves should be consistent with those for claim reserves for any contract, or else appropriate adjustment must be made when necessary to assure provision for the aggregate liability. The definition of the date of incurral must be the same in both determinations.

(b) **Minimum Standards for Contract Reserves.**

(1) Basis.

(A) Morbidity or other Contingency. Minimum standards with respect to morbidity are those set forth in Appendix A. Valuation net premiums used under each contract must have a structure consistent with the gross premium structure at issue of the contract as this relates to advancing age of insured, contract duration and period for which gross premiums have been calculated.

Contracts for which tabular morbidity standards are not specified in Appendix A shall be valued using tables established for reserve purposes by a qualified actuary and acceptable to the Commissioner.

(B) Interest. The maximum interest rate is specified in Appendix A.

(C) Termination Rates. Termination rates used in the computation of reserves shall be on the basis of a mortality table as specified in Appendix A except as noted in the following paragraph.

Under contracts for which premium rates are not guaranteed, and where the effects of insurer underwriting are specifically used by policy duration in the valuation morbidity standard, or for return of premium or other deferred cash benefits, total termination rates may be used at ages and durations where these exceed specified mortality table rates, but not in excess of the lesser of:

(i) eighty percent of the total termination rate used in the calculation of the gross premiums; or

(ii) eight percent.

Where a morbidity standard specified in Appendix A is on an aggregate basis, such morbidity standard may be adjusted to reflect the effect of insurer underwriting by policy duration. The adjustments must be appropriate to the underwriting and be acceptable to the commissioner.

(D) Reserve Method.

(i) For insurance except long-term care, the minimum reserve is the reserve calculated on the two-year full preliminary term method; that is, under which the terminal reserve is zero at the first and also the second contract anniversary.

(ii) For long-term care insurance, the minimum reserve is the reserve calculated on the one-year full preliminary term method.

(iii) For return of premium or other deferred cash benefits, the minimum reserve is the reserve calculated as follows: On the one year preliminary term method if such benefits are provided at any time before the twentieth anniversary;

On the two year preliminary term method if such benefits are only provided on or after the twentieth anniversary.

The preliminary term method may be applied only in relation to the date of issue of a contract. Reserve adjustments introduced later, as a result of rate increases, revisions in assumptions (e.g., projected inflation rates) or for other reasons, are to be applied immediately as of the effective date of adoption of the adjusted basis.

(E) Negative Reserves. Negative reserves on any benefit may be offset against positive reserves for other benefits in the same contract, but the total contract reserve with respect to all benefits combined may not be less than zero.

(c) **Alternative Contract Reserve Valuation Methods and Assumptions Generally.** Provided the contract reserve on all contracts to which an alternative method or basis is applied is not less in the aggregate than the amount determined according to the applicable standards specified above, an insurer may use any reasonable assumptions as to interest rates, termination and/or mortality rates, and rates of morbidity or other contingency. Also, subject to the preceding condition, the insurer may employ methods other than the methods stated above in determining a sound value of its liabilities under such contracts, including, but not limited to the following:

the net level premium method; the one-year full preliminary term method; prospective valuation on the basis of actual gross premiums with reasonable allowance for future expenses; the use of approximations such as those involving age groupings, groupings of several years of issue, average amounts of indemnity, grouping of similar contract forms; the computation of the reserve for one contract benefit as a percentage of, or by other relation to, the aggregate contract reserves exclusive of the benefit or benefits so valued; and the use of a composite annual claim cost for all or any combination of the benefits included in the contracts valued.

(d) **Tests For Adequacy and Reasonableness of Contract Reserves.** Annually, an appropriate review shall be made of the insurer's prospective contract liabilities on contracts valued by tabular reserves, to determine the continuing adequacy and reasonableness of the tabular reserves giving consideration to future gross premiums. The insurer shall make appropriate increments to such tabular reserves if such tests indicate that the basis of such reserves is no longer adequate; subject, however, to the minimum standards of subsection (b) of this section.

In the event a company has a contract or a group of related similar contracts, for which future gross premiums will be restricted by contract, insurance department regulations, or for other reasons, such that the future gross premiums reduced by expenses for administration, commissions, and taxes will be insufficient to cover future claims, the company shall establish contract reserves for such shortfall in the aggregate.

(Effective September 28, 1993)

Sec. 38a-78-16. Reinsurance

Increases or offsetting credits to reserves because of reinsurance assumed or reinsurance ceded, must be determined in a manner consistent with minimum reserve standards and with all applicable provisions of the reinsurance contracts which affect the insurer's liabilities.

(Effective September 28, 1993)

Appendix A

Specific Standards for Morbidity, Interest and Mortality

I. Morbidity.

(a) Minimum morbidity standards for valuation of specified individual contract health insurance benefits are as follows (references to Commissioners' Table refers to the valuation table version as opposed to the basic table version as applicable):

(1) Disability Income Benefits Due to Accident or Sickness.

(A) Contract Reserves:

Contracts issued on or after January 1, 1965 and prior to January 1, 1986:

The 1964 Commissioners Disability Table (64 CDT)

Contracts issued on or after January 1, 1994:

The 1985 Commissioners Individual Disability Tables A (85CIDA); or

The 1985 Commissioners Individual Disability Tables B (85CIDB).

Contracts issued during 1986 through 1993:

Optional use of either the 1964 Table or the 1985 Tables.

Each insurer shall elect, with respect to all individual contracts issued in any one statement year, whether it will use Tables A or Tables B as in the minimum standard. The insurer may, however, elect to use other tables with respect to any subsequent statement year.

(B) Claim Reserves:

The minimum morbidity standard in effect for contract reserves on currently issued contracts, as of the date the claim is incurred.

(2) Hospital Benefits, Surgical Benefits and Maternity Benefits (Scheduled benefits or fixed time period benefits only).

(A) Contract Reserves:

Contracts issued on or after January 1, 1955, and before January 1, 1982:

The 1956 Intercompany Hospital-Surgical Tables.

Contracts issued on or after January 1, 1982:

The 1974 Medical Expense Tables, Table A, Transactions of the Society of Actuaries, Volume XXX, pg. 63. Refer to the paper (in the same volume, pg. 9) to which this table is appended, including its discussions, for methods of adjustment for benefits not directly valued in Table A: "Development of the 1974 Medical Expense Benefits," Houghton and Wolf.

(B) Claim Reserves:

No specific standard. See (5).

(3) Cancer Expense Benefits (Scheduled benefits or fixed time period benefits only).

(A) Contract Reserves:

Contracts issued on or after January 1, 1986:

The 1985 NAIC Cancer Claim Cost Tables.

(B) Claim Reserves:

No specific standard. See (5)

(4) Accidental Death Benefits.

(A) Contract Reserves:

Contracts issued on or after January 1, 1965:

The 1959 Accidental Death Benefits Table.

(B) Claim Reserves:

Actual amount incurred.

(5) Other Individual Contract Benefits.

(A) Contract Reserves:

For all other individual contract benefits, morbidity assumptions are to be determined as provided in the reserve standards.

(B) Claim Reserves:

For all benefits other than disability, claim reserves are to be determined as provided in the standards.

(b) Minimum morbidity standards for valuation of specified group contract health insurance benefits are as follows:

(1) Disability Income Benefits Due to Accident or Sickness.

(A) Contract Reserves:

Contracts issued prior to January 1, 1994: The same basis, if any, as that employed by the insurer as of January 1, 1994;

Contracts issued on or after January 1, 1994:

The 1987 Commissioners Group Disability Income Table (87CGDT).

(B) Claim Reserves:

For claims incurred on or after January 1, 1994:

The 1987 Commissioners Group Disability Income Table (87CGDT);

For claims incurred prior to January 1, 1994:

Use of the 87CGDT is optional.

(2) Other Group Contract Benefits.

(A) Contract Reserves:

For all other group contract benefits, morbidity assumptions are to be determined as provided in the reserve standards.

(B) Claim Reserves:

For all benefits other than disability, claim reserves are to be determined as provided in the standards.

II. Interest.

(a) For contract reserves the maximum interest rate is the maximum rate permitted by law in the valuation of annual premium ordinary life insurance for appropriate guarantee duration and issued on the same date as the health insurance contract.

(b) For claim reserves on policies for which contract reserve is required, the maximum interest rate is the maximum rate permitted by law in the valuation of annual premium ordinary life insurance for appropriate guarantee duration and issued on the same day as the claim incurral date.

(c) For claim reserves on policies for which no contract reserve is required, the maximum interest rate is the maximum rate permitted by law in the valuation of single premium immediate annuities issued on the same date as the claim incurred date, such rate reduced by one hundred basis points (1%).

III. Mortality.

(a) The mortality basis used shall be according to a table (but without use of selection factors) permitted by law for the valuation of ordinary life insurance issued on the same date as the health insurance contract.

(b) Subject to approval of the commissioner, other mortality tables adopted by the NAIC and promulgated by the Commissioner may be issued in the calculation of the minimum reserves if appropriate for the type of benefits.

(Amended June 22, 1995)

Appendix B

Reserves for Waiver of Premium (Supplementary explanatory material.)

Waiver of premium reserves involve several special considerations. First, the disability valuation tables promulgated by the NAIC are based on exposures that include contracts on premium waiver benefit status as in-force contracts. Hence, contract reserves based on these tables are NOT reserves on "active lives" but rather reserves on contracts "in force." This is true for the 1964 CDT and for both the 1985 CIDA and CIDB tables.

Accordingly, tabular reserves using any of these tables should value reserves on the following basis:

Claim reserves should include reserves for premiums expected to be waived, valuing as a minimum the valuation net premium being waived.

Premium reserves should include contracts on premium waiver benefit status as in-force contracts, valuing as a minimum the unearned modal valuation net premium being waived.

Contract reserves should include recognition of the waiver of premium benefit in addition to other contract benefits provided for, valuing as a minimum the valuation net premium to be waived.

If an insurer is, instead, valuing reserves on what is truly an active life table, or if a specific valuation table is not being used but the insurer's gross premiums are calculated on a basis that includes in the projected exposure only those contracts for which premiums are being paid, then it may not be necessary to provide specifically for waiver of premium reserves. Any insurer using such a true "active life" basis should carefully consider, however, whether or not additional liability should