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A NEW MORBIDITY TABLE FOR DISABILITY INCOME

By Duane Kidwell

Volume XXXVII of the *Transactions* of the Society of Actuaries includes a report on the construction process for a new disability income valuation table, (1985 CIDA). The 1964 CDT has long been outmoded and a table was needed to express more current experience and to allow flexibility for the valuation of current products. Even though actuaries were using various multiples of the 1964 CDT valuation factors for different claim durations, there was just concern among the regulatory authorities for improving the credibility of statutory valuation. The 1985 CIDA table was, therefore, produced by a Committee of the Society at the request of the NAIC.

The 1985 CIDA takes on a new set of dimensions, expressing rates of incidence and rates of termination from disablement uniquely for combinations of age, sex, cause (accident, sickness or combined), elimination period and occupation class. Each of these factors was evaluated and a method was devised to permit each factor to be recognized in net premiums and reserves. Rates of termination from disablement are in select and ultimate form, including each factor for the period of time that it was found to be significant. Ultimate rates of termination (claim durations of 11 years or more) are sex distinct by attained age.

The 1985 CIDA table produces active life (policy) reserves that are substantially lower than the 1964 CDT in the professional white collar occupation class and slightly higher than the 1964 CDT for the blue collar occupation classes. Policy reserves for female lives for issue ages over 35 are substantially lower than for males. Claim reserves under the 1985 CIDA are generally much higher than under the 1964 CDT, particularly in the blue collar classes and for females. A company holding 110% of the 1964 CDT 3.5% claim reserves on a mature block of claims will find the total reserve about equal to the 1985 CIDA 6% reserves.

The new table provides the opportunity for each insurer to fit a valuation standard to its own mix of business. This is particularly significant to a company marketing primarily to a particular oc-

cupation class, or who issues policies with only 1 or 2 elimination periods. Although many companies now market unisex rates, the Committee's analysis clearly demonstrated the logic for recognizing gender in valuation. The construction method inherently produced appropriate different factors for males and females.

Incidence rates were developed from a combination of industry data and the 1976 New York Study. The New York Study provided the means for finer graduation.

Terminations from disablement rates were developed from 22 companies' experience on individual disability income claim experience during the period 1974-1979 for the early durations (up to 2 years). Group long-term disability income experience from the same period was used for the intermediate durations (3-10 years), with Social Security and premium waiver experience being used for the ultimate durations (over 10 years).

A companion table (1985 CIDB) was developed by Paul Barnhart using a technique that he had earlier developed to express continuance tables by exponential formulae with appropriate factors being chosen to reasonably reproduce experience results. The 1985 CIDB table produces substantially higher claim reserves in the early durations (1st year) and about the same level of reserves in the later durations than does the 1985 CIDA. Either table will be permitted as a minimal reserve valuation standard. The NAIC adopted both tables so as to permit companies now using the Barnhart formulae to continue to do so.

Regulatory authorities can now audit reserves quickly by using a diskette furnished by the Society for the 1985 CIDA table that provides instant, on-the-spot calculation of a policy or claim reserve for any set of identifying parameters: age, sex, duration, elimination period, benefit period or cause, for any interest rate. The diskette can be used on any 256K, IBM compatible P.C. A diskette providing even more flexible options (i.e., for COLA or modifying termination rates) will soon become available from the Society office. □

Our study data showed a wide disparity by company for claims experience during the earlier durations. Therefore, even though we have developed an average industry table, there will be companies who experience in some areas is so unique that the actuary should give further consideration to the adequacy of his reserves. This situation continues to be recognized by the NAIC in the Valuation Standards by suggesting that a company value claims during the first 2 years of claim using its own experience whenever possible, adopting the alternate 1985 Commissioners' tables as a minimum reserve standard, otherwise.

The NAIC also asked for a standard valuation table for Group Long-term Disability claim reserves and such a table has now been prepared for exposure to members of the Society, beginning in February. The proposed Group LTD table recognizes elimination periods of 3, 6 and 12 months on a sex distinct basis. Further flexibility is being introduced to permit modification of termination rates by: number of persons in the group, replacement ratio, broad industry category and broad occupation classes.

Only 15 states currently have specific valuation minimum standards for disability income and it should therefore not be a difficult or lengthy process for the NAIC recommendations to become the legal minimal reserve standards. Nevertheless, in recognizing that the proposed tables produce more appropriate claim reserves, and to adopt the simple flexibility available, some companies report that they are already using the new tables in varying capacity in both statutory and GAAP accounting. We point out that the tables were produced from several broad sources of data for valuation purposes and caution companies to carefully consider the modifications they would need to make to the tables for any particular further use.

The new valuation tables are being received as a most welcome contribution for the administration and regulation of Disability Income Insurance. Equally significant are the techniques for analysis of data, construction of tables and facility of review, introducing the advantages of the high tech age into another phase of the actuary's work. □