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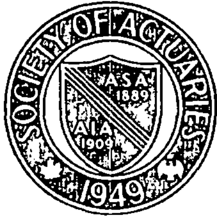

The Actuary
The Newsletter of the Society of Actuaries
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THE JAVITS BILL

The widely-discussed report of the President's Committee on Corporate Pension Funds published in January of 1965 recommended sweeping changes in the Federal laws and regulations. Various bills have been introduced in Congress to implement one or more of the specific recommendations, but none encompassing the major recommendations. The bill (S.1103) introduced by Senator Javits of New York entitled "Pension and Employee Benefit Act of 1967" would implement several of the major, and largely controversial, Committee recommendations.

The principal features are as follows:

(1) Coverage — The Act would apply to all private pension and profit-sharing plans covering 26 or more employees, except plans of any governmental unit, an exempt organization, a plan covering self-employed or an unfunded, unqualified plan.

(2) Pension Commission — There would be established a U. S. Pension and Employee Benefit Plan Commission to replace regulatory functions now performed by Treasury, the Labor Department and the S. E. C.

(3) Registration — All plans would be required to register with the Pension Commission and submit periodic reports. Registered plans would have to include certain minimum benefit and funding provisions. Triennial valuations by an actuary *certified* by the Commission would be required.

(4) Reinsurance — After registration for 5 consecutive years, the Plan would be covered by the reinsurance program to protect accrued benefits against loss by reason of plant shutdown, bankruptcy, etc. The annual premium would be 1% of the unfunded liability.

(5) Voluntary Pension Portability — A special national fund would be established to provide for the handling of vested credits for terminated employees, on a voluntary basis. The vested account could subsequently be transferred back to a private plan under certain conditions.

The Bill provides for certification of actuaries by the Commission. It also requires Commission approval of the actuarial bases used to determine lump-sum values of vested employee equities payable in cash. It is silent as to the extent to which actuarial assumptions and standard funding methods would be prescribed for (1) plan valuations to meet minimum funding requirements, (2) determination of the unfunded liabilities for purposes of the reinsurance premium, and (3) determination of the value of vested benefits for purposes of the "portability fund."

Although several features of the Bill follow the pattern of the 1965 Pension Benefits Act of Ontario, there are several differences. Perhaps the most important is in the extent of coverage. Ontario sets minimum standards for *all* pension plans, including those covering public employees; the Javits' bill applies only to private plans which, as a class, are the best funded.

This Bill may not be enacted in 1967, but may be indicative of future legislative patterns.

ACTUARIAL RESEARCH CONFERENCE AT ANN ARBOR

A seminar on Risk Theory and Selected Topics in Multivariate Analysis was held November 14-16, 1966, at the University of Michigan in Ann Arbor. The Society's Committee on Research and the corresponding Committee of the Casualty Actuarial Society were joint sponsors with the University.

Professor James C. Hickman suggested that individual risk theory be used in teaching life contingencies. This would promote continuity in actuarial education since many of the ideas from statistics would be used in a natural way in developing life contingencies.

Dr. Paul M. Kahn outlined the key idea in the Bohman-Esscher Report for evaluating the distribution function for total claims. The applicability of stochastic approaches developed in many other fields to collective risk problems was pointed out by Professor John A. Beekman. Mr. Donald Jones set forth a general model in which the total amount of claims was viewed as the sum of a random number of claims made up of random variables corresponding to the amounts of the individual claims. Mr. Robert Taylor presented a theory of the composite life insurance risk and also calculated stop-loss reinsurance premiums for two insurance portfolios and various retention and risk levels.

Risk theory in the context of various types of reinsurance was discussed by Mr. John C. Wooddy and experiences in this area were described by Messrs J. W. Lincoln and William A. Drew. An application of collective risk theory to group insurance experience was presented by Mr. Dwight K. Bartlett, III.

Mr. John M. Boermeester discussed a simulation experiment to obtain confidence limits for gross premiums for small groups. A simulation model of a life insurance company reinsurance pool was outlined by Mr. Russell M. Collins, Jr. This model is being developed to guide the choice of reinsurance agreement which will most effectively reduce the fluctuation from year to year in the individual total claim experience of the member companies.

The theoretical development of regression and multivariate analysis was reviewed by Professor Robert V. Hogg.

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MEDICARE REVIEWED AFTER EIGHT MONTHS

At a panel on "Medicare — An Analysis After Eight Months" held by the Chicago Actuarial Club on March 20, Dr. Ted LeBoy, Assistant Medical Director of Continental Assurance Co., commented on some changes that had been observed.

The average length of hospital stay for people in the Medicare age group in Illinois increased by 2.1 days according to a survey taken of 628 community institutions as of December 1966. A further increase appears likely so far this year. One reason for this rise is the additional medical problems discovered during hospitalization when the original diagnosis indicated only a limited stay.

Physicians whose fees have been modified to conform to the provisions of the law have not complained of the adjustments. This may be due to the fact that in a great many instances services are now being paid for where there was formerly a quasi-charitable attitude. Usual and customary charges formerly meant usual for the physician and customary for the area. With the Medicare definition of a prevailing charge for the area, both terms, usual and customary, are being used to describe charges by physicians. In the carriers' commercial business, reductions in payments for physician's services based upon an insurer's usual and customary clause are being resisted by physicians if the reason for the reduction is that their charge is in excess of the customary charge for the area.

Other panelists were Dr. C. L. Reeder and Messrs. William Love and William Cannon. The last two described the Medicare operations of insurers in Illinois and some of their problems. Questions from members elicited further comments.

Charges by physicians increased to the prevailing charge for their area when they learned what that was, with an obvious inflationary effect. Every bill submitted to an insurer must be examined; for example, deductible requirements must be satisfied and charges in excess of the usual and customary must be ascertained. The insurers are using this experience as an aid in paying claims for like cases.

Bills for a physician's services are first compared with bills he had submitted previously for the same procedure. They then are compared with the prevailing charge for the area. About 10 percent of the bills are questioned; this usually discloses that a more complicated procedure was performed than that originally described. Adjustments are made on about 2 percent of the bills.

Actuaries Club Meetings:

- May 8, Michigan Actuarial Society, Detroit, Michigan
- May 19, Hartford and Boston Actuaries Club, Boston, Massachusetts
- May 25-26, Actuaries Club of the Pacific States, Ogai, California
- May 26, Middle Atlantic Actuaries Club (Semi-Annual), Richmond, Virginia

Conference . . .

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He made the point that the mathematical framework, which can be very general, represents merely a starting point for consideration of real problems. Professor Bruce M. Hill pointed out that the Bayesian statistician relies on a mathematical framework that permits combining subjective assumptions with statistical distribution functions.

Dr. Hilary L. Seal presented practical applications of regression analysis. In one case, where the loss ratio for automobile accidents was assumed to be equal to the product of four factors, a suitable transformation reduced the multiplicative model to a linear model.

Dr. Joseph G. Bryan, using a logarithmic transformation, developed the loss ratio for outstanding automobile bodily injury claims on the basis of an analysis of settled claims.

Mr. Gordon D. Shellard discussed a model for the loss ratio under Major Medical Insurance where the four major variables were age, sex, marital status, and duration. He developed separate formulas for each sex in terms of the three remaining variables.

Mr. Edward A. Lew discussed experiments with discriminant analysis to evaluate the underwriting significance of various characteristics of life and health insurance risks. No matter how good the separation might be, appreciable errors in classification are common, even in cases where the significant characteristics are reasonably well understood.

Digests of the papers presented at the conference may be obtained by writing to Professor Cecil Nesbitt, Department of Mathematics, University of Michigan, Ann Arbor, Michigan 48104.

LETTER TO THE EDITOR

Dear Editor:

In the March issue of *The Actuary*, you report that the preparation of a special form regarding pension costs was "revealed" at the March 7 meeting of the American Pension Conference. You indicate that this form "is being prepared to comply with Opinion No. 8" of the AICPA and that the form "is for auditors to use when requesting necessary information from actuaries with respect to pension plans."

Some attending the March 7 meeting were not aware that such a "special form" was revealed, and I think *The Actuary* exaggerates the importance of this particular form. So far as I am able to determine, this form has no official sanction and represents only the efforts of one or two accounting firms to think through and perhaps simplify the auditing problems that may arise under Opinion No. 8. We have been exposed to other efforts along the same line.

I also think the assertion that the form is for auditors to use "when requesting necessary information from actuaries" must contain an inaccuracy. Information can be properly provided to accountants by actuaries only at the request of the actuary's principal.

Since numerous aspects of Opinion No. 8 have practical significance only in special cases, completion of a form contemplating all of the ramifications of Opinion No. 8 would create unnecessary expense for most employers. I do not believe that practicing auditors wish to impose an excessive expense on their clients, and my guess is that no standard reporting form for actuaries will be developed under Opinion No. 8.

John Hanson
Chicago, Illinois
April 7, 1967