only effective way of ascertaining how far the contributions fall short of providing the whole of the benefits is to make an ordinary actuarial valuation of the whole of the liabilities and assets, as the result of which the total discounted liabilities must be equalized by the sum of the total discounted contributions (including Government annual subsidies) and the present accumulated funds, the item subject to adjustment being the subsidies. The resulting detailed Valuation Balance-sheet is shown in Table XI, which is summarized as follows:—

Liabilities.

Value of contributors' pensions already granted for £38,253 pe	av e
Value of widows' and children's pensions already granted for £1,69	
per annum	k
service	1,199,784
Value of prospective pensions (to present contributors) for future	e:
service)	798,916
Value of prospective pensions to widows and children of present con	1-
tributors	
Value of return of contributions on death or withdrawal	258,914
	£2,959,116
Assets.	
Accumulated funds	263,948
Value of contributors' contributions	963,060
Value of present and future Government subsidies	1,732,108
	£2,959,116

- 9. The chief points of note in the foregoing valuation summary are :-
 - (a.) The value of the contributors' contributions (£963,060) considerably exceeds the value of contributors' prospective pensions for future service (£798,916).
 - (b.) The greater part of the Government's liability is caused by the pensions for back service, the value of which is £1,199,784, but for which the present annual subsidy would have been sufficient without further increases.
 - (c.) The value of the total liabilities to be met by the application of present and future subsidies is £1,732,108, and I now proceed to report as to the probable annual sums required by the Fund as subsidy during the ensuing three years.
- 10. I must preface this portion of my report by a statement in reference to the two sets of data upon which the present investigation and a previous one made four years ago were based. In 1907 I supplied actuarial reports upon the Civil Service Superannuation Bill, 1906, and the Public Service Superannuation Bill, 1907, from the former of which it will be seen (I.-11A, p. 10) that information was furnished to me respecting 5,593 persons with aggregate salaries amounting to £876,125 per annum. It was then understood that those figures approximately represented the maximum numbers and salaries of initial contributors to the Fund then being started. But during the first year of the Fund no less than 7,546 contributors joined, with aggregate salaries amounting to £1,154,866 per annum; or, to put it more clearly, the original data supplied to me contained approximately not more than three-fourths of the contributors who actually joined the scheme at the outset. I am not aware that any one was to blame in the matter; the result was probably due to bringing classes of public servants into the scheme not originally contemplated. The only reason for drawing attention to the matter now is that numerous estimates put forward in my 1907 reports, or submitted by me in evidence before the Public Accounts Committees of 1907 and 1908, were consequently understated, and should be increased by one-third, or otherwise the material difference between my former and present estimates might lead to serious misunderstanding.

11. I have estimated "the probable annual sums required by the Fund to provide the retiring and other allowances falling due within the ensuing three years without affecting or having recourse to the actuarial reserve appertaining to the contributors' contributions," as required by the Act, and the following is the result:—

Required for	1911,	1912.	1913.
Current ordinary pensions Prospective pensions to existing contributors now over pension age	£ 36,280 4,391 4,707	£ 34,283 4,199 12,293	£ 32,266 4,000 19,845 56,111
Deduct amounts provided by contributors' contributions without having recourse to the actuarial reserve appertaining to them*	2,318	3,250	4,350
Subsidies required for ensuing three years	43,060	47,525	51,761

* For definition of this see paragraph 12.

I therefore have to report that, in addition to the annual subsidy of £23,000 now being paid, further subsidies of £20,000, £24,500, and £29,000 will be the minimum likely to be required for the years 1911, 1912, and 1913 respectively.