CANADIAN INSTITUTE OF FORESTRY SALARY SURVEY REPORT — 1964

By J. E. MARSHALL

- The report this year is based exclusively on the regular annual Department of Labour survey—sample coverage is therefore only one-third that of previous C.I.F. salary surveys.
- Better coverage for British Columbia was obtained—foresters who were not C.I.F. members were included this year for the first time.
- The median income was \$8,250 in 1963 compared to \$7,950 in 1962, an increase of 3.8 per cent.
- The median income of industrial foresters increased at a rate 1.3 times that of government foresters.

This report presents summarized data regarding foresters' salaries for the 8th consecutive year. However, because of the amount of work involved and the shortage of staff in the Surveys and Analysis Section of the Department of Labour, it was decided to dispense with the normal C.I.F. annual salary survey this year. To preserve continuity where possible with past survey information, figures were compiled from data provided by the Department of Labour from their annual Survey of the Scientific and Technical Professions. This survey covers a representative sample of one-third of all engineers and scientists in Canada. In addition, the Department of Labour has made available for distribution with this issue of the *Forestry Chronicle*¹ copies of their preliminary report, "Professional Manpower Bulletin". The Committee on behalf of the C.I.F. would like to express its sincere appreciation to Mr. A. W. Cowan and his associates in the Department of Labour for the tabulations and helpful co-operation received.

Because of the diminished sample size this year, several tables and figures presented in previous surveys had to be either deleted or combined to form a new consolidated table.

Table 1, is a consolidation of last year's Tables 3 and 4. The average number of years since Bachelor graduation has diminished one year for Canada as a whole. All regions show a reduced number of years since graduation, but British Columbia shows a relatively large reduction of two years. The latter situation is most likely due to the inclusion of non-C.I.F. members. This group is concentrated in the government sector and probably explains to some degree the reduced median income of government foresters in that Province in comparison with last year. Atlantic industrial foresters are the only other group showing a lower median this year than last, and while reduced sample size is the most obvious explanation, it is not an entirely satisfactory one. Quebec incomes show a surprisingly sharp increase considering the fact that the average number of years since graduation has dropped one full year.

¹Editor's Note: These were not available in time for distribution with the June issue.

In Table 2 (last year's Table 5) figures for all categories in British Columbia reflect the broader sample coverage of that Province this year, as has already been mentioned. The third quartile and upper decile figures for the Atlantic region are difficult to explain, but show that the salary declines in comparison to last year are confined to these two upper categories. Foresters' salaries in the Province of Quebec show substantial increases in the median and higher categories.

Table 3 (last year's Table 7) shows salaries of recent graduates to have increased noticeably this year for all categories. The number of replies, however, is very small.

Tables 4 and 5 are new this year. They replace Figures 4 and 5 of last year's survey and contain information which is self-explanatory.

The purpose of Table 6 (last year's Table 8) is to compare the general rising trend in wages with the rise in the retail price index over the last 5 years. Note for 1963 that prices appear to have risen proportionately at a more rapid rate than have wages. Looking to the past 5-year period, though, incomes of the entire Canadian work force have risen 13.5 per cent, while those of foresters in general have risen 17.9 per cent. During this period the cost of living as represented by the retail price index has risen 5.1 per cent. The increase in foresters' earnings is weighted lower than it should appear for two reasons. Firstly, because the figure for Quebec is lower than it should be, since data for the Quebec Corporation of Forest Engineers were not included until the year 1960. Secondly, because the British Columbia figure is not realistic owing to the inclusion for the first time this year of non-C.I.F. foresters. The increase in the median income for foresters in Canada as a whole over the past 5-year period is more likely to be in the vicinity of 19 per cent than the 17.9 per cent shown.

The intent of Table 7 (last year's Table 9) is to show the comparison of median annual earnings by years from Bachelor graduation for forestry, engineering and natural science. However, figures in engineering and natural science were not available in time for this report. Space, therefore, is being left for the interested reader to enter these figures and make his own comparison since his information is supplied in the Professional Manpower Bulletin.

A current version of last year's Figure 6, giving a comparison of the median annual salaries of foresters in government, industry and university with those of other professions, could not be included this year because the required information was not available in time. However, the reader will find the same figure, save perhaps for a small amount of forestry detail, in the Professional Manpower Bulletin.

The change in survey method this year, which may be viewed as an experiment, has resulted in a more condensed report since certain detail has been omitted. It is for the members of the Institute to decide, therefore, whether they find this year's type of report adequate. If it is not detailed enough for every year, perhaps it would be suitable for alternate years. The Salary Survey Committee invites suggestions in this regard.

NOTE

- (a) Upper Decile—The figure above which 10% of the reporting returns fall.
 (b) Upper Quartile—The figure above which 25% of the reporting returns fall.
 (c) Median—the middle item when all items are arranged according to size.
 (d) Lower Quartile—The figure above which 75% of the reporting returns fall.
 (e) Lower Decile—The figure above which 90% of the reporting returns fall.

TABLE 1
REGIONAL MEDIAN INCOME BY CLASS OF EMPLOYMENT

Region and Class of Employment	Median Income		Average Number of Years Since Graduation	
	1962	1963	1962	1963
ATLANTIC			15.5	14.9
Industry	8,250	7,650		
Government	6,750	7,400		
QUEBEC			15.9	14.9
Industry	8,750	9,700		
Government	6,700	7,100		
ONTARIO			15.6	15.4
Industry	9,350	9,950		
Government	7,500	8,100		
PRAIRIES			13.0	12.9
Industry	9,250	—		
Government	7,250	7,600		
BRITISH COLUMBIA			14.3	12.3
Industry	8,700	8,800		
Government	7,600	7,100		
CANADA				
Industry	8,900	9,300		
Government	7,250	7,500		
University	8,900	9,500		
Secondary Schools	7,150	7,500		
CANADA	7,950	8,250	15.2	14.2

Figure 1 - Median Incomes from Eight Consecutive Salary Surveys
(Average number of years of experience or years since Bachelor Graduation in brackets)

TABLE 2

REGIONAL INCOME BY YEAR OF BACHELOR GRADUATION
ALL CLASSES OF EMPLOYMENT — 1963

Region	Year of Bachelor Graduation	Lower Decile	First Quartile	Median	Third Quartile	Upper Decile
ATLANTIC	1923-1932	—	—	—	—	—
	1933-1942	\$6,000	7,150	8,000	9,500	12,000
	1943-1952	6,200	7,100	8,000	9,000	9,850
	1953-1962	4,800	5,500	6,500	7,500	9,600
	Total	5,350	6,500	7,650	9,050	11,000
	*Percentage Change	3.9	6.6	3.4	-0.6	-7.7
QUEBEC	1923-1932	6,700	9,500	17,000	22,500	33,000
	1933-1942	7,400	8,500	10,350	12,850	15,100
	1943-1952	6,700	8,400	9,750	12,200	15,350
	1953-1962	5,100	5,500	6,650	7,750	9,250
	Total	5,550	6,700	8,700	11,050	15,800
	*Percentage Change	3.7	5.5	10.1	5.2	22.5
ONTARIO	1923-1932	7,150	10,250	14,100	18,600	22,850
	1933-1942	7,050	8,400	10,750	14,850	17,800
	1943-1952	7,100	8,050	8,900	10,550	12,750
	1953-1962	5,400	6,150	6,750	7,750	9,650
	Total	6,200	7,150	8,650	10,750	15,000
	*Percentage Change	5.1	5.1	5.5	4.4	4.5
PRAIRIES	1923-1932	—	—	—	—	—
	1933-1942	—	—	—	—	—
	1943-1952	7,150	7,550	8,250	10,350	11,950
	1953-1962	5,200	5,500	6,600	6,750	7,400
	Total	5,500	6,550	7,600	8,850	11,700
	*Percentage Change	1.9	2.3	2.0	0	9.3
BRITISH COLUMBIA	1923-1932	—	—	—	—	—
	1933-1942	6,800	8,500	10,250	12,000	22,000
	1943-1952	6,450	7,350	8,350	9,550	12,100
	1953-1962	5,050	5,550	6,400	8,050	12,500
	Total	5,400	6,350	7,900	9,850	12,950
	*Percentage Change	-2.8	-6.3	-4.4	-4.6	0.4

* Percentage change between 1962 and 1963.

TABLE 3

ANNUAL INCOME OF 1961 GRADUATES IN 1962, AND 1962 GRADUATES IN 1963

	1961 Graduates in 1962	1962 Graduates in 1963
Lower Decile	\$4,000	4,350
First Quartile	4,500	4,800
Median	5,150	5,300
Third Quartile	5,600	5,750
Upper Decile	5,900	6,000
Average Income	4,900	5,300

(Based on 23 replies in 1963 and 32 replies in 1962)

TABLE 4

MEDIAN ANNUAL EARNINGS BY YEAR OF BACHELOR GRADUATION AND
LEVEL OF EDUCATION, 1963

Year of Bachelor Graduation	Total	Level of Education			
		No Degree	Bachelor's	Master's	Doctor's
Before 1926	5	—	—	—	—
1923-1932	54	\$12,250	11,750	17,000	—
1933-1942	73	9,950	9,600	—	—
1943-1952	286	8,700	8,700	8,550	10,350
1953-1962	223	6,550	6,300	6,650	—
Total	641	8,250	8,050	8,400	10,200

TABLE 5

MEDIAN ANNUAL EARNINGS BY REGION AND WORK FUNCTION, 1963

Region	Total	Work Function	
		Research and Teaching	Other
Atlantic	70	\$7,650	7,400
Quebec	147	8,700	8,900
Ontario	211	8,650	8,850
Prairies	39	7,600	7,650
Pacific	174	7,900	8,000
Total	641	8,250	8,300

TABLE 6

AVERAGE YEARLY WAGES AND SALARIES—INDUSTRIAL COMPOSITE¹
(ENTIRE CANADIAN WORKING FORCE)

Province	1959		1960		1961		1962		1963		% Increase over 1959
	Income	Increase %	Income	Increase %	Income	Increase %	Income	Increase %	Income	Increase %	
Nfld.	\$3,311	6.6	\$3,531	5.2	\$3,716	2.6	\$3,811	3.3	\$3,935	18.8	
P.E.I.	2,847	0.5	2,860	3.7	2,965	2.1	3,027	3.9	3,144	10.4	
Nova Scotia	3,129	4.1	3,258	2.1	3,327	2.8	3,419	4.1	3,560	13.8	
N. Brnswk.	3,140	3.8	3,258	1.4	3,305	3.4	3,416	4.3	3,563	13.5	
Quebec	3,669	3.5	3,796	3.2	3,917	3.5	4,056	3.6	4,204	14.6	
Ontario	3,972	3.1	4,093	3.1	4,219	3.1	4,351	3.4	4,500	13.3	
Manitoba	3,648	2.2	3,729	2.4	3,820	2.8	3,927	2.6	4,030	10.5	
Sask.	3,647	2.9	3,751	2.9	3,858	3.8	4,005	3.0	4,125	13.1	
Alberta	3,933	2.9	4,047	3.4	4,184	0.2	4,191	4.3	4,372	11.2	
B.C.	4,165	3.6	4,314	2.7	4,430	0.2	4,438	6.0	4,706	13.0	
Canada	3,820	3.2	3,943	3.0	4,062	3.1	4,189	3.5	4,334	13.5	

RETAIL PRICE INDEX²

Canada (base year 1949)	126.5	1.2	128.0	0.9	129.2	1.2	130.7	1.8	133.0	5.1
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MEDIAN ANNUAL INCOME OF FORESTERS BY REGIONS

	1959		1960		1961		1962		1963		% Increase over 1959
	Income	Increase %	Income	Increase %	Income	Increase %	Income	Increase %	Income	Increase %	
Atlantic	\$6,550	3.1	\$6,750	3.0	\$6,950	6.5	\$7,400	3.4	\$7,650	16.8	
Quebec ³	7,400	-1.4	7,300	3.4	7,550	4.6	7,900	10.1	8,700	17.6	
Ontario	7,150	3.5	7,400	6.1	7,850	4.5	8,200	5.5	8,650	21.0	
Prairies	6,550	5.3	6,900	3.6	7,150	4.2	7,450	2.0	7,600	16.0	
B.C. ⁴	7,200	4.2	7,500	2.7	7,700	7.1	8,250	-4.4	7,900	9.7	
Canada	7,000	4.3	7,300	3.4	7,550	4.4	7,950	3.8	7,250	17.9	

¹From "Employment and Payrolls", Dominion Bureau of Statistics, Ottawa, 1963.²From "Prices and Price Indexes", Dominion Bureau of Statistics, Ottawa, January, 1964.³Salary information regarding members of the Quebec Corporation of Forest Engineers was not included in 1959.⁴The sample was enlarged in 1963 to include a considerable number of non-C.I.F. members. Figures for this year are not suitable for comparison with those of previous years.

TABLE 7

MEDIAN ANNUAL EARNINGS BY YEARS FROM BACHELOR GRADUATION;
ENGINEERING, NATURAL SCIENCE, AND FORESTRY — 1963

Years from Bachelor Graduation	Engineering** Median*	1Natural Science** Median*	Forestry Median
1	—	—	\$5,300
2	—	—	5,600
3	—	—	5,800 ²
4	—	—	6,350
5	—	—	6,400
6-10	—	—	7,500
11-15	—	—	8,650
16-20	—	—	9,300
21-25	—	—	10,400 ²
26-30	—	—	12,000
31-35	—	—	12,000
36-40	—	—	13,000
Total, All Years	—	—	8,250

* Excludes self-employed respondents.

** Source: Professional Manpower Bulletin, Economics and Research Branch, Department of Labour, Canada, May, 1964.

¹ Includes: Biology, Chemistry, General, Geology, Mathematics, Mathematics and Physics, and Physics.

(²) Estimated.

For your convenience The Forestry Chronicle offers a free employment service. Prospective employers or applicants should write to Mr. George A. Sinclair, Ontario Department of Lands & Forests, Tweed, Ontario, who will prepare applications for publication. Applicants are requested to include their own advertisement giving the following information: University granting degree, year of graduation, years and type of experience and type of employment preferred.

Employment Wanted:

Graduate Forester—University of Zagreb 1951, 38 years old, 7 years in forest management in Yugoslavia, 2 years in France, 4 years in Canada. Experience in management, planning, quality control studies, road location and building, logging operations, consulting. Languages—English, French, Italian, Yugoslavian. Interested in working for pulp and paper company. Please refer to code No. F.I.5.

Forester Wanted:

Graduate foresters or forest technicians, preferably with some pulpwood operating experience wanted for Operations Group of paper company in Northern Ontario. Following six to twelve months training, successful applicant would be placed in Operating Camp Supervisory and/or Forestry position. Salary commensurate with experience and qualifications. All applications received up to June 30th will be considered. Please refer to Code No. F.I.4.