PROVINCE OF BRITISH COLUMBIA

Department of Industrial Development, Trade, and Commerce

REPORT

for the

YEAR ENDED DECEMBER 31

1964

To Major-General the Honourable GEORGE RANDOLPH PEARKES,
V.C., P.C., C.B., D.S.O., M.C.,
Lieutenant-Governor of British Columbia.

MAY IT PLEASE YOUR HONOUR:

I beg to submit herewith the Report of the Department of Industrial Development, Trade, and Commerce for the year ended December 31, 1964.

RALPH R. LOFFMARK,
Minister of Industrial Development,
Trade, and Commerce.

The Honourable Ralph R. Loffmark,
Minister of Industrial Development, Trade, and Commerce,
Victoria, B.C.

SIR,—I have the honour to submit herewith the Report of the Department of Industrial Development, Trade, and Commerce for the year ended December 31, 1964.

THOMAS L. STURGESS,
Deputy Minister of Industrial Development,
Trade, and Commerce.

Report of the Department of Industrial Development, Trade, and Commerce

For the Year Ended December 31, 1964

FOREWORD

Supported by an unprecedented level of capital expenditure together with buoyant export markets and enlarged industrial capacity, the British Columbia economy in 1964 continued to enjoy dynamic growth characteristics. Of particular importance were advances in capital construction, including hydro and pulp and paper developments.

Total capital investment in 1964 is expected to reach $1.6 billion, thereby eclipsing the all-time record established in 1957. The single most important economic event of the year was the ratification of the Columbia River Treaty in September, 1964. For the next 10 to 15 years an annual average of 1,350 men will be employed to bring the giant project, the total cost of which is estimated at $410,000,000, to a close. Work is also progressing very favourably on the Peace River project. British Columbia Hydro and Power Authority will spend an estimated $50,000,000 on the project during the fiscal year ending March 31, 1965. Other power developments in 1964 included new transmission-lines from Grand Forks to Penticton and from Quesnel to Prince George, installation of a third thermal unit at Ioco, and replacement of the wood-crib dam at Lower Bonnington.

Capital expenditures by the British Columbia pulp and paper industry during 1964 reached an estimated $130,000,000, up considerably from previous years. Pulp-mill expansion programmes have been carried out at Duncan Bay, Port Alberni, and Port Alice, and there are three new mills under construction at Prince George and Kamloops. Also completed during the year was a $25,000,000 newsprint-mill at Crofton.

Other major capital expenditures included the completion of a $57,000,000 natural-gas line from Chetwynd to Fort Nelson; improved loading and storage port facilities in North Vancouver, Port Moody, and Vancouver totalling $32,000,000; and commencement of a 100-mile extension of the Pacific Great Eastern Railway from Summit Lake to Fort St. James at a total cost of $18,000,000.

Farm cash income for 1964, estimated at $147,870,000, was down slightly from the record set in 1962. The decline is attributed to inclement weather. Production was, in general, increased in all sectors of the agricultural industry, but markets, and hence prices, have been weak.

The performance of the British Columbia fisheries industry in 1964 was, with an estimated wholesale market catch valued at $90,000,000, considerably better than expected.

Mining activity also continued on a high level, with important developments in copper, molybdenite, and iron. Consolidated Mining and Smelting Company, Limited, has undertaken several chemical and fertilizer expansions at its Kimberley and Trail sites, bringing fertilizer capacity up to 1,000,000 tons per annum.

The selling value of products from the Province's manufacturing plants in 1964 was estimated at $2.6 billion, up almost 10 per cent over 1963. The forest industries provided the major impetus, with lumber production up 3 per cent, plywood

production up 13 per cent, pulp production up 15 per cent, and paper production up 14 per cent.

Commodity exports through British Columbia customs ports are expected to reach $1,625,000,000 in 1964, up $225,000,000 from 1963. Important gains were made in shipments to the United Kingdom (up 25 per cent) and the Common Market (up 37 per cent), although the United States continues to be by far our best market, absorbing over 40 per cent of British Columbia's exports.

The labour force of the Province increased in 1964 by almost 5 per cent over 1963. Personal incomes were up 8.4 per cent over 1963, while retail trade had increased by 10 per cent.

Present indications foretell further advances by British Columbia along the road of economic expansion in 1965. With the impetus to be anticipated from many projects still under construction, a continuation of British Columbia's high level of capital investment can be assumed.

Following in this Report are summaries of the activities of the various divisions of this Department—namely, the Bureau of Economics and Statistics; the Industrial and Trade Office; the Data Processing Division; British Columbia House, London, England; and British Columbia House, San Francisco, Calif. The objectives and organization of the British Columbia Research Council are also included.

BUREAU OF ECONOMICS AND STATISTICS

Prior to reviewing the work accomplished by the Bureau of Economics and Statistics during 1964, it should be explained that the Bureau is a fact-finding and advisory body. It has two primary functions: the first is to provide economic counsel to all who request it and, when necessary, to conduct investigations into economic questions affecting the Province; the second function is to collect and compile economic statistics of the Province which are of interest and value.

The Bureau has endeavoured to follow a policy of building up a select group of professional personnel who are capable of performing a variety of difficult economic analyses. This policy is designed to ensure technical proficiency. It has also been a Bureau policy to make the services of its personnel available at all times to any department of the Government. A description follows of the various services performed during the year.

ECONOMIC RESEARCH

The Bureau received many requests for information about the Provincial economy from private individuals, companies, associations, newspapers, and business publications. Much of the information requested is available in the Bureau's files and library, but special surveys and considerable research are often necessary.

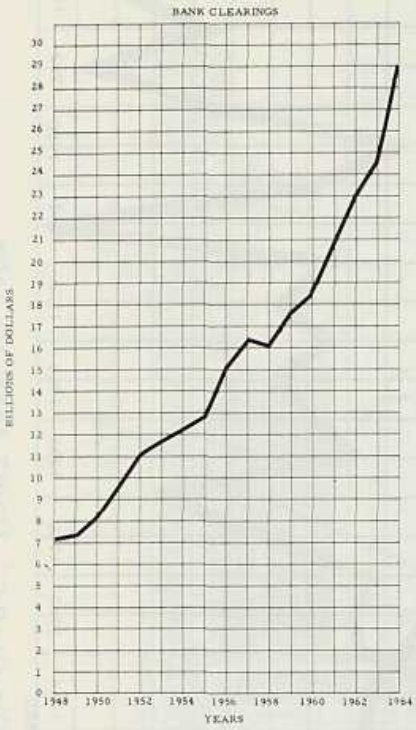
One of the Bureau's primary functions is to provide economic counsel to the Government. Each week a report is prepared supplementary to this function and distributed to the Premier and to the members of the Executive Council. These weekly reports review and summarize significant events and developments in the field of economics which are considered of importance to the Province. Technical assistance is also given to the many branches of the Government, as requested. Numerous publications are issued to keep government and industry informed of current business conditions. The two publications most widely distributed are the "Monthly Bulletin of Business Activity" and the "Annual Summary of Business Activity." The former contains a brief description of current changes in monthly business indicators, plus statistical tables and charts, and the latter records the past year's performance in relation to the previous 10 years, utilizing charts and historical series to illustrate the current economic position of the Province. In recent years an executive opinion poll has been conducted at the end of each year to assess the outlook of industry for the coming year.

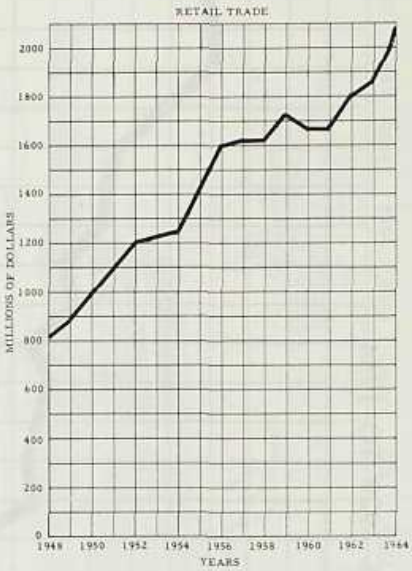
The annual study of wage rates for selected occupations in various centres of the Province continues to be published. The Civil Service Commission, as well as other Government agencies and the public, has been provided with these comparative wage rates.

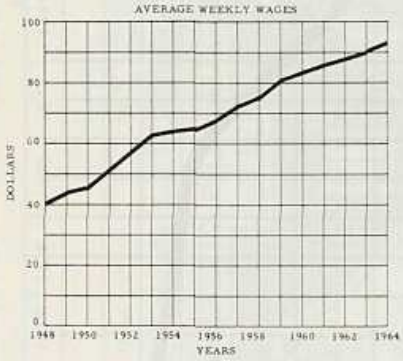
Economic Activity in British Columbia, 1962, 1963, and 1964

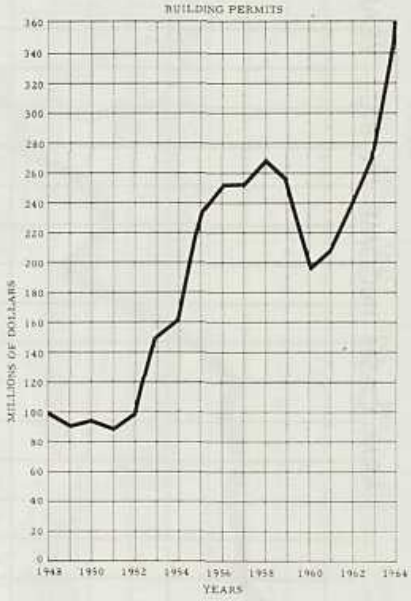
	Unit or Base Period	1962	1963	1964 Preliminary Estimates
Mining—				
Total value of production	$000	229,371	257,514	262,200
Zinc	$000	51,356	53,069	58,300
Copper	$000	33,209	37,817	36,000
Lead	$000	34,537	37,835	38,400
Iron concentrates	$000	2,060	20,746	20,650
Industrial minerals	$000	14,304	16,511	16,650
Structural materials	$000	21,366	23,882	25,150
Petroleum, crude	$000	17,617	25,470	24,460
Natural gas	$000	10,323	10,909	11,790
Forestry—				
Total value of production	$000	812,000	850,000	900,000
Timber scaled	M cu. ft.	1,343,000	1,473,000	1,514,000
Lumber production	M f.b.m.	6,004,000	6,381,000	6,600,000
Pulp production	Tons	2,411,000	2,480,000	2,850,000
Paper production	Tons	1,201,000	1,220,000	1,390,000
Fisheries—				
Wholesale marketed value of production	$000	94,673	76,000	90,000
Pack of canned salmon	Cases	1,816,585	1,203,271	1,251,618
Agriculture—Farm cash income	$000	151,688	149,572	147,870
Manufacturing—Factory shipments	$000	2,182,374	2,425,000	2,630,000
External trade—				
Exports through B.C. customs ports	$000	1,244,712	1,398,720	1,625,000
Imports through B.C. customs ports	$000	421,603	476,962	550,000
Internal trade—				
Gasoline consumed	Gallons	358,835,000	377,625,000	410,000,000
Electric power generated	000 kwh.	14,613,000	15,408,000	17,000,000
Railway freight loaded and received in British Columbia	Tons	13,858,657	14,741,324	16,000,000
Sales of life insurance	$000	404,520	458,640	505,000
Total retail sales	$000	1,797,090	1,902,255	2,095,000
Motor-vehicle dealers	$000	308,370	350,397	410,000
Department stores	$000	264,754	282,954	315,000
Capital investment—				
Capital and repair expenditure	$000	1,287,900	1,381,600	1,600,000
Building permits	$000	237,124	270,809	350,000
New residential units—starts	Units	13,892	17,329	26,000
Finance—Cheques cashed	$000	23,089,746	25,069,589	29,000,000
Employment (June)—				
Labour force	Number	613,000	623,000	653,000
Employed	Number	580,000	591,000	620,000
Unemployed	Number	33,000	32,000	33,000
Employment indices (based on firms with 15 or more employees)—				
All employment	1949=100	115.7	119.9	125.3
Manufacturing	1949=100	121.1	124.8	127.0
Iron and steel products	1949=100	113.0	125.4	137.2
Lumber and plywood	1949=100	122.6	128.5	131.0
Pulp and paper	1949=100	198.3	210.3	224.7
Mining	1949=100	76.6	82.6	81.5
Logging	1949=100	76.3	80.3	81.0
Transportation, storage, and communication	1949=100	114.2	115.1	120.1
Service	1949=100	136.7	142.9	158.9
Construction	1949=100	100.9	102.6	108.7
Labour income	$000	2,090,000	2,248,000	2,440,000

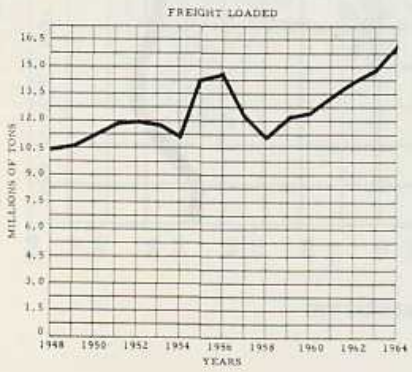
Economic Indicators in British Columbia

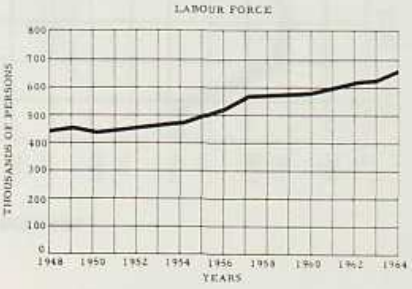


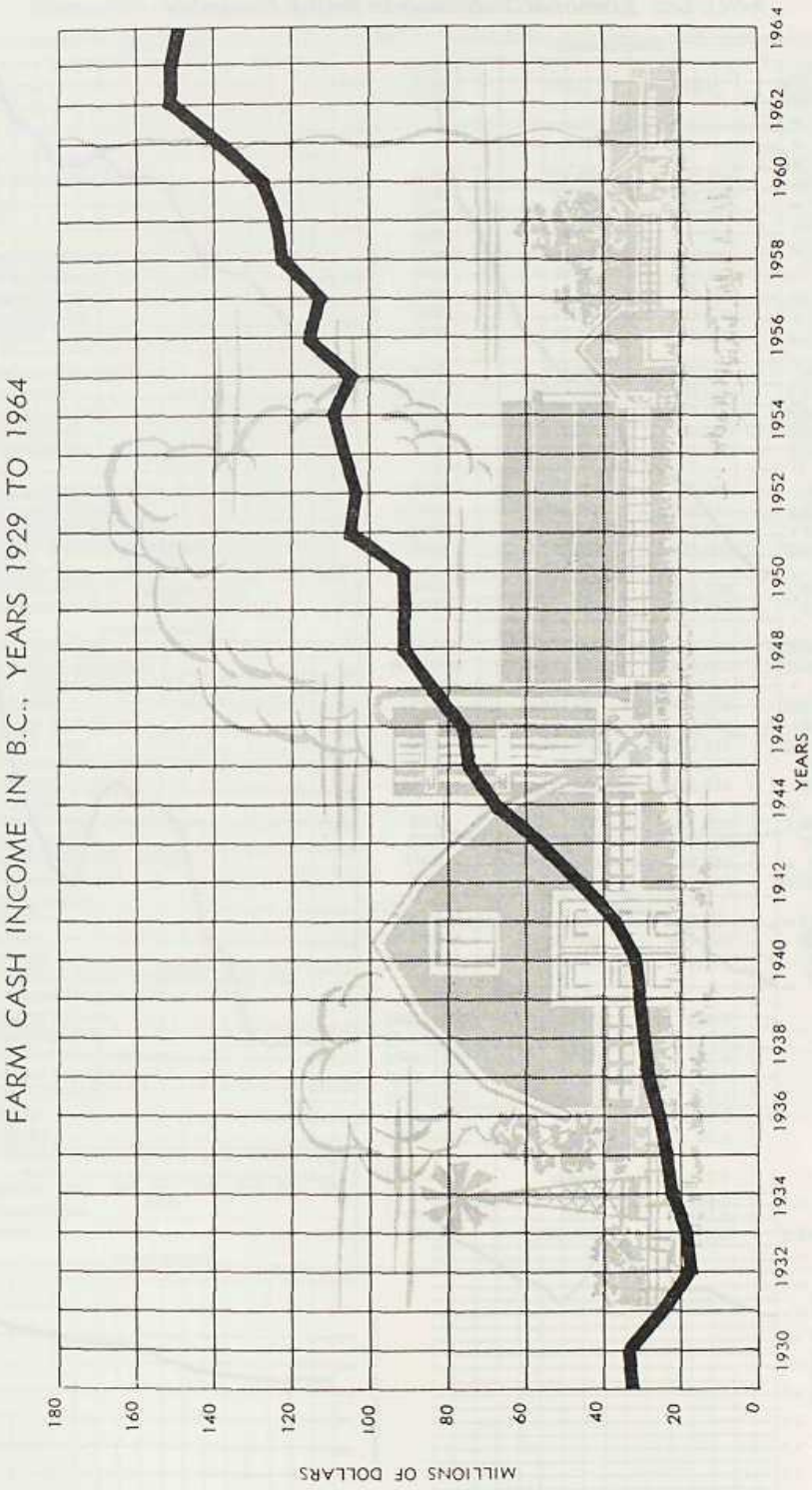


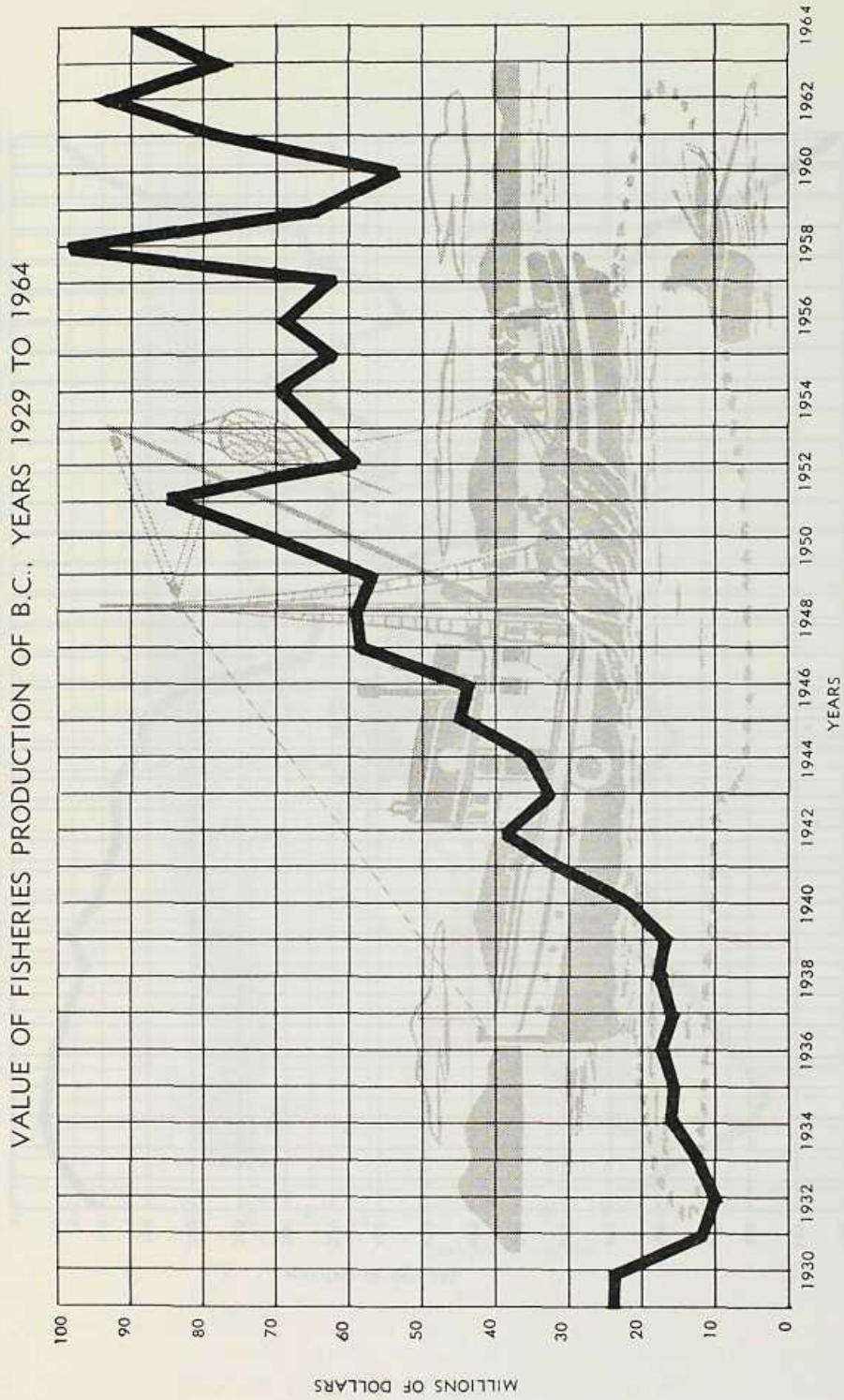


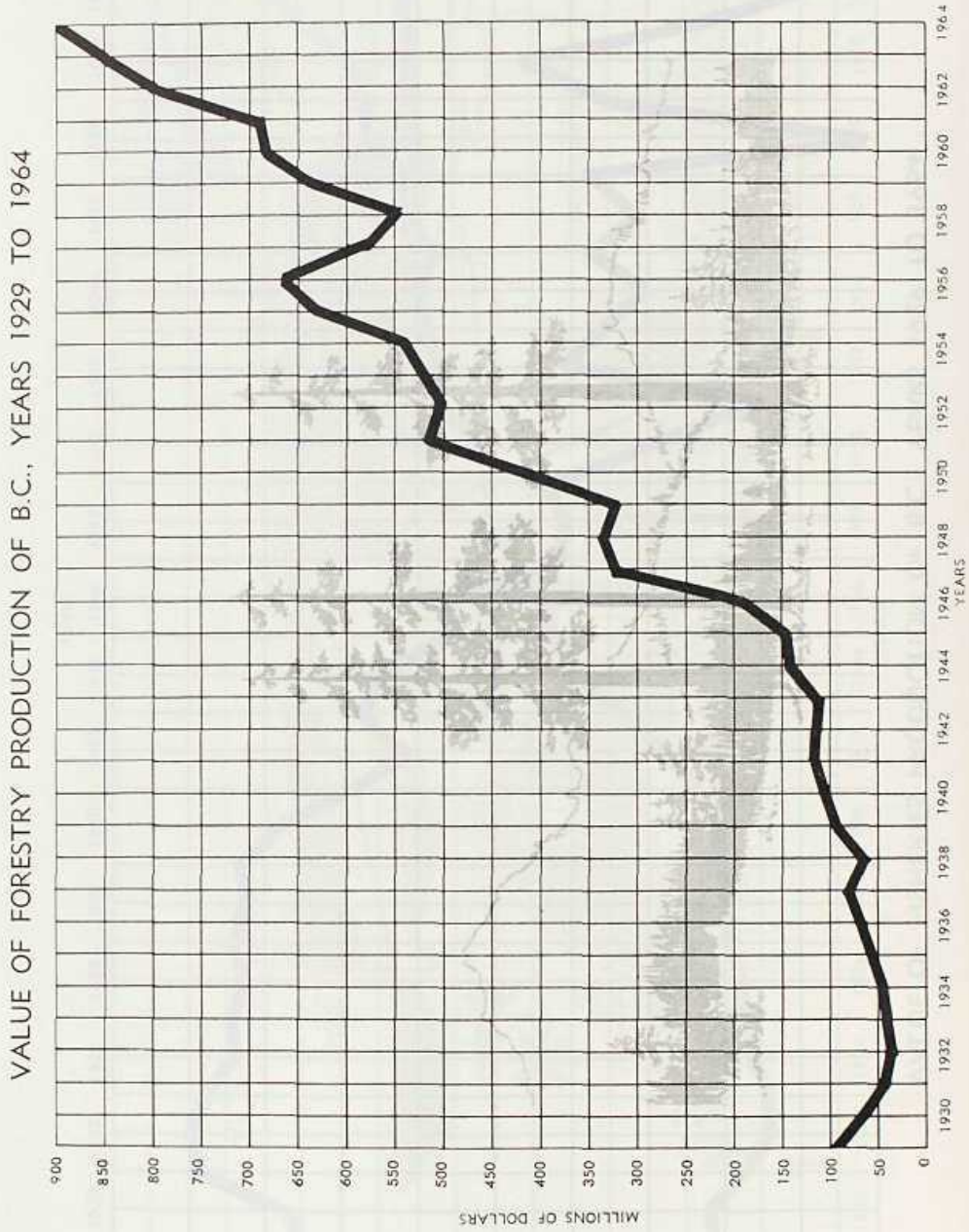







FARM CASH INCOME IN B.C., YEARS 1929 TO 1964
MILLIONS OF DOLLARS
180
160
140
120
100
80
60
40
20
0
1930
1932
1934
1936
1938
1940
1942
1944
1946
1948
1950
1952
1954
1956
1958
1960
1962
1964
YEARS


VALUE OF FISHERIES PRODUCTION OF B.C., YEARS 1929 TO 1964
MILLIONS OF DOLLARS
100
90
80
70
60
50
40
30
20
10
0
1930
1932
1934
1936
1938
1940
1942
1944
1946
1948
1950
1952
1954
1956
1958
1960
1962
1964
YEARS


VALUE OF FORESTRY PRODUCTION OF B.C., YEARS 1929 TO 1964
MILLIONS OF DOLLARS
900
850
800
750
700
650
600
550
500
450
400
350
300
250
200
150
100
50
0
1930
1932
1934
1936
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1944
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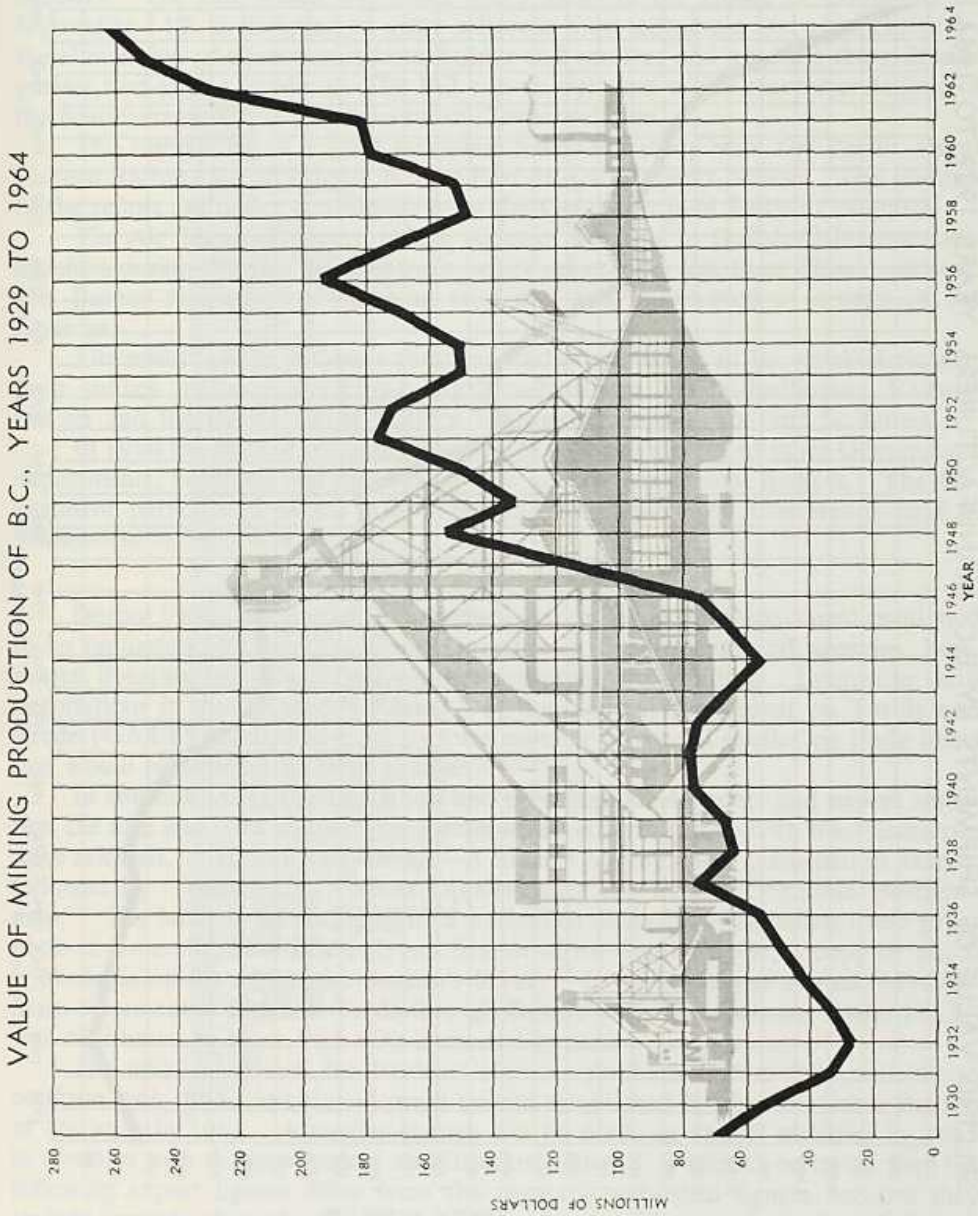
1960
1962
1964
YEARS


VALUE OF MINING PRODUCTION OF B.C., YEARS 1929 TO 1964
MILLIONS OF DOLLARS
280
260
240
220
200
180
160
140
120
100
80
60
40
20
0
1930
1932
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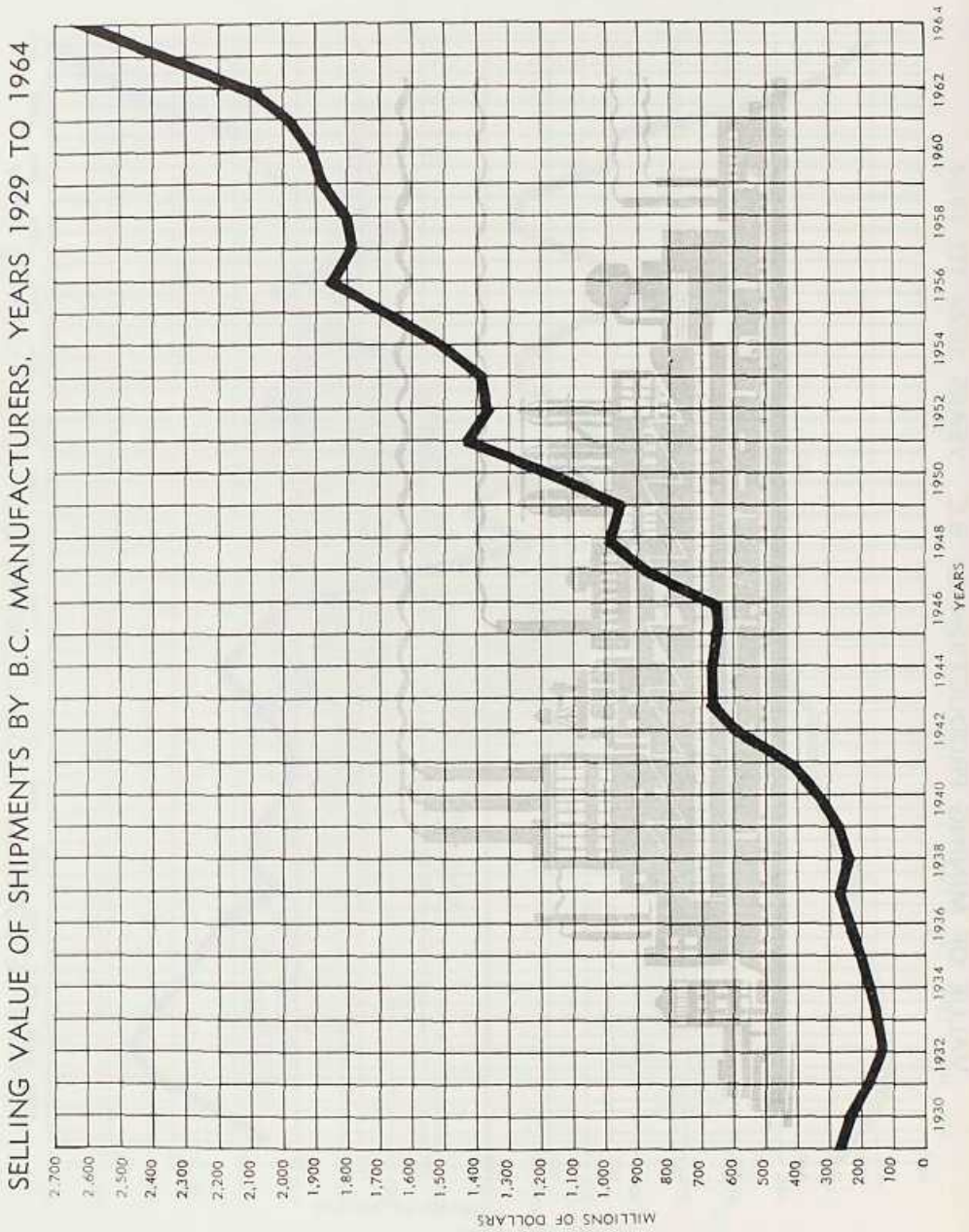
1958
1960
1962
1964
YEAR


SELLING VALUE OF SHIPMENTS BY B.C. MANUFACTURERS, YEARS 1929 TO 1964
MILLIONS OF DOLLARS
2,700
2,600
2,500
2,400
2,300
2,200
2,100
2,000
1,900
1,800
1,700
1,600
1,500
1,400
1,300
1,200
1,100
1,000
900
800
700
600
500
400
300
200
100
0
1930
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1962
1964
YEARS

TRANSPORTATION

During 1964 the Bureau of Economics and Statistics undertook an appraisal of the effect Federal Bill C-120 might have on British Columbia's transportation industry. The Bill, which was given first reading in the House of Commons on September 14th, is designed to make railroads more economic and competitive by the elimination of uneconomic branch lines and services and allowing the railroads greater rate-setting freedom. The Bill was an outcome of the recommendations of the MacPherson Royal Commission on Transportation.

The Bureau began a joint economic feasibility study with the Pacific Great Eastern Railway for an extension from Fort St. John to Fort Nelson. The findings of the report are under consideration by the Government of British Columbia.

The Air Transport Board held a series of hearings in British Columbia communities during the year to review air policy concerning less than Class 1 airlines. The Bureau maintained a watching brief and was represented at several of the hearings.

The results of the Bureau's previous studies continued to be watched closely; such studies included the Great Northern-Northern Pacific-Burlington Railway merger and the Pacific Great Eastern Railway's extension to Fort St. James.

In 1964 the Bureau continued to provide its usual service to other Government departments, business, and industry in rate and developmental matters. The Department participated in the Alaska-British Columbia-Yukon Conference held at Whitehorse in September.

EXTERNAL TRADE

During 1964 the external trade statistics compiled in the Department continued to be requested by other Provincial Government departments and agencies, businesses, libraries, individuals, universities, and other organizations. Interest in tariff negotiations in the " Kennedy Round " of the General Agreement on Tariffs and Trade (GATT) resulted in requests for a number of special studies on trade items that would be affected by tariff changes.

In addition to regular tabulation and presentation of import and export statistics, the fifth and sixth studies in a special series covering trade with the Pacific rim were released. " Hawaii and Alaska—A Market Survey " was published in March, followed by "Australasia—Export Opportunities for British Columbia Businessmen." The latter is an abridgment of a detailed analysis of Canadian trade prospects in Australia, New Zealand, and islands of the South Pacific, a copy of which is available on loan from the Bureau's library. In addition, the annual " Preliminary Statement of External Trade through British Columbia Customs Ports, 1963," was distributed to more than 600 interested parties.

The table of exports for British Columbia products was revised in 1962 to conform with the export classification system established by the Dominion Bureau of Statistics in 1961. A similar change will be made in import statistics in 1965 to conform with the new import classification system. It should be noted that the following export figures differ from the regularly published figures because they include exports through other Canadian ports considered principally of British Columbia origin. These statistics exclude products originating in other Provinces but shipped through British Columbia customs ports.

The import table shows imports through British Columbia customs ports and includes products which are transhipped to other Provinces. No attempt has been made to estimate the value of such products consumed within the Province. The following import figures are similar to regularly published figures, being the final revised values.

British Columbia Product Exports to Commonwealth and Foreign Countries by Commodity Group for the Years 1953 to 1963, Inclusive[1] (Excluding Gold and Non-trade Items)

Commodity Group	1953	1954	1955	1956	1957	1958	1959	1960	1961	1962	1963[2]
Fish and marine animals and products	$31,242,356	$41,960,644	$31,730,198	$31,983,642	$27,803,601	$50,335,166	$42,758,907	$29,379,902	$31,961,848	$37,471,076	$38,036,227
Crude wood materials (logs, chips, etc.)	9,414,066	10,916,799	10,515,893	9,155,802	9,859,585	6,863,776	6,055,084	9,604,885	16,387,040	16,304,036	22,986,576
Wood fabricated materials (lumber, plywood, etc.)	254,487,451	283,077,289	311,488,221	258,541,162	222,657,415	236,960,869	225,924,828	276,529,965	311,756,977	347,611,489	397,610,607
Wood pulp and similar pulp	29,147,419	42,115,831	75,843,970	113,575,468	69,404,860	67,672,862	96,290,271	98,960,386	109,591,148	123,564,507	136,779,112
Paper and paper board	54,607,634	56,918,872	62,557,454	65,075,308	70,525,783	76,596,267	97,567,644	109,114,306	107,966,190	114,939,592	121,996,323
Metals in ores, concentrates, and scrap	52,390,324	41,739,268	43,613,433	46,003,784	36,930,071	26,112,447	35,188,064	43,125,151	37,137,644	48,165,158	63,225,458
Non-ferrous metals	49,755,581	50,556,600	70,419,164	71,765,726	88,026,216	72,939,990	93,213,888	118,855,993	107,168,746	109,038,130	120,502,615
Crude non-metallic minerals (except coal and petroleum)	704,903	1,095,356	3,600,446	5,205,653	7,924,363	7,772,483	9,959,788	13,370,165	11,851,738	13,702,267	14,779,853
Coal, crude petroleum, and natural gas	1,245,145	1,235,979	1,532,717	1,432,460	2,716,486	17,812,110	16,524,814	14,469,769	20,242,686	23,557,194	21,631,031
All other products	69,853,458	76,268,211	95,484,590	85,594,776	107,226,196	86,269,290	86,518,223	91,673,579	87,230,120	97,363,190	111,148,940
Totals, all products	$552,848,337	$605,884,849	$706,786,086	$688,333,781	$643,074,576	$649,335,260	$710,001,511	$805,084,101	$841,294,137	$931,716,639	$1,048,696,742

[1] These figures include exports through all Canadian customs ports for selected products considered to be of British Columbia origin. It should be noted that these statistics have been revised to conform to the new export classification system established in January of 1961 by the Dominion Bureau of Statistics in Ottawa.

[2] Preliminary, subject to revision.

Imports through British Columbia Customs Ports from Commonwealth and Foreign Countries by Commodity Group for the Years 1953 to 1963, Inclusive[1] (Excluding Gold and Non-trade Items)

Commodity Group	1953	1954	1955	1956	1957	1958	1959	1960	1961	1962	1963[2]
Agricultural and vegetable products—											
For food	$60,456,867	$69,022,030	$69,898,724	$74,308,061	$77,750,172	$74,179,542	$72,212,304	$73,079,726	$71,075,927	$73,559,778	$82,713,245
Not for food	7,043,492	7,194,135	8,352,456	10,334,615	10,293,544	10,828,888	13,811,686	14,263,459	15,540,890	14,556,187	14,173,355
Animals and animal products	7,173,994	8,615,554	9,462,960	15,909,756	14,883,520	13,743,314	14,422,938	14,837,487	16,104,554	15,813,187	17,636,265
Fibres, textiles, and products	18,166,450	18,788,847	21,273,732	22,262,710	22,076,450	22,672,145	27,307,700	27,289,204	28,166,935	27,020,472	24,981,548
Wood, wood products, and paper	12,411,633	13,361,922	19,328,125	21,900,332	23,025,102	22,862,085	25,463,044	22,015,069	22,160,874	25,427,224	25,873,754
Iron and its products	109,040,582	105,357,481	139,811,659	229,023,597	209,271,742	135,609,270	170,812,288	156,814,532	136,738,128	154,342,050	152,306,849
Non-ferrous metals and products	20,320,844	21,158,861	25,269,317	46,101,949	50,936,814	40,885,965	59,019,683	51,110 835	46,779,103	49,267,456	48,656,234
Non-metallic minerals and products	66,486,963	40,963,155	32,471,292	40,815,722	39,845,544	30,456,695	30,159,112	28,575,074	27,954,404	29,762,491	30,256,958
Chemicals and allied products	14,842,710	15,899,759	18,837,648	19,766,755	18,538,605	16,339,856	18,047,781	18,507,071	19,293,783	21,241,006	21,221,717
Miscellaneous products	25,422,504	21,022,864	26,278,511	27,940,662	32 211,134	31,379,877	39,701,272	33,829,030	38,070,834	66,046,878	40,610,786
Totals, all products	$341,366,039	$321,384,608	$370,984,424	$508,364,159	$498,832,627	$398,957,637	$470,957,808	$440,321,487	$421,885,432	$477,036,729	$458,430,711

[1] Imports include only items entering Canada through British Columbia customs ports but do not include non-trade items and gold. Many of the commodities imported are shipped to other Provinces. These statistics have been revised from 1953 to date to conform with the changes in Canadian trade statistics instituted by the Dominion Bureau of Statistics, Ottawa, in 1960 and 1961.

[2] Preliminary, subject to revision.

STATISTICS

The Bureau is responsible for the collection, analysis, interpretation, and publication of statistical information about British Columbia. In addition, it provides assistance to other departments in the compilation of statistical information and in establishing uniform statistical methods throughout the service. Following is a brief outline of the Bureau's activities in these fields.

Co-operative Statistical Agreements

Because other Government agencies are also concerned with the collection of statistics, a series of working agreements has been arranged to prevent overlapping or duplication. Currently, agreements exist between this Bureau and the Dominion Bureau of Statistics, Ottawa, as well as the Provincial Departments of Mines and Petroleum Resources, Labour, the Provincial Secretary, Health Services and Hospital Insurance, and Social Welfare. During 1964 essential statistical services performed for the other Provincial departments as well as for the Department of Industrial Development, Trade, and Commerce were maintained. A regular basis has now been established for conferences between the Provincial and Federal statistical bureaux.

Forestry

The collection, analysis, and dissemination of statistical and economic information relating to the forest industries of the Province is an important phase of the Bureau's work. During the year a large number of requests were received from industry, trade and other organizations, labour organizations, industry associations, and individuals. In addition, assistance was rendered to other Government departments. Studies were undertaken of forest industries and forest products for Departmental use, for other Government departments, and in response to other requests.

The forest industries of the Province comprise the most important industrial group in British Columbia, accounting for somewhat over 35 per cent of the net value of all commodity-producing industries. In 1964 the net value of production of the forest industries was an estimated $900,000,000. The forest industries provided employment for over 75,000 persons. British Columbia accounts for 65 per cent of the lumber produced in Canada, 85 per cent of the plywood, 20 per cent of total pulp production, and 15 per cent of the total paper production in Canada.

Logging production for 1964 is expected to be an estimated 1,530,000,000 cubic feet (equivalent to 9.0 billion board-feet) of timber, approximately 4 per cent above 1963 production. From figures available to the end of October, logging production on the Coast was slightly above 1963, while production in the Interior of the Province was up by 5 per cent.

Lumber production to the end of September was 3 per cent above 1963 and was expected to reach 6.6 billion board-feet by the year-end. Lumber markets remained generally satisfactory, and lumber shipments to the end of September were 4 per cent above 1963 shipments. Overseas markets took an increased proportion of lumber shipments.

The plywood industry produced an estimated 2.1 billion square feet (¼-inch basis), which was approximately 13 per cent above 1963. All shipments, and particularly export shipments, showed healthy gains.

The pulp and paper industry in the Province showed substantial growth in production, sales, export shipments, and in capacity during the year. Pulp production in the first 10 months rose 15 per cent over 1963 and was expected to reach

2,850,000 tons for the year. Paper production in the first 10 months was 11 per cent higher than 1963 and was expected to reach 1,390,000 tons for the year.

Expansion in the pulp and paper industry highlighted the year. Considerable new capacity was brought into operation in 1964 through expansions at existing mills. Early in the year, capital investment intentions for 1964 by the British Columbia pulp and paper industry were estimated at $130,000,000, well above 1963. During the year, proposals for new pulp-mills and the expansion of existing mills were announced in rapid succession. These proposed new mills, along with the three mills under construction, will be important factors in the development of the Provincial economy over the next decade.

Mining

It is the responsibility of the Bureau to collect and compile the production statistics on all minerals, with the exception of coal, natural gas, and petroleum. These statistics are subsequently published in detail in the Annual Report of the Minister of Mines and Petroleum Resources.

The value of mineral production in 1964 is expected to reach a new all-time high. The preliminary estimate indicates that it will be approximately $262,200,000, which is almost $5,000,000 greater than 1963. In some cases the volume of shipments is below that of the previous year. However, there has been a steady rise in many metal prices, particularly silver, copper, lead, and zinc, which has minimized the effect upon the total value of the reduced shipments. Distribution of mineral production may be summarized as follows:—

Zinc is expected to have a value of $58,300,000, or roughly 22 per cent of the total. Other minerals, in order of value, are: Lead, $38,400,000; copper, $36,000,000; crude petroleum, $24,460,000; and iron concentrates, $20,650,000. These minerals alone account for roughly 70 per cent of the total mineral production of the Province.

Labour

In the field of labour statistics, valuable progress was made during 1964 in the furtherance of co-operative efforts on the part of the Federal and Provincial departments concerned. Periodic meetings attended by personnel from both Governments have been called to deal with expected changes and improvements in the methods presently in use, and it is hoped that the coming year will provide a starting point for new plans envisaged in the continuing effort to improve the availability and accuracy of current labour statistics through the use of more efficient systems of collection and tabulations.

The Bureau of Economics and Statistics was again responsible for the main statistical sections of the Annual Report of the Department of Labour, the current material appearing under headings of "Highlights of the 1964 Statistical Report on Trades and Industries" and "Annual Survey of Organized Labour in British Columbia, 1964," in the Departmental report for that year.

Salary and wage rate surveys conducted by the Bureau in 1964 were expanded to cover additional occupations not included in previous coverage, and the adoption of questionnaires designed to conform closely with those in use by the Federal Department of Labour enabled a closer comparison to be made with data from that source. As these surveys are now being used to provide source material not only for the annual "Salary and Wage Rate Survey," but also for specialized studies in connection with the Civil Service Commission survey requirements, it is highly probable that growing complexities in this field will necessitate closer alignment of

Federal and Provincial programmes to streamline a joint approach, with mutual advantage to both authorities.

In accordance with the existing agreement, a follow-up survey of labour organizations was again conducted by the Bureau as a complementary service to the Federal Government. Resulting from this co-operative arrangement, basic material was obtained for a directory of trade-unions in British Columbia, which was completed for the British Columbia Department of Labour.

Projects completed during the year in the labour section included the following:—

(1) The 1964 survey of British Columbia salary and wage rates.
(2) Statistical sections for the 1964 Annual Report of the British Columbia Department of Labour.
(3) A survey of organized labour in British Columbia completed, together with a directory of trade-unions and labour organizations, for the Department of Labour.
(4) A survey of clerical salary rates in the Vancouver area, tabulated for the Vancouver Board of Trade.
(5) Special surveys and test runs of tabulated material relating to selected occupational salary data required in wage studies conducted by the Bureau for the Civil Service Commission.
(6) Updating of current labour statistics in use by the Bureau.

Revised totals shown in the following table represent the estimated annual labour income in British Columbia for the years 1947 to 1964:—

Estimated Annual Labour Income in British Columbia

Year	Annual Income	Year	Annual Income
1947	$641,000,000	1956	$1,649,000,000
1948	794,000,000	1957	1,765,000,000
1949	825,000,000	1958	1,763,000,000
1950	915,000,000	1959	1,873,000,000
1951	1,072,000,000	1960	1,948,000,000
1952	1,214,000,000	1961	1,984,000,000
1953	1,279,000,000	1962	2,090,000,000
1954	1,302,000,000	1963	2,248,000,000
1955	1,426,000,000	1964	2,440,000,000[1]

[1] Preliminary estimate.
Source: Estimates of Labour Income, Dominion Bureau of Statistics, Ottawa, Ont.

MARKET RESEARCH

Investors and businessmen continue to show a keen interest in the industrial and market potential of the Province, and a large and varied number of requests have been received during the past year for market data and assessment of business opportunities.

The Bureau of Economics and Statistics is always on the alert to identify products which present a good opportunity for manufacture by local firms, and in this connection the Bureau has prepared a number of industry studies. The Bureau's extensive manufacturing and importing data are systematically searched and analysed to assist in locating new trade opportunities.

Another important aspect of market research which has continued to receive attention relates to the study of specific areas of the Province. (*See under* Publications.)

PUBLICATIONS

PERIODICAL

Monthly Bulletin of Business Activity.—This publication contains special articles of current interest and also incorporates a monthly review of current changes in the principal segments of the Provincial economy.

Summary of Business Activity in British Columbia.—This publication is a companion to the Monthly Bulletin, and is issued at the end of the current year. It summarizes the current year's economic picture and presents historical series relating to business activity in the Province.

Business Outlook.—This publication is issued at the end of the current year and indicates business conditions during the past year and the outlook for the coming year. It is based on a survey of 300 of the major companies in British Columbia.

External Trade.—Statistics covering in detail all commodities imported or exported through British Columbia customs ports having an aggregate value of $50,000 and over.

British Columbia Facts and Statistics.—Portrays graphically some of the salient features of British Columbia's economy and describes its geography, government, and judiciary and educational systems.

Salary and Wage Rate Survey.—This annual publication summarizes salary and wage rates in selected clerical, professional, and trade occupations, in business and industrial establishments, for metropolitan Vancouver and Victoria, Southern Interior centres, and Northern centres.

British Columbia Directory of Wholesalers and Distributors, Importers, Exporters, and Manufacturers' Agents.—Published in 1964 as a companion of the British Columbia Trade Index.

SPECIAL

Petrochemicals.—A study published in 1962, it was revised in 1964 to meet the demand for current information on this subject.

A Manual of Resources and Development.—This publication was released in May, 1964. It contains up-to-date information about the location and development of British Columbia's resources and is well documented with maps and diagrams.

Area Surveys.—As one of a series of regional studies, a report on the Grand Forks-Greenwood area is in the course of preparation.

Import Items Meriting Further Investigation for Domestic Production or Substitution.—This report is intended to aid those entrepreneurs in the Province who are considering establishing industries to supply the domestic markets.

Pacific Rim Trade Studies.—These studies are designed to encourage British Columbia exporters and producers to examine more intensively the possibilities for expanding and diversifying exports to the countries bordering the Pacific Ocean. The following have been released to date: Canada's Trade with Countries of the Pacific in 1962; United States Market Opportunities for British Columbia Businessmen in 1962; Export Opportunities in the Far East in 1962; The Pacific Rim of Latin America in 1963; and Canada's Exports to South-east Asia—A Trade and Transportation Study in 1963; Hawaii and Alaska—A Market Survey in March, 1964; and Australasia—Export Opportunities for British Columbia Businessmen in May, 1964.

(NOTE.—A complete listing of Bureau publications is contained in the Department's List of Publications, obtainable free of charge.)

INDUSTRIAL AND TRADE OFFICE

Activity of this office centres on the promotion of new industrial and commercial enterprises throughout the Province, assistance to established businesses when required, and development of the domestic and export trade. The office also provides industry with data on location-sites, land-use maps, availability of raw materials, and information on the services offered by the British Columbia Research Council on matters concerning industrial and scientific research.

This work is carried out in co-operation with other Provincial Government departments, Federal Government departments, Boards of Trade, Chambers of Commerce, the British Columbia Division of the Canadian Manufacturers' Association, industrial commissions, railway industrial agents, and foreign trade representatives in Canada and overseas.

BRANCH PLANT AND MANUFACTURING UNDER LICENCE INQUIRIES

During the year this office continued to direct letters to selected contacts, suggesting the establishment of branch plants in British Columbia or alternatively having their products manufactured under licence. The response to these letters has been gratifying.

Among licence manufacturing proposals received from the United Kingdom and the Continent, United States, and Eastern Canada were portable gas-fired space-heaters with automatic ignition systems, nylon fibres for use in cement, patented and copyright children's games and toys, patented nylon fishing-nets, and slip-resistant car differentials.

COMPOSITE INDUSTRIAL MAPS OF METROPOLITAN VANCOUVER AND OF THE FRASER VALLEY AREA

The demand for these maps continued to be heavy during the year. Numerous inquiries were received from real-estate firms, business firms, and individuals. Many complimentary copies were mailed to firms outside the Province who indicated an interest in establishing in the metropolitan Vancouver area.

The two maps cover an area extending from Burrard Inlet and the mouth of the Fraser River to Hope, and indicate the zoned and potential heavy and light industrial areas, main highways, railway lines, natural-gas line, oil pipe-line, and other facilities serving the area.

HANDICRAFT DIRECTORY

Copies of the 13th edition of this directory were distributed through the year to retail and wholesale firms, resorts and other outlets, and to British Columbia Houses in San Francisco and London. The usual contact was made with Eastern Canadian Provinces interested in handicraft development. Four show-cases of British Columbia handicraft are on display in the Empress Hotel in Victoria, and during the year a series of regional displays was exhibited at the Government Information Centre at 787 Hornby Street, Vancouver. The displays were organized by the Department with the assistance and co-operation of Mr. K. Stittgen, of the Community Arts Council, Vancouver. Some of the items exhibited during the year included weaving, ceramics, silver jewellery, copperwork, and Indian crafts.

REGIONAL INVESTMENT OPPORTUNITIES

A revised edition of this report was printed during the year, in response to heavy demand for regional information of this kind. Numerous copies were distributed to inquirers who visited the Departmental exhibit at the United States World Trade Fair held in San Francisco from September 10th to 20th. The survey lists many investment opportunities in the fields of hotel and motel requirements, housing developments, warehousing, wholesale and retail outlets, and regional facilities.

PROVINCIAL GOVERNMENTS' TRADE AND INDUSTRY COUNCIL

The Department was represented at the 16th annual conference held in Charlottetown, P.E.I., from September 16 to 18, 1964. Some of the topics discussed included: Small Business Management Programmes; Programmes for Upgrading Adult Skills; Trade Fairs and Trade Missions; Designated Areas; Provincial Trade Development Programmes and Federal-Provincial Co-operation; Plans and Programmes for Provincial Statistics for Industrial Development Use; Federal-Provincial Development Programmes.

The aims of the Council are to provide interprovincial consultation and co-operation on matters of trade and industrial development, to supply traders and manufacturers from Canada and abroad with a nation-wide Provincial service in these fields, and to promote greater understanding throughout Canada of the economic conditions affecting the development of each of the Provinces and all of Canada.

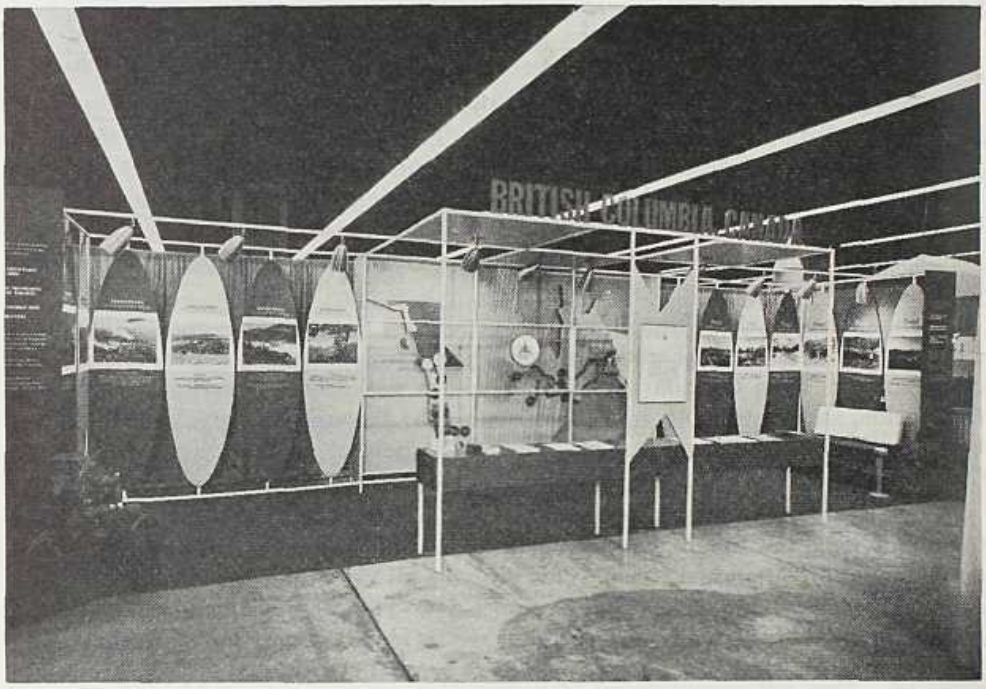
Each year the Council presents the Canadian Industrial Development Award to an individual in Canada who has made an outstanding contribution to industrial development on a national basis. This year the award winner was the Honourable Frank M. Ross, C.M.G., M.C., K.St.J., LL.D. The award was presented to the Honourable F. M. Ross at a special luncheon in Vancouver on November 4th, sponsored by the Industrial Development Commission of Greater Vancouver and the Department of Industrial Development, Trade, and Commerce. The Honourable Ralph Loffmark, Minister of this Department, made the presentation in behalf of the Council.

UNITED STATES WORLD TRADE FAIR IN SAN FRANCISCO

British Columbia was represented by an industrial exhibit at the first World Trade Fair held on the west coast of the United States, from September 10 to 20, 1964. The Department of Industrial Development, Trade, and Commerce exhibit (*see* illustration) pictorially and statistically told the story of the industrial expansion taking place in the Province. The exhibits covered an area of 300 square feet. Two British Columbia firms also attended the fair and were assisted by the Department in setting up their exhibits.

This World Trade Fair was held in the Civic Auditorium-Brooks Hall and attracted more than 250,000 buyers, importers, and other businessmen. It featured 1,000 exhibitors from 50 countries with 25,000 products on display. Numerous inquiries on travel, settlement, licence manufacturing, investment, and industrial opportunities were received by officials in charge of the Government exhibit. The two British Columbia participating firms were well satisfied with the number of inquiries they received concerning their products.

Industrial literature from Chambers of Commerce throughout British Columbia was distributed to selected contacts. A special edition of the " Beautiful British Columbia " magazine was also distributed to interested inquirers. This special edition contained 10 pages of excellent industrial photographs together with a complete story on the economic activity of the Province. The demand for the magazine was heavy, and more than 2,000 copies were requested.



British Columbia Exhibit, San Francisco World Trade Fair.

BRITISH COLUMBIA INDUSTRIAL DESIGN COMMITTEE

The purpose of the Committee is to encourage appreciation of industrial design and its importance as a factor in production and marketing of British Columbia products.

The Committee includes representation from the Federal Department of Trade and Commerce; Provincial Department of Industrial Development, Trade, and Commerce; Department of Education; University of British Columbia; Canadian Manufacturers' Association; Vancouver Board of Trade; Vancouver School of Art; British Columbia Research Council; Association of Professional Engineers of British Columbia; Canadian Association of Consumers; Architectural Institute of British Columbia; and Community Arts Council of Vancouver.

During the year under review the British Columbia Industrial Design Committee was active in working with designers and manufacturers in promoting good design throughout the Province. Some of the Committee's activities included:—

(*a*) Organizing a photographic exhibit of B.C.-designed products, which was displayed throughout many centres of the Province.

(*b*) Publishing and distributing 2,000 folders inviting participation in a proposed association of British Columbia designers.

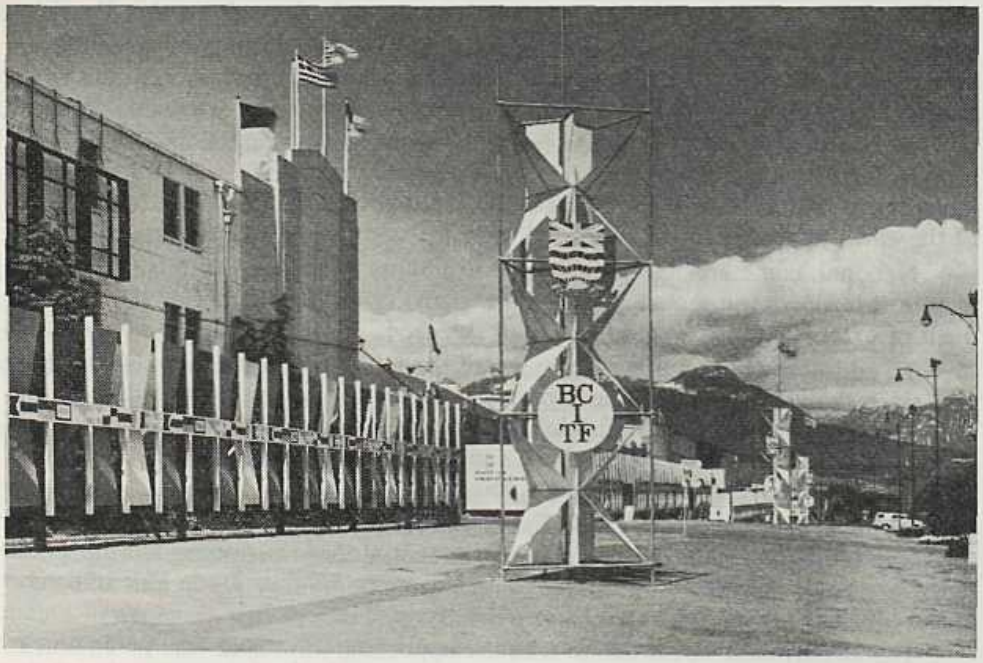
(*c*) Organizing the British Columbia schools' fourth industrial design competition, resulting in four award winners being named and five receiving honourable-mention awards.

(*d*) Publishing and distributing to all industrial arts teachers a British Columbia schools industrial design booklet, "Design 63."

REGIONAL DEVELOPMENT

During the year the Industrial and Trade Office continued to work closely with industrial establishments, Boards of Trade and Chambers of Commerce, research organizations, and all other groups interested in the industrial expansion of the Province.

Representatives of the Department visited many Chambers of Commerce during the year and assisted them in their efforts to assess the industrial potential of their areas. Some of the areas visited included Powell River, Ocean Falls, Penticton, and Kelowna. Early in the year the Department was represented by the Deputy Minister and the Industrial Commissioner at a special meeting in Penticton called for the purpose of establishing the Southern Okanagan Regional Industrial Development Commission. Later in the year, at the request of the Kelowna Chamber of Commerce, the Industrial Commissioner visited the Kelowna area for four days to familiarize himself with Kelowna's industrial potential and to advise the Chamber members on how the Department could provide aid to stimulate Kelowna's industrial expansion.



1964 British Columbia International Trade Fair.

1964 BRITISH COLUMBIA INTERNATIONAL TRADE FAIR, MAY 13TH TO 23RD, EXHIBITION PARK, VANCOUVER

In the presence of Major-General the Honourable George R. Pearkes, V.C., P.C., D.S.O., M.C., the Lieutenant-Governor of British Columbia, Ministers of British Columbia's Government and civic, commercial, and industrial dignitaries of the Province, the third British Columbia International Trade Fair was opened on May 13th by his Grace the Duke of Devonshire, Minister of State for Commonwealth Relations. In his speech the Duke remarked upon the growth of population, industry, and trade, not only in Western Canada, but in countries bordering the Pacific Ocean, which the port of Vancouver is so well placed to serve. In referring to the British Columbia Government's outward-looking policies, he congratulated the Provincial Government on its sponsorship of the fair, which provided such an excellent opportunity for increasing two-way trade.

The erection of an additional exhibition building since the 1961 British Columbia International Trade Fair has enabled the organizers to attract many more exhibitors, and in comparison with the preceding fair the 1964 fair was much larger in space occupied and the variety of goods displayed. From 40 countries the products, both consumer and industrial, of at least a thousand manufacturers were displayed, and in recognition of the growth and potential of secondary industry in British Columbia, a particular feature of the fair was a large display of machine tools.

In the Hall of Nations, Government pavilions included Australia, Belgium, Britain, Bulgaria, Republic of China, France, Federal Republic of Germany, Italy, Japan, India, The Netherlands, New Zealand, and the Province of Ontario. The Federal Department of Trade and Commerce entered a popular information exhibit, as did this Department as the sponsoring agency of the Provincial Government. Most exhibitors displayed a wide range of consumer goods, however, with emphasis being on industrial machinery and tools geared to meet the demands of the industrial and power development under way and planned for this Province.

During the 10-day period the Trade Fair was open, an estimated 8,500 buyers and 135,000 visitors had an opportunity to inspect products from around the world valued at $10,000,000.

In contrast to previous trade fairs, there was a substantial increase in the number of Canadian firms displaying their goods and services. The numerous government officials and trade missions who visited the fair from the four corners of the earth appeared to be impressed with the wide range of products displayed.

National, commercial, and industrial exhibitors expressed satisfaction with the results of business transacted and agreed that the object of the fair—" the development of external trade "—had been fully achieved.

To add to the international character of the fair, an international fashion show was given daily in the exhibition grounds. By far the largest contribution to the show came from Canada's own fashion houses, but also modelled were fashions from Australia, Mexico, United States, India, and Europe. During the fair, films from many countries were given continuous showing.

At the conclusion of the Trade Fair a confidential questionnaire was circulated to exhibitors. The results showed that 93 per cent of those answering felt the Trade Fair was worth while and 90 per cent would like to see another Trade Fair sometime in the future.

The Department would like to take the opportunity to thank Mr. W. J. Borrie, president of the Trade Fair, and his able and public-spirited directors and staff for

their whole-hearted support in organizing and staging another highly successful trading event.

1967 BRITISH COLUMBIA INTERNATIONAL TRADE FAIR, MAY 17TH TO 27TH

In August of this year the Honourable the Premier announced that the fourth British Columbia International Trade Fair will be held in May, 1967. In making the statement he said that the 1967 British Columbia International Trade Fair would be the most important commercial event in British Columbia during Canada's centennial year.

In December the Minister announced that Mr. W. J. Burnett has been appointed president of this event. Associated with him will be Mr. W. J. Borrie, Mr. K. F. Fraser, and Mr. H. K. Hall as vice-presidents and the following directors: Mr. W. M. Anderson, partner, Winspear, Hamilton, Anderson & Company; Mr. E. Benson, vice-president and general manager, Pacific Press Limited; Mr. E. W. Disher, president, Disher Equipment Limited; Mr. P. M. Downes, general manager, corporate communications, MacMillan, Bloedel and Powell River Limited; Mr. J. C. Gilmer, executive vice-president, Canadian Pacific Airlines; The Honourable W. M. Hamilton, president, Canadian Park and Tilford Limited; Mr. Robert M. Johnston, retired; Mr. D. H. Mollison, administrative assistant, Department of Industrial Development, Trade, and Commerce; Mr. R. D. Noble, president, Atlas Travel Service Limited; Mr. R. T. Rose, general manager, Vancouver Board of Trade; Mr. T. L. Sturgess, Deputy Minister, Department of Industrial Development, Trade, and Commerce.

At the same time, the Minister said that invitations to participate in the British Columbia International Trade Fair have been extended to the Ambassadors and High Commissioners of all countries trading with Canada. Already the Minister has received word from the British High Commissioner in Ottawa that Britain will again participate with an official exhibit.

With considerable time to plan and with the outstanding success of the previous trade fairs as background, it is anticipated that the 1967 event will assume even greater international importance and make a further substantial contribution to the trade development of British Columbia.

DEVELOPMENT OF EXTERNAL TRADE

During the year under review, the Industrial and Trade Office has continued its close co-operation with the regional offices of the Department of Trade and Commerce in Vancouver, the Vancouver Board of Trade, the Canadian Manufacturers' Association, the members of the Vancouver consular corps, and other organizations interested in the development of British Columbia's external trade.

Members of the Department have continued visits to secondary industries of the Province to ascertain what products could be exported to foreign markets.

In an effort to maintain a continuing interest in this project, the programme "Operation Actual" was initiated during the year. Its basic aim is to stimulate exports and make manufacturers more aware of potential foreign markets. Letters were sent to selected manufacturers in the Province explaining the programme and its benefits. In addition, "Operation Actual" was publicized in all leading metropolitan newspapers and in the Department's regular publications. It is still too early to pass judgment on the programme's success; however, overseas markets for numerous products have been investigated and many additional firms have been

included in the Canadian Exporters Directory, a publication which is used by the Canadian Trade Commissioners serving throughout the world for the development of exports.

TRADE MISSION TO JAPAN

The Minister of this Department, the Honourable Ralph Loffmark, accompanied by the Honourable Frank Richter, Minister of Agriculture, led a trade mission of 15 businessmen to Japan for three weeks in June. The composition of the mission included exporters as well as present and potential importers of Japanese products. The group visited Tokyo, Yokohama, Kyoto, Osaka, and Kobe, where plant visits and meetings with leading Japanese business organizations were undertaken. It is evident that Japanese plants are among the most modern and efficient in the world, with technology and market research playing an important part in their industrial expansion programme. During this visit many worthwhile business associations were formed, indicating an expansion of trade between Japan and British Columbia. Interest was evident also in the possibilities for investment in British Columbia in industry and commerce.

Elements of the mission visited Hong Kong, where again meetings and visits took place with industrial and trade organizations and, as in Japan, individual members of the mission had the opportunity to make business appointments of individual interest.

WORLD TRADE WEEK

This event was sponsored by the Department through the Trade Fair organization and co-ordinated by the World Trade Committee of the Vancouver Board of Trade. The programme was announced by Government proclamation and took place during the period of May 6th to 12th, immediately preceding the 1964 British Columbia International Trade Fair. Boards of Trade throughout the Province were invited to assist in this promotion, which was publicized through press, radio, and television. A special Trade Week symbol was designed and reproduced in posters and show-cards. Special events were arranged, including a fireworks display on the opening day and a press reception and luncheon.

Objectives of World Trade Week were to draw attention to the opening of the British Columbia International Trade Fair and to point up the importance of world trade to the economic welfare of British Columbia. Because of the success of this event, it is expected to become an annual undertaking.

TRADE PROMOTION CONFERENCE

In co-operation with the Federal Department of Trade and Commerce and the Vancouver Board of Trade, this Department sponsored a Trade Promotion Conference on May 7, 1964, in the banquet room of the Hotel Vancouver.

Under the general chairmanship of Mr. James A. Roberts, Deputy Minister of Trade and Commerce, Ottawa, the conference consisted of up-to-date reports from trade authorities, followed by panel discussions and questions. Members of the panels included Vancouver businessmen and Federal and Provincial Government trade officials. Over 200 delegates attended and heard discussions covering trade prospects in Britain, the European Common Market, the Pacific rim area, and the United States. Reporting on the various areas of trade were senior Federal trade officials from Ottawa, Britain, and the United States, a number of whom were intimately connected with Canada's position in the " Kennedy Round " of trade negotiations. Mr. T. R. G. Fletcher, Assistant Deputy Minister of Trade and Commerce, Ottawa, also spoke on general techniques of trading in world markets.

The luncheon meeting held in conjunction with the seminar was addressed by the Honourable Ralph R. Loffmark, who later introduced the special guest, Governor John A. Burns of Hawaii.

Following the panel reports and discussions, opportunity was given those attending to submit written questions to any of the participants, and replies received included many good suggestions on expanding particular phases of foreign trade. As a result of the conference, a far greater understanding of export opportunities was obtained by those in attendance, and it was felt that a continuing programme of trade conferences should be maintained.

EXHIBITS WITHIN THE PROVINCE

The 1964 Departmental exhibit is a pictorial and statistical presentation of this Province's industry and progress. The use of this exhibit at various events within the Province has resulted in many inquiries being received for information on all aspects of our economy.

Events at which the exhibit was displayed included the Annual Convention of the Real Estate Institute of British Columbia, held from May 4th to 6th at Harrison Hot Springs; the Victoria Exhibition, from May 11th to 16th in Victoria; the Vancouver Island Exhibition, from August 20th to 22nd in Nanaimo; and the North Vancouver Products and Service Display, on October 29th.

Display material was also made available for the Pacific Northwest Trade Association Conference, held in Prince George, September 13th to 15th.

TRADE AND INDUSTRY BULLETIN

During 1964 the Bulletin completed 15 years of continuous publication, listing trade inquiries, export opportunities, manufacture under licence agreements available to British Columbia firms, notices of tenders, and news of general commercial interest. Special reports were also included covering participation in trade fairs, amended trade regulations, and market reports on selected regions. The increased use of the Bulletin by the trade representatives of other nations bears out the importance of this publication to the commercial and industrial organizations in Western Canada. The circulation of the Bulletin has increased to 1,200 copies per month.

DATA PROCESSING DIVISION

The main function of the Data Processing Division since its inception in 1938 has been to serve as a data-processing centre for the departments of the Government. Over this 26-year period there have been many changes in equipment and methods introduced to meet the growing requirement of the departments for faster and more complex reports. The past year has been no exception and has seen a major change in equipment and procedures as the majority of the work has been converted from the unit-record machines to stored programme equipment. This transition has been a major operation as all jobs have had to be reviewed and programmes prepared so they could be economically handled on the new electronic systems. The advantages of using the stored programme equipment have already manifested themselves by increasing the speed at which reports can be produced. Reports that formerly took weeks or months to tabulate can now be prepared in a matter of hours, not to mention the improved facilities for dealing with problems of greater complexity that could not be attempted on the older equipment.

Because of the time required for the conversion, the main benefits have not yet been attained nor has there been an opportunity to develop new work which could take advantage of the speed and power of the electronic systems.

To meet the equipment changes, it has been necessary to train the staff in programming methods and in the operation of the new equipment. This has resulted in many hours of overtime in order that the training and conversion could be completed without interfering with the normal work schedule. The co-operation and spirit of the staff during this period have been commendable. The changing of duties has resulted in a reclassification by the Civil Service Commission of many of the positions in the Division.

The Division is now equipped with two electronic systems. In addition, an ancillary machine section is still maintained for the preparation of cards for input into the more powerful systems. An I.B.M. 1401 data-processing system is used to handle the business-oriented type of application where there is a large amount of data requiring a limited amount of computations with equally large amount of printed output. For those applications of an engineering nature where there are complex calculations involved, an I.B.M. 1620 computer is used. Both systems take advantage of the ancillary equipment, such as sorters, collators, etc., for the preparation of material for input. As both systems are card-operated, it is necessary to maintain a Key Punch Section to prepare all input material. Smaller Key Punch Sections are maintained by the British Columbia Forest Service and the Hospital Insurance Service, both of which forward their work for processing in the Data Processing Division.

The equipment currently installed, all of which is leased on a monthly basis, includes the following I.B.M. equipment: One 1401 card-operated data-processing system, one 1620 computer, two alphabetic printers, one document originating machine, five sorters, one collator, one facsimile posting machine, thirteen key-punches, and six verifiers.

Early in the new year an additional 1401 magnetic-tape system is being added to handle motor-vehicle registration and driver records for the Attorney-General's Department. At the same time the present 1401 system is to be converted to a magnetic-tape system so there will be complete compatibility between the two systems. Magnetic tapes have many uses in other operations.

As the tables in the latter part of this report indicate, the 1620 computer system is working to maximum capacity, and with a growing demand for more time by our

customers, recommendations have been made to have the power of this system increased by adding an on-line printer, increased memory, and magnetic disk drives. These features should enable the Division to meet the demands of the immediate future.

To operate the systems and provide service, it is necessary to maintain a highly trained staff covering the fields of systems procedures, programming, and equipment operation for all types of work, such as accounting, data processing, statistical and engineering applications. At present the staff includes a supervisor of data processing, an assistant supervisor, three section supervisors, four programmers, two console operators, five machine operators, one senior key-punch operator, sixteen key-punch operators, and one senior clerk-stenographer.

In view of the new work for the Motor-vehicle Branch and natural growth, it is anticipated that this staff will be augmented by the addition of three programmers, two console operators, a magnetic-tape librarian, and three key-punch operators early in the next fiscal year.

The Division is currently handling 135 jobs from 15 departments or agencies. An indication of the major jobs and their size can be obtained from the material shown in Table I.

The very nature of the work dictates that the Division employ a different method of handling work for the 1620 and 1401 systems. In the case of the 1620 computer system, an open-shop plan is employed; here the engineer or technical expert has been trained to do the programming in his specialized field, and this Division supplies assistance with more sophisticated programming. Once the programme becomes a routine operation, it is left to the staff for processing.

In the case of the data-processing applications for the 1401 system which do not require the same technical knowledge, the Division operates a closed shop, the programming being done by our staff in co-operation with officials of the department concerned. Experience to date has proved the operation of the two plans to be most satisfactory for all concerned.

The continuous growth of the Division has presented problems in finding space to house the equipment. Several moves have been made since the inception of the Division. With the proposed addition of equipment for the Motor-vehicle Branch, larger and more suitable quarters will probably be required.

Accurate job cost records are maintained through a time-card system. While no billing is presented for work done, the system does provide a valuable assessment of the value of work done for each department. These figures have been used to complete the tables included with this report.

Control of work is established by presenting requests for new work to the Electronic Data Processing Committee, which rules upon such applications. This Committee is comprised of Deputy Ministers whose departments are involved in data processing.

Table I shows a comparative statement of the value of work done for the various departments during the past five years. These figures are based on actual costs and show that the work has practically doubled since 1959. The growth is spread fairly evenly amongst all departments. The departments showing the greatest increase in service use are the Forest Service, Lands Service, and Department of Highways. These departments use the 1620 computer, which has provided a service that could not be rendered on the conventional punch-card equipment.

The chart in Fig. I shows graphically the distribution of work performed for each department, with the British Columbia Forest Service as the most extensive user, followed by the Liquor Control Board and the Lands Service.

Figs. II and III show the distribution of work handled on 1401 and 1620 systems. The Health Branch (Hospital Insurance), followed by the Liquor Control Board, accounts for half the time on the 1401 data-processing system, while the Forest Service is the leading user of the 1620 computer, with the Lands Service and Department of Highways the next biggest users.

The utilization of the unit-record equipment as shown in Fig. IV has a more even distribution of work load for the reason that it is used by all departments to prepare work for input into the larger systems.

Fig. V shows a breakdown of the work done in the Key Punch Section, with the Department of Social Welfare (cost of drugs) heading the list of users. These figures do not show the complete picture because the forest service and Hospital Insurance Service operate separate departmental Key Punch Sections, and that time is not included in these figures.

A distribution of the time spent in programming for the two electronic systems is shown in Figs. VI and VII. It will be noted that there is a fairly even distribution of work for the programming of the 1401 system due to the fact that the majority of this work is done by the Division's programming staff, while there is much less time spent programming for the 1620 system since the Departmental staff acts mainly in an advisory capacity, with the routine work done by programmers on the staff of the serviced departments, being engineering problems. The tables and charts indicate that a great deal of assistance has been given to the British Columbia Forest Service.

An interesting picture of the utilization of the 1401 and 1620 systems is shown by Figs. VIII and IX. The relationship between production running and programme testing and correcting are interesting, while the idle time is of great importance since it depicts the potential of the systems to handle new work. Maximum utilization of the 1620 system has been reached, unless there is a reduction in programme testing.

Table II shows the number of hours spent in the basic operations—systems development, programming, other clerical, key-punching, and machine-operating for each department. The figures for the Department of Industrial Development, Trade, and Commerce are distorted to the extent that these contain the housekeeping operations for the Division in addition to specific jobs done for the Department.

Table I.—Comparative Cost Statement

Department and Branch	1959/60	1960/61	1961/62	1962/63	1963/64
Agriculture—					
Horticultural Branch	$1,662.62	———	———	———	$124.11
Herd Improvement Branch	8,078.91	$3,649.45	$3,948.16	$4,850.32	5,795.59
Totals	$9,741.53	$3,649.45	$3,948.16	$4,850.32	$5,919.70
Attorney-General—					
Credit Union	$553.94	$1,389.90	$1,061.39	$3,030.10	$1,010.15
Fire Marshal Act	851.66	1,249.51	892.07	1,346.05	1,270.95
Official Committee	327.42	245.31	26.63	19.46	———
Motor-vehicle Branch	9,740.77	7,712.19	7,288.62	6,635.28	10,058.78
Liquor Control Board	30,269.84	33,025.47	30,414.67	38,487.67	39,275.09
Totals	$41,743.63	$43,622.38	$39,683.38	$49,518.56	$51,614.97
Education—					
General Administration	$3,672.38	$1,497.93	$1,236.75	$1,901.38	$2,206.87
Tests, Standards, and Research	7,378.33	8,199.65	10,914.06	20,244.56	7,760.90
Adult Education	———	———	———	2,221.62	1,228.88
Secondary School Correspondence	1,123.76	1,138.54	1,060.66	1,254.05	1,526.22
Inspector of Schools and School Services	———	———	2,942.81	1,525.40	3,653.53
Totals	$12,174.47	$10,836.12	$16,154.28	$27,147.01	$16,376.40

Table I.—Comparative Cost Statement—Continued

Department and Branch	1959/60	1960/61	1961/62	1962/63	1963/64
Finance—					
Minister's Office	.....	$1,308.39	.....	.....	.....
Mechanical Tabulation	.....	922.22	.....	.....	$3.91
Totals	.....	$2,230.61	.....	.....	$3.91
Forest Service—					
Engineering Service	$3,102.63	$3,227.54	$1,479.73	$2,371.63	$4,873.95
Forest Surveys	28,632.44	64,380.45	60,932.19	31,903.67	53,033.13
Forest Management	.....	281.66	1,056.01	4,182.21	4,933.03
Forest Research	.....	.....	685.90	1,442.06	4,819.20
Scaling Fund	.....	.....	.....	660.62	26.84
Totals	$31,735.07	$67,889.65	$64,153.83	$40,560.19	$67,686.15
Health Services and Hospital Insurance—					
Vital Statistics	$601.96	$39.06	$8.39	$51.45	$29.98
Hospital Insurance Service	21,780.58	19,616.98	22,518.09	24,940.93	25,639.08
Totals	$22,382.54	$19,656.04	$22,526.48	$24,992.38	$25,669.06
Highways—					
Bridge Engineering Branch	.....	$1,638.29	$2,030.14	$14,351.00	$4,517.01
Locations Branch	.....	1,577.90	15,103.09	13,491.97	10,724.00
Research and Development	$275.03	137.48	37.12	2,851.34	2,177.09
Totals	$275.03	$3,353.67	$17,170.35	$30,694.31	$17,418.10
Industrial Development, Trade, and Commerce—					
Bureau of Economics and Statistics	$8,153.18	$7,031.32	$7,032.74	$8,214.84	$8,653.48
Data Processing Division	.....	.....	.....	12,141.13	21,540.94
Totals	$8,153.18	$7,031.32	$7,032.74	$20,355.97	$30,194.42
Labour—					
General Administration	$654.55	$768.59	$452.88	$1,227.51	$535.62
Lands—					
Surveys and Mapping, Legal Surveys	$25.22	$8,832.13	$16,954.04	$18,698.78	$21,644.58
Geographic Division	.....	15.05	.....	12.49	12.49
Water Rights Branch Administration	13,062.73	10,143.23	6,635.54	7,124.68	10,532.44
Hydraulic Investigation	.....	4,154.73	3,427.11	2,890.02	.....
Totals	$13,087.95	$23,145.14	$27,016.69	$28,725.97	$32,189.51
Mines and Petroleum Resources—					
Petroleum and Natural Gas	.....	.....	.....	.....	$2,720.93
Provincial Secretary—					
Queen's Printer	$12,050.62	$10,355.73	$8,821.04	$8,674.62	$9,048.93
Superannuation Branch	1,649.42	6,787.40	2,513.35	1,779.58	6,993.32
Civil Service Commission	5,634.42	4,048.60	3,452.38	3,608.22	5,092.06
P.S. Medical Plan	.....	.....	10.84	86.47	.....
Totals	$19,334.46	$21,191.73	$14,797.61	$14,148.89	$21,134.31
Recreation and Conservation—					
Fish and Game Branch	.....	.....	.....	$1,802.84	$1,757.00
Parks Branch	$464.67	.....	$4,583.06	63.71	79.31
Totals	$464.67	.....	$4,583.06	$1,866.55	$1,836.31
Social Welfare—					
Accounts Division	$19,057.94	$23,948.08	$17,277.51	$24,577.70	$23,809.54
Municipal Affairs—					
Regional Planning	.....	$561.37	.....	.....	.....
Water Resources—					
Water Rights	.....	.....	.....	$669.90	$6,759.45
Other—					
British Columbia Power Commission	$40.03	$1,860.04	$1,012.10	.....	.....
University of Victoria	.....	.....	.....	.....	$98.98
Totals	$40.03	$1,860.04	$1,012.10	.....	$98.98
Grand totals	$178,845.05	$229,744.19	$235,809.07	$269,335.26	$303,967.36

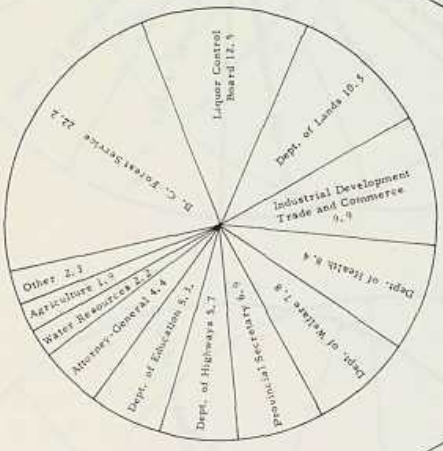
Table II.—Number of Productive Hours Spent in the Basic Operations for Each Department, 12-month Period Ended September 30, 1964

Department	Systems Development	Programming		Other Clerical	Key-punching	Machine Time		
		1401	1620			Unit Record	1401	1620
Agriculture	14.2	146.0	.....	109.2	718.1	275.5	25.0	.....
Attorney-General	17.6	277.9	.....	74.3	1,693.5	422.9	61.2	.....
Education	5.7	144.8	.....	23.5	2,122.7	364.4	187.6	16.6
Forest Service	191.3	568.2	454.9	41.3	1,893.0	1,640.8	209.7	1,164.1
Health	272.8	294.1	.....	51.1	135.7	1,319.5	482.6	.....
Highways	.....	.....	6.3	.....	642.9	183.7	0.2	446.4
Industrial Development, Trade, and Commerce	745.0	293.4	26.8	2,157.9	1,802.8	747.9	141.9	82.9
Labour	1.5	19.9	2.5	1.1	5.0	34.6	7.4	.....
Lands Service	21.3	127.6	2.2	170.1	2,664.0	885.3	74.3	407.9
Liquor Control Board	89.9	156.6	.....	779.8	3,391.0	1,922.2	367.8	.....
Mines	190.6	41.6	.....	.....	160.4	21.6	25.4	.....
Provincial Secretary	.....	233.6	.....	525.0	2,866.0	880.6	112.8	.....
Recreation and Conservation	13.7	11.2	34.9	1.8	247.9	38.7	1.9	12.1
Social Welfare	69.2	113.9	5.0	424.8	4,299.8	794.7	89.2	.....
Water Resources	.....	.....	7.3	1.5	457.7	114.7	22.1	111.1
Other	.....	.....	.....	.....	.....	21.2	.....	0.5
Total hours	1,632.8	2,428.8	539.9	4,361.4	23,100.5	9,668.3	1,809.1	2,241.6

TWELVE MONTH PERIOD ENDING SEPTEMBER 30TH, 1964

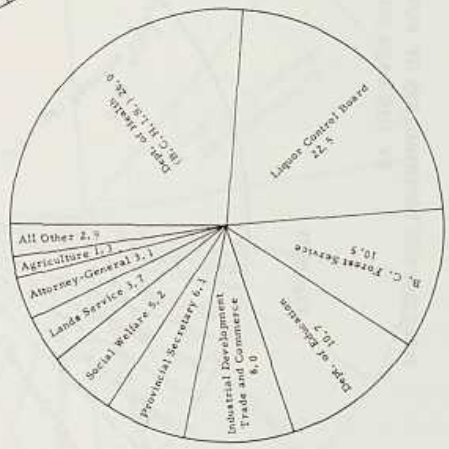
PERCENTAGE DISTRIBUTION OF WORK DONE FOR THE VARIOUS DEPARTMENTS OF THE GOVERNMENT
BY THE DATA PROCESSING DIVISION BASED ON THE DOLLAR VALUE

FIGURE I



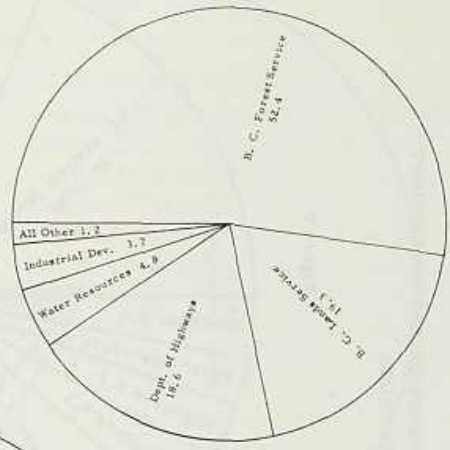
All Systems

FIGURE II



1401 Data Processing System

FIGURE III

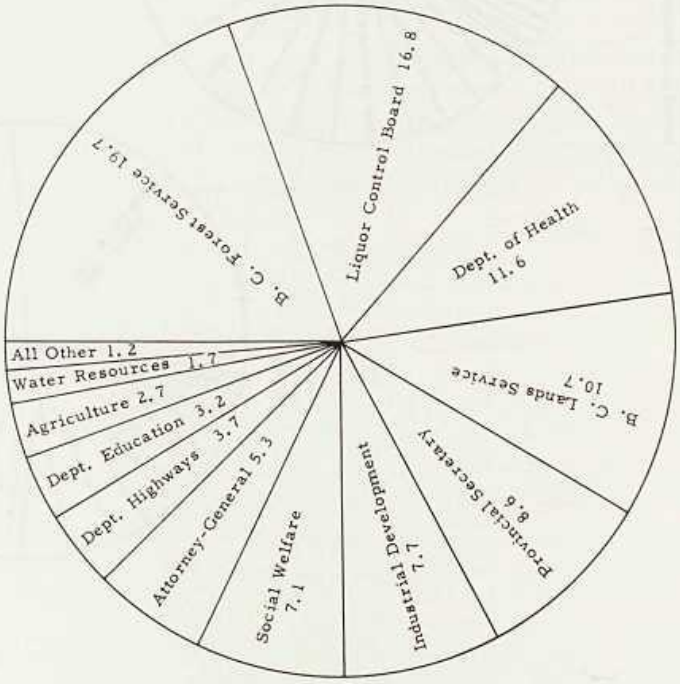


1620 Computer System

TWELVE MONTH PERIOD ENDING SEPTEMBER 30TH, 1964

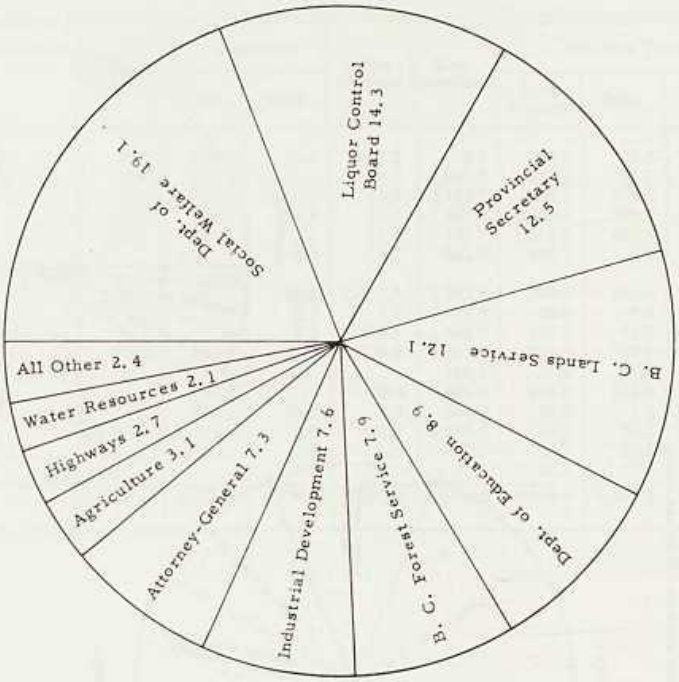
PERCENTAGE DISTRIBUTION OF WORK DONE FOR THE VARIOUS DEPARTMENTS OF THE GOVERNMENT BY THE DATA PROCESSING DIVISION BASED ON DOLLAR VALUE

Figure IV



Unit Record (Ancillary) Equipment

Figure V

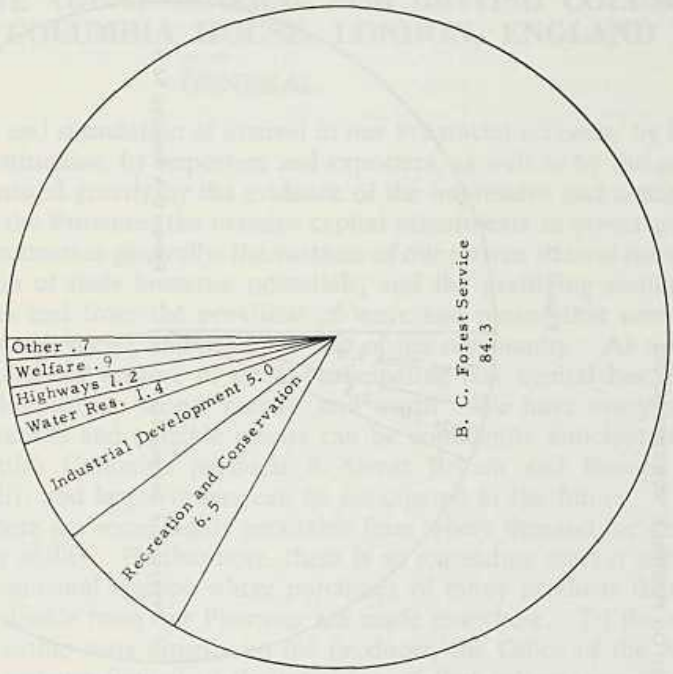


Key Punching Equipment

TWELVE MONTH PERIOD ENDING SEPTEMBER 30TH, 1964

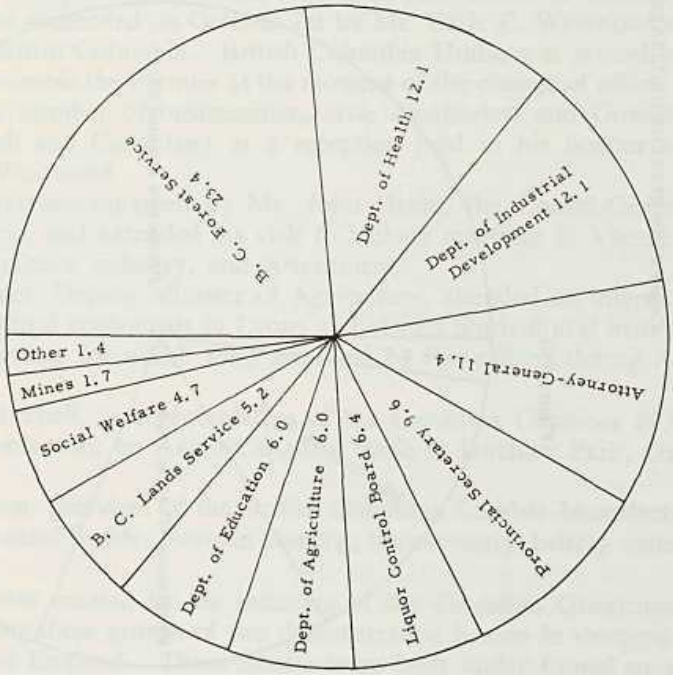
PERCENTAGE DISTRIBUTION OF TIME SPENT IN PREPARATION OF PROGRAMMES FOR THE VARIOUS DEPARTMENTS OF THE GOVERNMENT BY THE DATA PROCESSING DIVISION BASED ON PRODUCTIVE HOURS

Figure VII



Programming 1620 System

Figure VI

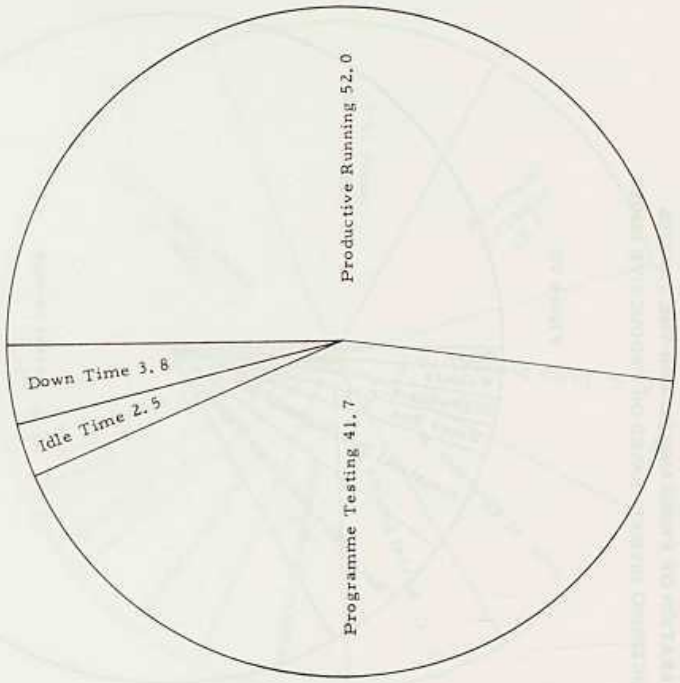


Programming 1401 System

TWELVE MONTH PERIOD ENDING SEPTEMBER 30TH, 1964

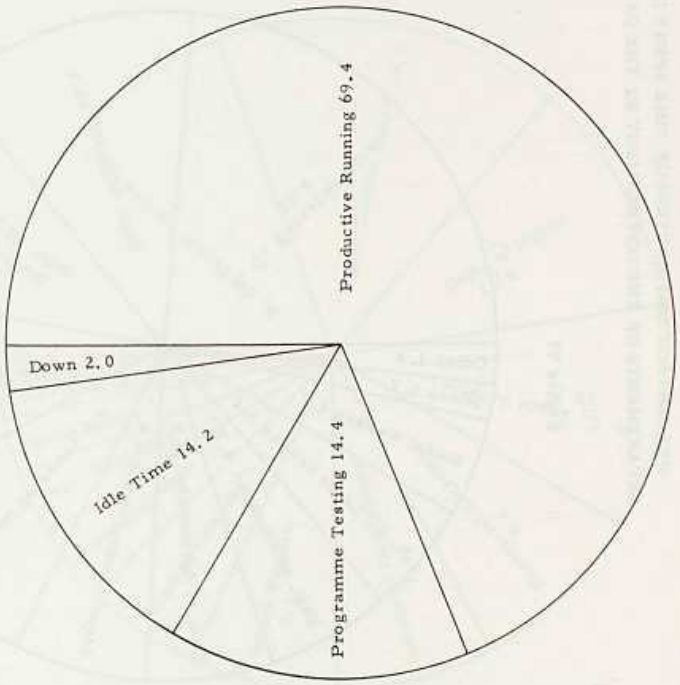
COMPUTER SYSTEMS UTILIZATION BASED ON POSSIBLE WORKING HOURS

Figure IX



1620 System

Figure VIII



1401 System

OFFICE OF THE AGENT-GENERAL FOR BRITISH COLUMBIA, BRITISH COLUMBIA HOUSE, LONDON, ENGLAND

GENERAL

The generation and stimulation of interest in our Provincial economy by industrial and financial institutions, by importers and exporters, as well as by the general public, have been assisted greatly by the evidence of the impressive and continuous economic growth of the Province, the massive capital investments in power generation and industrial production generally, the vastness of our proven natural resources, the reliable indication of their immense potentials, and the gratifying results that British Columbia has had from the provision of ways and means that constantly will improve the cultural, social, and economic life of the community. As a result, the flow to the Province of venture or profit-participating risk capital has grown, and is growing continuously in scope, variety, and worth. We have every reason to believe that substantial and tangible results can be confidently anticipated.

Exports of British Columbia products to Great Britain and Europe have increased substantially, and larger orders can be anticipated in the future. Unfortunately, however, there are some highly profitable lines where demand far exceeds the Province's supply ability. Furthermore, there is an expanding market potential now available in Continental Europe where purchases of many products that normally should be obtainable from our Province are made elsewhere. To the extent that effective salesmanship rests directly on the producer, the Office of the Agent-General is in some measure limited to the provision of that information that can eventually bring together buyer and seller.

September 30, 1964, marked the end of a three-year tenure of office by Dr. J. V. Fisher, who was succeeded on October 1st by Mr. Earle C. Westwood as the Agent-General for British Columbia. British Columbia House was graced by the presence of the Honourable the Premier at the moment of the change of office. The Premier met a large number of businessmen, civic dignitaries, and Government officials (both British and Canadian) at a reception held in his honour at the introduction of Mr. Westwood.

The Premier was accompanied by Mr. John Hecht, the Consul-General in Vancouver for Austria, and extended his visit to include meetings in Vienna with representatives of business, industry, and government.

Mr. A. H. Turner, Deputy Minister of Agriculture, attended an international conference of agricultural economists in Lyons and visited horticultural institutions in Holland (introductions for which were arranged by this office) during August and September.

Mr. Howard Mitchell, as representative of the Canadian Chamber of Commerce, attended a conference on Anglo-Canadian trade in Ditchley Park, Oxford, in November.

Mr. R. H. Ellison, president of the British Columbia Lumber Manufacturers' Association, accompanied by Mr. Norman Dusting, the secretary, briefly visited the United Kingdom.

Much interest was created by the initiative of the Canadian Government in paying for and erecting three groups of two demonstration houses in strategic locations in Scotland and England. These houses were built under Canadian supervision, one house in each pair being completely finished and furnished, with the second house remaining partly erected to introduce to the British public timber-frame construction along Canadian lines and to show modern methods used in

walling, flooring, and other features. Where practicable, Canadian hardware and double-glazed window frames were used. The British Government has set a target of 400,000 new homes to be provided in a year, and by traditional methods this would be most difficult to achieve. By the use of timber-frame construction and factory-built homes, a compromise can be reached in respect to numbers erected, with a combination of Canadian methods and traditional British exteriors.

IMMIGRATION AND SETTLEMENT

Settlement inquiries are not as positive as in previous years. The standard of living in the British Isles improves year by year as salaries and wages increase. Although the cost of living likewise increases at a rapid rate, fewer people seek to emigrate. This does not, however, hold true in respect to immigration to countries such as Australia, where the cost of the journey is subsidized by that Government. In all, some 428 settlement inquiries were handled, in addition to which correspondence with 370 individuals was carried on.

SCHOOL-TEACHERS

This office was able to place interviewing accommodation at the disposal of Mr. J. Phillipson, who was sent by the Department of Education in Victoria to interview prospective teachers for the Province. Much preliminary work was done by the staff in arranging interviews, which led to considerable correspondence. From the volume of applications received, a total of 110 teachers was interviewed, of which 31 were appointed and a further 10 to 15 will probably be accepted. Since the interviews in the spring, the Agent-General has had 67 other inquiries from teachers and has provided the necessary information. In each case these numbers refer only to applicants and do not include families.

STAFF

There have been no staff changes throughout the year.

VISITORS

Some 3,709 visitors from British Columbia registered at British Columbia House, and at the same time some 18,200 pieces of mail were handled on their behalf. It was again noted that a very large proportion of these visitors were young people seeing the world before settling down to their chosen careers. The new visitors' reading-room is proving highly satisfactory and well used. However, it is located on the mezzanine floor, and a small number of visitors would prefer to have elevator service.

FILMS AND PUBLICITY

There has been an increased demand for films, and this year the Agent-General catered to an audience totalling 22,000. This figure refers only to films handled by the Office of the Agent-General. Other Canadian agencies in the United Kingdom having film-distribution arrangements include the Canadian Government Travel Bureau, the Canadian railway companies, Canada House, and the National Film Board.

The Agent-General's newsletter continues to disseminate business, economic, and cultural information concerning the Province. Surveys show that it is well read and in many quarters sought after as a means of informing industrialists, businessmen, bankers, etc., on all phases of life in the Province.

The Agent-General has obtained a large illuminated map of British Columbia, specially designed and painted for display in the Regent Street window. It has not only attracted the attention of passers-by, but has resulted in a number of inquiries from people seeking additional information.

TOURISM

Efforts continue to be made to attract tourists to British Columbia, but the cost of transportation to the western part of Canada from the British Isles prevents many people from travelling. An increasing number of businessmen going to the Province take extra days to enjoy the recreation to be found so abundantly there.

ADMINISTRATION

Certain new lettings have been made at market value for accommodation in this highly desirable area of the west end of London occupied by British Columbia House. Additionally, the large exhibition hall has been rented for a period of months. British Columbia industry has been advised of the availability of this room for exhibition purposes, affording an opportunity to display goods in the heart of London free of charge.

All new leases entered into include a clause calling for review of rental at periodic intervals. This is an advantage where rentals increase at a substantial rate, and will ensure that the Department's returns from office rentals keep abreast of current market values.

INDUSTRIAL AND TRADE OFFICE

1964 proved to be the busiest year since the opening of the Industrial and Trade Office in 1947. This is a reflection of the current prosperity in the Province, and it is expected that interest will be intensified in the immediate future.

TRADE FROM BRITISH COLUMBIA

During the first 11 months of 1964, 126 inquiries were received from British Columbia, an increase of 46 over 1963, most of which had to do with the sale of British Columbia products in the United Kingdom and European markets. Suitable contacts were arranged for the majority of these inquiries, and, in many cases, buyers and distributors were found.

A number of manufacturers in British Columbia have recently established sales offices or branches in Great Britain and Europe. There were 11 such moves during 1964—six in the United Kingdom, one in Belgium, three in France, one in Holland, and one in Italy.

TRADE INQUIRIES FROM EUROPE

During 1964 the following inquiries were received from the United Kingdom and the countries of Western Europe:—

United Kingdom	324
Austria	9
Belgium	4
France	18
Germany	56
Italy	6
The Netherlands	21

Portugal	2
Spain	4
Scandinavia	37
Switzerland	11
Other countries	18
Total	510

This is an increase of 62 over 1963 and includes inquiries covering a wide variety of products and from firms wishing to sell in Western Canada, establish branches, or import food or raw materials from British Columbia producers.

Tangible evidence of the desire of British and European companies to enter British Columbia is evinced by the following moves of capital and (or) establishment:—

Two large paper-manufacturers (one Swedish and one German) have, in association with British Columbia companies, announced their intention to build kraft pulp-mills—one at Prince George and one at Prince Rupert.

Seven manufacturers (two Dutch, two German, one Swedish, one British, and one Norwegian) of engineering equipment of various kinds have established branches, service depots, etc., or appointed agents in various parts of the Province.

Three investment and finance houses (two from London and one from Dusseldorf) have established during the year subsidiary companies in the Province.

A well-known British seed grower and dealer has established a branch at Langley.

A Swiss holding company has built and is operating a luxury hotel at Sooke.

EXPORT OPPORTUNITIES

There are being received at the London office a number of inquiries for goods or services from countries other than the United Kingdom and Europe (for example, South America, the Caribbean, the Middle East, and Africa). These inquiries have been received from trade attachés, the embassies in London, import-export houses in London, the Board of Trade, and directly from importers in these countries. They have been sent forward over the last few months under the heading of "Export Opportunities," and 17 have been forwarded to the Department in this manner since August.

LICENCE MANUFACTURE

European and British firms continue to make inquiries concerning prospects for having their products manufactured under licence in British Columbia. This would seem to be an excellent method of taking up plant capacity in the Province and, at the same time, bring into being secondary industries. The Office of the Agent-General continues to require information concerning factories, machine-shops, and surplus plant capacity available within the Province with some indication of types of products for manufacturing and distributing.

INVESTMENT

In 1963 a paper group in London announced that it had agreed to invest $25,000,000 in a pulp and paper mill near Prince George. During 1964 this amount was raised to $40,000,000.

A German company has announced its intention of forming a joint venture with a British Columbia based company. This venture envisages an investment by the German principals of $25,000,000 in the pulp industry.

A Swedish firm has also announced that, in association with another British Columbia company, it will build and operate a kraft pulp-mill near Prince Rupert. The amount invested by the Swedish principals is reported to be $40,000,000.

More funds are available in the United Kingdom and Europe for large-scale investment, not only in the forest industries, but in a wide variety of enterprises. Firms wishing to expand or to go into association with European partners are encouraged to send details to this office with the authorization that inquiries be made on their behalf.

GROUP VISITS TO THE UNITED KINGDOM AND EUROPE

The Canadian Factory-built Housing Mission to Europe visited Europe during May and June. Two British Columbians were amongst the members. Conferences with builders and local authorities, held in London, were attended by the Industrial and Trade Counsellor from this office.

GROUP VISITS TO BRITISH COLUMBIA

The Council of the Scottish Chambers of Commerce Trade Mission to Canada visited British Columbia to coincide with the British Columbia International Trade Fair in May. The Home Build'ng Mission visited Vancouver in October for a two-week study of timber-frame housing construction methods.

BUSINESS TRIPS TO THE CONTINENT

The Industrial and Trade Counsellor made business trips to Dusseldorf, Dortmund, Hamburg, Brussels, Rotterdam, Amsterdam, Utrecht, and The Hague. He also attended the annual meeting of The Netherlands-Canada Chamber of Commerce in Rotterdam in October.

Continual contact with the Canadian Trade Commissioners in the United Kingdom, Eire, and Western Europe was maintained.

"FILE ON BRITISH COLUMBIA"

A new system of publicizing the trade, industry, and general conditions in the Province has been devised, whereby trade counsellors, embassies, banks, Chambers of Commerce, trade associations, etc., are supplied with an attractively prepared file containing an information sheet on the functions of the Department and the Agent-General's Office. In addition, this file includes reports and current literature received from the Province. New publications, press releases, etc., are sent as and when available. This system has brought forth favourable comments, and good results from it can be expected.

BUSINESS EMIGRATION

Inquiries from businessmen with varying amounts of capital contemplating re-establishment or a move to the Province were received. In such cases the practice of the office is to put them in touch with the Department, with Boards of Trade, trade associations, etc., and letters of introduction are supplied to individuals and firms in that part of the Province in which they intend to settle.

NEW BRITISH COLUMBIA PRODUCTS

It has become apparent that an excellent market exists in Europe for British Columbia oysters and clams. This has been occasioned by the fact that the oyster

beds in Europe, especially those at the mouth of the Scheldt in Holland, will disappear over the next few years because of land-reclamation schemes. Recommendations have been sent forward to the Department for the establishment of canning and processing plants for oysters so that new products, such as clam chowder, oyster soup, oysters in brine, and frozen oysters, can be offered to the European and United Kingdom trade.

BRITISH COLUMBIA HOUSE, SAN FRANCISCO

During 1964 there was a continued interest shown by United States companies and individuals in the business development and economic growth of the Province of British Columbia. The huge hydro projects under way and proposed, the tremendous expansion in the forest industry, and the increased activity in mining and petroleum development have caught the imagination of the business community of California.

The Commercial Representative carried out a continuing programme of personal calls and direct mailings to California companies manufacturing products which are presently selling in British Columbia and which have possibilities for manufacture within the Province. It is recognized by California businessmen that this Province offers many industrial location sites which could be utilized by United States firms desiring to acquire a favoured position in so far as export trade is concerned. Many such businessmen have expressed interest in locating in British Columbia.

During the past year British Columbia firms have shown an increasing interest in the potential of the California market as an outlet for their production. This interest was expressed by the participation of five British Columbia firms in the California Giftware Show, one in the Western Tool and Metal Show, one in the Western Electronics Show and Convention, one in the Western Market Sporting Goods Show, and several in the Fine Food and Beverage Show. The Canadian participation in these trade shows (open only to registered buyers) was first arranged by the Department of Trade and Commerce, Ottawa. British Columbia House is appreciative of the many courtesies extended by the office of the Commercial Division, Canadian Consulate General, Los Angeles, in connection with these trade shows.

The British Columbia participants in these trade shows found their activities rewarding either in direct sales, the appointment of representatives, or for the knowledge gained of the market requirements.

The Department arranged for an exhibit to be entered in the Seventh United States World Trade Fair, held in Brooks Hall and the Civic Auditorium, San Francisco, September 10 to 20, 1964, consisting of a display depicting the exciting industrial expansion taking place in the Province. The exhibit was augmented by a travel information booth, provided and staffed by British Columbia House, San Francisco. Total attendance at the Seventh United States World Trade Fair was 268,000, and the British Columbia exhibit drew great interest from the business community and general public of the Bay area. The two British Columbia companies participating received many inquiries as to the availability of their respective products and plan to have sales representation in California.

Inquiries received at the Trade Fair included individual requests for information on investment opportunities, possible licence agreements with British Columbia manufacturers, information on sources of supply for products and materials from British Columbia, and a wide range of general inquiries respecting immigration, small businesses in the trades and services field, farming, ranching, etc. A number of inquiries were dealt with in connection with employment opportunities, and these were mainly received from the professions and from skilled workers who were aware of, and interested in, the industrial activity of the Province.

In 1964 the Commercial Representative travelled to Southern California on five occasions for periods of four weeks, carrying on a programme of personal calls on manufacturing firms in the Los Angeles and San Diego areas. Close contact

and co-operation was maintained with the Canadian Trade Commissioners, the business-development officers of the five Canadian banks represented in California, the Canadian transportation companies locally represented, foreign officers of California banks, and all other agencies having interest in the general field of trade and industrial development. Liaison was also maintained with the representatives of the Canadian Department of Defence Production, whose offices are located in Los Angeles and who are in close contact with the United States-Canada Defence Production Sharing Programme.

The past 12 months have shown an increase over the first two years of operation by British Columbia House, in both the number of inquiries received and visits from British Columbia businessmen and the number of contacts and inquiries received from California business firms and individuals.

The mezzanine display area of British Columbia House, which has been made available to British Columbia manufacturers wishing to display the products they offer for sale in California, has for several months been utilized by a British Columbia manufacturer of kitchen cabinets. The firm has appointed a sales representative in the Bay area, and has been successful in selling a good volume of cabinets in California.

A British Columbia handcraft manufacturer has a display in British Columbia House featuring coffee tables made from burls of the maple-tree, red cedar, alder, and black poplar. The display is creating a great deal of interest.

A request from Prince George concerning the possibility of selling British Columbia turnips has been received. Full details on importation, duties, and outlets have been provided.

During the year, calls have been made on financial companies, bankers, and brokers, informing them of developments and investment opportunities in British Columbia.

During 1964 many people migrated from the United States to British Columbia. Included were those interested in farming, ranching, and commerce, as well as skilled mechanics, teachers, and retired people.

Immigration inquiries reach British Columbia House by mail and personal calls. Full information on the Province is provided, and referral made to the Canadian Immigration for details on immigration requirements.

In the mid-west and southern districts, calls were made on lumber-buyers interested in British Columbia wood products. The steady flow of British Columbia lumber and shingle products to the mid-west and southern areas is well established.

BRITISH COLUMBIA RESEARCH COUNCIL

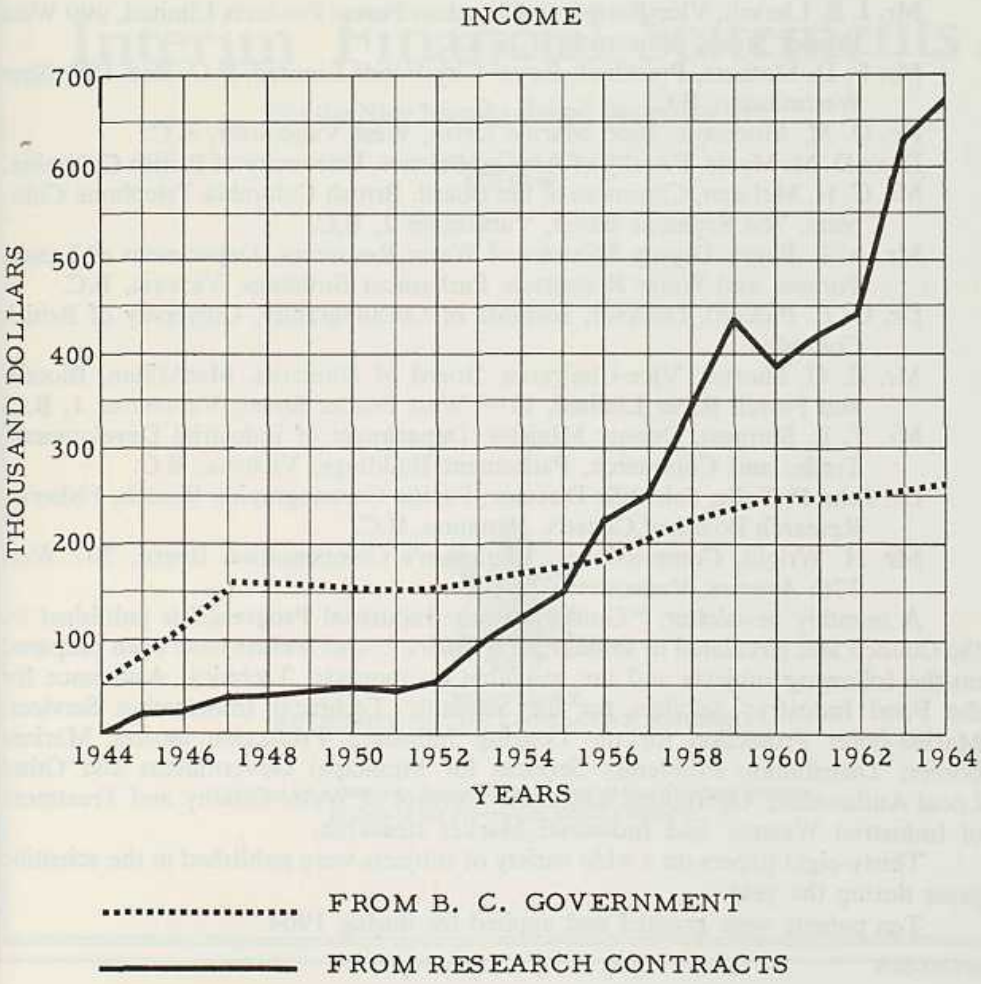
The British Columbia Research Council was incorporated in 1944 under the *Societies Act*.

The broad objectives of the Council are to provide scientific and technical services to the industry of the Province, and to conduct research leading to the establishment of new industries and the development of the natural resources of British Columbia.

From a very modest beginning, the Council has grown with the development of the Province. It now employs a staff of 77 and operates from its own laboratory, located on the campus of the University of British Columbia.

Financial support comes from a Provincial grant through the Department of Industrial Development, Trade, and Commerce, and from earned income from contract research for industry and Government agencies. It also receives a limited amount of financial assistance from the National Research Council and other organizations.

The following graph shows the growth of the Council's major sources of income over the years:—



The Council is supervised by a board of management, who met and reviewed the activities of the Council on April 28, June 29, and October 20, 1964, and consisted of the following:—

The Honourable Ralph R. Loffmark, Minister of Industrial Development, Trade, and Commerce, Parliament Buildings, Victoria, B.C.

Mr. F. E. Atkinson, Canada Agriculture Research Station, Summerland, B.C.

Mr. E. W. Bassett, Deputy Minister of Lands, Parliament Buildings, Victoria, B.C.

Mr. John Bene, President, Weldwood of Canada Limited, 900 East Kent Avenue, Vancouver 15, B.C.

Dr. J. J. R. Campbell, Department of Dairy Science, University of British Columbia.

Dr. John A. Gower, District Geologist, Kennco Exploration Western Limited, 1030 West Georgia Street, Vancouver 5, B.C.

Mr. G. H. Gwyn, Manager, Kitimat Works, Aluminum Company of Canada Limited, P.O. Box 1800, Kitimat, B.C.

Mr. G. H. D. Hobbs, President, Western Canada Steel Limited, 450 South-east Marine Drive, Vancouver 15, B.C.

Mr. R. M. Hungerford, President, Clayburn-Harbison Limited, 1690 West Broadway, Vancouver 9, B.C.

Mr. J. E. Liersch, Vice-President, Canadian Forest Products Limited, 999 West Pender Street, Vancouver 1, B.C.

Mr. F. D. Mathers, President, Royal City Foods Limited, P.O. Box 159, New Westminster, B.C.

Dr. D. M. Morrison, 3666 Marine Drive, West Vancouver, B.C.

Dean D. M. Myers, Faculty of Applied Science, University of British Columbia.

Mr. C. H. McLean, Chairman of the Board, British Columbia Telephone Company, 768 Seymour Street, Vancouver 2, B.C.

Mr. A. F. Paget, Deputy Minister of Water Resources, Department of Lands, Forests, and Water Resources, Parliament Buildings, Victoria, B.C.

Dr. G. L. Pickard, Director, Institute of Oceanography, University of British Columbia.

Mr. E. G. Shorter, Vice-Chairman, Board of Directors, MacMillan, Bloedel and Powell River Limited, 1199 West Pender Street, Vancouver 1, B.C.

Mr. T. L. Sturgess, Deputy Minister, Department of Industrial Development, Trade, and Commerce, Parliament Buildings, Victoria, B.C.

Dr. John P. Tully, Scientific Director, Pacific Oceanographic Branch, Fisheries Research Board of Canada, Nanaimo, B.C.

Mr. H. Wright, Commissioner, Workmen's Compensation Board, 707 West 37th Avenue, Vancouver 13, B.C.

A monthly newsletter, " Guide Lines to Industrial Progress," is published by the Council and circulated to some 2,500 readers. Also leaflets have been prepared on the following subjects and are available on request: Technical Assistance for the Food Industry; Services for the Sawmill; Technical Information Services; Marine-borer Protection for the Logging Industry; Protection against Marine-borers; Distribution Problems; Services for Municipal Governments and Other Local Authorities; Operations Research; Control of Water Quality and Treatment of Industrial Wastes; and Industrial Market Research.

Thirty-eight papers on a wide variety of subjects were published in the scientific press during the year.

Ten patents were granted and applied for during 1964.

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