26-D-27 C.3 Published by Authority of the Rt. Hon. C. D. Howe, M. A48-10-6-48 NION BURE Minister of Trade and Commerce Price -25 cents Department of Trade and Commerce Dominion Eureau of Statistics JUL 13 1948 Census of Industry and Merchandising Mining, Metallurgical and Chemical Statistics Ottawa - Canada Dominion Statistician: Herbert Marshall Director - Division of Census of Industry and Merchandising: 7. H. Losee Chief - Mining, Metallurgical and Chemical Statistics: H. McLeod

THE MICA MINING INDUSTRY, 1946

Canadian production or primary shipments of all grades of mica in 1946 totalled 8,720,669 pounds valued at \$199,039 compared with 7,044,221 pounds worth \$233,270 in 1945. Of the total output in 1946, mines in the province of Quebec contributed 2,397,788 pounds valued at \$108,667 and Ontario 4,707,381 pounds worth \$66,952; the British Columbia mines shipped 1,615,500 pounds valued at \$23,420. The major portion of the shipments was phlogopite (amber mica) which weighed 7,104,739 pounds and was valued at \$175,579. Nearly all the muscovite (white mica) was produced in British Columbia.

Table 1 - PRINCIPAL STATISTICS OF THE MICA MINING INDUSTRY IN CANADA, 1945 and 1946

		1945		1 9	46	
		CANADA (x)	Quebec	Ontario	British Columbia	CANADA (x)
Number of firms or operators		40	20	6	1	27
Number of employees: On salary On wages		16 158	13 94	3 19		16 113
Total		174	107	22		129
Salaries and wages: Salaries Wages	\$	31,973 158,165	26,644 103,425	4,340	***	30,984 122,632
Total	\$	190,138	130,069	23,547		153,616
Selling value of products (gross) Cost of fuel and electricity Cost of process supplies used Selling value of products (net)	00000	233,270 21,597 28,895 182,778	108,667 18,684 17,628 72,355	66,952 1,624 150 65,178	23,420	199,039 20,308 17,778 160,953

(x) Does not include general statistics for one plant operating in British Columbia.

Table 2 - MICA PRODUCTION (PRIMARY SALES) IN CANADA, BY CLASSES, 1945 and 1946

	1	945	1	946
Grade	Pounds	Total value f.o.b. shipping point	Pounds	Total value f.o.b. shipping point
		\$		Ş
Rough, mine-run or rifted Mica sold for mechanical splitting. Splittings Ground or powdered	11,910 329,476 4,050 1,753,030	886 57,816 3,865 36,799	692,339 254,363 13,050 2,657,230	35,381 42,523 10,725 51,146
Scrap - Mine or shop waste and mica mined and sold for grinding Flake (mica schist) - Natural or	4,877,886	30,074	5,073,092	38,216
recovered by milling	67,869	103,830	30,595	21,048
TOTAL MICA SHIPMENTS	7,044,221	233,270	8,720,669	199,039
Varieties: Phlogopite mica (amber) Muscovite mica (white).	5,694,504 1,349,717	142,535 90,735	7,104,739 1,615,930	175,579 23,460

NOTE: This report was prepared by A. R. Deir, Mining Statistician.

Table 3 - PRODUCTION (SALES) OF MICA IN CANADA, BY PROVINCES AND VARIETIES, 1946

Description	Phlogo	Phlogopite		ite	TOTAL	
Province	Pounds	\$	Pounds	\$	Pounds	\$
Quebec Ontario British Columbia	2,397,788 4,706,951	108,667 66,912	430 1,615,500	40 23,420	2,397,788 4,707,381 1,615,500	108,667 66,952 23,420
TOTAL CANADA	7,104,739	175,579	1,615,930	23,460	8,720,669	199,039

Table 4 - PRODUCTION (SALES) OF MICA IN CANADA, 1937-1946

Year	Short tons	\$	Year	Short tons	\$
1937	945	133,731	1942	3,010	383,567
1938	519	80,989	1943	4,025	553,856
1939	1,068	147,321	1944	3,342	841,026
1940	975	237,145	1945	3,522	233,270
1941	1,743	335,288	1946	4,360	199,039

The total value of mica produced in Canada from the first official recording of mica statistics in 1886 to the end of 1946 amounted to \$10,624,861.

Table 5 - IMPORTS AND EXPORTS OF MICA, 1945 and 1946

	191	4 5	191	1946		
	Pounds	Value	Pounds	Value		
		Ş		\$		
Imports -		and rom		000 7 /0		
Mica and manufactures of, n.o.p		236,597		280,142		
Vermiculite, crude		35,496		56,826		
Exports -						
Mica, scrap and waste	4,853,600	33,200	3,899,400	33,601		
Mica splittings	5,200	4,088	8,400	6,913		
Mica manufactures		2,614		2,193		
Mica, rough, untrimmed	801,400	107,740	675,900	99,059		
Mica, trimmed	67,600	146,026	25,800	47,494		
Hica, ground	352,000	11,055	451,000	17,808		
TOTAL MICA EXPORTS		304,723		207,068		

Table 6 - CONSUMPTION OF MICA IN CANADA, BY INDUSTRIES, AS REPORTED TO THE ANNUAL CENSUS OF INDUSTRY, 1945 and 1946

	174) and 1740			
	1945		1946	
	Quantity	Cost at works	Quantity	Cost at works
A PERSON PERSON AND A PERSON AND A	(tons)	\$	(tons)	\$
In electrical apparatus industry In rubber industry In roofing (x)	163 166 1,042	389,491 20,405 53,498	178 132 1,263	355,160 16,868 66,852
In mica manufacturing industry	52	71,377	70	109,475
TOTAL ACCOUNTED FOR		534,771		548,355

(x) Includes mica used in manufacture of wall paper.

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		19	4 5			19.	4 6	
and the second s	Mii	and the state of t	Shor) (x)	Min	and the second se	Sho	p (x)
Month	Surface	Under- ground	Male	Female	Surface	Under- ground	Male	Female
January	64	46	44	84	34	27	47	8
February	47	37	40	33	30	26	45	8
liarch	44	35	47	30	28	26	Lala	8
April	45	31	47	30	33	22	39	7
May	38	23	55	21	42	16	38	6
June	52	24	64	12	38	17	43	6
July	59	19	69	20	43	16	55	5
August	52	19	55	14	46	15	62	5
September	63	8	42	14	37	15	62	5
October	65	13	40	14	37	16	60	5
November	48	22	48	14	23	6	58	6
December	54	20	48	14	25	10	52	6
AVERAGE	55	25	51	27	37	16	52	7

Table 7 - NUMPER OF WAGE-EARNERS ON FAYROLL ON TIME RECORD ON THE LAST DAY OF EACH MONTH OR HEAREST WORK DAY, 1945 and 1946

(x) Includes outside workers.

Table 8 - POWER EQUIPMENT (Including Stand-by or Emergency Equipment) USED DURING 1946

	Ordinar:	ily in Use	In Reserve or Idle		
	Number of units	Total horse power	Number of units	Total horse power	
Steam engines	2	75	1	30	
Steam turbines Diesel engines Gasoline, gas and oil engines, other than	1	31.5		* * *	
Diesel engines	10	317	1	3	
Hydraulic turbines or water wheels Electric motors operated by purchased power	49	636	3	45	
TOTAL	62	1,343	5	78	
Stationary boilers	3	670	1	40	
Motor-generator sets	1	20			

Table 9 - FUEL AND ELECTRICITY USED DURING THE YEAR, EXCLUSIVE OF THAT SUPPLIED TO EMPLOYEES, 1945 and 1946

	1740				
		19	45	19	46
Kind	Unit of measure	Quantity	Cost at works	Quanti ty	Cost at Works
			Ş		Ş
Bituminous coal - From Canadian mines	ton	32	366	8	124
Imported	ton	190	2,375	85	1,020
Anthracite coal - From United States	ton	33	456	25	425
Coke	ton	5	65		
Gasoline	Imp.gal.	29,594	9,926	17,455	5,570
Kerosene or coal oil	Imp.gal.				
Fuel oil and diesel oil	Imp.gal.	7,157	306	12.654	1,462
Wood (cords of 128 cubic feet of piled wood).	cord	824	2,411	157	1.103
Electricity purchased for power and lighting,					
including service charges	K.W.H.	190,734	5,192	1,357,230	10,604
TOTAL			21,597		20,308
Electricity generated for own use	К.W.H.	6,000		9,300	

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<u>Hica</u>

The following information has been extracted from a report on the Mice Industry by the Bureau of Mines, Ottawa:

Main source of phlogopite production is the general Ottawa region, both in Ontario and Quebec. Production of muscovite has been small and intermittent, and only rarely, as in the 1942-44 period, has mining for this type of mica been undertaken on an important scale. Most of the output is handled and prepared for market by producers and dealers having trimming establishments in or near Ottawa. A few operators make direct mine shipments of semi-rough mica to the United States for the production there of punched shapes. The making of thin splittings, now done on a very much smaller scale than formerly, is mostly farmed out in small rural communities in the Ottawa district. Scrap mica continues to be recovered on a considerable scale from old mine dumps, and these furnish most of the scrap sold for grinding, as well as considerable amounts of screened untrimmed mica shipped to the United States for the making of mechanical splittings.

In Quebec, in 1946, the Nellis mine, near Cantley, in Hull township, operated by Blackburn Bros., Ottawa, continued to be the leading producer. This company prepares its output in a shop at Ottawa, and also operates a grinding plant at its mine. The plant continued to be the leading Canadian producer of ground phlogopite mica. The remainder of the Quebec output came mainly from a number of small, scattered operations in the general Gatineau-Lievre River section, most of the material being rough mica sold to dealers, or scrap salvaged from old mine dumps.

Suzorite Company, Limited, a subsidiary of Siscoe Metals Ltd., proceeded with plans to develop production of flake and powdered phlogopite from a large body of "suzorite" rock in Suzor township, Laviolette county, Quebec. Several thousand tons of crude rock were mined and shipped to a plant installed by the company at Shawinigan Falls, Quebec, and some of the material was processed, mainly for the recovery of roofing grades of mica and of rock granules. Early in 1947, milling problems in connection with the processing crude suzorite for the recovery of maximum amounts of coarse flake were under study in the Bureau of Mines laboratories at Ottawa.

In Ontario, Sydenham Mining Company, Limited, operating the old Lacey mine, near Sydenham, in Loughborough township, Frontenac county, was the only important producer. This company ships its product in rough-trimmed form to its affiliate, Lacey Mica Company, of New Brighton, Staten Island, N.Y. Loughborough Mining Company (General Electric Company) continued recovery of scrap mica from old waste dumps at the Lacey mine, and was the leading shipper in 1946 of this class of product. The remaining small sales of sheet mica in the Province came chiefly from properties in the Perth area, Lanark county.

In British Columbia, ground muscovite mica, made from schist rock is produced by Fairey and Company, 661 Taylor Street, Vancouver, and by Geo. W. Richmond and Company, 4190 Blenheim Street, Vancouver, for sale to the local roofing trade. The crude rock is procured from Albreda region.

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Mica

DIRECTORY OF OPERATORS IN THE CANADIAN MICA MINING INDUSTRY, 1946

Name of Operator	Head Office Address	Location of Mine or Plan
luebec -		
Blackburn Bros.	85 Sparks St., Ottawa, Ontario	Cantley and Perkins
Chenier, A.	Cantley	Hull Tp.
Cross, W. C.	209 Bridge St., Hull	Hull Tp.
Delisle, Jos.	Mistassini	Lac Noir
Dessève, J. L.	106 Jeanne D'Arc, Hull	Lauretta
Fleury Mica Mine Ltd.	Chibaugamau	Rinfret
Gauthier, J. B.	C.P. 226, Buckingham	Dinholm
McNeely, Jas.	114 Harmer Ave., Ottawa, Ontario	Cawood Tp.
Mica Co. of Canada, Ltd.	2 Lois St., Hull	
Morin, F.	3644 Bergerac, Montreal Nord	Blake
Perkins Hills Mica Co. Ltd.	360 St. James St., W., Montreal	Perkins Mills
Pink Lake Mica Mines Ltd.	74 King St. E., Toronto, Ontario	Hull Tp.
Poirier, A.	Wilson's Corner	Wakefield
Poirier, Wm.	Wilson's Corner	Wakefield
Renaud, J.	Perkins Mills	
Sargent, F. G.	Cascades	Hull Tp.
Suzorite Co. Ltd.	907 Dominion Square Bldg., Montreal	Suzor Tp.
Trudeau Mineral Exploration	Old Chelsea	
Wallingford, E.	Perkins	Templeton
Wallingford, Wm. & A.	Gatineau Pointe	Perkins Mills
Intario -		Sec. 1996.31
Green, W. E. & Bro.	Perth Road	Ottie Lake
Lee, W. W.	Westport	Bedford
Loughborough Mining Co. Ltd.	Sydenham	Frontenac
Purdy Mica Mines Ltd.	184 Bay St., Toronto	Eau Claire
Sydenham Mining Co. Ltd.	Box 252, Kingston	Loughborough
Watts, R. W.	21 Isabella St., Perth	Perth

British Columbia -

Fairey & Co.

661 Taylor St., Vancouver

Vancouver

