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RUBBER INDUSTRIES

1962

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SYMBOLS

The following standard symbols are used in Dominion Bureau of Statistics publications:

- .. figures not available.
- ... figures not appropriate or not applicable.
- nil or zero.
- -- amount too small to be expressed.
- P preliminary figures.
- r revised figures.

RUBBER INDUSTRIES

This industrial group comprises three separate industries defined as follows under the Revised Standard Industrial Classification:

Rubber Footwear Manufacturers. – Establishments primarily engaged in manufacturing all-rubber footwear and footwear having fabric uppers and rubber soles.

Tire and Tube Manufacturers. - Establishments primarily engaged in manufacturing rubber tires and tubes for automobiles, trucks, aircraft, tractors and other machinery and implements.

Other Rubber Industries. - Establishments primarily engaged in manufacturing rubber goods such as rubberized fabrics, mechanical rubber goods, rubber flooring and rubber sundries.

Although establishments in this industrial group are classified to one of the three industries concerned, on the basis of their principal manufacturing activity, many of them are not exclusively engaged in manufacturing products pertaining to the industry in which they are classified. For this reason, beginning with the 1960 report in this series, the annual tables in this report have generally presented data on the industrial group basis only. The sole exception to this practice in this report is Table 1 A which gives a breakdown of the separate principal statistics for all three industries for both 1961 and 1962, as well as the breakdown of the industrial group for both years by provinces; and Table 3, which does not include two-digit head offices in the breakdown by individual industry (see Explanatory Notes).

For the 1962 survey, a change was made to the total activity approach as fully outlined in the Explanatory Notes contained at the end of this report. These total data were also collected in the 1961 survey, but were not published at that time. Many tables in this report reflect this increase in activity coverage, including Table 1A referred to above, presenting both 1961 and 1962 figures.

Tables 6 A to 6 D, inclusive, show respectively, in detail, the 1962 shipments of the four main groups of commodities made in this industry, namely, Footwear; Tires; Tubes; and Other Products. Since it is not possible, for technical reasons, to apply the adjustments for sales taxes, etc., to the shipments shown in these four tables, it has been necessary to add a special table, namely, Table 6. The purpose of the latter table is to reconcile the individual shipment totals of Tables 6 A to 6 D, inclusive, with the 1962 total shown throughout the rest of this report under the heading "Value of shipments of goods of own manufacture".

Table 4 shows the details of the materials and supplies used in manufacturing by this industrial group, whereas Table 8 presents the shipments by all industries of certain commodities manufactured both in this and other industries. Tables 10 to 14, inclusive, present 1962 data obtained from the monthly survey covering the consumption of rubber as a commodity.

A list of the establishments classified to this industrial group in the 1962 survey will be found at the end of this report. This list gives, firstly, the particular industry in which the establishment was classified and, secondly, the products produced by it.

TABLE 1.	Principal Statis	tics - Manufacturing	Activity,1 1957-61
Basis: Revised	Standard Industrial	Classification and New	Establishment Concept ²

				Em	ployees				Welson of		
Xear	Estab- lish- ments	Production and related workers ⁴		Administrative and office employees ³		Total ⁴		Cost of fuel and elec- tricity ⁴	Cost of materials and supplies	Value of shipments of goods of own manu-	Value added4
		Number	Wages	Number	Salaries	Number	Salaries and wages	arcity	used ⁴	facture ⁴	
	No.		\$'000		\$'000				\$'000		
1957	86	16,766	58,096	5, 415	25, 120	22, 181	83, 215	5,006	145, 567	334, 778	
1958	87	14, 746	52, 139	5,202	24,358	19, 948	76, 497	5,034	129, 641	314, 792	177, 811
1959	86	15, 736	60, 399	5, 346	26, 485	21, 082	86, 884	5, 425	161, 816	354, 045	195, 197
1960	89	15, 113	57, 766	5, 185	26, 765	20, 298	84, 531	5, 223	153, 840	328, 459	173, 811
1961	93	14,262	57, 778	4, 598	24,226	18,860	82, 004	5, 276	148,684	331, 135	171, 594

See footnotes following Table 3 A.

TABLE 1 A. Principal Statistics - Manufacturing Activity and Total Activity,¹ 1961 and 1962 Basis: Revised Standard Industrial Classification and New Establishment Concept²

				Man	ufacturing	activity			Total activity					
Year, province and	Estab- lish-		oduction ated work		Cost of fuel and	Cost of materials	Value of shipments of goods	Value	Working and pa			otal oyees ⁷	Total	
industry	ments	Number	Man- hours paid	Wages	elec- tricity ⁵	and supplies used ⁴	of own manu- facture ⁴	added4	Number	With- drawals	Number	Salaries and wages	value added [*]	
	No.		'000			\$'000		+		\$'000		\$'0	00	
1961								1						
New Brunswick											67	311		
Quebec	33	4.387	9,293	14.777	1, 222	31,984	69, 727	36, 493	12	13	6, 295	24.010	36,925	
Ontario	48	9.598	20,767	41,609	3,929	114,296	252, 479	127.920	5	14	14, 412	66, 867	133, 318	
Manitoba	2	3,000	20, 101	11,000	0,040	111,200	5061 TIO	101,000	1		*** ***	00,001	100,010	
Alberta	4	270	501	962	100	3,576	8,239	4,976	12	13	774	3, 195	4, 971	
British Columbia	6	43	64	176	25	212	690	458	12	12	273	1,354	471	
Totals	93	14, 298	30, 644	57, 524	5.276	150.069	331, 135	169,847	10	33	21, 821	95, 737	175, 685	
		11, 400	30, 011	DI, DAT	0, 410	100,000	331, 100	103,041	10	00	#1; 0#1	50, 101	x10,000	
1962								1						
New Brunswick				_		_	_	_	-	_	84	391	-	
Quebec	32	4.877	10.531	16.269	1.245	35,048	76, 623	41.814	1.1	19	6,862	25, 597	42, 228	
Ontario	47	10.459	22.848	48,540	4, 102	128,935	263, 624	131,938	4	9	14.812	73, 361	138, 712	
Manitoba	1	1												
Alberta	5	284	635	1,325	179	6, 577	13,046	6, 345	12	12	755	3, 566	6, 327	
British Columbia	5	44	105	197	25	210	668	434	33	13	275	1,287	444	
Totals	90	15,664	34.117	66. 331	5, 550	170, 771	353, 962	180,528	9	31	22, 788	104,203	187.712	
1961									1					
Footwear manufacturers	6	3,360	6,826	10,059	399	12, 446	32, 579	19, 101	-		4,069	12,931	19,407	
Tire and tube manufacturers	10	5,615	12,270	26,987	2,675	88, 560	180, 248	83, 471	-	-	7,307	35, 754	83, 505	
Other rubber industries	77	5, 323	11,548	20, 478	2,203	49,064	118, 308	67, 275	10	33	7,656	32,908	71,687	
Head offices, sales offices and														
auxiliary units ¹⁰					0.0.4						2, 789	14, 144	1, 086	
Totals	93	14, 298	30, 644	57, 524	5,276	150,069	331, 135	169,847	10	33	21, 821	95, 737	175,685	
1962									1		1			
Footwear manufacturers	6	3,902	8,158	11, 381	394	14,906	36, 664	22, 731	-	-	4,612	14,403	23, 151	
Tire and tube manufacturers	10	5,991	13, 180	31, 147	2,830	100,804	186, 683	84,679	-		7,278	38,941	85,845	
Other rubber industries	74	5,771	12, 780	23,803	2, 327	55,061	130, 614	73, 119	9	31	7, 935	36, 448	79, 146	
Head offices, sales offices and auxiliary units ¹⁰											2, 963	14, 412	(430	
Totals	90	15. 664	34.117	66.331	5, 550	170.771	353, 962	180.528	9	31	22, 788	104, 203	187. 712	

See Table 2 and footnotes following Table 3 A.

				Ma	anufacturi	ng activity					Total act	ivity	
Size group	Estab- lish- ments		oduction ated worl		Cost of fuel and	Cost of materials	Value of shipments of goods	Value		owners artners ⁶		otal loyees ⁷	Total
	monto	Number	Man- hours paid	Wages	elec- tricitys	and supplies used ⁴	of own manu- facture*	added ⁴	Number	With- drawals	Number	Salaries and wages	value added*
	No.		'000			\$'000	1	3		\$'000		\$'	000
1961 Under \$10,000 \$ 10,000 to \$ 24,999 25,000 " 49,999 50,000 " 199,999 200,000 " 499,999 200,000 " 499,999 500,000 " 499,999 5,000,000 " 4999,999 5,000,000 " 4999,999 5,000,000 " 4999,999 Head offices, sales offices and auxiliary units ¹⁰ Totals	4 10 4 9 13 12 17 20 83		- 36 17 29 234 733 1,019 4,356 24,220 30,644	49 22 40 290 1,007 1,523 6,953 47,640	1 4 36 100 159 657 4,313 5,276	10 59 47 130 660 1,480 4,501 17,029 126,154	17 171 129 332 1,384 4,206 9,342 41,860 273,695 331,135	6 111 78 194 784 2,716 4,573 24,364 137,022 169,847	3 2 4 - - - - - - - - - - 10	4 6 16 7 7 33	1 27 10 27 170 436 643 2,810 14,908 2,789 21,821	3 79 30 104 470 1.587 2.498 10.515 66,307 14,144 95,737	6 114 80 923 2, 797 4, 701 24, 881 140, 905 1, 086 175, 685
1962 Under \$10,000 \$ 10,000 to \$ 24,999 50,000 " 49,999 100,000 " 199,999 200,000 " 499,999 500,000 " 499,999 5,000,000 " 4,999,999 5,000,000 " 4,999,999 5,000,000 " 4,999,999 5,000,000 and over Head offices, sales offices and auxiliary units ¹⁰	4 5 6 4 6 17 8 19 21	9 10 10 64 384 453 2,331 12,303	1 19 21 138 800 961 5,146 27,012 34,117	1 31 34 31 243 1,205 1,458 7,993 55,336	1 4 3 19 150 134 692 4,546	7 30 85 177 331 2,111 2,313 20,147 145,570 	19 88 216 308 891 5,291 5,530 46,469 294,151 353,962	11 57 127 558 3.027 4.138 26,162 146,320	233	3 8 16 3 	11 16 18 83 506 579 3.049 15,563 2,963 22,788	1 399 53 364 1.950 2.171 11.982 73,147 14,412 104,203	11 59 130 126 590 3,350 4,231 27,008 152,634 (430) 187,712

 TABLE 1 B. Principal Statistics classified by Size Groups based on Shipments of Goods of Own Manufacture, 1961 and 1962

 Basis: Revised Standard Industrial Classification and New Establishment Concept²

See footnotes following Table 3 A.

TABLE 1 C. Principal Statistics classified by Size Groups based on Manufacturing Value Added, 1961 and 1962 Basis: Revised Standard Industrial Classification and New Establishment Concept²

				Ma	anufacturi	ng activity				1	Cotal acti	vity	
Size group	Estab- lish- ments		oduction ated work		Cost of fuel and	Cost of materials	Value of shipments			owners rtners		otal oyees'	Total
	ments	Number	Man- hours paid	Wages	elec- tricity ³	and supplies used*	of goods of own manu- facture ⁴	Value added	Number	With- drawals	Number	Salaries and wages	value added*
1961	No.		'000			\$1000	L			\$'000		\$'	000
Under \$10,000 \$ 10,000 to \$ 24,999 25,000 ** 49,999 100,000 ** 99,999 200,000 ** 999,999 500,000 ** 999,999 5,000,000 ** 999,999 5,000,000 ** 4,999,999 5,000,000 and over Head offices, sales offices and auxiliary units ¹⁰ Totals	8 10 4 7 9 17 8 21 9	7 22 19 58 182 574 572 5,806 7,058	12 47 36 123 374 1.241 1.203 12,089 15,520	15 65 53 185 450 1.891 1.830 21.012 32,022 57,524	2 5 4 22 46 222 207 1,889 2,880 5,276	42 726 180 412 922 5,575 4,657 44,946 92,610	79 1,047 326 954 2,126 10,997 10,997 103,909 200,726	38 114 136 521 1,263 5,384 5,973 56,522 99,896 	4 1 - - - -	7 12 8 7 	11 37 33 84 230 740 796 7,767 9,334 2,789 21,821	30 124 127 315 704 2,871 2,854 30,579 43,988 14,144 95,737	41 114 259 537 1,307 5,529 6,024 57,338 103,449 1,086 175,685
1962		11,400	001045	0110.01	01.010	100,000	001,100	103,041	10	33	41, 841	89, 131	1 (3, 68
Under \$10,000 \$ 10,000 to \$ 24,999 50,000 to \$ 99.999 100,000 to \$ 99.999 200,000 to \$ 199,999 500,000 to \$ 499,999 500,000 to \$ 499,999 1,000,000 to \$ 4,999,999 5,000,000 and over Head offices, sales offices and auxiliary units ¹⁰	5 10 4 5 11 14 10 22 9	1 15 13 42 172 535 659 6,489 7,738	2 32 97 341 1,130 1.474 14,106 16,908	3 52 41 168 539 1,767 2,163 24,423 37,176	1 5 4 15 75 182 225 2.056 2.985	$16 \\ 143 \\ 140 \\ 340 \\ 1.164 \\ 4.663 \\ 5.274 \\ 56.776 \\ 102.254 $	34 308 289 806 2,654 9,541 12,660 123,693 203,978	18 161 143 434 1.422 4.712 7.272 65,297 101,069	251	3 17 7 - 3 - -	2 24 19 69 226 678 866 8,258 9,683 2,963	8 84 86 343 864 2,633 3,245 33,666 48,862 14,412	11 166 145 587 1.483 4.841 7.367 86.710 106.825
Totals	90	15,664	34.117	66.331	5. 550	170, 771	353, 962	180, 528		31	2, 903	14, 412	187.71

See footnotes following Table 3 A.

				Man	ufacturing	activity				Т	'otal activ	vity	
Size group	Estab- lish- ments		oduction ated work		Cost of fuel and	Cost of materials	Value of shipments of goods	Value	Working and pa		Total employees ⁷		Total
		Number	Man- hours paid	Wages	elec- tricity ^s	and supplies used ⁴	of own manu- facture*	added ⁴	Number	With- drawals	Number	Salaries and wages	added*
1961	No.		'000			\$'000	,			\$'000		\$*0	00
Under \$10,000 \$ 10,000 to \$ 24,999 25,000 '' 49,999 50,000 '' 99,999 100,000 '' 199,999 200,000 '' 499,999 500,000 '' 499,999 5,000,000 and over Head offices, sales offices and auxiliary units ¹⁰	7 11 3 7 9 18 7 22 9 9 3	6 23 10 58 171 594 480 5.898 7.058 14,298	9 49 26 123 335 1,289 1,008 12,284 15,520 30,644	13 67 31 185 407 1,956 1,532 21,311 32,022 57,524	2 5 22 40 229 180 1,915 2,880 5,276	31 737 109 412 748 5,820 3,488 46,115 92,610	64 1,062 223 954 1,800 11,427 8,700 106,179 200,726 331,135	30 122 106 521 1,106 5,571 4,998 57,497 99,896 169,847	4 4 1 - - - - - 10	7 12 8 - 7 - - - 33	9 39 16 84 217 770 645 7,918 9,334 2,789 21,821	25 129 61 315 635 3,007 2,346 31,088 43,988 14,144 95,737	31 124 107 537 1,226 5,763 5,009 58,354 103,449 1,086 175,685
1962 Under \$10,000 \$ 10,000 to \$ 24,999 25,000 '' 49,999 100,000 '' 199,999 200,000 '' 199,999 200,000 '' 499,999 5,000,000 '' 4,999,999 5,000,000 and over Head offices, sales offices and auxiliary units ¹⁰	6 9 4 4 10 17 9 21 10	1 15 13 33 162 580 633 5,960 8,267	3 31 27 74 323 1,230 1,415 12,927 18,087	4 51 41 131 508 1,946 2,051 22,012 39,587	1 5 4 12 71 200 215 1.871 3,172	66 93 140 241 1,058 5,172 4,971 50,611 108,419	94 247 289 573 2,352 10,886 11,849 112,557 215,114	28 151 143 340 1,254 5,477 6,768 60,338 106,028 	2 5 1 - - - - -	3 17 7 3 	4 22 19 47 210 758 824 7,580 10,361 2,963	17 75 66 208 803 3,033 3,041 30,480 52,069 14,412	28 156 145 363 1,264 5,785 6,867 61,675 111,860 (430
Totals	90	15, 664	34, 117	66, 331	5, 550	170, 771	353, 962	180, 528	9	31	22, 788	104, 203	187, 712

TABLE 1D. Principal Statistics classified by Size Groups based on Total Value Added, 1961 and 1962 Basis: Revised Standard Industrial Classification and New Establishment Concept²

See footnotes following Table 3 A.

TABLE 1E. Principal Statistics classified by Size Groups based on Total Employed,¹³ 1961 and 1962 Basis: Revised Standard Industrial Classification and New Establishment Concept²

				Man	ufacturing	activity				1	Fotal acti	vity	
Size group	Estab- lish- ments		oduction ated work			Cost of materials	Value of shipments of goods	Value	Working owners and partners ⁶		Temple	Total value	
	, include	Number Man- hours paid		Wages elec- tricity ⁵		and supplies used ⁴	of own manu- facture ⁴	added ⁴	Number	With- drawals	Number	Salaries and wages	added ^s
1961	No.		000			\$'000				\$'000		\$'	000
Under 5 employees	17 9 23 11 9 9 15	21 44 444 660 799 2,233 10,097	41 94 911 1,431 1,805 4,706 21,657	57 139 1,405 1,944 3,016 7,784 43,179	5 16 152 219 435 771 3,679	122 976 5,283 3,402 11,365 16,700 112,221	330 1,669 10,041 8,862 25,710 38,082 246,440	198 482 4,853 5,282 14,179 20,936 123,916	8 1 - - -	18 8 7 	33 77 613 811 1,233 2,829 13,436 2,789	110 283 2,403 2,733 5,262 10,891 59,910 14,144	203 505 5,110 5,346 14,743 20,909 127,783 1,086
Totals	93	14, 298	30, 644	57, 524	5, 276	150, 069	331, 135	169, 847	10	33	21, 821	95, 737	175, 685
Under 5 employees	17 8 20 10 11 8 16	19 55 387 589 1.080 2.021 11.513	41 123 809 1,305 2,393 4,520 24,927	68 206 1,292 1,844 4,059 8,081 50,784	8 21 150 198 510 849 3,816	198 569 4,171 4,261 13,993 18,713 128,867	452 1,311 8,590 10,090 31,564 43,306 258,649	248 740 4,275 5,702 17,359 23,862 128,342	8 -1 	27 	31 83 553 754 1,506 2,533 14,365 2,963	121 370 2,370 2,676 6,485 10,983 66,787 14,412	254 765 4,597 5,803 18,206 23,817 134,699 (430
Totals	90	15, 664	34, 117	66, 331	5, 550	170, 771	353, 962	180, 528	9	31	22, 768	104, 203	187, 712

See footnotes following Table 3 A.

TABLE 1F. Principal Statistics classified by Type of Organization, 1961 and 1962 Basis: Revised Standard Industrial Classification and New Establishment Concept²

	-			Mai	nufacturing	activity				7	Fotal acti	vity	
Type of organization	Estab- lish- ments		oduction ated work		Cost of	Cost of materials	Value of Shipments of goods	Value	Working and pa	owners rtners*		otal oyees ⁷	Total
	, menes	Number	Man- hours paid	Wages	elec- tricity ³	and supplies used ⁴	of own manu- facture*	added*	Number	With- drawals	Number	Salaries and wages	value added*
	No.		'000		h	\$'000				\$'000		\$*	000
1961									1.00				
Individual ownerships Partnerships	8	} 35	58	76	6	78	285	216	10	33	35	76	217
Incorporated companies	84	14, 263	30, 586	57,448	5,270	149,991	330, 850	169,631			18,997	81,517	174, 382
Cooperatives		-	-	-	-		-	-			-	-	_
Head offices, sales offices and auxiliary units ¹⁰											2,789	14,144	1,086
Totals	93	14, 298	30, 644	57, 524	5, 276	150, 069	331, 135	169, 847	10	33	21, 821	95. 737	175, 685
1962													
Individual ownerships Partnerships	8	} 26	51	82	8	94	296	195	9	31	26	82	204
Incorporated companies	81	15,638	34,067	66, 250	5, 544	170,677	353,666	180, 333			19,799	89,709	187, 938
Cooperatives	-	-	- ·	-	-	-	-				-	-	-
Head offices, sales offices and auxiliary units ¹⁰		15, 664	34, 117	66, 331	5, 550	170, 771	353, 962	180, 528			2, 963 22, 788	14, 412 104, 203	(430) 187, 712

See footnotes following Table 3 A.

TABLE 2. Industry Outputs, Inputs and Value Added, 1961 and 1962 Basis: Revised Standard Industrial Classification and New Establishment Concept²

Item	196	1	1963	2
		\$'000		
Manufacturing activity:				
Value of shipments - Goods of own manufacture		331,135		353, 962
Add: Closing inventory - Goods in process	8,658		10,086	
Finished goods	58,261	66,919	46,868	56, 954
Deduct: Opening Inventory - Goods in process	7,842		8,634	
Finished goods	65,020	(72,862)	45, 432	(54,068)
Gross output - Manufacturing activity		325, 192		356, 850
Deduct: Cost of materials and supplies used in manufacturing activity	150,069		170, 771	
Cost of fuel and electricity used	5,276	(155,345)	5,550	(176,321)
Value added - Manufacturing activity		169, 847		180, 528
Non-manufacturing activities:				
Value of shipments - Goods not of own manufacture				45, 526
Add: All other revenue			134	
Closing inventory - Goods purchased for resale	6,647		6, 153	6, 287
Deduct: Purchases of goods for resale as Such			36, 260	
Opening inventory - Goods not of own manufacture	6,467		6,421	
Cost of all other materials and supplies used		()	1,948	(44,629)
Value added - Non-manufacturing activities		5,838		7, 184
Total value added	175, 6	85	187, 7	12

See footnote following Table 3 A.

TABLE 3. Employment and Payroll, 1961 and 1962 Basis: Revised Standard Industrial Classification and New Establishment Concept²

RIA III CANA					En	ployees						Sala	ries and	wages	
Year, province		Producti related v			tra	ninis- tive		les, nd		tal vees ^{7, *}	Producti related v		Admin- istra-	Sales,	Total
and industry	Manufa	cturing ⁴	0	ther*	and o	ffice ^{6,9}	distri	bution*	empro,	yees .	related v	OINCIS	tive	and distri-	salaries and
	Male	Female	Male	Female	Male	Female	Male	Female	Male	Female	Manufac- turing	Other	office	bution	wages
1961				L	nun	nber					1	1	\$'000		
New Brunswick	3,076	1.311 1,591	•••		•••				61 4,530 11,644	6 1.765 2.768	14,777 41,609		••	* *	311 24,010 66,867
Manitoba	} 268	2							696	78	962				3,195
Alberta British Columbia	35	6							220	53	176		• =		1,354
Totals	11, 386	2, 912					++	* *	17,151	4,670	57, 524				95, 737
1962										1					
New Brunswick Quebec Ontario	3, 361 8, 723	1.516	30	- 3	973 2,213	429 846	74 512 1,035	10 71 226	74 4,846 12,001	10 2,016 2,611	16,269 46,540	131	6,504 17,195	391 2,824 7,495	391 25,597 73,361
Manitoba Alberta	262	2	-	-	46	9	342	74	670	65	1, 324	-	316	1,926	3,566
British Columbia	39	5	-	-	17	4	170	40	226	49	197	-	121	969	1,287
Totals	12, 405	3,259	30	3	3, 249	1,288	2, 133	421	17,817	4, 971	66, 331	131	24, 136	13,605	104, 203
1961 Footwear manufacturers Thre and tube manufacturers Other rubber industries	1,671 5,334 4,161	1,469 281 1,142	•••		• •			••	2,352 7,152 6,105	1, 717 700 1, 726	10,059 26,967 20,478				12,931 36,116 33,835
Totals	11, 386	2, 912						* *	15,609	4,143	57, 524				84, 882
1962															
Footwear manufacturers Tire and tube manufacturers Other rubher industries	2,130 5,746 4,529	1,772 245 1,242	- 25		439 681 1,230	222 210 439	44 553 544	5 116 99	2,613 7,180 6,328	1,999 573 1,783	11, 381 31, 147 23, 803	117	2,760 6,547 9,274	262 3,553 4,211	14.403 41.247 37,405
Totals	12,405	3,259	25	3	2, 550	871	1, 141	222	16, 121	4, 355	66, 331	117	18, 581	8,026	93, 055
				2											

See footnotes following Table 3 A.

TABLE 3 A. Production and Related Workers,4 - Manufacturing Activity, by Months, 1963	2
Basis: Revised Standard Industrial Classification and New Establishment Concept ²	

Month	Establishments reporting monthly detail ¹¹		
	Male	Female	
	nur	nber	
January	11,702 11,777 11,819 11,971 12,334 12,589 12,589 12,581 12,803 12,673 12,873 12,877 12,673	2,919 2,957 3,023 3,066 3,188 3,385 3,265 3,465 3,558 3,558 3,558 3,558 3,558 3,558 3,558	
Average for all establishments	12,405	3,259	

¹ See Table 2 and Explanatory Notes concerning manufacturing and non-manufacturing activities.

 See Explanatory Notes.
 ³ See Explanatory Notes.
 ³ This category, in this table only, includes working owners and partners. Since administrative and office employees are engaged in a variety of activities they have been excluded from manufacturing activity beginning with the revised 1961 series shown in the following tables. They are included here for purposes of comparison with the tabulations of previous years.
 ⁴ Conceptually identical to previous years. ⁴ Conceptually identical to previous years. See Explanatory Notes. ⁵ Cannot be reported separately for manufacturing and non-manufacturing activities but related substantially to manufacturing activity. Identical concept

to previous years. *Working owners and partners were included with administrative and office employees in the "Manufacturing series" published in former years. See E1-

planatory Notes. ⁷ Includes production and related workers, administrative and office employees, sales distribution and other employees. See Explanatory Notes for the

⁷ Includes production and related workers, administrative and office employees, sales distribution and other employees. See Explanatory Notes for the treatment of head office employees and those employed in auxiliary units. ⁸ Value of total shipments and other operational revenue less total cost of materials, supplies, fuels and purchases of products and materials for resale in the same condition; all adjusted for inventory changes where required. See Table 2 and Explanatory Notes . ⁹ Sales and distribution workers and production workers (non-manufacturing) are included for the first time as a result of the full Implementation of the new definition of the establishment. The figures for production workers (non-manufacturing), administrative and office employees and distribution workers are not yet available for 1961 but form part of total employees. Sales and distribution workers may include some employees that are reported as part of a manufacturing establishment but are not working at the establishment's location. Head offices, sales offices, etc., which report separately are included in the figures for the figures for a manufacturing is which they are located.

facturing establishment but are not working at the establishment's location. Head offices, sales offices, etc., which report separately are included in the figures for the province in which they are located. ¹⁰ These data cover the activities reported by separately located units such as head offices, sales offices, administrative offices, laboratories, warehouses, etc. Such units do not usually constitute separate 'establishments' as they do not normally generate all the necessary elements of input and output statistics. However, they are treated as extensions of manufacturing establishments and, in the case of individual industries, may be located in provinces where no proces-sing plants are situated. For the most part, these units contribute only to costs of operations (mainly salaries and wages) and they are included here to provide completeness and consistency of the statistics. See Explanatory Notes which deal with Single and Multi establishments for a complete explanation of procedures. ¹¹ The monthly detail of production workers was not collected from small establishments. Annual averages reported by these establishments were included ¹² Confidential data. ¹³ Includes paid employees and working owners but excludes unpaid family workers.

13 Includes paid employees and working owners but excludes unpaid family workers.

Note: Figures may not add due to rounding.

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TABLE 6 B. Shipments of Tires, by Type, 1962

Basis: Revised Standard Industrial Classification and New Establishment Concept¹

Туре	Premium and first line	Second line	Third and fourth lines	Total	Value
		nun	aber		\$'000
Pneumatic tires (including tubeless): Passenger car all ply ratings	6, 233, 810	1, 563, 136	1, 181, 348	8,978,294	91,828
Truck and bus (including earth-mover, excavator, logger and grader):					
(a) Sizes smaller than 12.00 - 22: Highway Off the road	first llne 800, 713 112, 040	110, 361 26, 436		911,074 138,476 }	45,922
(b) Sizes 12.00-22 and larger: Highway Off the road	6, 329 18, 321	-		6.329 18.321 }	7.574
Tractor and implement	329, 853	65,098		394,951	9, 459
Boat trailer	7, 591			7, 591	49
Mobile home (trailer)	3				
Industrial, pneumatic and semi-pneumatic (including wheelbarrow)	668,770	31, 529		720, 299	1, 318
Aeroplane, motorcycle and side car, bicycle, and pneumatic tires, n.e.s.					
Solid and cushion tires: All types: (including lawn mower, wheelbarrow, pressed-on and moulded-on)	37, 072	_		37, 072	306
Total tires	8, 234, 499	1, 796, 560	1, 181, 348	11, 212, 407	156,456

¹ See Explanatory Notes. ² See Table 6.

TABLE 6C. Shipments of Tubes, by Types, 1962 Basis: Revised Standard Industrial Classification and New Establishment Concept^a

Туре	First line	Second line	Total	Value
		number		\$'000
Passenger car	1,422,827	925,852	2,348,679	3,064
Truck and bus: (a) Sizes smaller than 12.00-22 (b) Sizes 12.00-22 and larger	758,610 21,861	17,629	776,239	3,064 289
Tractor and implement	274,293	-	274,293	775
Boat trailer	2	-	2	2
Aeroplane, motorcycle and side car, bicycle, and tire tubes, n.e.s.	528,208	13, 469	541,697	393
Total tubes	3,005,799	956, 970	3, 962, 769	8,085

See Explanatory Notes.
 Included with "Aeroplane, motorcycle and side car, etc."
 See Table 6.

TABLE 6 D. Shipments of Other Products, 1962

Basis: Revised Standard Industrial Classification and New Establishment Concept¹

Principal products	Quantity	Value
		\$'000
Clothing (rubber, rubberized, etc.) doz. Fabrics (rubberized, plastic-coated, etc.) sq. yd. Artificial and imitation leather	15, 827 2, 289, 434	1,440 2,442
Rubber and composition soles (full and taps) pt. Rubber and composition heels "" Rubber and composition soling and toplifting sheets ""	6,756,037 12,962,461 15,232,491	2, 495 1, 736 5, 118
Belts and belting: Conveyor lin. ft. Transmission, flat type lib.	6, 493, 124 1, 209, 199 1, 905, 373	5.472 1.322
Transmission, V-type, automotive fan belts: No. Original equipment No. Replacement "" Transmission, V-type, fractional h.p. belts "" V-type, other belts — Multi-V "" Rubber belts and beiting, other (including agricultural) ""	922, 248 1, 700, 849 1, 931, 808 1, 169, 408	467 1,619 1,046 1,345 1,454
Hose and tubing: ft. Garden hose, rubber ft. Automotive hose ft. Heavy industrial hose ft. Light industrial hose, fire hose and all other rubber tubing ft. Plastic garden hose, other hose and flexible tubing ft. Plastic pipes, film and sheet and other extruded plastic products ft.	8,983,779 7,057,205 7,836,642	872 1,592 5,668 4,545 652 2,687

See footnotes end of table.

Principal products		Quantity	Value
· · · · · · · · · · · · · · · · · · ·			\$1000
Rubber packing, all kinds	lb.	3, 667, 319	2,013
Rubber supplies, such as washers, gaskets, etc.			3,708
Rubber thread, covered and not covered		913,742	1,571
Rubber and friction tape		1,847.193	1,382
Pressure sensitive tape, including cellulose Printers rolls and other rubber rolls			2
		112, 595	454
All other rubber rolls and coverings (including wringer rolls)			2, 283
Rubher coverings and linings, for tanks, pipes, etc.		3, 345, 215	2,912
Rubber floor mats, matting, stair treads, etc		4,021,458	924
Link mats for doors, etc.		1,006,191 250,057	2, 809
Rubber sheet flooring and wainscotting		200,007	261
Rubber tiles		2	2
Rubber tires and tiring, for baby carriages, etc.		1,062.447	
Repair gums and fabrics		724,856	211 642
Other unvulcanized gums		665, 929	391
Tread rubber (Camelback)		19, 531, 770	6, 406
Cured rubber, in slabs		2	2
Rubber adhesives:			
Neoprene	. gal.	1,628	7
Other (including natural ruhber)		971,968	2,952
Tire and tube repair materials (patches, etc.)			901
Tube repair kits	No.	708, 890	152
Rubber blankets, printers', etc.	. lh.	374,972	370
Battery containers		1	
Battery covers, vents, etc.		}	4, 157
Channel rubber		2	2
Rubber automotive and aeroplane parts, n.e.s.	lb.	7, 545, 647	5,279
Druggists' and medical sundries (including rubber sheeting and rubberized sheets)			1, 118
Gloves, rubher		219, 339	1,072
Gloves, plastic, rubherized and plastic coated fabric		28, 102	198
Ruhber jar rings		2	2
Weather stripping, all kinds	lh.	5,715,687	2, 778
Sanitary goods, n.e.s.			136
Aprons, rubber, rubberized and plastic		4, 356	110
Bathing caps, shower caps, etc.		2	2
Rubber play balls		2	2
Rubber toys (including rubber and plastic dolls)			76
Hockey pucks		2	3
Balloons, toy	-	364, 200	647
Extruded rubber goods, n.e.s.			921
Moulded rubber goods, n.e.s.			4, 997
Moulded plastics, n.e.s.			1.822
Other plastic products, n.e.s. (bags, covers, tapes, tiles, toys, folding doors, etc.)			8,716
Sponge and hard rubber mats, pads, cushions, etc.		272, 143	310
Foamed latex			
Rug underlay of cushioning		2	2
Latex compounds (natural and synthetic)		7, 410, 570	3,130
Dies and moulds		1,042	49
All other products Amount received in payment for work done on materials and products owned hy others		•••	44.321
Amount received in payment for work done on materials and products owned by others		***	2, 154
Total union of other medicals			
Total value of other products		***	154, 312'

TABLE 6 D. Shipments of Other Products, 1962 - Concluded

See Explanatory Notes.
included with "All other products".
See Table 6.

Description		Quantity	Cost
			\$'000
Materials used:			
Rubber, natural ²	1b.	78, 267, 890	22, 304
Rubber, reclaimed ²	60	39,452,550 160,660,902	4,867 35,282
Rubber, natural ^a Rubber, reclaimed ^a Rubber, synthetic ^a Rubber, scrap	4.8	17, 942, 186	637
Crude allied gums	4.4	44,956	117
Latex compounds	**	1,263,528	381
Latex compounds Tread rubber (camel back) Rubber, other (including master batches, tubing, etc.)	44	258,765	91 500
Plastics, synthetic resins	1b.	19,885,698	4,229
Plastics, other	**	1, 546, 160	1,023
Tire fabrics, cotton	- 44	1,887,335	1.412
re rayon	4.4	13,968,797	10,348
Tire fabrics, all other (nylon, etc.)	44	15, 597, 993 620, 860	19,717
Belting duck	44	3,419,099	3,085
Belting fabrics, other	4.4	459, 951	412
Holland cloth	4.4	80,144	81
Shoe fabrics, other than leather		610,595 9,973,524	620 3,170
Other fabrics, n.e.s.		5,415,697	2,807
Yarns, cotton	lb.	304,939	311
" rayon, nylon, etc.	44	1,545.650	1,423
FeitJuter		18,200 407,174	30 100
Fu	yd.	983, 456	262
Mouton shearling	lb.	92, 983	76
Leather	F4	426.145	564
Leather tops for boots		32,497 84,518,164	65 6, 748
China clay	44	19,070,556	326
Other clays and earths		10,759.002	205
Mica, ground		544.807	54
Solvents Fatty acids	lb.	4,013,778 2,872,704	1,156 234
Sulphur	4.4	5, 987, 903	446
Whiting		20, 942, 782	332
Litharge	14	207, 592 10, 192, 547	226 1,309
Zinc oxide Talc and scapstone	44	2, 796, 971	1,309
Barytes	48	983,358	47
Titanium dioxide	E4	1,901,147	483
Accelerators, n.e.s.	44	3,411,887	2,040
Coloring agents, n.e.s.		2,497,667 216,738	606 48
Plasticizers, n.e.s.	4.4	18, 266, 552	2,788
Anti-oxidants, n.e.s.	44	4, 113, 129	2,297
Fillers, n.e.s.	44	21, 571, 805	847
Other chemicals, n.e.s. Oils	1b.	712, 923	4,507
Wire	4.8	11,098,777	2,495
		•••	1,464
Shoe findings, buckles, eyelets, etc	(FR)	415.945	1.548
Rubber cement		135.968	232
Paints, varnishes, etc.		124, 527	116
Thread for sewing			29 241

TABLE 4. Materials and Supplies Used in Manufacturing Activity, 1962 Basis: Revised Standard Industrial Classification and New Establishment Concept¹

1.

See Explanatory Notes.
 ¹ For details of "Rubber used" see Tables 10 to 14, inclusive.
 ³ No detailed information on materials used was collected from small establishments, the estimated costs for which are included here In 1962 these estimated costs were \$2,746,855.

12,633

4.568

7.243

170, 771

570

. . .

All other materials and components used³

2. Containers and other packaging materials and supplies used

Total ..

3. Operating, maintenance and repair supplies used (excluding fuel)

4. Amount paid out to others for work done on materials owned by establishments

TABLE 5. Fuel a	and Electricity Used	in Manufacturing	Activity. ² 1962
Basis: Revised Sta	ndard Industrial Classific	cation and New Estab	lishment Concept'

Description		Quantity	Cost
			\$'000
. Large establishments which reported commodity detail:			
Bituminous coal: (a) From Canadian mines (b) Imported	ton	43 138, 257	1 1, 520
Sub-bituminous coai (from Alberta mines only) Anthracite coal Lignite coal	ton	97	_2
Coke Gasoline (including gasoline used in cars and trucks) Fuel oil including kerosene or coal oil Wood	mp. gal.	297, 847 7, 082, 407	105 650
Gas: (a) Liquefied petroleum gases	mp. gal. M cu. ft.	27, 384 1, 385 383, 907	5 2 179
Other fuel	kwh.	327, 420, 781	2, 739 198
2. Estimate for small establishments for which no data were collected:			
Fuel and electricity	1		149
3. Ali establishments:			
Total fuel and electricity used			5,550

¹ Does not include fuel and electricity produced for own use. ² Includes only fuel and electricity purchased. Conceptually identical to previous years in that it also includes relatively small amounts used in non-manufacturing activities since these cannot be reported separately. ³ See Explanatory Notes.

TABLE 6. Shipments by Type of Products, 1962

Basis: Revised Standard Industrial Classification and New Establishment Concept¹

Type of products	Value
	\$'000
lootwear	35, 746
Cires	156, 456
lubes	8,085
ther products	154, 312
Total shipments	354, 599
ess adjustment for value of sales taxes, excise duties and outward transportation charges which could not be deducted from in	
dividual commodity items described above	637
Total shipments (adjusted)	353.962

¹ See Explanatory Notes.

TABLE 6 A. Shipments of Footwear, 1962

Basis: Revised Standard Industrial Classification and New Establishment Concept¹

Kind	Quantity	Value
Boots, all rubber:	pairs	\$'000
(a) Knee, thigh and hip	973,954 279,330	3, 383
Boots, rubber bottoms and leather tops: Lumbermen's, etc.		
Bottoms for reacher tops	112, 103 176, 302	682 415
Overshoes and goloshes: (a) Cloth uppers (b) All rubber, lined and unlined Light and heavy rubbers	882, 686 2, 926, 272 2, 854, 728	3, 820 8, 268 3, 728
Footwear, with canvas or other fabric tops: (a) Utility (b) Casual	2, 581, 162 748, 416	4, 410
Bathing shoes	2	2
Plastic waterproof footwear, all types	2, 828, 804	3,904
Leather footwear	1	2
Other footwear		4,221
Total footwear	1, 942, 733	35, 7463

See Explanatory Notes.
Included in "Other footwear".
See Table 6.

TABLE 12. Consumption of Natural Rubber in Total, by End Products, and by Months, showing also Percentage of Natural to All Rubber Consumed, 1962

	Natural Consumed in the manufacture of						
Month	Total	Percentage of all rubber	Tires and tubes ¹	Wire and cable	Footwear ³	Foamed rubber	Other products
	'000 lbs.	%			'000 lbs.		
January	6,337	28.9	4,490	40	521	171	1, 115
February	6,325	28.7	4,416	32	573	133	1, 171
March	6, 578	29.0	4,460	47	589	141	1,341
April	6,020	27.4	4,127	35	555	141	1, 162
May	6,836	27.7	4,934	38	606	115	1,143
June	7, 203	27.2	5,011	62	655	110	1,365
July	5,957	28.2	4, 552	18	348	91	948
August	5, 123	27.7	3, 149	40	687	87	1, 160
September	6,840	27.3	4,847	42	657	108	1,186
Octoher	7,290	26.3	5,126	62	726	138	1,240
November	7,449	27.4	5,122	55	738	118	1,416
December	5,967	26.8	4,209	44	481	105	1, 128
Totals	77, 925	27.7	54, 443	515	7,136	1,456	14, 375

¹ Includes "Tire repair materials". ² Includes "Heels, soles, etc".

TABLE 13. Consumption of Reclaimed Rubber in Total, by End Products, and by Months, showing also Percentage of Reclaimed to All Rubber Consumed, 1962

	Recl	aimed	Consumed in the manufacture of				
Month	Total	Percentage of all rubber	Tires and tubes ¹	Wire and cable	Footwear ^a	Foamed rubber	Other products
	'000 lbs.	%	'000 lbs.				
January	3, 186	14.5	2,269	1	223	-	693
February	3,348	15.2	2,354	5	248	-	741
March	3,170	14.0	2, 175	5	272	-	718
April	3,340	15.2	2, 191	3	252	_	894
May	3,917	15.9	2.656	5	330	-	926
June	3,755	14.2	2, 597	5	281	-	873
Ju]y	3,010	14.3	2, 279	2	117	-	612
August	2,553	13.8	1, 706	5	203	-	639
September	3,323	13.2	2.290	7	221	-	805
October	3,685	13.3	2, 495	6	235		949
November	3,863	14.2	2,579	6	186	-	1, 092
December	3,126	14.0	2,044	4	159	-	919
Totals	40, 276	14.3	27, 635	54	2, 727	-	9,860

¹ Includes ''Tire repair materials''. ² Includes ''Heels, soles, etc''.

TABLE 14. Consumption of All Rubber, by Main Types and by End Products Classification, 1962

End products	Natural	Synthetic	Reclaimed	Total all rubber
		'000	lbs.	
Fires, tubes and tire repair materials	54, 443	115,784	27,635	197, 862
Vire and cable	515	6,724	54	7, 293
matwear (including heels, soles, etc.)	7, 136	13,920	2,727	23, 783
'anned rubber	1,456	3, 967	-	5,423
ther products	14,375	23, 156	9,860	47, 391
Totals	77, 925	163, 551	40, 276	281, 752

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List of Establishments, 1962 Index to Industry: A Footwear; B Tires; C Other Products Index to Products: (1) Footwear (2) Tires (3) Other Products

Name	Address	Industry	Products	
Quebec:				
The Acton Rubber Ltd.	Acton Vale	A	(1)(3)	
American Biltrite Rubber Co. (Canada) Ltd.	255 Jenckes Lane, Sberbrooke	C	(3)	
American Wringer Company (Division of Hamstell Corp. Ltd.)	155 Main St., Farnham	C	(3)	
Arrowtape Industries Ltd.	1955 Notre Dame St., Lachine	C	(3)	
Associated Industrial Rubber Co. Ltd.	2705 Bates Rd., Montreal	C	(3)	
Best Rubber Carpets Reg'd	5073 Rue de la Gare, Montreal	C	(3)	
M. Bloomfield & Sons, Ltd.	7230 Alexandra St., Montreal	C	(3)	
The Britisb Rubber Company Limited	455-19th Ave., Lachine	A	(1)(2)(3)	
Canadian Lastex Ltd.	1665 Notre Dame St., E., Montreal	C	(3)	
Canadian Philtex Products Ltd.	824 Blvd. Ste Croix, St. Laurent	C	(3)	
Canadian Technical Tape Limited	455 Côte Vertu Road, St. Laurent	C	(3)	
Cat's Paw Holtite Rubber Co. of Canada Ltd.	Lindsay St., Drummondville	C	(3)	
Dominion Rubber Co. Ltd.	St. Jerome	A	(1)	
Dominion Rubber Co. Ltd. Dominion Rubber Co. Ltd. (Latex and Reclaim Division)	1806 Notre Dame St. E., Montreal 1830 Notre Dame St. E., Montreal	C	(3)	
		C	(3)	
Durie & Miller of Canada Ltd. Franko Piastic Extrusions	8525 Delmeade Rd., Montreal	C	(3)	
General Latex and Chemicals (Canada) Ltd.	1052 Henault St., Montreal 425 River St., Verdun	C	(3)	
B.F. Goodrich Sponge Products Canada Ltd.		C	(3)	
The Goodyear Tire & Rubber Co. of Canada Ltd.	Depot St., Waterville	C	(3)	
Jiffy Products Inc.	2052 St. Catherine St. W., Montreal	c	(2)(3)	
Laval Tanguay, Inc.	1042 Wellington S., Sherbrooke	c	(3)	
Lion Rubber & Plastics Ltd.	0140 Clement St., Ville Lasalle	c	(3)	
The Miner Rubber Co. Ltd.	191 Denison Ave., Granby	A	(1) (3)	
Peelcoat Industries Reg'd.	201 Laval St., Granby	C	(1)(3)	
Precision Rubber Products (Canada) Ltd.	156 Turgeon St., Ste. Thérèse de Blainville	C	(3)	
Rockland Accessories Limited	Kingsbury	C	(3)	
The Rubber Guild	2444 Centre St., Montreal	C	(3)	
Stedfast Rubber Co. (Canada) Ltd.	Sydeman Ave., Granby	C	(3)	
Tillotson Rubber Co. Ltd.	260 St. Michel St., St. Johns	C	(3)	
Wilkinson Linatex Co. Ltd.	1975 Bois Franc Road, St. Laurent	С	(3)	
F.E. Woodward & Son Limited	290-17th Ave., Lachine	С	(3)	
Ontario:				
Armet Industries Limited (Silicone of Paint Division)	Woodlawn Rd., Guelph	с	(3)	
Austenal Canada Ltd.	364 Waterloo Ave., Guelph	C	(3)	
Bata Shoe Co of Canada, Ltd.	Batawa	A	(1) (3)	
Biltrite Tire Co. Ltd.	121 De Grassi St., Toronto	C	(3)	
Bowes "Seal Fast" Co. Ltd.	765 Woodward Ave., Hamilton	C	(3)	
Canadian Collord Products Ltd.	985 St. Luke Road, Windsor	С	(3)	
Canadian Vaportred Ltd.	40 John St., Thorold	в	(2) (3)	
Chase Grocord of Canada Ltd.	120 Town Line, Tillsonburg	С	(3)	
Chevron Matting Co.	Alberta St., River Canard	C	(3)	
Clarke Roller & Rubber Ltd.	11 Newbridge St., Toronto	С	(3)	
Cloudfoam Ltd.	284 Fairall St., Ajax	С	(3)	
Dayton Rubber Co, (Canada) Ltd.	3723 Dundas St. W., Toronto	C	(3)	
Dominion Rubber Co. Ltd.	51 Breithaupt St., Kitchener	С	(1)(3)	
Dominion Rubber Co. Ltd.	149 Strange St., Kitchener	в	(2) (3)	
Dominion Tape of Canada Ltd.	104 William St., Cornwall	С	(3)	
Dowswell Lees & Company Limited	65 Hatt St. Dundas	C	(3)	
Dunlop Canada Limited	Dunlop Drive, Whitby	В	(2) (3)	
Dunlop Canada Limited	870 Queen St. E., Toronto	C	(2) (3)	
Feather Industries Ltd.	115 Glen Scarlett Rd., Toronto	C	(3)	
Federal Mogul Bower (Canada) Ltd.	Arthur St., Mitchel	C	(3)	
Federal Mogul Bower (Canada) Ltd.	342 Erie St., Stratford	C	(3)	
Firestone Tire & Rubber Co. of Canada, Ltd.	1579 Burlington St. E., Hamilton	В	(2) (3)	

TABLE 7. Industry Inventories, 1962¹ Basis: Revised Standard Industrial Classification and New Establishment Concept²

		Manuf	acturing		Non- manufacturing	
Province and industry	Raw materials and supplies	Goods in process	Finished goods of own manufacture ^s	Total manufacturing	Products or materials purchased for resale	Total inventories
	1		book va	lue \$'000	• · · · · · · · · · · · · · · · · · · ·	
Opening: ³ Quebec Ontario Manitoba Alberta British Columbia	4, 107 13, 746 } 354 60	1,532 6,814 283 6	7, 753 50, 524 4	13, 392 71, 084 641 70	1,043 5,378	14, 435 78, 462 641 70
Totals ⁴	18, 267	8,634	58, 284	85, 185	6, 421	91, 606
Closing: Quebec Ontario Manitoba Alberta British Columbia	4,595 16,068 } 628 61	1,718 8,024 338 6	9,050 49,317 4	15,363 73,409 970 71	1, 005 5, 148 	16,368 78,557 970 71
Totals ⁴	21, 351	10, 086	58, 375	89, 813	6, 153	95, 96
Opening: Footwear manufacturers Tire and tube manufacturers Other rubber industries	2,088 9,193 6,986 18,267	501 4, 281 3, 852	7, 035 43, 225 8, 023	9,624 56,699 18,861	883 3,325 1,686	10, 507 60, 024 20, 547
Totals ⁴	18, 267	8, 634	58, 284	85, 185	6, 421	91, 606
Closing: Footwear manufacturers Tire and tube manufacturers Other rubber industries	2,490 10,667 7,994	887 5, 290 4, 109	8, 215 42, 500 7, 660	11,392 58,657 19,763	672 2,891 1,903	12,064 61,548 21,686
Totals ⁴	21, 351	10, 086	58, 375	89, 813	6, 153	95, 966

¹ Values represent book values of inventories owned in Canada. ² See Explanatory Notes. ³ The opening inventories may differ from the closing inventories for the previous survey year because of changes in classification, the receipt of revised data, the inclusion of new establishments and the removal of establishments which did not operate during the survey year. ⁴ Figures may not add due to rounding. ⁵ The difference between figures in this table and those in Table 2 arises from firms reporting output of products on the basis of production rather than of shipments. Consequently, inventories of finished products for such respondents are not taken into account for purposes of compiling value added in Table 2.

TABLE 8. Shipments of Goods of Own Manufacture - All Industries,¹ 1961 and 1962

		1961	L	1962P		
Description	1911	Quantity	Value	Quantity	Value	
······································			\$'000		\$'000	
Pressure-sensitive tapes:						
Plastic tape, all types		1			5, 548	
All other tapes: Paper, cloth, etc.		j	10, 782*		5,949	
Rubber tiles	sq. ft.	5, 241, 881	1, 643	2	2	
Foamed latex and chemically blown rubber	lb.	4, 677, 016	4,539	5, 063, 553	4,930	
Rug underlay and cushioning, all types			5.477		6,246	

¹ Includes shipments from other industries which manufacture, as a secondary activity, the commodities listed above.
² Figures are confidential in 1962.

	Capital expenditures		Rep	air expenditure	38	Total capital and repair expenditures			
Year	Construction	Machinery and equipment	Sub- total	Construction	Machinery and equipment	Sub- total	Construction	Machinery and equipment	Total
					\$,000				
1960	6,970	17,052	24,022	1, 073	8,059	9,132	8,043	25,111	33, 154
1961	2,830	13,800	16, 430	877	8, 274	9, 151	3, 507	22, 074	25, 581
1962	2,908	14, 088	16, 996	1,135	9,012	10, 147	4,043	23, 100	27, 143

TABLE 9. Capital and Repair Expenditures, 1960-62

Source: Business Finance Division. - DBS.

The statistics contained in the body of this report are compiled from returns submitted annually by firms whose principal operations necessitate that they be classified under the Rubber Industries. However, there are other firms using rubber, most notably those engaged in Wire and Cable manufacturing, whose operations are outside the scope of the Rubber Industries. In order that there may be available a total picture of rubber as a Commodity a monthly survey is maintained, in which all firms using rubber at the raw level are included. This survey results in statistics on the total consumption of rubber, by types, and by broad end product use groups, and data of this nature compiled from monthly returns are presented in the special supplementary tables following this text.

Because of rounding, the totals in Tables 11 to 14, inclusive, do not always agree with the total of the monthly figures.

	S-ty	pe					
Month	Solid	Latex	Butyl	Neoprene	N - type	Other	Total
		1		'000 lbs.			
January	10, 219	585	809	584	90	112	12, 399
February	10, 323	551	825	466	81	106	12, 352
March	10,766	598	822	558	85	136	12, 965
April	10, 596	480	845	491	90	138	12, 640
May	11,638	543	981	574	104	111	13, 951
June	13, 001	628	1, 063	625	90	142	15, 549
July	10, 316	470	687	502	70	86	12, 131
August	8, 800	564	649	612	89	107	10,821
September	12, 451	574	875	769	134	118	14,921
October	14, 033	640	1, 040	780	135	128	16,756
November	13, 499	586	859	665	114	161	15,884
December	11,069	495	776	571	123	128	13, 182
Totals	136, 731	6, 714	10, 231	7, 197	1, 205	1, 473	163, 551

BLE 10. Consumption of Synthetic Rubber, by Types and by Months, 1962

TABLE 11. Consumption of Synthetic Rubber, in Total, by End Products, and by Months, showing also Percentage of Synthetic to All Rubber Consumed, 1962

	Synt	hetic		Consume	d in the manuf	acture of	
Month	Total	Percentage of all rubber	Tires and tubes ¹	Wire and cable	Footwear ²	Foamed rubber	Other products
	'000 lbs.	%			'000 lbs.		
Januaty	12, 399	56.6	8, 543	552	1,070	302	1, 932
February	12, 352	56.1	8, 654	395	1, 313	275	1,715
March	12, 965	57.1	8, 904	592	1,259	300	1, 910
April	12, 640	57.5	8, 809	512	1.142	287	1,890
May	13, 951	56, 5	9, 882	631	1, 147	336	1,955
June	15, 549	58.7	11, 210	677	1, 331	396	1, 935
July	12, 131	57.5	9, 324	386	637	244	1, 540
August	10, 821	58. 5	6, 914	401	1, 334	388	1, 784
September	14, 921	59, 5	10, 702	704	1, 164	361	1, 990
October	16,756	60.4	11, 985	737	1, 394	399	2, 241
November	15, 884	58.4	11, 583	621	1, 157	368	2,155
December	13, 182	59. 2	9, 274	516	972	311	2, 109
Totals	163, 551	58, 0	115, 784	6, 724	13, 920	3, 967	23, 156

¹ Includes "Tire repair materials". ² Includes "Heels, soles, etc.".

List of Establishments, 1962 - Concluded

Name	Address	Indus try	Product
ntario - Concluded:			
Gaco Products Ltd.	177 Clarence St., Brantford	С	(3)
Gates Rubber of Canada Limited	50 Iroquois St., Brantford	С	(3)
General Latex & Chemicals (Canada) Ltd.	68 Eastern Ave., E., Brampton	C	(3)
General Tire & Rubber Co. of Canada Limited (Industrial Products Division)	John St., Welland	С	(3)
B.F. Goodrich Canada Limited	521 King St. W., Kitchener	В	(2) (3)
The Goodyear Tire & Rubber Co. of Canada Ltd.	Raynes St., Bowmanville	C	(2) (3)
The Goodyear Tire & Rubber Co. of Canada Ltd.	3050 Lakeshore Blvd., New Toronto	В	(2) (3)
G.L. Griffith & Sons Ltd.	341 Erie Street, Stratford	С	(3)
Hamilton Kent of Canada Ltd.	3094 Mavis Rd., Toronto	C	(3)
Kaufman Rubber Company, Ltd.	410 King St. W., Kitchener	A	(1) (3)
Latex Compounding Company	370 Bering Ave., Toronto	C	(3)
Mansfield Rubber (Canada) Limited	220 John St., Barrie	в	(2)
Minnesota Mining & Manufacturing of Canada Limited	Oxford St., London	С	(3)
National Rubber Co. Ltd.	394 Symington Ave., Toronto	C	(3)
Novelty Rubber Company	150 Canada Street, Hamilton	C	(3)
Remington Prod. (Canada) Ltd.	18 Foster St., Perth	C	(3)
Rubbermaid (Canada) Ltd.	2531 Stanfield Rd., Cooks ville	C	(3)
Ruflex Threads Limited	3 West Ave. S., Hamilton	C	(3)
Selberling Rubber Co. of Canada Ltd.	99 Paton Road, Toronto	В	(2)(3)
Sellotape Canada Ltd.	10 Esandar Drive, Toronto	С	(3)
Silcofab Limited	322 York Rd., Guelph	C	(3)
M.L. Snyder & Son Ltd.	49 Pine St., Wood bridge	С	(3)
Viceroy Manufacturing Company Limited	1655 Dupont St., Toronto	С	(3)
Western Rubber Co. of Canada, Limited	Alton	С	(3)
Yale Rubber Mfg. Co, of Canada, Ltd.	Kincardine	С	(3)
fanitoba:			
Shur-Foot Mat Company	221 Flora Ave., Winnipeg	С	(3)
liberta:			
Fabrix Rubber Mat Co. Ltd.	10.027-92nd St., Edmonton	C	(3)
Firestone Tire & Rubber Co. of Canada Ltd.	2 Highway Blackfoor Trail, Calgary	8	(2)
Goodyear Tire & Rubher Co. of Canada Ltd. (The)	1271 12th St. N.W., Medicine Hat	в	(2)
Petroleum Rubber Ltd.	9725-62nd Ave., Edmonton	С	(3)
Tap Master Corpn Ltd.	326-10th St. N.W., Calgary	C	(3)
ritish Columbia:			1.15
A.C. Rubber Manufacturing Co. Ltd.	1430 Burrard St., Vancouver	с	(2)
Huntington Rubber Mills of Canada, Ltd.	Dewdney Trunk Rd., Port Coquillam	c	(3)
Reliable Ruhber Mat Mfg. Company	3340 Findlay St., Vancouver	c	(3)
Seaway Fenders Ltd.	261 No. 7 Road, RR2, Richmond	c	(3)
			(2)
Western Mat Company Ltd.	1603 Franklin St., Vancouver	С	(3)

This report is one in a series of about 140 publications which present the results of the 1962 Census of Manufactures. Most reports in this series refer to specific industries, but there are summary reports for Canada and the provinces and special reports on geographical distribution and on type of ownership and size of establishments.

With the publication of the results of the 1962 Census of Manufactures, the Bureau has completed a major revision in the classification and concept of its annual census of manufacturing establishments. Because of its size and complexity, this project had to be carried out in three stages. The first stage was the change in classification and the results of the 1960 Census, together with the re-compilation of the 1957, 1958 and 1959 Censuses were published in the 1960 reports on the basis of the revised Standard Industrial Classification. This part of the project was confined entirely to a re-coding of existing reporting units. The second stage consisted of the implementation of the new definition of the reporting unit i.e. "establishment" as it applied to manufacturing activities of manufacturing establishments (See following note on "Establishment"). Results of the 1961 Census reflected this change in concept and, in order to provide comparability of data for recent years, the 1961 reports contained principal statistics on the basis of the new establishment definition for years back to 1957.

The third stage which was the extension of the definition of the establishment to cover total activities of manufacturing establishments is reflected in the statistics for 1961 and 1962 contained in this report. This full implementation of the new definition of the establishment has resulted in an extension of the data to non-manufacturing activities of manufacturing establishments and in additional changes in the 1961 statistics of manufacturing activities. Statistics on manufacturing activities will continue to be shown separately as in the past but, beginning with 1961, data on all operations (total activity) of manufacturing establishments will also be given. By definition "total activity" relates to all operational data and excludes such non-operational items as rent, interest and dividends. In addition, statistics on man-hours paid will be included as part of the regular series of industry statistics. For many industries, adjustments and revisions were made to the 1961 data on manufacturing activities which were published during the second stage to bring them in line with reporting procedures followed in the 1962 Census and to reflect the final application of the new concept. The 1961 statistics on manufacturing activities contained in this report are thus not entirely comparable with those published in the 1961 reports. However, the 1961 statistics are shown in this publication in both their original and revised forms in order to provide a link with the immediate past. A more complete account of recent changes and additions and brief descriptions of the principal industry statistics are given in following sections of these notes.

Standard Industrial Classification

The revised Standard Industrial Classification which was introduced with the 1960 Census of Manufactures and applied to the results of the 1957, 1958 and 1959 censuses provides for a breakdown of the manufacturing universe into 140 industries arranged in 20 major groups. Custom Tailoring Shops is the only industry class in the Manufacturing Industries Division of the classification which is not covered in the annual Census of Manufactures. It is surveyed as part of the Decennial Census of Merchandising and Service Establishments. Of the 140 "three-digit" industry classes in the Manufacturing Industries Division, 21 are further broken down into 67 "four-digit" sub-classes. With the exception of the Wood Preservation and Sound Recording industries, the figures for which are at present confidential and have to be included with those of related industries, the statistics for all of the "four-digit" sub-classes are published regularly. Thus, at the Canada level, principal statistics are compiled for 183 industries. These cannot all be published separately by province because of the confidential nature of the data in certain provinces.

Reporting establishments are classified or allotted to specific industries in the classification system on the basis of the value of principal products made or shipped. In general, establishments primarily engaged in repair work (Shoe Repair Shops, Motor Vehicle Repair Shops etc.) are not included in manufacturing industries. Exceptions are establishments primarily engaged in furniture, ship, boat, aircraft and railroad rolling stock repairs which are classified to the manufacturing industries producing the products involved. Establishments primarily engaged in assembling parts into complete units have always been included in manufacturing industries.

Full details concerning the revised classification system are contained in the Standard Industrial Classification Manual, Catalogue No. 12 - 501, which is available from either the Queen's Printer or the Dominion Bureau of Statistics.

It should be noted that two new industries (Poultry Processors and Dental Laboratories) and three new groups of establishments (book publishers in the Publishing Industry, electro-plating establishments in the Metal Stamping, Pressing and Coating Industry and prescription branches in the Ophthalmic Goods Manufacturers Industry) have been included in the 1961 (revised) and 1962 Census statistics and will continue to be included thereafter. They were surveyed for the first time in the 1960 Census (1961 Census in the case of prescription branches) in line with the revised classification but, since they did not represent new production, they were removed from the 1960 and 1961 compilations published in the 1961 Census reports in order to provide complete comparability of data over the period 1957-61. Statistics for this period are repeated in the 1962 reports to supply a link with the revised 1961 data and the new 1962 statistics.

Establishment

The reporting unit in the Census of Manufactures is the **establishment**. The majority of establishments are firms, but many firms have more than one manufacturing establishment. Such firms are requested to submit a separate Census of Manufactures report for each manufacturing establishment which can meet the reporting requirements described below.

Beginning with the 1961 Census of Manufactures the establishment is defined as follows:

"The smallest unit which is a separate operating entity capable of reporting all the following principal statistics:

Materials and supplies used, Goods purchased for resale as such, Fuel and power consumed, Number of employees and salaries and wages, Inventories, Shipments or sales."

Following is a description of the main features of the new establishment concept introduced in the 1961 Census, how they differ from those of the old "activity" concept and the steps taken to correct for breaks in continuity.

(a) The establishment is to be distinguished from smaller subdivisions or departments which do not have records that permit them to report all items required of an establishment. Prior to 1961, some establishments were required to submit two or more separate reports when they were engaged in activities which were classifiable to different industries. Beginning with 1961, separate reports for such activities are required only in cases where accounting records can provide the necessary input and output elements of principal statistics. Special reporting arrangements were made with respondents when the acceptance of combined reports would have seriously affected the statistics for particular industries or areas. Where continuity of industry statistics was affected by this change in reporting procedures, adjustments to the data were made back to 1957 in order to maintain comparability of the series for recent years.1

(b) A manufacturing establishment is typically a factory, mill or plant principally engaged in manufacturing activities. Prior to 1961, the Census of Manufactures attempted to cover the manufacturing activities of all establishments, whether or not they were primarily engaged in manufacturing. Beginning with the 1961 Census, establishments (accounting entities) which are not primarily engaged in manufacturing are no longer included as manufacturing establishments in the basic industry statistics.¹

Again, adjustments were made to reflect the removal of such reporting units for the period 1957-60. These reporting units are now listed as establishments in other Bureau surveys, such as Wholesale Trade, Construction etc. This has resulted in a somewhat smaller universe represented by the Census of Manufactures. In terms of overall 1960 Census results, the number of establishments transferred to other industries totalled 2,786 or 8% but these represented only 0.7% of total employment and of total value of shipments of manufactured products. In order, however, to maintain complete coverage of certain commodity items produced mainly in manufacturing establishments, many non-manufacturing establishments are now surveyed by the Industry Division for commodity shipments only and the latter are included in those tables of industry reports showing shipments of certain commodities "from all industries".

(c) A manufacturing establishment may be, and often is, engaged in other activities in addition to its principal manufacturing activity. Prior to 1961 the main emphasis in the Census of Manufactures was on manufacturing activity. Beginning with 1961, each establishment reports on all the activities carried out within its accounting boundaries (except income from investments such as rent, interest and dividends) and data on different activities (manufacturing, trading in goods not of own manufacture, construction by own labour force, revenue from services etc.) are requested separately. However, the statistics published in the 1961 reports were confined to manufacturing activity only in order to maintain comparability with previous years and to permit a more thorough audit of the new data. The 1962 reports contain principal statistics on total activities of manufacturing establishments for 1961 and 1962 with the main elements of manufacturing activity shown separately as in the past. It should be noted that the statistics for separate activities are not completely consistent. Some respondents cannot distinguish in their records materials, shipments and inventories relating to own manufacturing activities from those relating to goods not of their own manufacture or to other activities and can report operational data in total only under manufacturing activity. This situation has always existed, however, and is not considered important enough to invalidate the use of the data in the measurement of manufacturing as an "activity". The values assigned by the respondent to materials and shipments of own manufactured goods include costs in varying degrees that relate to internal (to the establishment) transportation, warehousing and selling activities, but it is not possible to make adjustments to arrive at a uniform valuation for manufacturing activity only; although valuation at the establishment "boundary" must be accepted, the items valued under manufacturing activities still relate, in most cases, to "goods of own manufacture". In the case of employment only data on manufacturing production workers and manufacturing man-hours can be assigned, in total, to manufacturing activity; administrative and office employees can seldom be allocated to separate activities.

¹ Most of these adjustments were made when the results of the 1961 Census were being compiled. Since publication of these results in the 1961 reports additional adjustments were made to the 1961 data, as noted earlier, and these are reflected, where applicable, in the revised 1961 statistics contained in this report.

Complete consistency, therefore, can be obtained only at the "all operations" (total activity) level, and for studies or statistical measures requiring accurate co-ordinated data, the "total" statistics should be used.

(d) Additional changes resulted from intensive editing and follow-up consistent with the introduction of the new concept. An example of such changes is the provision for the elimination, in total, of sales taxes and outward transportation charges from value of shipments. Prior to 1961, although the value of shipments for each product was requested excluding taxes and transportation charges, no allowance had been made for the reporting of these items in total when the respondents' records did not permit their deduction from the values of the individual products. Another example is a change in the valuation of shipments where, prior to 1961, a manufacturing company operating warehouses or sales outlets was reporting value of shipments in terms of an estimated manufacturer's price in accordance with the old activity concept, even though his records were not kept on this basis. Since the accounting boundary in such cases extends to distribution operations, the respondent was instructed in 1961 to report shipments at the final selling price in order to obtain more realistic and accurate data.² Adjustments were made to the value of shipments for the period 1957-60 to reflect such changes and maintain continuity of the shipments data. Since no actual data to make these corrections were available for back years, 1961 adjustment ratios were applied to the previous years for each industry affected, on the assumption that the valuation changes in 1961 applied in equal proportions to the preceding period.³

(e) The new concept also demands that inventories held apart from plant be included with plant inventories if establishment boundaries extend to warehouses and sales outlets. Prior to 1961, compilations took into account only the inventories held at plant. In this case, however, most of the missing data were available from supplementary questions in the Annual Census and from the Monthly Inventories and Shipments Survey and actual corrections could be made for previous years.

³ See footnote 1.

(f) Prior to 1961 the Census of Manufactures did not have complete coverage of head and administrative offices and had never surveyed separate sales offices, warehouses or laboratories operated by manufacturing firms. Beginning with the 1961 survey. complete coverage of these auxiliary units was effected. In the past the employment and salaries and wages of those head and administrative offices that were surveyed were either coded in total to the industry in which the greatest portion of the company's manufacturing activities was classified or else, in the case of certain large multi-unit firms with establishments in several industries, were pro-rated among the different industries involved. In the original 1961 statistics published in 1961 reports, the same coverage and treatment of head offices was applied to maintain comparability over the 1957-61 period. Beginning with the revised 1961 statistics, all head offices and auxiliary units are covered and are processed according to the methods described below.

1. Single-Establishment Companies

In the great majority of cases central administrative and executive personnel of companies consisting only of one establishment are generally located at the site of the manufacturing plant and are automatically included in the plant reports. Where head offices and auxiliary units are geographically separate from plant locations and employ a sizeable number of workers they are surveyed on special questionnaires.

Separately located head offices, sales offices, administrative offices and other separate auxiliary units (laboratories, warehouses, etc.) do not usually constitute separate establishments⁴ for purposes of industry statistics since they do not normally generate operational revenues but give rise only to costs of operation (mainly salaries and wages) which make up part of the selling price of manufactured products and which are thus included in the value of shipments or sales. Where such units belong to single-establishment companies, they will be considered as extensions of the establishment's boundaries and their operations consolidated with the establishment's total activity.

2. Multi-Establishment Companies

In the case of companies with more than one establishment the following rules are applied:

(i) Where all the establishments of a company are classified to the same (three-digit) industry, the head office and other auxiliary units are coded to that same industry.

(ii) Where the establishments of a company are not all classified to the same (three-digit) industry but are coded to different industries, or industries in different industry groups or even different divisions

² Some manufacturing firms operate sales branches or selling warehouses as separate sales establishments for which complete accounting records of receipts. expenses, employment and sales are maintained. In such cases the plants, in effect, "sell" to the sales outlets on much the same basis as they would to independent buyers. The value of plant shipments is based on factory prices and the "boundary" of the manufacturing establishment does not extend beyond the plant. The sales outlets in such cases constitute separate sales establishments and are classified to wholesale or retail trade. Some sales outlets of manufacturing firms, although they physically handle products of the plants, do not maintain separate accounts and are generally treated for statistical purposes as extensions of manufacturing operations. Special arrangements were made for separate reporting in a few cases where the treatment of such outlets as manufacturing extensions would seriously affect the significance of statistics for particular manufacturing and trade industries.

⁴ See footnote 2 for exceptions.

of the Standard Industrial Classification, the inclusion of data for head office and auxiliary units in any one of the (three-digit) industries concerned would distort the relationship between items of principal statistics. In such cases, the auxiliary units are coded at the group (two-digit) level in tabulations of industry statistics. Where multi-establishment companies cut across group or major division lines of the Classification, the head office and auxiliary units will be coded to the (two-digit) industry group in which the major part of the company's operations are classified. Although this may result in some distortion of (two-digit) industry group statistics it will eliminate distortion within groups as it will leave statistics at the (three-digit) industry level free of these company-wide data.

Period Covered

Respondents are asked to submit figures for the calendar year, if at all possible, and most reports are on this basis. Financial year reports for periods differing from the calendar year are accepted in instances where respondents find it impossible to supply calendar year data from accounting records. However, the data on employees, salaries, wages and man-hours are requested on a calendar year basis in all cases.

When establishments are operated for only a portion of a year, a report is required covering the period of operation.

Working Owners or Partners

Beginning with the revised 1961 statistics working owners and partners of unincorporated businesses are shown as a separate category in the principal statistics and are neither included in the number of employees nor in salaries and wages; there is some duplication in numbers when a person owns more than one establishment and is reported as a working owner on each census return. In all previous reports of the Census of Manufactures these workers were included as part of the number of administrative and office employees and their withdrawals were included as part of salaries. Withdrawals are defined as amounts withdrawn by owners or partners for normal living expenses, excluding withdrawals for payment of income tax.

Number of Establishments

The number of establishments represents the number of operating units (accounting entities as per the new definition of the establishment) for which separate reports are submitted. Head offices located apart from establishments and which are surveyed separately and separate sales and administrative auxiliaries that are treated as extensions of manufacturing activities are not included in the establishment count. However, the operational statistics (employment, salaries etc.) of such auxiliary units which are coded at the "three-digit" level are included in the principal statistics of industries coded at the same level; those units coded at the "two-digit" level are included with the statistics for groups of industries.

Employees

As noted above, the number of working owners and partners are excluded from the number of employees, beginning with the revised 1961 statistics. This change brings the definition of "employees" in the Census of Manufactures in line with that of "employees" in the Bureau's monthly Employment Survey and with that of "paid workers" in the Bureau's Labour Force Survey. For purposes of historical comparisons, the number of working owners and partners should be added to total employees (beginning with the revised 1961 data) in order to correspond with the figure of "total employees" published in previous reports concerned with the Annual Census of Manufactures.

In addition to production and related workers engaged in manufacturing activities, total employees include administrative, office, sales and distribution workers as well as any production workers employed in non-manufacturing activities such as construction undertaken for the use of the establishment by its own employees (when these are treated as a separate work force) or logging (mostly in connection with sawmills or planing mills). Number of employees represents as closely as possible equivalent annual full-time employment. Adjustments are made when reported figures indicate the existence of part-time or seasonal employment.

Administrative and office employees include all executive and supervisory officials such as _ presidents, vice-presidents, controllers, secretaries, treasurers etc., together with managers, professional, technical and research employees, superintendents and factory supervisors above the working foreman level, and clerical staffs. Also included are employees in activities such as advertising, credit collections, purchasing, personnel, legal, medical etc. Sales and distribution workers include office personnel whose salaries are charged to selling expense, travelling salesmen, driver salesmen, truck drivers and their helpers, etc. They exclude persons working on a commission basis who are not considered regular employees.

Production and related workers in manufacturing activities include, in addition to those engaged in processing and assembling, those employed in storing, inspecting, handling, packing, warehousing, etc. They also include employees in related activities such as maintenance, repair, janitorial and watchman services. Working foremen doing similar work to that of employees they supervise are also included. Production workers employed in nonmanufacturing activities such as construction undertaken for the use of the establishment. logging employees or outside piece-workers employed in certain industries are excluded from the number of production and related workers but are part of the total number of employees in those industries.

Production and related workers are reported as those receiving pay during the last pay period of each month, an average for the year being obtained by summing the monthly figures and dividing by twelve. This procedure is followed even though the plant did not operate in all months in order to derive equivalent annual full-time employment. The numbers are somewhat affected by turn over, in that employment is overstated when an employee changes employment within the same industry during a pay period. Other categories of workers are reported in the form of annual averages. Figures on employment and man-hours refer to the calendar year whether or not some establishments report other data on a financial year basis.

Man-hours of production and related workers in manufacturing activitles represent total man-hours paid (total hours at work during the calendar year plus hours not worked but nevertheless paid for, such as paid vacations, sick leave, statutory holidays etc.). In reporting overtime hours, respondents are requested to report only hours actually at work. It should be noted that the division of hours paid into production and related workers payrolls results in **average** hourly earnings and does **not** represent hourly wage rates which are collected and published by the Department of Labour and which are based on selected occupations.

Salaries and Wages

Salaries and Wages refer to gross earnings of the employees described above, **before** deductions for income tax and employees' contributions to social services such as sickness, accident and unemployment insurance, pensions etc. They include all salaries, wages, bonuses, profits shared with employees, the value of room and board where provided, commissions (paid to regular employees only), as well as any other allowance forming part of the workers' earnings. Payments for overtime are included.

Wages refer to amounts paid to production and related workers engaged in manufacturing operations as defined above. Salaries refer to amounts paid to all other categories of employees including relatively small numbers of production workers engaged in construction and extractive operations or who are employed as outside piece-workers. Figures on salaries and wages refer to the calendar year whether or not some establishments reported other data on a financial year basis.

Fuel and Electricity

Figures for fuel refer to amounts actually used (including fuel used in cars, trucks, locomotives etc.) not to purchases unless the quantities are substantially the same. Any fuel and electricity produced by establishments for internal consumption are not included in the total cost. Values represent laid-down cost at the establishment including freight, duty etc.

Materials and Supplies

(a) Used in manufacturing activities. Figures represent quantities and laid-down cost values, at the establishment, of materials, supplies and purchased components owned and used during the year in manufacturing activities and related processes. The statistics represent only commodity items or physical goods (costs of services or overhead charges such as advertising, insurance, depreciation etc. are not included) whether purchased from others or received as transfers (in the form of materials, components or semi-processed goods) from other establishments of the reporting company. Respondents are required to report materials and supplies used not purchased. Included are maintenance and repair supplies not chargeable to fixed assets accounts and any amounts charged by other establishments for work done on materials owned by the reporting establishment. Cost of repairs or maintenance done by outside contractors and cost of returnable containers are not included.

(b) Purchases for resale as such. Figures represent the cost of materials or products purchased from others by the reporting establishment (or received as transfers from other establishments of the reporting company) for re-sale as such in the same condition as purchased. Included are any finished products received on consignment from other countries.

(c) Other materials and supplies used. Figures represent the cost of materials and supplies, if any, used in new construction and in the production of machinery and equipment (for the use of the reporting establishment) by the establishment's own employees. Included are materials used for any capital repairs and alterations carried out by the establishment's employees. Value of construction and repair work done by outside contractors is not included nor is the cost of purchased machinery and equipment. Also included is the cost of office supplies not chargeable to fixed assets accounts and the cost of such other items of materials and supplies used as food, beverages and supplies for establishmentoperated cafeterias and lunch counters, first aid medical supplies, laboratory supplies etc.

Shipments

In general the figures represent revenue from all production, sales, services and related activities of reporting establishments. Non-operating revenues such as rent, interest and dividends and the sale of used fixed assets are excluded.

(a) Shipments of goods of own manufacture

These figures represent shipments of goods made from own materials either in the reporting establishments or by other manufacturers on the basis of a charge to the reporting establishments for work done. Included are revenue from repair and custom work, amounts received in payment for work done on materials owned by other establishments and the cost of any goods shipped on a rental basis.

All products and by-products of own manufacture shipped from the establishment are covered, including transfer shipments to sales outlets, distributing warehouses or to other manufacturing plants of the reporting firm when such units are treated as separate establishments. (See notes on "Establishment").

Such shipments are net of returned goods, and value figures at the establishment exclude discounts, returns, allowances, sales taxes and excise duties, returnable containers, and charges for outward transportation by common or contract carriers. Transportation or delivery expenses incurred by the reporting establishments' own carriers are not deducted.

The unsold portion, at year-end, of consignment shipments in Canada, is treated as inventory and not as shipments, but all shipments to foreign countries, for which form B.13 "Customs Canada, Export Entry" has been completed, are treated as shipments.

In four industries, viz. Fabricated Structural Metal Industry, Aircraft and Parts Manufacturers, Railroad Rolling Stock Industry and Shipbuilding and Repair, where work on principal products extends over a relatively long period, the value of production, rather than the value of shipments, is recorded. For these industries value of production is computed from the value of deliveries of complete units during the year plus the value of work done during the year on unfinished units less the value of work done in previous years on units delivered in the year under review. Adjustments to the value of shipments are also made for firms in these industries and in some other industries which operate on the basis of progress payments. The latter are treated as sales and not as inventory, so that for firms which use a progress payments account, an adjustment to the value of shipments is made for the net change in this account during the year.

(b) Shipments of goods not of own manufacture

These figures represent the net selling value at the establishment (less discounts, returns, allowances, sales taxes and excise duties and transportation charges by common or contract carriers) of all products or materials (including products transferred from other establishments of the reporting firm) sold as such in the same condition as purchased or received as transfers. For those industries which ship goods on a rental basis value of shipments represents the book value of such goods. All sales of consignment goods from other countries are included.

(c) Other revenue

Figures represent the book value of fixed assets, if any, (new construction and machinery and equipment including major repairs and alterations, additions, modifications, installation and assembly work) produced during the year for the use of reporting establishments by the establishments' own employees and for which depreciation accounts are maintained. Included also are any revenues from the sale of electricity and from any operations performed by the establishments' own employees, such as revenue from goods produced for rental (the book value of such goods are included as part of factory shipments), servicing revenues, commissions on sales (when not included in value of sales), revenue from company-operated cafeterias and lunch counters and revenue from outside installation or construction work not related to the establishments' own products, sale of used materials (excluding sale of used fixed assets), research and development work etc. As mentioned previously the figures do not include non-operating revenue such as rent, dividends, interest, etc.

Inventories

(a) Manufacturing inventory

Values represent the book value of manufacturing inventory owned in Canada. The value of inventory held for which progress payments have been received is treated as shipments and is not included in inventory owned. Figures consist of inventory owned at the plant and at warehouses or selling outlets which are treated as extensions of establishments for the purpose of reporting shipments. Inventory owned in transit in Canada or on consignment in Canada is included. Inventory owned abroad has already been reported as shipments and is excluded.

(b) Inventory of goods purchased for re-sale

Figures represent the book value of inventory of goods purchased for re-sale as such without further processing, owned by reporting establishments and held at the plants and at any warehouses or selling outlets which are treated as extensions of establishments. Inventory owned in transit in Canada or on consignment in Canada is included.

Because of changes in classification, the receipt of revised data, the inclusion of new establishments or the removal of old establishments which did not operate during the latest year, the opening inventory for the latest year does not necessarily coincide with the closing inventory of the preceding year.

Value Added

(a) By manufacturing activities

Figures are compiled by deducting the cost of materials and fuel and electricity consumed from the value of production (value of shipments adjusted for changes in the value of inventories of finished goods and goods in process).

(b) By total activities

Figures consist of value added by manufacturing activities plus value added by nonmanufacturing activities and is compiled by deducting the cost of goods purchased for re-sale and the cost of other materials and supplies used from the value of shipments of goods not of own manufacture plus other revenue, adjusted for changes in the value of inventories of goods purchased for re-sale.

"Value added" is sometimes referred to as net production. However, to arrive at the National Accounts concept of net production, or "Gross domestic product at factor cost", it would be necessary to subtract also the cost of advertising, insurance and other business expenses which are not collected in the annual Census of Manufactures. "Value added" figures for the primary industries, manufacturing and construction are published in DBS publication Catalogue No. 61-202, Survey of Production.

Short Forms

Since 1949, in order to ease the reporting burden for smaller firms, a one-page short form has been used asking for only a limited amount of detail. For purposes of publication, missing data were estimated on the basis of appropriate ratios. Beginning with the 1959 census, the general limit for short forms was raised from \$50,000 (the limit used since 1949) to \$100,000 value of shipments and a new medium form was used. This form is a shortened version of the long form in that some of the general questions were pared down and the detailed lists of materials and products were limited to the more important items. The general limits for firms in this category were set at between \$100,000-\$500,000 value of shipments, but in the case of both the short and medium forms there are lower cut-offs for a number of industries in which the smaller firms account for a larger share of total shipments.

Prior to 1961, the short form was limited to a question on the principal items of factory shipments. In the 1961 and 1962 censuses, in addition to the question on shipments of goods of own manufacture, general questions on employment and payroll and on total revenue were added on all short forms. The other elements of principal statistics, viz. value of materials, fuel and electricity and inventories, were estimated by using ratios based on the change in the value of shipments reported in 1961 and 1962. This was done to permit the complete compilation of basic industry statistics by industry and by geographic location. The proportions of the estimated data was generally less than 5 per cent of the total in each category of principal statistics.

Beginning with the 1963 census, general questions on total purchases of materials, fuel and electricity and on total inventory were added on the short forms. The two questions, however, were designed so that the data can be easily derived from respondents' regular accounting records. This will permit a complete tabulation of principal statistics without the necessity of estimating missing items and will result in increased accuracy for rural area statistics where small firms account for a relatively important part of industrial output.

The addition of extra questions on the short form in recent years has also permitted an increase in the cut-off limits for short forms in many industries. This has meant that many more firms are now receiving the short form instead of the long or medium form. It has also resulted in the withdrawal of the medium form in a number of industries, thus further simplifying collection and tabulation procedures.

