

THE SPIRIT DISTILLING TRADE (GREAT BRITAIN).*

Contents.

	Page
INTRODUCTORY	203
Summary of results	203
Qualifications affecting comparisons	204
PRODUCTION	204
Total make of spirits in United Kingdom	204
Production in Great Britain for sale	205
Other products	206
Cost of materials	206
Net output	206
Exports and imports	206
WAGES IN 1924	208
EMPLOYMENT	208
MECHANICAL POWER	209
TABLES	210

Introductory†.

The Tables on pages 210–212 are based on Returns received from firms in Great Britain, whose business in 1924 consisted wholly or mainly in the distilling of spirit. The number of such separate Returns was 130, including 10 in respect of establishments in England, at one of which the work was confined in 1924 to the handling of by-products of other plants, and 120 in respect of establishments in Scotland. Two firms to which schedules were sent did not furnish Returns; these firms had very small establishments, and their total output was negligible. In some cases Returns covered more than one establishment.

Summary of results.—The following table shows the main results of the Censuses of 1924, 1912 and 1907, comparisons between the figures for the three years being subject to the qualifications mentioned in the next paragraph :—

Particulars.	Unit.	1924.	1912.	1907.
Value of goods made (Gross output) ..	£'000	7,070	3,411	3,417
Cost of materials used	"	4,509	2,587	2,449
Net output	"	2,561	824	968
Average number of persons employed ..	No.	4,566	3,717	4,102
Net output per person employed	£	561	222	236
Mechanical power available :—				
Prime movers	H.P.	12,702	11,512	10,529
Electric motors driven by purchased electricity	"	4,753	1,376	(not recorded).

* In order to avoid the disclosure of information relating to the business of individual firms in Northern Ireland, it has been found necessary, so far as that division of the United Kingdom is concerned, to combine the results obtained from the Spirit Distilling Trade with those for the Tobacco Trade. The above Report and that on the Tobacco Trade (page 213) therefore relate, for the most part, to Great Britain only; the combined Report for Northern Ireland will be found on page 223.

† See also the Notes on pages vii–xiv.

Qualifications affecting comparisons.—In considering the above table and the other tables in this Report which show figures for the different censal years, it should be borne in mind that :—

(1) The comparability of figures relating to value or cost is affected by the changes which have taken place in the general purchasing power of money.

(2) The Censuses of 1907 and 1924 extended to all firms, however small, but in 1912 firms employing not more than five persons (excluding the proprietors) were merely required to state the average number of persons employed by them in the year. According to the information so furnished the number of persons employed in Great Britain in the establishments thus excluded was 116 or 3·1 per cent. of the number employed by the remaining firms, as shown in the above table.

Production.

*Total make of spirits in United Kingdom.**—Distillers were required to state the total quantity of spirits produced by them in 1924, whether for sale as such or for use in their works for methylation or in the manufacture of liqueurs, cordials, etc. The total quantity of spirits distilled in 1924 in the United Kingdom was returned as 38,527,000 proof gallons (see Table IIA on page 210), of which 8,167,000 proof gallons were distilled by firms in England and Wales, 27,788,000 proof gallons by firms in Scotland, and 2,572,000 proof gallons by firms in Northern Ireland. Firms were, however, allowed to make their Returns for their business years, being a period of twelve months ended at some date not earlier than 30th June, 1924, and not later than 30th June, 1925. The quarterly records of production of spirits in the United Kingdom published in the Accounts relating to the Trade and Navigation of the United Kingdom yield the following particulars as to the total quantities distilled during different periods :—

12 months ended—	Proof gallons.
30 June, 1924	36,565,000
30 September, 1924	36,316,000
31 December, 1924	36,404,000
31 March, 1925	38,028,000
30 June, 1925	39,444,000

In this trade it happened that firms responsible for nearly 50 per cent. of the total production of spirits made Returns relating to periods which ended later than 31st March, 1925.

* The total make of spirits in the *United Kingdom* is, for convenience, discussed in this section, the relative information for Northern Ireland being taken from the Report on Northern Ireland on page 224.

The total production of spirits in the United Kingdom in 1907 and 1912 (in both of which years the quantities distilled in Southern Ireland were included), as returned to the Census, was between 48,086,000 and 49,184,000 proof gallons in the former year and 44,613,000 proof gallons in the latter year. The Excise record of production in these two calendar years, as shown in the quantity tables referred to above, amounted to 49,019,000 proof gallons in 1907 and 46,231,000 proof gallons in 1912.

Firms in the United Kingdom with an output of 31,302,000 proof gallons, or 81 per cent. of the total quantity returned to the Census in respect of 1924, stated that they used 1,030,000 cwts. of British grain and 4,530,000 cwts. of imported grain.

It was stated in the Report of the Commissioners of Customs and Excise, that for the year ended 30th September, 1924, the materials used at distilleries in the United Kingdom included 3,106,000 cwts. of malt and 1,941,000 cwts. of unmalted grain, and all other materials accounted for no more than 770,000 cwts., being chiefly molasses.

Distillers were asked to classify their output of spirits according to the type of stills used, and firms in the United Kingdom producing 33,958,000 proof gallons of distilled spirits furnished the following particulars :—

Distilleries,	Spirit made in pot stills.	Spirit made in patent stills.
	Th. proof galls.	Th. proof galls.
In England and Wales	—	6,645
In Scotland	10,042	14,746
In Northern Ireland	97	2,428

The above information was furnished by firms producing 81·4 per cent. of the output in England and Wales, 89·2 per cent. of that in Scotland and 98·2 per cent. of that in Northern Ireland. The whole of the output in England and Wales represented by the sample was made in patent stills : of the sample output in Scotland and in Northern Ireland 59·5 per cent. and 96·2 per cent. respectively was made in patent stills.

The Excise Report shows, for the year ended 30th September, 1924, 12,883,000 proof gallons as made in Scotland at distilleries using pot stills only.

Production in Great Britain for sale.—Detailed information relating to the output of the Spirit Distilling Trade in Great Britain in 1924 will be found in Table IIB on page 210. The following table shows, for the three censal years, the quantity and value of plain spirits made for sale in each year and the value of other products of distillation. The output of similar products recorded on schedules for trades other than the Spirit Distilling Trade, amounting in value to £51,000 in 1924, £16,000 in 1912 and £16,000 in 1907, is included in the figures for each year.

Kind of goods.	1924.		1912.		1907.	
	Quantity.	Value.	Quantity.	Value.	Quantity.	Value.
Plain spirits* ..	Th. proof galls. 34,020	£'000 5,458	Th. proof galls. 34,565	£'000 2,628	Th. proof galls. 36,057	£'000 2,655
Other products of distillation (yeast, etc.) ..	..	1,410	..	757	..	709
TOTAL VALUE ..	..	6,868	..	3,385	..	3,364

* The production for sale of *plain spirits* in Northern Ireland in 1924 and 1912 will be found on page 224. The total production for sale in the three censal years was as follows :—

	Th. proof galls.	£'000
1924 (Gt. Britain and N. Ireland) ..	36,574	5,701
1912 (" " " ") ..	40,660	2,977
1907 (Gt. Britain and all Ireland) ..	48,086	3,709

The output in the above table is free from duplication. The value of spirits made was returned as exclusive of duty.

Other products.—In addition to the distillation products dealt with in the preceding paragraph, firms that made their Returns on schedules for the Spirit Distilling Trade recorded, in each of the censal years, an output of methylated spirit and other goods as shown below. These goods, being of kinds mainly produced in other trades are dealt with in the Reports on those trades.

Kind of goods.	1924.	1912.	1907.
	Value.	Value.	Value.
Methylated spirit	£'000 125 (Th. proof galls.) (1,733)	£'000 29 (415)	£'000 54 (1,098)
Other goods made	128	13	15
TOTAL VALUE	253	42	69

Cost of materials.—The cost of materials used by firms in Great Britain that made their Returns on schedules for the Spirit Distilling Trade was returned as £4,509,000 in 1924; the corresponding figure for 1912 was £2,587,000 and for 1907, £2,449,000.

Net output.—The net output in 1924 of the firms in Great Britain that made their Returns on schedules for the Spirit Distilling Trade (whose gross output was valued at £7,070,000) was £2,561,000, that sum representing, without duplication, the total amount by which the value (at distillery) of the aggregate output exceeded the cost (at distillery) of the materials used.

The net output per head of persons employed in the censal year 1924 was £561 as compared with £222 in 1912 and £236 in 1907.

Exports and imports.—For the reason that the majority of the output of the Spirit Distilling Trade was returned for periods other

than the calendar year 1924, the comparison of exports and imports of spirits is made with the production for the United Kingdom in the calendar year as recorded by the Excise authorities :—

Spirits.	1924.	1912.	1907.
	Thousand proof gallons.		
Production	36,404	46,231	49,019
British exports	8,536	10,194	7,820
Retained imports*	2,523	5,349	7,500

* Including variations in stocks in bonded warehouses.

The quantities of potable spirits entered for consumption in the United Kingdom, less exports on drawback, have been as follows :—

Spirits.	1924.	1912.	1907.
	Thousand proof gallons.		
Home-made	12,430	25,153	32,674
Imported	2,276	5,374	7,308
TOTAL	14,706	30,527	39,982
Percentage home-made	84.5	82.4	81.7

It should be remembered that spirits distilled in Southern Ireland and consumed in Great Britain or Northern Ireland were, in 1912 and 1907, included with the figures for home-made spirits. The quantity of potable spirits imported from the Irish Free State into the United Kingdom in 1924 was 922,000 proof gallons.

The consumption in the year ended March, 1925, included, in addition to potable spirits, 7,600,000 proof gallons of home-made spirits and 597,000 proof gallons of imported spirits, issued for methylation, together with 696,000 proof gallons of home-made spirits and 447,000 proof gallons of imported spirits, issued, free of duty, for use in arts and manufactures.

The exports and imports shown above include all spirits except methylated and perfumed spirits; home-made and imported spirits mixed in bond and exported (which are not large in quantity) are included with British exports in 1924 and with re-exports of imported spirits in 1907 and 1912. Owing to the prohibition policy of the United States of America exports to that country have fallen from 1,003,000 proof gallons in 1907 to 1,825 gallons in 1924; on the other hand exports to the Irish Free State in 1924 were 172,000 gallons whereas in 1907 such trade was considered as domestic trade. Again, in 1924 about 922,000 proof gallons of *unenumerated spirits, not sweetened*, were imported from the Irish Free State, being 83.2 per cent. of the gross imports of that kind of spirit and 25.4 per cent. of the gross imports of all spirits in that year. It may be added that the output of spirits in the Irish Free State in 1926 was about 739,000 proof gallons. Exports of home-made spirits do not bear any relation to the quantity distilled in the year, since large stocks are held in bond; such stocks increased by 3,643,000 proof gallons in 1924 and were 143,337,000 gallons at the end of the year, or

nearly four times the quantity distilled in the twelve months. Making allowance for the increase in stocks, the quantity of home-made spirits released for consumption in 1924, including quantities supplied as ships' stores, was about 24,300,000 proof gallons.

Wages in 1924.

Under the Census of Production Act, 1906, the powers of the Board of Trade to require information do not extend to particulars of the amount of wages paid, and, consequently, no information on this head was secured in connexion with the Census of 1924. As a result, however, of the voluntary enquiry undertaken by the Ministry of Labour into wages and hours in the United Kingdom in 1924, information was obtained as to the total wage-bill of a group of firms in the Spirit Distilling Trade in Great Britain which made Returns both to the Ministry of Labour and to the Census of Production office. According to the Census records this group of firms employed in the week ended 18th October, 1924, 3,436 operatives, or 85 per cent. of the total of 4,029 operatives for the trade as a whole, and their net output totalled £2,058,000, or 80 per cent. of the aggregate net output of £2,561,000 for the trade as a whole. The total wage-bill of these firms, as returned to the Ministry of Labour, was £510,000, representing about 25 per cent. of their aggregate net output.

Employment.

The detailed information relating to employment in Great Britain in 1924 is summarised in Table III on page 211. The following table sets out certain particulars for that year together with those obtained at the 1907 Census. For the purpose of this comparison the average numbers of operatives of each sex returned for 1924 have been divided between the two age-groups in the proportions shown by the data relating to the week ended 18th October.

Average number.	Males.		Females.		Males and females.	
	Under 18.	All ages.	Under 18.	All ages.	Under 18.	All ages.
1924.						
Operatives	51	3,766	8	213	59	3,979
Administrative, etc. ..	21	502	6	85	27	587
TOTAL	72	4,268	14	298	86	4,566
1912.						
Wage earners	62	3,147	9	89	71	3,236
Salaried	30	469	—	12	30	481
TOTAL	92	3,616	9	101	101	3,717
1907.						
Wage earners	61	3,486	5	87	66	3,573
Salaried	42	517	2	12	44	529
TOTAL	103	4,003	7	99	110	4,102

The numbers of operatives recorded month by month in 1924 ranged from 219 above the average, in December, to 298 below the average, in August (see Table IIIB, page 211).

Mechanical Power.

The detailed information relating to the mechanical power available in Great Britain in 1924 is summarised in Table IV on page 212. The following table sets out the particulars for 1924 and 1907 relating to the capacity and kinds of *prime movers* and the capacity of *electric generators* installed.

Power equipment.	1924.			1912.	1907.
	Ordinarily in use.	In reserve or idle.	Total.	Total.	Total.
PRIME MOVERS :—					
Reciprocating steam engines ..	H.P. 7,428	H.P. 1,957	H.P. 9,385	H.P. 7,946	H.P. 8,580
Steam turbines	482	—	482	1,447	12
Gas engines	975	431	1,406	746	} 656
Petrol and light oil engines ..	445	74	519	168	
Heavy oil engines	146	12	158	} 1,205	} 1,260
Water power	752	—	752		
Other	—	—	—	—	21
TOTAL	10,228	2,474	12,702	11,512	10,529
ELECTRIC GENERATORS :—					
Driven by—	Kw.	Kw.	Kw.	Kw.	Kw.
Reciprocating steam engines	2,223	1,178	3,401	682	272
Steam turbines	275	—	275	400	} 231
Gas engines	594	285	879	} 827	
Petrol and light oil engines	25	—	25		} 104
Heavy oil engines	28	—	28	} 104	
Water power	104	—	104		—
Other prime movers	—	—	—	—	—
TOTAL	3,249	1,463	4,712	1,909	503

The capacity of *electric motors* recorded in 1924 and 1912 was as shown below :—

Electric motors.	1924.			1912.
	Ordinarily in use.	In reserve or idle.	Total.	Total.
Driven by—				
Electricity generated in own works	H.P. 4,139	H.P. 229	H.P. 4,368	H.P. 1,972
Purchased electricity	4,180	573	4,753	1,376

Corresponding information was not required for 1907. The total number of Board of Trade units of electricity purchased for power and lighting purposes in that year was returned as 111,000.

TABLES.

I.—Summary of results.

Particulars.	Unit.	England and Wales.	Scotland.	Great Britain.
Value of goods made (Gross output) ..	£'000	1,229	5,841	7,070
Cost of materials used	"	831	3,678	4,509
Net output	"	398	2,163	2,561
Average number of persons employed	No.	1,017	3,549	4,566
Net output per person employed ..	£	391	609	561
Mechanical power available :—				
Prime movers	H.P.	4,240	8,462	12,702
Electric motors driven by purchased electricity	"	1,385	3,368	4,753

II.—Production.

A.—TOTAL QUANTITY OF SPIRITS DISTILLED IN THE YEAR.

Country.	Quantity.
England and Wales	Th. proof galls. 8,167
Scotland	27,788
Great Britain	35,955
Northern Ireland*	2,572

* See footnote on page 204.

B.—OUTPUT FOR SALE OR FOR STOCK.

Kind of goods made.	England and Wales.		Scotland.		Great Britain.	
	Quantity.	Value.	Quantity.	Value.	Quantity.	Value.
	Th. proof galls.	£'000	Th. proof galls.	£'000	Th. proof galls.	£'000
Plain spirits	6,799	608	27,221	4,850	34,020	5,458
Methylated spirits	1,360	100	373	25	1,733	125
Other products of distillation (yeast, etc.) .. .. .	..	*	..	*	..	1,359
Other products .. .. .	..	*	..	*	..	128
TOTAL VALUE OF GOODS MADE (Gross output)	..	1,229	..	5,841	..	7,070

* In order to avoid the possible disclosure of information relating to individual firms, figures can only be given for Great Britain as a whole.

III.—Employment.

A. NUMBERS EMPLOYED IN WEEK ENDED 18TH OCTOBER, 1924.

Kind of staff.	Males.		Females.		Males and females.	
	Under 18.	All ages.	Under 18.	All ages.	Under 18.	All ages.
<i>England and Wales :—</i>						
Operatives	11	877	1	30	12	907
Administrative, etc.*	5	114	1	26	6	140
TOTAL	16	991	2	56	18	1,047
<i>Scotland :—</i>						
Operatives	41	2,943	7	179	48	3,122
Administrative, etc.*	16	388	5	59	21	447
TOTAL	57	3,331	12	238	69	3,569
<i>Great Britain :—</i>						
Operatives	52	3,820	8	209	60	4,029
Administrative, etc.*	21	502	6	85	27	587
TOTAL	73	4,322	14	294	87	4,616

* Administrative, technical and clerical staff.

B. OPERATIVES EMPLOYED IN ONE WEEK IN EACH MONTH OF 1924.

England and Wales. (Annual average : Males, 849 ; Females, 28 ; Total, 877.)

Week ended	Males.	Females.	Total.	Week ended	Males.	Females.	Total.
Jan. 12th ..	809	27	836	July 19th ..	847	27	874
Feb. 16th ..	836	28	864	Aug. 16th ..	852	29	881
Mar. 15th ..	837	28	865	Sept. 13th ..	865	30	895
Apl. 12th ..	833	28	861	Octr. 18th ..	877	30	907
May 17th ..	839	28	867	Novr. 15th ..	881	29	910
June 21st ..	822	27	849	Decr. 13th ..	889	30	919

Scotland. (Annual average : Males, 2,917 ; Females, 185 ; Total, 3,102.)

Jan. 12th ..	3,091	185	3,276	July 19th ..	2,629	185	2,814
Feb. 16th ..	3,093	184	3,277	Aug. 16th ..	2,617	183	2,800
Mar. 15th ..	3,069	189	3,258	Sept. 13th ..	2,688	181	2,869
Apl. 12th ..	3,046	184	3,230	Octr. 18th ..	2,943	179	3,122
May 17th ..	2,923	191	3,114	Novr. 15th ..	3,060	182	3,242
June 21st ..	2,759	187	2,946	Decr. 13th ..	3,093	186	3,279

Great Britain. (Annual average : Males, 3,766 ; Females, 213 ; Total, 3,979.)

Jan. 12th ..	3,900	212	4,112	July 19th ..	3,476	212	3,688
Feb. 16th ..	3,929	212	4,141	Aug. 16th ..	3,469	212	3,681
Mar. 15th ..	3,906	217	4,123	Sept. 13th ..	3,553	211	3,764
Apl. 12th ..	3,879	212	4,091	Octr. 18th ..	3,820	209	4,029
May 17th ..	3,762	219	3,981	Novr. 15th ..	3,941	211	4,152
June 21st ..	3,581	214	3,795	Decr. 13th ..	3,982	216	4,198

IV.—Mechanical Power.

PARTICULARS OF PRIME MOVERS, ELECTRIC GENERATORS
AND ELECTRIC MOTORS.

Power equipment.	England and Wales.		Scotland.		Great Britain.	
	Ordinarily in use.	In reserve or idle.	Ordinarily in use.	In reserve or idle.	Ordinarily in use.	In reserve or idle.
PRIME MOVERS :—	H.P.	H.P.	H.P.	H.P.	H.P.	H.P.
Reciprocating steam engines	2,242	1,260	5,186	697	7,428	1,957
Steam turbines	370	—	112	—	482	—
Gas engines	143	18	832	413	975	431
Petrol and light oil engines ..	7	40	438	34	445	74
Heavy oil engines	—	—	146	12	146	12
Water power	160	—	592	—	752	—
TOTAL	2,922	1,318	7,306	1,156	10,228	2,474
TOTAL OF PRIME MOVERS INSTALLED	4,240		8,462		12,702	
ELECTRIC GENERATORS :—	Kw.	Kw.	Kw.	Kw.	Kw.	Kw.
Driven by—						
Reciprocating steam engines	660	750	1,563	428	2,223	1,178
Steam turbines	275	—	—	—	275	—
Gas engines	68	—	526	285	594	285
Petrol and light oil engines	—	—	25	—	25	—
Heavy oil engines	—	—	28	—	28	—
Water power	—	—	104	—	104	—
TOTAL	1,003	750	2,246	713	3,249	1,463
TOTAL OF ELECTRIC GENERATORS INSTALLED	1,753		2,959		4,712	
ELECTRIC MOTORS :—	H.P.	H.P.	H.P.	H.P.	H.P.	H.P.
Driven by—						
Electricity generated in own works	2,098	89	2,041	140	4,139	229
Purchased electricity	1,235	150	2,945	423	4,180	573