PA339.9

12 (HA251)

0834

1976

OF POLITICAL AND E

Business Statistics Office

Business Monitor

Report on the Census of Production

Miscellaneous (nonelectrical) machinery



Special Note for Purchasers

Commencing with the 1971 Census, the Census of Production reports are being numbered in a uniform series embracing all industrial inquiries in the Business Monitor series. These Business Monitors have a code P (for production) followed first by A (indicating that it is an annual series) or Q (quarterly) or M (monthly): and then by a number indicating the minimum list heading, or sub-division of a minimum list heading, of the Standard Industrial Classification (revised 1968).

The Census of Production (PA) reports are available on standing order (details on application to Her Majesty's Stationery Office, P.O. Box 569, London SE1 9NH. Telephone 01-928 6977), although they are not included in the global subscription arrangements for the Business Monitor series.

Government Statistical Service

A service of statistical information and advice is provided to the Government by specialist staffs employed in the statistics division of individual Departments. Statistics are made generally available through their publications and further information and advice on them can be obtained from the Departments concerned.

Enquiries:
Business Statistics Office
Newport, Gwent
NPT 1XG
Newport 56111 (STD code 0633) ext 2455
Telex 497121
Answer Back BSONPT G

PA339.9 Business Monitor

A publication of the Government Statistical Service

Report on the Census of Production 1976

Miscellaneous (nonelectrical) machinery

Presented by the Secretary of State for Industry to Parliament in pursuance of the Statistics of Trade Act 1947 (10 & 11 Geo.6 Cha.39 sec 7)

Department of Industry
Business Statistics Office

London: Her Majesty's Stationery Office

Introductory notes Coal mining

Grain milling

Biscuits

Sugar

PA229.1 Margarine

Petroleum and natural gas

Milk and milk products

Fruit and vegetable products

Vegetable and animal oils and fats

Spirit distilling and compounding

Coke ovens and manufactured fuel

Pharmaceutical chemicals and preparations

Synthetic resins and plastics materials and

Mineral oil refining Lubricating oils and greases

Animal and poultry foods

PA229.2 Starch and miscellaneous foods

Brewing and malting

PA239.2 British wines, cider and perry

Inorganic chemicals

Toilet preparations

Soap and detergents

Dyestuffs and pigments

PA279.2 Formulated adhesives, gelatine, etc.

PA279.7 Photographic chemical materials

Iron and steel (general)

Miscellaneous base metals

Metal-working machine tools

PA333.3 Compressors and fluid power equipment

Mechanical handling equipment

Textile machinery and accessories

Aluminium and aluminium alloys

Copper, brass and other copper alloys

Agricultural machinery (except tractors)

Construction and earth-moving equipment

PA339.2 Printing, bookbinding and paper goods machinery PA339.3 Refrigerating machinery, space-heating, ventilating and air-conditioning equipment

Miscellaneous (non-electrical) machinery

Industrial (including process) plant and steelwork

Precision chains and other mechanical engineering

Photographic and document copying equipment

Scientific and industrial instruments and systems

PA339.5 Scales and weighing machinery and portable

PA339.7 Food and drink processing machinery and

Ordnance and small arms

Watches and clocks

Electrical machinery

Electronic computers

equipment

Insulated wires and cables

packaging and bottling machinery

Ball, roller, plain and other bearings

Surgical instruments and appliances

Telegraph and telephone apparatus and

Gramophone records and tape recordings

Radio, radar and electronic capital goods

Electrical appliances primarily for domestic use

Broadcast receiving and sound reproducing

Radio and electronic components

synthetic rubber

PA279.3 Explosives and fireworks

PA279.6 Surgical bandages, etc.

PA279.4 Formulated pesticides, etc.

Iron castings, etc.

Industrial engines

Office machinery

Mining machinery

power tools

Fertilizers

Polishes

PA279.5 Printing ink

Pumps

Miscellaneous chemicals

Tobacco

PA271.2 Organic chemicals

Bread and flour confectionery

Stone and slate quarrying and mining

Chalk, clay, sand and gravel extraction

Miscellaneous mining and quarrying

Bacon curing, meat and fish products

Cocoa, chocolate and sugar confectionery

PA1001

PA 103

PA104

PA211 PA212

PA213

PA214

PA215

PA216

PA217

PA218

PA219

PA231

PA239 1

PA232

PA240

PA261

PA262

PA271.1

PA272

PA273

PA275

PA276

PA277

PA278

PA312

PA313

PA321

PA323

PA331

PA333 1

PA334

PA335

PA336

PA338

PA341

PA342

PA349.1

PA349.2

PA351

PA352

PA354

PA361

PA363

PA365 1

PA365.2

PA367

PA368

PA339.1

PA333.2 Valves

PA369.1	Electrical equipment for motor vehicles,	cycles
	and aircraft	

PA369.2 Primary and secondary batteries PA369.4 Electric lamps, electric light fittings, wiring accessories, etc.

Shipbuilding and marine engineering PA380 Wheeled tractor manufacturing PA381.1 Motor vehicle manufacturing

PA381.2 Trailers, caravans and freight containers Motor cycle, tricycle and pedal cycle manufacturing Aerospace equipment manufacturing and repairing PA383 PA384

Locomotives, railway track equipment, railway carriages. wagons and trams Engineers' small tools and gauges PARON PA391

Hand tools and implements PA392 Cutlery, spoons, forks and plated tableware, etc.

PA393 Bolts, nuts, screws, rivets, etc. PA394 Wire and wire manufactures PA395

Cans and metal boxes PA396 Jewellery and precious metals Metal furniture PA399.1

PA399.5 Drop forgings, etc. PA399.6 Metal hollow-ware

PA399.8 Miscellaneous metal manufacture PA411 Production of man-made fibres

PA412 Spinning and doubling on the cotton and flax systems Weaving of cotton, linen and man-made fibres PA414

Woollen and worsted PA415 Jute

PA416 Rope, twine and net PA417.1 Hosiery and other knitted goods

PA417.2 Warp knitting PA418 Lace PA419 Carpets

PA421 PA422 1

Household textiles and handkerchiefs

PA422.2 Canvas goods and sacks and other made-up textiles PA423 Textile finishing PA429 1

Asbestos PA429.2 Miscellaneous textile industries

Leather (tanning and dressing) and fellmongery PA432

PA433

Weatherproof outerwear PA442 Men's and boys' tailored outerwear

PA443 Women's and girls' tailored outerwear PA444 Overalls and men's shirts, underwear, etc. PA445 Dresses, lingerie, infants' wear, etc.

PA446 Hats, caps and millinery PA449.1 Corsets and miscellaneous dress industries

PA449.2 Gloves PA450 Footwear

PA461.1 Refractory goods

PA461.2 Building bricks and non-refractory goods PA462 Potterv PA463 Glass

PA464 Cement PA469.1 Abrasives

PA469.2 Miscellaneous building materials and mineral products PA471 Timber

PA472 Furniture and upholstery Bedding, etc.

PA474 Shop and office fitting PA475 Wooden containers and baskets

PA479 Miscellaneous wood and cork manufactures Paper and board

PA482. Cardboard boxes, cartons and fibre-board packing cases PA482 2 Packaging products of paper and associated materials PA483 Manufactured stationery

PA484.1 Wallcoverings PA484 2 Miscellaneous manufactures of paper and board PA485 Printing, publishing of newspapers and periodicals General printing and publishing

PA491 Rubber PA492

Linoleum, plastics floor-covering, leathercloth, etc. Brushes and brooms PA494 Toys, games and children's carriages

PA494 3 Sports equipment PA495 Miscellaneous stationers' goods Plastics products

PA499 1 Musical instruments Miscellaneous manufacturing industries PA499 2

PA500 Construction

PA602 Electricity PA603 Water supply Summary tables PA339.9 MISCELLANEOUS (NON-ELECTRICAL) MACHINERY

The information in this report relates to establishments classified to the Miscellaneous (non-electrical) machinery industry, minimum list eading 339.9 in the Standard Industrial Classification (revised 1968). The activities of the industry include:—

Manufacturing boot and shoe machinery, brick making machinery, paper and pulp making machinery, laundry machinery (other than electrical domestic), dry cleaning machinery, rolling mills and other complete machines not reported elsewhere.

> In interpreting the data in the tables it is essential to bear in mind the notes and definitions which commence on page (iii).

LIST OF CONTENTS

Table No	Title Carace and and and an experience and an ex	Page
1	Output and costs, 1973 - 1976	2
2	Capital expenditure, 1973 - 1976	3
3	Stocks and work in progress, 1973 - 1976	3
4	Analysis of establishments by size, 1976	4-5
5	Regional distribution of employment, net capital expenditure, net output and gross value added at factor cost, 1976	6
6	Percentage analysis of twelve-month periods covered by returns received from United Kingdom establishments employing 20 or more persons, 1976	7
7	Percentage analysis of employees, by full and part-time employment and sex, 1976	7

TABLE 2

PA339.9

Output and costs, 1973 - 1976 All United Kingdom establishments classified to the industry (a)

	Unit	1973	1974	1975	1976
Enterprises	Number	1,126	1,207	1,207	1,299
Establishments	rajlete ma ;; tunes i	1,456	1,534	1,527	1,597
Sales of goods produced	£ thousand	475,605	531,942	653,280	699,065
Receipts for work done and industrial services					
rendered	.,	(b)	(b)	(b)	39,003
Capital goods produced for establishments' own use	,,	960	462	688	1,069
Non-industrial services rendered	,,	1,533	3,051	2,682	3,728
Goods merchanted or factored	.,	47,046	47,652	66,353	
Total sales and work done (c)	,,	525,143	583,107		78,364
		323,143	363,107	723,004	821,230
Increase during the year, work in progress and goods on hand for sale	"	-154	51,233	40,469	15,475
Gross output	"	524,989	634,340	763,473	836,705
Purchases of materials for use in production, and					
packaging and fuel	"	213,074	284,256	331,825	335,971
Purchases of goods for merchanting or factoring	"	35,040	37,807	50,828	61,388
ncrease during the year, stocks of materials,					
stores and fuel	"	10,514	18,858	527	9,221
Cost of industrial services received	"	15,393	22,562	22,714	24,379
Net output	.,	271,996	308,572	358,634	424,188
Fotal employment (d)	Thousands	86.6	86.0	80.1	78.1
Net output per head	£	3,139	3,586	4,475	5,430
Payments for non-industrial services					
Rents, hire of plant and machinery (e)(f)	£ thousand	2,523	2,968	3,382	3,739
Commercial insurance premiums	"	2,882	3,341	3,652	4,320
Bank charges		582	630	767	908
Other non-industrial services (g)	"	20,710	21,347	30,160	38,631
icensing of motor vehicles		182	189	251	336
ates, excluding water rates	"	3,651	4,793	6,308	7,327
Gross value added at factor cost	"	241,467	275,304	314,113	368,927
Gross value added at factor cost				Ver and being	140 - 110 - 110 - 110 - 110 - 110 - 110 - 110 - 110 - 110 - 110 - 110 - 110 - 110 - 110 - 110 - 110 - 110 - 110 - 110 - 110 - 110 - 110 - 110 - 110 - 110 - 110 - 110 - 110 - 110 - 110 - 110 - 110 - 110 - 110 - 110 - 110 - 110 - 110 - 110 - 110 - 110 - 110 - 110 - 110 - 110 - 110 - 110 - 110 - 110 - 110 - 110 - 110 - 110 - 110 - 110 - 110 - 110 - 110 - 110 - 110 - 110 - 110 - 110 - 110 - 110 - 110 - 110 - 110 - 110 - 110 - 110 - 110 - 110 - 110 - 110 - 110 - 110 - 110 - 110 - 110 - 110 - 110 - 110 - 110 - 110 - 110 - 110 - 110 - 110 - 110 - 110 - 110 - 110 - 110 - 110 - 110 - 110 - 110 - 110 - 110 - 110 - 110 - 110 - 110 - 110 - 110 - 110 - 110 - 110 - 110 - 110 - 110 - 110 - 110 - 110 - 110 - 110 - 110 - 110 - 110 - 110 - 110 - 110 - 110 - 110 - 110 - 110 - 110 - 110 - 110 - 110 - 110 - 110 - 110 - 110 - 110 - 110 - 110 - 110 - 110 - 110 - 110 - 110 - 110 - 110 - 110 - 110 - 110 - 110 - 110 - 110 - 110 - 110 - 110 - 110 - 110 - 110 - 110 - 110 - 110 - 110 - 110 - 110 - 110 - 110 - 110 - 110 - 110 - 110 - 110 - 110 - 110 - 110 - 110 - 110 - 110 - 110 - 110 - 110 - 110 - 110 - 110 - 110 - 110 - 110 - 110 - 110 - 110 - 110 - 110 - 110 - 110 - 110 - 110 - 110 - 110 - 110 - 110 - 110 - 110 - 110 - 110 - 110 - 110 - 110 - 110 - 110 - 110 - 110 - 110 - 110 - 110 - 110 - 110 - 110 - 110 - 110 - 110 - 110 - 110 - 110 - 110 - 110 - 110 - 110 - 110 - 110 - 110 - 110 - 110 - 110 - 110 - 110 - 110 - 110 - 110 - 110 - 110 - 110 - 110 - 110 - 110 - 110 - 110 - 110 - 110 - 110 - 110 - 110 - 110 - 110 - 110 - 110 - 110 - 110 - 110 - 110 - 110 - 110 - 110 - 110 - 110 - 110 - 110 - 110 - 110 - 110 - 110 - 110 - 110 - 110 - 110 - 110 - 110 - 110 - 110 - 110 - 110 - 110 - 110 - 110 - 110 - 110 - 110 - 110 - 110 - 110 - 110 - 110 - 110 - 110 - 110 - 110 - 110 - 110 - 110 - 110 - 110 - 110 - 110 - 110 - 110 - 110 - 110 - 110 - 110 - 110 - 110 - 110 - 110 - 110 - 110 - 110 - 110 - 110 - 110 - 110 - 110 - 110 - 110 - 110 - 110 - 110 - 110 - 110 - 110 - 110 - 110 - 110 - 110 - 110 - 110 - 110 - 110 - 110 - 110 - 110 - 110 - 110 - 110 - 1
per head	£	2,787	3,199	3,919	4,723

Including estimates for establishments not making satisfactory returns, non-response and establishments exempt because of size. Satisfactory returns accounted for 72 per cent of employment within the industry.

(b) Included with Sales of goods produced.

(c) Details of manufacturers' sales of principal products are published regularly in Business Monitor PQ339.9.

(d) Average number employed, including full and part-time employees (see table 7) and working proprietors.

1973 figures include hire of vehicles.

For 1973-1975 rents of industrial and commercial buildings were not recorded separately. For 1976 the amount payable was

1974-1976 figures include the cost of hiring goods vehicles.

Capital expenditure, 1973 - 1976

All United Kingdom establishments classified to the in	ndustry (a)(b)	(s) yntauthu int of bei	biano emerorialdatas mu	£ thousand
Wegdework (f) requestions	1973	1974	1975	1976
Land and buildings			eng fini i commu	12 (20 - 10 10 10)
New building work	1,927	2,439	2,530	2,135
Land and existing buildings				
Acquisitions	1,148	1,615	2,824	1,283
Disposals	5,889	977	1,180	648
Vehicles				
Acquisitions				
Motor cars	2,046	2,398)	3,298	4,188
Other vehicles	579	583)		
Disposals Motor cars	739	844)		
Other vehicles	73	99)	1,036	1,275
Plant and machinery				
Acquisitions	12,387	13,903	14,960	14,994
Disposals	679	977	811,111	1,257
Total net capital expenditure	10,707	18,041	20,286	19,420

Including estimates for establishments not making satisfactory returns, non-response and establishments exempt because of size. Satisfactory returns accounted for 72 per cent of employment within the industry.

(b) Capital expenditure in respect of manufacturing establishments where production had not commenced before the end of the year, is

TABLE 3

Stocks and work in progress, 1973 - 1976 All United Kingdom establishments classified to the industry (a)

					£ thousand
THE TANK	1973	1974	1975		1976
	meridade des productivos	na in serina men sammaati An araba samma sam	Increase	Charles acception to desire	Value at end of year
Materials, stores and fuel	10,514	18,858	527	9,221	79,504
Work in progress	-3,703	44,129	31,241	10,584	187,550
Goods on hand for sale	3,548	7,104	9,228	4,891	51,475
Total	10,359	70,091	40,996	24,696	318,529

Including estimates for establishments not making satisfactory returns, non-response and establishments exempt because of size. Satisfactory returns accounted for 72 per cent of employment within the industry.

318,529

Analysis of establishments by size, 1976
All United Kingdom establishments classified to the industry (a)

Size group (b)	Estab- lish- ments	Enter- prises (c)	Employment		Wages and sa	laries (f)	1207 aphino	
			Total Opera- (d) tives	Others (e)	Operatives		Others (e)	id vieta
			(u)	(0)	Total per head		Total	per head
4153	Number	Number	Number Number	Number	£ thousand	£	£ thousand	£
1 - 10	863	668	4,374)					
11 - 19	269	236	3,827)	2.210			2.032 - anoth	
20 - 49	189	189) 14,589 5,809)	6,919	39,436	2,703	23,330	3,372
50 - 99	123	121	8,513)					
100 - 199	70	68	9,572 6,149	3,413	16,497	2,683	11,279	3,305
200 - 299	28	28	6,992 4,306	2,681	11,884	2,760	9,050	3,376
300 - 399	16	16	5,541 3,333	2,208	9,313	2,794	6,879	3,116
400 - 499	10	10	4,625 2,734	1,891	8,466	3,097	6,887	3,642
500 - 749	18	18	10,360 6,186	4,174	17,452	2,821	13,778	3,301
750 - 999	5	983.025	4,455 2,716	1,739	7,646	2,815	5,776	3,322
,000 and over	6	5	14,049 9,004	5,045	28,539	3,170	16,878	3,345

Total	1,597	1,299	78,117	49,017	28,070	139,233	2,841	93,857	3,344

⁽a) Including estimates for establishments not making satisfactory returns, non-response and establishments with fewer than 20 employees.

Total sales and work done (g)	Gross output	Net output	4544	Gross value added at factor cost	46) 1	Net capital expenditure (h)	Total stocks and work in progress at end of year
		Total	per head	Total	per head		
f thousand	£ thousand	£ thousand	Der cent of United	£ thousand	£ % man req	£ thousand	£ thousand
224,806	227,608	115,414	5,124	(j)	(j)	6,760	56,828
224,000							
					alt	0,0	sibila ra estratuli (
102,516	106,119	54,457	5,689	148,048(j)	4,613(j)	2,495	34,649
68,595	70,641	36,020	5,152	31,433	4,496	1,887	25,806
66,077	66,634	32,388	5,845	27,620	4,985	1,211	22,784
59,566	60,468	28,081	6,072	23,712	5,127	1,150	14,512
122,406	126,257	67,015	6,469	59,119	5,706	1,387	45,281
44,929	44,190	21,030	4,721	17,173	3,855	937	15,279
132,334	134,787	69,784	4,967	61,823	4,401	3,592	103,391

	before every some surprise for the state of the state of the sea of the sea of the state of the control of the state of th
(f)	The cost of employers' contributions to national insurance, graduated pensions, other pensions and welfare schemes and the running costs of canteens, is estimated for the industry at £30,105 thousand.

⁽g) Sales of goods produced, capital goods manufactured, buildings constructed by establishments for their own use, work done, industrial and non-industrial services rendered and merchanted goods.

⁽b) Average number employed, including full and part-time employees (see table 7) and working proprietors.

⁽c) The sum of the figures for the size groups may exceed the total for the industry because some enterprises control establishments in more than one size group.

⁽d) Including working proprietors.

⁽e) Administrative, technical and clerical employees.

⁽h) New building work plus acquisitions less disposals of land and existing buildings, vehicles and plant and machinery.

⁽j) Gross value added data relate to establishments employing 1-199.

TABLE

PA339.9

PA339.9

Regional distribution of employment, net capital expenditure, net output and gross value added at factor cost, 1976 All United Kingdom establishments classified to the industry

Area	Total employmen	t (a)	Net capital) expenditure (b)(c)			Net output, gross value added and employment in the region from returns received from establishments with more than 80 per cent of their employment in the region (d)			
					Net output	Gross va added a factor co	t po	imployment as a ercentage of total egional employment	
	2000 (84) (2 <u>1.2</u>	Saute S	Epithological	20000	(<u>the beginning</u>)	7 <u> </u>	ir —	the industry	
	Thousands	per cent of United Kingdom	£ thousand	per cent of United Kingdom	£ thousand	£ thouse	and		
Standard regions of England									
North	2.0	2.6	377	1.9	8,577	7,380	62	7	
Yorkshire and			0,,		0,077	7,300	02		
Humberside	9.0	11.5	2,636	13.6	36,945	31,919	72	2.5	
East Midlands	8.1	10.4	1,537	7.9	29,096	25,410	75	.9	
East Anglia	1.5	1.9	527	2.7	6,088	5,496	74	.0	
South East	**************************************	890*9	0.00.48	*209.0	9719+6,58			* 11500	
South West	5.3	6.8	1,204	6.2	23,327	19,934	76	.3	
West Midlands	* 1382	8000	ath.te	*4934.8	17.492 * 10.78			*	
North West	*	600,813%	259,35	* 125.4	7.040co.rg			•	
England	66.1	84.6	15,327	78.9	240,197	207,597	62.	.8	
Wales	2.8	3.6	892	4.6	6,763	5,891	51.	.8	
Scotland	8.2	10.5	3,010	15.5	30,663	26,849	83.	.7	
Great Britain	77.1	98.7	19,230	99.0	277,622	240,337	64.	.6	
Northern Ireland	1.0	1.3	190	1.0	6,572	6,024	95.	4	
Unallocated (e)	-	-	-	-	139,994	122,566			
United Kingdom (b)	78.1	100.0	19,420	100.0	424,188	368,927			

(a) Average number employed, including full and part-time employees (see table 7) and working proprietors.

(b) Including estimates for establishments not making satisfactory returns, non-response and establishments with fewer than 20 employees.

(c) New building work plus acquisitions less disposals of land and existing buildings, vehicles and plant and machinery.

(d) Where a census return covered addresses in two or more regions an estimate was made of the net output and gross value added attributable to the region only where more than 80 per cent of the establishment's employees were located in the region. The estimate was made by assuming that net output and gross value added at each address covered by a return was proportional to employment at the address.

(e) Unallocated net output and gross value added covering establishments with addresses in two or more regions, plus estimates for unsatisfactory returns, non-response and establishments exempt because of size.

percentage analysis of twelve-month periods covered by returns received from United Kingdom establishments employing 20 or more

Accounting year ended	Percentage of total returns received	Percentage of total number employed
instruction settle to	per cent	per cent
1976 April (a)	1.0	0.2
May	1.3	0.3
June	5.2	4.5
July	3.9`	2.6
August	1.3	2.0
September	6.5	7.2
October	4.6	4.0
November	3.6	2.9
December	43.3	51.3
1977 January	4.6	6.7
February	0.6	0.6
March (b)	24.1	18.0

(a) From 6th April.

(b) Including returns made for twelve-month period ended 1st to 5th April 1977.

TABLE 7

Percentage analysis of employees, by full and part-time employment and sex, 1976(a) Other machinery industries minimum list heading 339.

Sex	Full-time	Part-time	All employees
FIRMANDONALY	per cent	per cent	per cent per cent
Male	82	very applied 1 below because a	83
Female	13	4	17

Source: Department of Employment

a) The percentages relate to the numbers employed (excluding working proprietors) in the United Kingdom in minimum list heading 339 at end June, 1976. In the 1976 Census of Production the employment of the Miscellaneous (non-electrical) machinery represented 37 per cent of the employment of minimum list heading 339 as a whole.

These notes give the main information needed for interpreting the figures in the industry Business Monitors: more detailed information about the census is given in a separate Business Monitor -PA1001 (Introductory Notes) of the Report on the Census of Production, 1976.

GENERAL INFORMATION

Changes made for 1976

The Census for 1976 is in line with similar inquiries being conducted in other member countries of the European Economic Communities. There was a small number of changes in the scope of the industry reports compared with 1975. These include separate headings for:

Sales of goods produced

Receipts for work done and industrial services

Amounts paid for hire of plant and machinery Amounts paid for rent of industrial and commercial buildings

Specific changes are explained in the introductions to the industry reports or by footnotes to the tables.

Suppression of information relating to individual undertakings

Section 9(5)(b) of the Statistics of Trade Act 1947 states - "The following provisions shall have effect with respect to any report, summary or other communication to the public of information obtained under the foregoing provisions of this Act -

in compiling any such report, summary or communication the competent authority shall so arrange it as to prevent any particulars published therein from being identified as being particulars relating to any individual person or undertaking except with the previous consent in writing of that person or the person carrying on that undertaking, as the case may be; but this provision shall not prevent the disclosure of the total quantity or value of any articles produced, sold or delivered; so, however, that before disclosing any such total the competent authority shall have regard to any representations made to them by any person who alleges that the disclosure thereof would enable particulars relating to him or to an undertaking carried on by him to be deduced from the total disclosed."

If a figure involved disclosure the contributor concerned was sometimes asked to give permission for its publication. In the majority of cases permission was given. When it was refused and where contributors were not approached the figure has been suppressed, either by combining it with other figures, or as in the regional tables, by omitting the figure altogether.

Symbols used

The following symbols are used throughout the PA series of Business Monitors:

- not available
- nil or less than half the final digit shown
- figures cannot be shown owing to the risk of disclosing information about individual enterprises
- R revised

Rounding of figures

Figures in the tables have, where necessary, been rounded to the nearest final digit. Where figures have been so rounded, the sum of the constituent items may not always agree exactly with the total

Industrial classification Standard Industrial The United Kingdom Classification (SIC) was first issued in 1948 and was subsequently revised in 1958 and 1968. exists to promote uniformity and comparability in the official statistics of the United Kingdom. The general principles followed are those of the International Standard Industrial Classification of all Economic Activities of the United Nations Statistical Office but the United Kingdom SIO reflects the organisation and structure of industry and trade as it exists in the United Kingdom. The SIC is a classification by activity and is not a commodity classification. However an index of all commodity headings for which sales data are provided in the Quarterly Business Monitors, is published in Business Monitor P01000

Statistical units

The statistical unit for the purpose of the Census is the establishment which is defined in the SIQ as the smallest unit which can provide the information normally required for an economic census, for example, employment, expenses, turn-over, capital formation. Usually the principal activities carried on in an establishment fall within a single heading of the classification (e.g. steel making or sugar refining). Typically the establishment embraces all the activities carried on at a single address e.g. a farm, a mine or a factory, including those which are ancillary to the principal activities. Frequently distinct activities characteristic of different industries are carried on at one address, but normally these are not classified separately and the whole establishment is classified according to the main activity. If, however, the required range of data can be provided for each activity, each is taken to constitute a separate establishment. Sometimes activities which are conducted as a single business are carried on at a number of addresses, Where this is so, businesses are asked to provide the full range of separate information in respect of each address; whether or not the activities are different. Their activities may, however, be integrated to such an extent that they constitute a single establishment. In the latter case the establishment is defined to cover the combined activities at these addresses (termed local units). Separate figures are obtained of employment and net capital expenditure at each unit in order to compile regional tables. Efforts are made by the Business Statistics Office to ensure, by negotiating with respondents, that the return from an establishment does not cover local units or addresses in more than one of the

countries of the United Kingdom. Further information about the statistical uni appeared in an article "The statistical unit business inquiries" in Statistical News No.13 May

Establishments are asked to exclude from the returns particulars relating to any department no engaged in production e.g. merchanting, transport warehousing, for which they keep a separate set accounts. Transfers of goods produced to suc departments are treated as sales and respondent are asked to value them as far as possible as sold to an independent purchaser. Where separate accounts are not kept they are asked to include details of all these activities in their return Particulars relating to head offices mainly engaged in the administration of the production units within the scope of the census were included. Where more than one return was made the information in respect of the head office wa apportioned among them. For certain purposes in the annual censuses

production (especially the enterprise analyses of Business Monitor PA1002) related establishments are combined. For these purposes an enterprise group may be defined as a business consisting of either a single establishment or two or more establishments under common ownership or control. Bringing together establishments into enterprise groups is also necessary for the purpose of ensuring that there will be no disclosure of the activities of any one enterprise group. Information about the relationship of establishments, the changing structure of groups of companies and about common ownership links is obtained from many sources, including the Stock exchange Year Book, company reports, press reports and information supplied by individual establishments.

THE REGISTER
The register permits a questionnaire to be sent direct to the reporting establishment on which the latter can include information relating to all the manufacturing (or local) units which it

comprises.

The inquiries provide a major source of information for keeping the register continuously up-to-date and act as a check on its detail and structure. For the establishments on the register making returns to the quarterly inquiries, the industrial classification is derived from an analysis of their sales of commodities and is reviewed annually. Employment data are entered on the register from returns to the annual census of production. In cases where an establishment does not make a return to these inquiries the employment data are based on information provided by the Department of Employment from the annual censuses of employment.

Establishments with 20 or more employees are included in the censuses each year and the information they supply to the census is supplemented by the returns that those with 25 or more employees provide to the quarterly inquiries. Information about establishments with fewer than 20 employees in most industries is less securely based, but increasing use has been made of data on these small establishments supplied by the Department of Employment. One benefit of using this information is an improvement in the estimates of the number of smaller establishments and enterprises, but there is little effect on other aggregates (e.g. employ-ment, output, net capital expenditure).

return was required in the 1976 Census from each establishment with 20 or more employees. Each establishment is classified to an industry, as defined in the SIC, whose principal products form the major part of the establishment's sales.

ne regions defined in Table 5 take account of the undary changes arising out of the Local vernment Act 1972 and the Local Government Act (Scotland) 1973. These changes came into effect in pril 1974 in England and Wales and May 1975 in Scotland.

TERMS USED IN THE CENSUS REPORT

verage number employed Establishments were required to state the number persons on the payroll on average during the year of return, whether full-time or part-time employees. Separate figures were required for:

- (a) administrative, technical and clerical
- (b) all other employees (operatives)

erages could be calculated from the figures elating to the last week of each calendar month. stablishments were also required to state the

number of working proprietors where appropriate and these are included in total employment figures. Outworkers (i.e. persons employed by establishments who worked in their own homes etc. on materials supplied by the establishment) are excluded. The figures include persons engaged on merchanting or factoring and canteen workers where particulars in respect of these activities could not be excluded from the return.

Working proprietors

These include all persons regarded as "selfemployed" for national insurance purposes and members of their families who worked in the business without receiving a wage or salary; but such persons who worked less than half the normal number of working hours are excluded. Directors working in the business but not in receipt of a definite wage, salary or commission are included under this heading: directors paid by fee only are not included.

Administrative, technical and clerical employees include directors in receipt of a definite wage, salary or commission, managers, superintendents and works foremen; research and design employees (other than operatives); draughtsmen, editorial staff, advertising staff, travellers and all office employees.

Operatives include all other classes of employees, that is, broadly speaking, all manual wage earners. They include operatives employed in power stations, transport (including roundsmen), warehouses, stores, shops and canteens. inspectors, maintenance workers and Operatives engaged in outside work of erecting, fitting etc. are also included, but outworkers are excluded.

Capital expenditure

Capital expenditure during the year in respect of manufacturing units where production had not started before the end of the year is included. Establishments were asked not to deduct from the value of capital expenditure amounts received or expected to be received in grants or allowances from the Government or any statutory body or local authority. Establishments with 100 or more employees were asked to include a total net capital expenditure figure for each calendar year.

(a) New building work

- This represents the cost incurred during the year of new building and other constructional work to be used in connection with the business covered by the return. The value is that charged to capital account during the year of return; it includes expenditure on new buildings and on the extension or reconstruction of old buildings, the value of works of a capital nature carried out by the establishment's own staff and the cost of any newly constructed buildings purchased. Figures shown include legal charges, stamp duties, agents' commissions, etc.
- (b) Land and existing buildings The items shown are the capital cost of freeholds purchased and the capital cost or premium payable for leaseholds acquired (excluding the value of assets acquired in taking over an existing business), and the amounts receivable for freeholds or leaseholds disposed of. The value is that charged to capital account during the year of
- (c) Plant, machinery and vehicles The items shown are the value of plant and machinery and of vehicles acquired, both new and second-hand, and the amount received for items disposed of during the year. The value of plant and machinery acquired includes plant, etc. which

firms produced for their own use in connection with the business covered by the return. The value of plant, etc. acquired is the expenditure charged to capital account during the year of return less any discounts received, but including the cost of transport and installation. Deductible value added tax is excluded but non-deductible value added tax on motor cars acquired is included. No deduction is made for depreciation, amortization or obsolescence. The proceeds of items disposed of during the year exclude amounts written-off for items scrapped.

Cost of industrial services

This includes amounts payable to other firms for work done on materials supplied by the establishpayments for repairs and maintenance (including those in respect of rented buildings) and amounts paid to other firms for contracts which have been sublet. Payments to outworkers are excluded.

Cost of non-industrial services

This includes rent of industrial and commercial buildings, hire of plant and machinery, commercial insurance premiums, bank charges and amounts paid for professional services, post office services, transport, advertising etc. Amounts payable on royalties for the right to use patents, trademarks, copyrights etc., manufacturing and quarrying rights and technical "know-how" are also included.

Gross output

In the calculation of gross output the value of total sales and work done is increased by the rise (or reduced by the fall) during the year in the value of work in progress and goods on hand for

Net output, a customary census measure, is calculated by deducting from gross output the cost of purchases (reduced by the rise, or increased by the fall, during the year of stocks of materials etc.) and the cost of industrial services received, and where applicable, duties etc.

Net output per head

The figures of net output per head are derived by dividing the net output by the average number of persons employed (full and part-time) on all activities covered by the returns, including operatives, administrative, technical and clerical employees and working proprietors, but excluding outworkers.

Gross value added at factor cost

Gross value added at factor cost is calculated by deducting from net output the cost of nonindustrial services (e.g. rent of buildings, hire of plant and machinery, commercial insurance premiums, bank charges and amounts paid for professional services, post office services, transport and advertising), rates (excluding water rates) and the cost of licensing motor vehicles. This estimate of gross value added approaches more closely than census net output to the definition of net output or value added in national accounts statistics.

Gross value added at factor cost per head The figures of gross value added at factor cost per head are derived by dividing the gross value added by the average number of persons employed (full and part-time) on all activities covered by the returns, including operatives, administrative, technical and clerical employees and working proprietors, but excluding outworkers.

Purchases

Purchases include the cost of raw materials,

components, semi-manufactured goods and workshop materials; of replacement parts and consumable tools not charged to capital account; of packaging materials of all types; of stationery and printed matter; of fuel, electricity and water; of materials to be used by the establishment or given out to other establishments for the production of machinery or other capital items for the establishment's own use; of materials for use by establishment when working on goods supplied by customers; and of food, etc. for any canteen covered by the establishment's return. Transfers of goods to the establishment from another department of the same firm not covered by the establishment's return are included at a cost corresponding to the estimated selling value recorded by the other department. Amounts payable to transport firms or credited to the firm's own transport department for delivery of materials are excluded, as are all purchases of machinery and plant charged to capital account. Purchases of goods for merchanting or factoring have been collected separately since 1973. The values shown exclude VAT. They include, in addition to the actual purchase price, the value of packaging material charged to the establishment. The value of returned goods or packaging material returned to suppliers and any trade discounts are excluded, Materials purchased duty-paid are included at their duty-paid value, less any drawback, rebate, etc. The cost of transport is included only if included with the purchase price in the firm's accounts. Imported goods are included at their full delivered cost. If in the firm's accounts the transport from docks or airport is not included in the cost of goods purchased, the cost is entered at c.i.f. plus duty (if applicable). Leasing, renting and hire purchase charges are excluded.

Sales of goods produced

Sales for the purposes of the annual censuses means deliveries on sale of goods made by establishments in the United Kingdom covered by the inquiry. Sales of goods made for these establishments by outworkers or by other establishments from materials given out to them and sales of waste products are included. New building work and machinery or other capital items produced by establishments for hiring out or leasing are regarded as sales, the value included in the return being that adopted in the establishments! capital asset accounts. Forward sales and canteen takings are excluded. All sales in the period of the inquiry are included irrespective of when the goods were manufactured. Goods produced in one establishment and transferred either to ancillary departments not engaged in production for which there are separate accounts, or to another establishment of the same firm not covered by the return, are treated as sales by the producing establishment and valued as far as possible as they had been sold to an independent purchaser. Goods transferred to wholesale or retail selling organisations, for which separate accounts are kept are valued on the same basis.
The value shown for sales is the "net selling

value" defined as the amount (excluding value added tax) charged to customers whether on an ex-works or delivered basis, after any trade discounts and agents' commissions have been deducted. The cost of packing materials less allowance for returnable cases is included. industries where products attract Excise Duty the value stated is usually inclusive of duty if sold duty-paid and exclusive of duty if sold in bond or exported.

Work done and industrial services rendered Figures for work done represent the amount charged for work carried out on materials supplied by a customer and include repair work. Within certain

industries this heading covers a wide variety of activities, for example, within the food sector butter packed on commission; within the textile industries - making up of garments, fur dressing and textile finishing; within printing and pub-lishing - preparatory work on type-setting, block making and binding. Work done is also significant in the electrical machinery and heavy engineering industries, covering erection, installation and repair and jobbing work. Other activities within this heading include exploration work, research and development, glass cutting and dressing and planing of timber.

Industrial services rendered include repairs and maintenance, installation work, and technical research and studies for other organisations.

Capital goods produced for establishments! own use This includes all work of a capital nature carried out during the year by the establishments! own staff for their own use.

Non-industrial services rendered

This includes rents received for commercial and industrial buildings, amounts charged for hiring out plant, machinery and other goods and amounts charged to other organisations for the provision of transport. It also includes amounts received for the right to use patents, trademarks, copyrights etc., manufacturing and quarrying rights and technical "know-how" and revenue from such staff facilities as canteens.

Goods merchanted or factored Merchanted goods are those (excluding canteen sales) sold without having been subjected to any manufacturing process by the seller.

Stocks and work in progress Values are given of stocks of goods on hand for sale and of materials, stores and fuel, at the end of the year of return and of the change during the year, including any stocks of goods held for merchanting or factoring. Work in progress is defined as materials which have been partially processed by the establishment but which are not usually sold or transferred to another establishment without further processing. The values include the cost of materials consumed and labour used, together with a margin of overhead costs and profits. Progress payments made to sub-contractors are excluded and progress payments received from other organisations are not deducted.

Wages and salaries

These are amounts paid during the year to operatives and to administrative, technical and clerical employees. Payments to working proprietors, whether called salaries or not, are excluded. The values shown include all overtime payments, bonuses and commissions, whether paid regularly or not, and no deduction is made for income tax, insurances, contributory pensions etc. The value of redundancy payments less any amounts reimbursed from Government sources is included. The value of any payments in kind, travelling expenses etc. is excluded.

Remuneration paid to outworkers

The remuneration paid to outworkers (i.e. persons employed by the establishment who do their work in their own homes) is generally on a piece-work basis. Only amounts paid to outworkers whose names appear on the establishment's payroll are included. Amounts paid to outworkers by sub-contractors are excluded.

Employers' insurance and welfare contributions This item includes employers' contributions to national insurance and graduated pensions (and/or earnings related basic contributions under the

Social Security Act, 1973) as well as commercial insurance premiums to provide pensions, superannuation or other retirement benefits, sickness benefits, personal accident benefits, disability or death benefits for employees or former employees or their dependants. Contributions to the running costs of canteens, social centres, children's and holiday homes, etc. for employees, former employees and their dependants are also included.

© Crown copyright 1979

Her Majesty's Stationery Office

Government Bookshops

49 High Holborn, London WC1W6HB 13a Castle Street, Edinburgh EH2 3AR 41 The Hayes, Cardiff CF1 1JW Brazennose Street, Manchester M60 8AS Southey House, Wine Street, Bristol BS1 2BQ 258 Broad Street, Birmingham B1 2HE 80 Chichester Street, Belfast BT1 4JY

Government publications are also available through booksellers

Extracts from this publication may be reproduced provided the source is acknowledged. Proposals for complete reproduction should be addressed to the Librarian, Business Statistics Office, Newport, Gwent NPT 1XG