## PA263

Business Statistics Office

## Business Monitor

# Report on the <br> Census of Production 

Lubricating oils and greases

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OF POLTICAL AND
ECONOMIC SCIENCA

MSO

## Business Monitor

A publication of the Government Statistical Service

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series embracing all industrial inquiries in the Busines
series embracing all industrial inquiries in the Busines
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it is an annual series) or Q (quarterly) or M (monthly)
and then by a number indicating the minimum list
heading, or sub-dision of a minial Ind inst heading, of
The Census of Production (PA) reports are available on standing order (details on application to Her
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Report on the Census of Production 1977

Lubricating oils and greases

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 )

List of Industry Reports, etc.

| PA1001 | Introductory notes |
| :---: | :---: |
| PA101 | Coal mining |
| PA102 | Stone and slate quarrying and mining |
| PA103 | Chalk, clay, sand and gravel extraction |
| PA104 | Petroleum and natural gas |
| PA109 | Miscellaneous mining and C |
| PA211 | Grain milling |
| PA212 | Bread and flour confectionery |
| PA213 | Biscuits |
| PA214 | Bacon curing, meat and fish products |
| PA215 | Milk and milk products |
| PA216 | Sugar |
| PA217 | Cocoa, chocolate and sugar confectionery |
| PA218 | Fruit and vegetable products |
| PA221 | Vegetable and animal oils and fats |
| PA229. 1 | Margarine |
| PA229.2 | Starch and miscellaneous foods |
| PA231 | Brewing and malting |
| PA232 | Soft drinks |
| PA239.1 | Spirit distilling and compounding |
| PA239.2 | British wines, cider and perry |
| PA261 | Tobacco ovens and manufactured fuel |
| PA262 | Mineral oil refining |
| PA263 | Lubricating oils and greases |
| PA271.1 | Inorganic chemicals |
| PA271.2 | Organic chemicals |
| PA271 | Miscellaneous chem |
| PA272 | Pharmaceutical chemicals and preparatio |
| PA273 | Toilet preparations |
| PA274 | Paint |
| PA275 | Soap and detergents |
| PA276 | Synthetic resins and plastics materials and synthetic rubber |
| PA277 | Dyestuffs and pigments |
| PA278 | Fertilizers |
| PA279.1 | Poolishes |
| PA279.2 | Formulated adhesives, gelatine, et |
| PA279.4 | Formulated pesticides |
| PA279.5 | Printing ink |
| PA279.6 | Surgical bandages, etc. |
| PA279.7 | Photographic chemical materials |
| PA311 | Iron and steel (general) |
| PA312 | Steel tubes |
| PA313 | Iron castings, etc. |
| PA321 | Aluminium and aluminium alloys |
| PA322 | Copper, brass and other copper alloy |
| PA323 | Miscellaneous base metals |
| PA331 | Agricultural machinery (except tractors) |
|  | Metal-working machine tools |
| PA333.2 | Valves |
| PАз33.3 | Compressors and fluid power equipment |
| PA334 | Industrial engines |
|  | Textile machinery and accessories |
| PA336 | Construction and earth-moving equipment |
| PA337 | Mechanical handling equipment |
| PA338 | Office machinery |
| PA339.1 | Mining machinery |
| PA339. 2 | Printing, bookbinding and paper goods machinery |
| РА 339.3 | Refrigerating machinery, space-heating, ventilating and air-conditioning equipment |
| РАЗ39.5 | Scales and weighing machinery and portabl power tools |
| РАЗ39.7 | Food and drink processing machinery and packaging and bottling machinery |
| РАЗ39.9 | Miscellaneous (non-electrical) mach inery |
|  | ustrial |
| PA342 | Ordnance and small arms |
| PA349. 1 | Ball, roller, plain and other bearings |
| PA349.2 | Precision chains and other mechanical engineering |
| PA351 | Photographic and document copying equipment |
| PA352 | Watches and clocks |
| PA353 | Surgical instruments and apolian |
| PA354 | Scientific and industrial instruments and systems |
| 边 | Electrical machinery |
| PA362 | Insulated wires and cables |
| PA363 | Telegraph and telephone apparatus and equipment |
| PA364, | Radio and electronic components |
|  | ophone records |
| PA365. 2 | Broadcast receiving and sound reproducing equipment |
|  | Electronic computers |
| PA367 | Radio. radar and electronic capital |
| PA368 | Electrical appliances primarily for domestic use |



PA369.2 Primary ant ant equipment for motor vehicles, cyc

PA370.
PAccessories, etc.
Shipbuild
PABO Wheeled tractor manine engineering
PA380 Wheeled tractor manufacturing
PA 381.1 Motor vehicle manufacturing
PA381.2
Prator vehicle manufacturing
PA382
Trailers. caravans and treight containers
Motor cycle, tricycle and
PA382
PA 383 Mortor cycle, tricycle and pedal cyclers manufacturing
Aerospace equipment manu facturing and reapairing Aerospace equipment manufactucing manu repacturing
Locomotives, railway track equipment, railway carriag wagons and trams
Engineers' small tools and gauges Hand tools and implements Cutlery, spoons, forks and plated tableware, etc.
Bolts, nuts, screws, rivets, etc. Wire and wire manufactures Cans and metal boxe Mewallery and pre Drop forgings, etc.
Metal hollow-ware
Misel
Miscellaneous metal manufacture
Production of man-made fibres Production of man-made fibres
Spinning and doubling on the Weaving of cotton, I inen and Woollen and worsted
Jute
Jute
Rope, twine and net
Hosiery and other knitted goods Hosiery and other
Warp knitting
Lace
Lace
Carpets
Carpets
Narrow fabrics
Household textiles and handkerchiefs
Canvas goods and sacks and other made-up textiles Canvas goods and
Asbestos Miscellaneous textile industries
Miscellaneous textile industries
Leather ttanning and dressingl and fellmongery
Leather goods
Leather goods
Fur
Fur Weatherproof outerwear
Men's and boys' tailored outerwear
Women's and gir $/ s$ ' tailored outerwear
Women's and gir sis' tailored outearwear
Overalls and men's shirts, underwear, etc.
Overalls and men's shirts, underwear, etc.
Dresses, lingerie, infants' wear, etc.
Hats, caps and millinery
Corsear, end miscell aneous dress industries
Corsess
Gloves
Footwea
Footwear
Refractory goods
Refractory goods
Building bricks and non-refractory goods
Pottery Pottery
Glass
Cens
Glass
Cement
Abrsives
Abrasives
Miscellar
Funniture and upholster
Bedding, etc.
Shop and office fitting
Wooden containers and baskets
Miscellaneous wood and cork
manufactures Paper and board
Cardboard boxes, cartons and fibre-board packing cases
Packaging products of paper and associated materials Packaging products of $p$ and
Manufactured stationery
Wallcoverings
Miscellaneous manufactures of paper and board
Miscellianeous manufactures of paper and board
Printing, publishing of newspapers and periodica General printing and publishing
Linoleum, plastics floor-covering, leathercloth, etc
Brushes and brooms
Toys, games and children's carriages
Sports equipment
Miscellaneous stationers' goods
Plastics products
Musical instrume
Musical instruments
Miscellaneous manufacturing industries
Construction
Electricity
Water sup
PAA603
PA 1002 Water surpply
Summary tables

The information in this report relates to establishments classified to the Lubricating oils and greases industry, minimum list heading 263 in the standard Industrial Classification (revised 1968). The activities of the industry include:-

Blending mineral, animal or vegetable lubricating oils and greases. Blending at refineries is excluded, but their sales of lubricating oils and greases are included.

In interroreting the data in the tables it is essential to bear
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 Title Page
No
Output and costs, 1973-1977
Capital expend iture, 1973-197
Stocks and work in progress, 1973-1977
Analysis of establishments by size, 1977
4-5
5 Regional distribution of employment, net capital expenditure, net output and gross value added
$6 \quad$ Percentage analysis of twelve-month periods covered by returns received from United
Kingdom establishments employing 20 or more persons, 1977 7
Percentage analysis of employees, by full and part-time employment and sex, 1977
Operating ratios, 1977

Uutput and costs, 1973-1977
All United Kingdom establish

|  | Unit | 1973 | 1974 | 1975 | 1976 | 1977 |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| Enterprises | Number | 131 | 138 | 137 | 143 | 134 |
| Establishments | " | 150 | 155 | 151 | 156 | 147 |
| Sales of goods produced, work done and industrial services rendered | f thousand | 111,083 | 164.718 | 194,059 | 290,560 | 345,282 |
| Capital goods produced for establishments' own use | " | 56 | 101 | 67 | 152 | 113 |
| Non-industrial services rendered | " | 134 | 179 | 182 | 162 | 186 |
| Goods merchanted or factored | " | 45,376 | 14,633 | 13,466 | 19,422 | 23,685 |
| Total sales and work done (b) | " | 156,649 | 179,630 | 207,774 | 310,296 | 369,267 |
| Increase during the year, work in progress and goods on hand for sale | " | 1,328 | 4,853 | 3,383 | 1,493 | 4,199 |
| Gross output | " | 157,977 | 184,483 | 211,157 | 311,789 | 373,465 |
| Purchases of materials for use in production, and packaging and fuel | " | 67,871 | 124,810 | 134,173 | 201,273 | 225,400 |
| Purchases of goods for merchanting or factoring | " | 16,798 | 13,407 | 11,271 | 19,716 | 21,802 |
| Increase during the year, stocks of materials, stores and fuel | " | 2,567 | 9,343 | -1,376 | 2,327 | 4,711 |
| Cost of industrial services received | " | 2,214 | 2,878 | 3,126 | 3,486 | 4,080 |
| Excise payments, etc. (net) | " | 24,116 | -60 | 336 | 1,260 | 2,738 |
| Net output | " | 49,544 | 52,791 | 60,874 | 88,381 | 124,155 |
| Total employment (c) | Thousands | 7.1 | 6.9 | 6.6 | 6.9 | 6.9 |
| Net output por head | £ | 6,987 | 7,680 | 9,164 | 12,785 | 18,001 |
| Payments for non-industrial services |  |  |  |  |  |  |
| Hire of vehicles, plant and machinery | £ thousand | 607 | 1,136 | 1,383 | 734 | 1,210 |
| Rents of industrial and commercial buildings | " | (d) | (d) | (d) | 378 | 561 |
| Commercial insurance premiums | " | 402 | 442 | 546 | 751 | 868 |
| Bank charges | " | 20 | 45 | 14 | 29 | 40 |
| Other non-industrial services | " | 3,709 | 4,692 | 5,453 | 7.555 | 10,140 |
| Licensing of motor vehicles | " | 171 | 166 | 182 | 191 | 292 |
| Rates, excluding water rates | " | 535 | 800 | 1,013 | 1,254 | 1,333 |
| Gross value added at factor cost | " | 44,099 | 45,511 | 52,282 | 77,489 | 109,711 |
| Gross value added at factor cost per head | £ | 6,219 | 6,621 | 7,870 | 11,209 | 15,907 |

(a) Including estimates for establishments not making satisfactory returns, non-response and establishments with fewer than 20 persons. Satisfactory returns accounted for 87 per cent of employment within the industry
(b) Details of manufacturers' quarterly sales of principal products are published regularly in Business Monitor PQ263.
(c) Average number employed, including full and part-time employees (see table 7 ) and working proprietors.
table 3
Stocks and work in progress, 1973-1977
All United Kingodom estaolishments classi
All United Kingdom establishments classified to the industry (a)

|  | 1973 | 1974 | 1975 | 1976 |  | 1977 |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: |
|  |  |  | Increase |  |  | Value at end of year |
| Materials, stores and fuel | 2,567 | 9,343 | $-1,376$ | 2,327 | 4,711 | 32,172 |
| Work in progress | 1 | 47 | 19 | 56 | 78 | 635 |
| Goods on hand for sale | 1,327 | 4.806 | 3,363 | 1.437 | 4,120 | 26,304 |
| Total | 3,895 | 14,196 | 2,007 | 3,820 | 8,909 | 59,111 |

(d) For 1973-1975 rents of industrial and commercial buildings were not recorded separately, but included in hire of vehicles, plant and
machinery.
a) Including estimates for establishments not making satisfactory returns, non-response and establishments with fewer than 20 persons.

## TABLE 4

Analysis of establishments by size, 1977
All United Kingdom establ ishments classified to the industry (a)

| Size <br> group <br> (b) | Estab-lishments | Enterprises (c) | Employment |  |  | Wages and salaries ( $f$ ) |  |  |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
|  |  |  | $\begin{aligned} & \overline{\text { Total }} \\ & \text { (d) } \end{aligned}$ | Operatives | $\begin{aligned} & \text { Others } \\ & \text { (e) } \end{aligned}$ | Operatives |  | Others (e) |
|  |  |  |  |  |  | Total | $\begin{aligned} & \text { por } \\ & \text { head } \end{aligned}$ | Total |
|  | Number | Number | Number | Number | Number | £ thousand | £ | £ thousand |


| $1-10$ | 71 | 69 | $328)$ |  |  |
| :---: | :---: | :---: | :---: | :---: | :---: |
| $11-19$ | 26 | 25 | $373!$ | 1,140 | 1,070 |
| $20-49$ | 19 | 18 | $572)$ |  |  |
| $50-99$ | 15 | 13 | $1,042)$ |  |  |
| $100-199$ | 7 | 7 | 992 | 516 | 474 |
| $200-299$ | 4 | 4 | 939 | 475 | 464 |
| 300 and over | 5 | 5 | 2,651 | 1,386 | 1,265 |


| 3,817 | 3,348 | 4,127 | 3,857 |
| :--- | :--- | :--- | :--- |
|  |  |  |  |
| 2,389 | 4,630 | 1,925 | 4,062 |
| 1,798 | 3,785 | 1,827 | 3,938 |
| 5,573 | 4,021 | 5,428 | 4,291 |


| $\begin{aligned} & \text { Total sales } \\ & \text { and work } \end{aligned}$done (g) | Gross output | Net output |  | Gross value added at factor cost |  | Net capital expenditure (h) | Total stocks and work in progress at |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
|  |  | Total | $\begin{aligned} & \text { per } \\ & \text { head } \end{aligned}$ | Total | $\begin{aligned} & \text { per } \\ & \text { head } \end{aligned}$ |  |  |
| £ thousand | £ thousand | f thousand | £ | £ thousand | £ | £ thousand |  |


| 96,294 | 96,729 | 24,981 | 10,791 | (j) | (j) | 4,031 | 15,472 |
| :--- | :--- | :--- | :--- | :--- | :--- | :--- | :--- | :--- |


| 70,445 | 72,198 | 21,602 | 21,776 | $39,333(j)$ | $11,894(j)$ | 840 | 11,107 |
| ---: | ---: | ---: | ---: | :--- | :--- | ---: | ---: |
| 60,132 | 59,983 | 19,191 | 20,438 | 18,203 | 19,386 | 824 | 8,540 |
| 142,396 | 144,556 | 58,381 | 22,022 | 52,175 | 19,681 | 3,891 | 23,993 |


| Total | 147 | 134 | 6,897 | 3,517 | 3,273 | 13,577 | 3,860 | 13,308 | 4,066 |
| :--- | :--- | :--- | :--- | :--- | :--- | :--- | :--- | :--- | :--- |

(a) Including estimates for establishments not making satisfactory returns, non-response and establishments with fewer than 20 persons.
(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 estab lishments in
more than one size group.
(d) Including working proprietors.

| 369,267 | 373,465 | 124,155 | 18,001 | 109,711 | 15,907 | 9,586 | 59,111 |
| :--- | :--- | :--- | :--- | :--- | :--- | :--- | :--- |
| 4 |  |  |  |  |  |  |  |

The cost of employers' contributions to national insurance, pensions and welfare schemes and the running costs of canteens, is
estimated for the industry at $£ 6,896$ thousand.
estimated for the industry at $£ 6,896$ thousand.
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.
(e) Administrative, technical and clerical employees.

Regional distribution of employment, net capital expenditure, net output and gross value added at factor cost, 1977
All United Percentage analy
persons, 1977

| Area | Total employment (b) | Net capital expenditure (c | Net <br> output (d) | Gross value added at factor cost (d), | Gross value added at factor cost returned 80 per cent or more of their employment in the region as a proportion of total factor cost in the region |
| :---: | :---: | :---: | :---: | :---: | :---: |
|  | Thousands | £ thousand | £ thousand | £ thousand | percentage |


| Standard regions of England |  |  |  |  |  |  |  |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| North | 0.1 | 2.0 | 208 | 2.2 | 1,300 | 1.020 | 33.6 |
| Yorkshire and Humberside | * | * | * | * | * | * | * |
| East Midlands | * | * | * | * | * | * | * |
| East Anglia | - | - | - | - | - | - | - |
| South East | * | * | * | * | * | * | * |
| South West | * | * | * | * | * | * | * |
| West Midlands | * | * | * | * | * | * | * |
| North West | * | * | * | * | * | * | * |
| England | * | * | * | * | * |  |  |
| Wales | * | * | * | * | * | * | * |
| Scotland | 0.4 | 5.2 | 868 | 9.0 | 3,809 | 2,972 | 58.2 |
| Great Britain | * | * | * | * | * |  |  |
| Northern Ireland | - | - | - | - | - | - | - |
| United Kingdom | 6.9 | 100.0 | 9,586 | 100.0 | 124,155 | 109,71 |  |

$$
\text { Including estimates for establishments not making satisfactory returns, non-response and establishments with fewer than } 20 \text { person: }
$$

Average number employed, including full and part-time emplovees (see table 7 ) and working proprietors.
New building work plus acquisitions less disposals of land and existing buildings, vehicles and plant and machinery
Where a census return covered addresses in two or more regions, an estimate of the net output attributable to each address was made Where a census return covered aadresses in wate to employment. An estimate for each region was ob
by assuming that net output was proportionate
net output for addresses located in that region. Gross value added at factor cost is treated similarly

| Accounting year ended |  | Percentage of total returns received | Percentage of total number employed |
| :---: | :---: | :---: | :---: |
| 1977 |  | per cent | per cent |
|  | April (a) | 0.0 | 0.0 |
|  | May | 2.2 | 0.4 |
|  | June | 2.2 | 0.4 |
|  | July | 4.3 | 2.3 |
|  | August | 2.2 | 5.5 |
|  | September | 4.3 | 1.4 |
|  | October | 4.3 | 1.7 |
|  | November | 2.2 | 0.4 |
|  | December | 50.0 | 64.0 |
| 1978 | January | 4.4 | 4.7 |
|  | February | 2.2 | 0.4 |
|  | March (b) | 21.7 | 18.8 |

(a) From 6th April.
(b) Including returns made for twelve-month period ended 1st to 5th Aprill 1978.
table 7
Percentage analysis of employees, by full and part-time employment and sex, 1977(a)

| Sex | Full-time | Part-time | All employees |
| :---: | :---: | :---: | :---: |
|  | per cent | per cent | per cent |
| Male | 78 | 1 | 79 |
| Female | 17 | 4 | 21 |

[^0]Ratio of gross output to stocks

Wages and salaries per administrative, technical and clerical

Notes
These notes give the main information needed for interpreting
he figures in the industry Business Monitors: me figation about the census is Moss Monitors: more detailed Monitor - PA 1001 (Introductory Notes) of the Report on the Census of Production, 1977.
GENERAL INFORMATION
Changes made for 1977 is in line with similar inquiries being
The Censul for 1977 is 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 1976 . of the industry
For the first time in the industry monitors a table has been
fors includd on operating ratios, calculated from census measeres of
output, investment, manpower and labour costs.

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 "The following provisions shall have effect with respect to an report, summary or other communication to the public
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 competent authority shall so arrange it as to prevent any
particulars published
therein from being identified as being particulars published therein from being identified as bein
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 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 them by any person who alleges that the disclosure thereo
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 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 figur regional tables, by omitting the figure altogethe

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
fifures cannot be shown owing to the risk of disclosing
information about individual enterprises.
R revised
Rounding of figures
Fioures in the trables
Figures in the tables have, where necessary, been rounded to the
nearest final nearest final digit. Where figures have been so rounded, the sum of the constituent items may not always agree exactly with the
total shown.
-
Industrial classification
The United Kingdom
The United Kingdom Standard Industrial Classification (SIC) was
first issued in 1948 and was subsenuently red 1968. It exists to promote uniformity and comparability in the
official official statistics of the United Kingdom. The general principles
followed are those of the International standard followed are those of the Interanational Standard Industria
Classification of all Economic Activities of the United Nations Classitication of all Economic Activities of the United Nation
Statistical Office but the United Kingdom SIC reflects the organisation and structure of industry and trade as it exists in the
United United Kingdom. The SIC is a classification by activity and is not a commod ity classification. However, an index of all commodity
eeadings for which sales data are provided in the Quarterly Business Monitors, is published in Business Monitor PQ 1000 .
Statistical units
The statistical unit for the purpose of the Census is the establishment
which is defined in the SIC as the Which is defined in the SIC as the smallest unit which can provide
the information normally required for an economic census, for
example, employment, expenses, turnover, capital formation. Usually the principal activities carried on in an establishment fall within a
single heading of the classification (eg steel making or sugar single heading of the classification (eg steel making or sugar
refining). Typically the establishment embraces all the activities carried on at a single address ee a mine or a factory, including those which are ancillary to the principal activities. Frequently distinc-
activities characteristic of different industries are carried on at one address, but normally these are not classified separrately and the whole establishment is classified according to the main activity. If,
however, the required range of data can be provided for however, the required range of data can be provided or each 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. The
of activities may, however, be integrated to such an extent that they constitute a single establishment. In the latter case the establishmen
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 (BSO) to ensure,
by negotiating with respondents, that the return from an establish. ment does not cover local units or addresses in more than one of he countries of the United Kingdom
Further information about the statistical unit appeared in an
article "The statistical unit in business inquiries" in Statistical News No 13 May 1971.
Establishments are asked to exclude relating to any department not engaged in production eg merchantin transport, warehousing, for which they keep a separate set of accounts. Transfers of goods produced to such departments are treated as sales and respondents are asked to value them as far as
possible as if sold to an independent purchaser Where separ解 ctivities in their return
Particulars relating to head offices mainly engaged in the admin were included production units within the scope of the census $n$ respect . Where more than one return was made the information For certain purposes in the annual censuses them. For certain purposes in the annual censuses of production
(especially the enterprise analyses of Business Monitor PA related establishments are combined. For these purposes an enterprise group may be defined as a business consisting of either a ingle establishment or two or more establishments under common enterprise groups is also necessary for the purpose of ensuring that here will be no disclosure of the activities of any one enterpris group. Information about the relationshio 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 elating to all the manufacturing (or locall can include information The inquiries provide a major source of information for keeping the register continuously up-to-date and act as a check on its detail nd structure. For the establishments on the register making returns
o the quarterly inquiries, the industrial classification is derived from 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 nnual census in 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. New additions to the register are obtained from various sources including Companies
Registration Office and the Department of Emplovment. The 1973 Finance Act allows HM Customs and Excise to pass to the BSO ists of businesses registered for VAT. Information from all these etails are sought directly fro the register, and where necessary, to trade are removed from the live register
Increasing use of the information obtained from the Departmen f Employment, HM Customs and Excise and BSO inquiries has ed to improvements on the register, which in turn enabled the
BSO to produce better estimates, particularly of numbers of smaller establishments and enterprises.

Coverage
A return
A return was required in the 1977 Census from each establishment
with 20 or more employees. Each establishment is classified to an 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.
Regions
regions defined in Table 5 take account of the boundary changes arising out of the Local Government Act 1972 and the
Local Government Act (Scotland) 1973. These changes came into effect in April 1974 in England and Wales and May 1975 in
Scotland.

## TERMS USED IN THE CENSUS REPORT

Average number employed
Establishments were required to state the number of persons on the payroll on average during the year of return, whether
full-time or part-time employes. Separate figures were required for: full-time or part-time employes. Separate iligures were rea
(a) administrative, technical and clerical employees
(b) all other employes (operatives) (a) administrative, technical and cles
(b)
all other employees loperatives)

Averages could be calculated from the figures relating to the last
week of each calendar month. Establishments were also required week of each calendar month. Establishments were also required
to state the number of working proprietors where appropriate to state the number of working proprietors where appropriate
and these are incluced in total employment figures. Outworkers
(ie persons employed by establishments who worked in their own (ie persons employed by establishments who worked in their own
homes etc on materials supplied by the establishment) are homes etc on materials supplied by the establishment) are
excluded. The figures include persons engaged on merchanting or 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 "self-emploved" for national
insurance purposes and members of their families who worked in insurance purposes and members of their families who worked in
the business without receiving a wage or salary; but such persons
the the business without receiving a wage or salary; but such persons
who worked less than half the normal number of working hours who worked less than half the normal number of working hours
are excluded. Directors working in the business but not in receipt are excluded. Directors working in tis business but hot under this
of a definite wage, salary or commision are included und ond
heading: directors paid by fee only are not included.

Employees
Administrative, technical and clerical employees include directors
in receit of a definite wage, salary or commission, managers and in receipt of a definite wage, salary or commission, managers and
works foremen; research and design employees lother than works foremen; research and design employees lother than
operatives) draughtsmen, editorial staff, advertising staff, travellers
and all office employees and all of fice 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
cleaners. Operatives engaged in outside work of erecting, fitting cleaners. Operatives engaged in outside work of
etc are also included, but outworkers are excluded.

Capital expenditure
Capital expend iture
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 or be
received in grants or allowances from the Government or any received in grants or allowances from the Government or any
statutory body or local authority. Establishments with 100 or stare employees were asked to include a total net capital
mexpenditure figure for expenditure figure for each calendar year.
(a) New building work
This reopresents the cost

This reopesents the cost incurred during the year of new building 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 buildings, the value of works of a capital nature carried out by the
establishments own staff and the cost of any newly constructed 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 acauired the capital cost or premium payable for leasenolds acauired
(excluding the value of assets accquired in taking over (excluding the value of assets acquired in taking over an existing
business), and the amounts receivable for freeholds or leaseholds disposed of. The
the year of return.
(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 vehicles acauired, , both new and second-hand, and the amount
received for items disposed of during the year. The value of plant
and machinery accuured includes plant, ete which firme of and machinery acquired includes plant, etc which firms produced for their own use in connection with the business coverer oy the
return. The value of plant, etc accuired is the expenditure charged to capital account during the year of return less any discounts
received, but including the cost of transport and install
 added tax on motor cars accauired is included. No deduction is
made for depreciation, amortization or obsolescence. Te made for depreciation, amortization or obsolescence. The proceeds
of items disposed of during the year exclude amounts written-off of items disposed
for items scrapped

Cost of industrial services
This includes amounts payable to other firms for work done o
materials supplied by the establishment, payments for materials supplied by the establishment, payments for repairs and maintenance lincluding those in respect of rented buildingss
and amounts paid to other firms for contracts which have been
sublet. Payments to outworkers are excluded.
Cost of non-industrial services
This includes rents of industrial and commercial buildings, hire
of plant, machinery and vehicles (excluding vehicles hired with of plant, machinery and vehicles (excluding vehicles nired, with
drivers), commercial insurance premiums, bank charges and amounts drivers), commercial insurance premiums, bank charges and amounts
paid for professional services, post office services, transport (wwithi paid for protessional services, post office services, transport (within
the United Kingdom), advertisisin etc. Amounts payable on royalties for the right to use patents, trademarks, copyrights etc, manufacturing and
also included.
Gross outpu
In the calculation of gross output the value of total sales and wort 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
sale.
Net output a customary census measure, is calculated by deducting from gross output the cost of purchases (reduced by the rise, of increased by the fall, during the year of stocks of materials etc
and the cost of industrial services received, and where applicable and the co
duties etc.
Net output per head
Net output per head
The figures of net output per head are derived by dividing the
net output by the average number of 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) part-time) on all activities covered by the returns, includin
operatives, administrative, technical and clerical employees and
and operatives, administrative, technical and clerical
working proprietors, but excluding outworkers.

Gross value added at factor cost
Gross value added at factor cost is calculated by deducting fro net output the cost of non-industrial services eg rent of buildings
hire of plant, machinery and vehicles lexcluding vehicles hired hire of plant, machinery and vehicles (excluding vehicles hired
with drivers), commercial insurance premiums, bank charges and amounts paid for professional services, post office arvichas transpo (within the United Kingdom) and addertisining, ratess (excludin
water rates) and the cost of licensing motor vehicles, This estim water rates) and the cost of licensing motor vehicles. This estima
of gross value added approaches more closely than census net output to the definition of net output or value added in nationa accounts statistics.
Gross value added at factor cost per hea
The figures of gross value added at factor cost per head are derive by dividing the gross value added by the average number persons employed (full and part-time) on all activities coverea
by the reters, includin clerical employees and working proprietors, but excluding out

Purchas
Purchases include the cost of raw materials, components, sen manufactured goods and workshop materials; of replacement parts and consumable tools not charged to capital account; of packagy
materials of all types; of stationery and printed matter; of tue electricity and water; of materials sto be used by the establishmen or given out to other establishments for the production of machiner
or other capital items for the establishment's own use; of materia for use by the establishment when working on goods supplied by
customerss and of food, etc for any canteen covered by the Tom another department of the same firm not covered by the trom doment's return are included at a cost corresponding to the
extalismed selling value recorded by the other department. Amounts
otimated extimated selling value recorded by the other department. Amounts
payable to transport firms or credited to the firm's own transport peyaale ternen for delivery of materials are excluded, as are all
department
pucheses of machinery and plant charged to caital acco depurchases of machinery and plant charged to capital account.
purchases of goods for merchanting or factoring have been 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 of packaging material charged to the establishment. The value of
returned goods or packaging material returned to supoliers and any returned joods or packaging material returned to suppliers and any
trade disounts are excluded. Materials purchased duty-paid are trad elscot their duty-paid value, lesss any drawback, rebate, etc.
includud
The cost of transport is included only if it is included with the The cost of transport is included only if it is included with the
purchase price in the firm's accounts. Imported goods are included purchase price in tel tered cost. If in the firm's accounts the transport
at thir full deliveren trom dooks or airport is not incluced in the cost of goods purchased,
cost is entered at cif plus duty (if apolicable). Leasing the cost is entered at cif plus duty (if applicable). Leasing,

Siles of goods produced
Sales for the purposes of the annual censuses means deliveries on of goods made by establishments in the United Kingom
oed 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
iccuded in the return being that adole included in the return being that adopted in the establishments'
capita asset accounts Forward sales and canteen takings are excluded. caitala asese taccounts Forward sales and canten takings are excluded.
All sles in the period of the inquiry are incluced irrespective of All sles in the period of the inquiry are included irrespective of
men 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 ergaged in production for which there are separate accounts, or to
another establishment of the same firm not covered by the return,
are teated as sales by the producing establishment and valued as arother establishment of the same firm not covered by the return,
are treated as sales by the producing establishment and valued as
faras possible as if they had been sold to an ind it ta sposible as if they had been sold to an independent purchaser.
Goods transferred to wholesale or retail selling organisations, for Goods transferred to wholesale or retail selling organisations, for
which separate accounts are kept are valued on the same basis. Whe velue shown tor sales in the "'net selling value" defined. as the
Thount (excluding VAT) charged to customers wheter and amount (excluding VAT) charged to customers whether on an
exworks or delivered basis, after any trade discounts and agents ex-wrks or delivered basis, after any trade discounts and agents'
commisions have been deducted. The cost of packing materials les alowance for returnable cases is included. In ind instries where roducts attract Excise Duty the value stated is usually inclusive
of duty if sold duty-paid and exclusive of duty if sold in of duty if sold duty-paid and exclusive of duty if sold in bond
or exported.

Receipts for work done and industrial services rendered roures for work done represent the amount charged for work
caried out on materials supplied by a customer and includ vork. Within certain industries this heading covers a wide variety of ativities, for example, within the food sector-butter packed on fur dressing and textile finishing; within printing and publishing reparatory work on type-setting, block making and binding. Work one is also significant in the electrical machinery and heavy
engineering industries, covering erection, installation and repair and iobbing work. Other activities within this heading include exploration work, research and development, glass cutting and dressing and
paraing of timber. Industrial services rendered include repairs and maintenance, insta-
lafion work, and technical research and studies for other
oranaisations. Capital goods produced for establishments' own use vera by the establ lishments' own sapitalf fort their cown coried out during the Von-industrial services rendered
Ihis inludes rents received for commercial and industrial buildings, Mounts charged for hiring out plant, machinery and vehicles and rovision of transport. It also includes amounts received for the ght to use pranseorts. It also includes amounts received for the Nd quarrving rights and technical "know-how" and revenue from
Wh staff facilities as canteens.
Cooss merchanted or factored
lechanted goods are those (
having been subjected to any manufacturing process by the seller.
Stocks and work in progress
Values are given of stocks
Valuses 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 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 which have been partially processed by the establishment but which
are not usually sold or transferred to another estabhishment wit are not usually sold or transferred to another establishment without
further processing. The values include the cost of materiats 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 consumed and labour used, together with a margin of overhead
costs and protits. Progress payments made to sub-contractors are
excluded and progress payments received from excluded and progress payments received from other organisations
are not deducted.
Wages and saries
Wages and salaries
These are amounts
These are amounts paid during the year to operatives and to
administrative, technical and clerical emper waministrative, technical and clerical employees. Payments to
working proprietors, whether called salaries or not, are excluded.
The values shown include all The values shown include all overtime opayments, bonuses, comm-
issions and hol liday pay, whether paid regularly or not and issions and holiday pay, whether paid regularly or not, and no
deduction is made for income tax, insurances, contributory pensions etc. The value of redundancy parments less any amounts reimbursed
from Government sources is included. The value of any payments from Government sources is included. The value of any payments
in kind, travelling expenses etc is excluded. in kind, t
Remuneration paid to outworkers
The remuneration paid
The remuneration paid to outworkers (ie persons employed by
the establishment who do their work in their generally on a piece-work basis. Only amounts paid to homes) is 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/or earnings related basic contributions under the Social
Security Pensions Act. 1975) and commercial insurane 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. children's and holiday homes, etc for employees, former employees and their dependants are also included.
Operating ratios
The operating rat
The operating ratios shown were obtained by dividing the estimate of the industry total for the quantity shown in the numerator by
the corresponding estimate for the quantity shown in the denominator. These estimates cor the quantity shown in the to the industry, including exempted establishments and nonrespondents. Within an industry, it is possible to compare ratios
for an individual firm with the ratios shown for the relevant industry. However, it is important to bear in mind that various factors may affect the results, for example, differences in
definitions, treatment of depreciation (which is not identified in the census data) and varying practise with regard to stock
valuation, may affect comparability in some respects.

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[^0]:    (a) The percentages relate to the numbers employed (excluding working proprietors) in the United Kingdom at mid-June, 1976,
    because 1977 information is not yet available.

