

# Production of major industrial products in August 2023 

## Content-related works

Statistics Poland, Enterprises Department

Supervised by
Katarzyna Walkowska

## Editorial team

Elżbieta Fidrych, Adam Górecki, Monika Hodzyńska, Katarzyna Korfanty-Rusiniak, Anna Kruk, Agnieszka Marczak, Anna Pazik, Krzysztof Szewczuk, Jerzy Tumiłowicz

ISSN 2720-6718

Publications available on website
http://www.stat.gov.pl

When publishing Statistics Poland data - please indicate the source

GUS

This publication contains data on the production of major products or assortment groups representing particular divisions of the Polish Classification of Goods and Services (PKWiU 2015) for Section B "Products of Mining and Quarrying" and section C "Manufacturing Products" obtained in the monthly survey.

The aim of the publication is to present changes in the production of industrial products based on data expressed in physical units of measure in particular months of the last two years. Selection of presented industrial products reflects the needs of a wide range of users, including among others, government administration, producers' associations and individual producers and scientific research institutions.

Presenting this publication we hope that the data will be a valuable source of information on production of the most significant products in Poland. At the same time, we will appreciate any comments and suggestions regarding the scope of data contained in this publication, which will allow for its better adaptation to the needs of users.

Taking the opportunity, we would like to thank all the respondents participating in the monthly survey on the production of industrial products, carried out on the P-02 form "Report on production and inventory of industrial products". Your commitment contributed to compiling this publication.

Director
of Enterprises Department
/-/ Katarzyna Walkowska
Preface .....  3
Symbols .....  5
Main abbreviations .....  6
Introduction .....  7
Executive summary ..... 8
Methodological notes ..... 15
List of tables (tables available for download in XLSX format)Table 1. Manufactured production of major industrial products in August, 2023
Table 2. Manufactured production of major products by months, 2022 and 2023
Table 3. Sold production of major products in August, 2023
Table 4. Sold production of major products by months, 2022 and 2023

## Symbols

| Symbol | Description |
| :---: | :--- |
| $(-)$ | magnitude zero |
| $(0)$ | magnitude not zero, but less than 0.5 of a unit |
| $()$. | data not available, classified data (statistical <br> confidentiality) or providing data impossible or <br> purposeless |
| $(*)$ | revised data |
| of which | indicates that not all elements of the sum are given |

## Main abbreviations

| Symbol | $\quad$ Description |
| :---: | :--- |
| Cu | copper |
| $\mathrm{dam}^{3}$ | cubic decametre |
| GWh | gigawatt-hour |
| $\mathrm{hm}^{3}$ | cubic hectometre |
| km | kilometer |
| MVA | megavolt-ampere |
| MW | megawatt |
| PLN | Polish zloty |
| thousand hectolitre of converted volume of product |  |
| with 10\% component content |  |

The survey of the production of industrial products in physical units of measure complements the survey of sold production of industry, and allows for monthly assessment of trends of domestic production. The publication contains data on manufactured production in Poland for 462 products or assortment groups representing major fields of industrial production.

The data were prepared on the basis of a monthly product survey carried out on the P-02 form "Report on production and inventory of industrial products". The survey covers enterprises manufacturing industrial products regardless of their type of business activity, with number of persons employed exceeding 49 persons.

Products or assortment groups are presented according to the PRODPOL nomenclature based on the Polish Classification of Goods and Services (PKWiU 2015) and the European PRODCOM List. In some cases, products are presented according to additional groupings, constituting the sum of selected items from the PRODPOL nomenclature. Data on manufactured production of products related to the prevention of spreading / combating COVID-19 previously presented in a separate table are included in table 1 and table 2.

Table 1 presents the data on manufactured production of products in August 2023 along with production dynamics indicators in relation to the previous month and to corresponding period of the previous year.

Table 2 presents the data on manufactured production of products retrospectively, by the months of the current and previous year.

Table 3 presents the data on sold production of products in August 2023 along with production dynamics indicators in relation to the previous month and to corresponding period of the previous year.

Table 4 presents the data on sold production of products retrospectively, by the months of the current and previous year.

Indices shown in table 1 and table 3 take account of corrections made for previous periods.
The sum of data from particular months in table 2 and table 4 does not always have to be consistent with the cumulative data (i.e. from the beginning of the year to the end of the reporting month), because minor adjustments of up to $3 \%$ at country level for a given product are taken into account only in cumulative data. Data corrected in relation to the data presented in the previous month are marked with an asterisk.

The reasons of differences that may occur between the amount of manufactured production and sold production are presented in the Methodological notes.

## Executive summary

In August 2023, the product survey carried out on the P-02 form "Report on production and inventory of industrial products" covered more than 7,000 statistical units with 50 or more persons employed that manufactured products specified in the PRODPOL nomenclature for monthly surveys in 2023.
The publication presents data on manufactured production for 462 products and assortment groups and on sold production for 308 products and assortment groups. In August 2023, manufactured production of 162 items and sold production of 118 items was higher than in August 2022. Decrease was noted on manufactured production for 285 items and on sold production for 183 items. Data on production of wheat bread; rectified spirit, seamless tubes and pipes, iron or steel reservoirs, tanks, vats and similar containers for liquids, of a capacity > 300 litres, barbed wire and barbed wire entanglements made from steel or steel wire, face masks used in medicine and soap with disinfectant properties is not published as it was not possible to obtain production data from some economic entities.

## MANUFACTURED PRODUCTION

Indicators of the dynamics of manufacturing industrial products were different in various sectors. In August 2023 in comparison to August 2022, in the divisions covering energy raw materials production decreased of e.g. lignite (by 35.7\%), petroleum oils and oils obtained from bituminous minerals (by 11.5\%). In the divisions Food products and Beverages production decreased of e.g. fruit wines (by 57.6\%), vegetable pickles (by 34.4\%), edible evaporated salt (by $34.2 \%$ ), sweetened or flavoured waters (by 32.6\%). In the divisions Wearing apparel and Leather and related products production decreased of e.g. women's or girls' trousers, overalls and shorts, not knitted (by 52.5\%), women's or girls' suits and ensembles, not knitted (by 52.0\%), women's or girls' blouses and shirts, not knitted (by 45.0\%), footwear (by 42.5\%), jerseys, pullovers, cardigans, waistcoats and similar articles, knitted or crocheted (by 42.4\%). In the divisions Wood and products of wood and Paper and paper products production decreased of e.g. assembled parquet panels of wood for mosaic floors (by 65.3\%), non-coniferous sawnwood (by 41.2\%), wooden flooring materials (by 31.0\%), other paper and paperboard for graphic purposes (by 29.7\%), wadding; other articles of wadding (by 23.2\%). In the division Chemical products production decreased of e.g. paints and varnishes, based on acrylic or vinyl polymers, weight of the solvent more than $50 \%$ (by 51.5\%), phosphatic fertilizers (by 51.3\%), 6hexanelactam (by 42.7\%), acetic acid (by 42.3\%), potassic fertilizers (by 34.8\%). In the division Rubber and plastic products production decreased of e.g. tyres for tractors (by 52.9\%), tyres for lorries and buses (by 30.6\%), plastic sacks and bags (by 20.8\%), plastic doors (by 10.4\%). In the division Other non-metallic mineral products production decreased of e.g. bricks made of clay (by $98.5 \%$ ), ceramic ridge tiles (by $91.1 \%$ ), ceramic roof tiles (by $58.9 \%$ ), bottles of coloured glass of a nominal capacity < 2,5 litres, for beverages and foodstuff (by 39.7\%), products of heat insulation of mineral wools (by $36.0 \%$ ), structural-wall tiles of calcium-silicate (by $33.8 \%$ ). In the division Basic metals production decreased of e.g. hot-rolled steel rods and bars (by 37.9\%), bronze (by 35.5\%), copper plates, sheets and strip (by 35.4\%), pig iron (by 26.3\%), cold-rolled steel sheet width 600 mm or wider (by $25.9 \%$ ). In the division Fabricated metal products production decreased of e.g. nails (by $34.9 \%$ ), chain (except articulated link chain) and parts thereof (by 30.8\%), welded grill, netting and fencing manufactured from wire of a diameter of < 3 mm (by 30.5\%), radiators for central heating of iron or steel (by $24.0 \%$ ), iron or steel reservoirs and similar containers for solids, of a capacity > 300 litres (by 22.5\%). In the divisions Computer, electronic and optical products and Electrical equipment production decreased of e.g. outside aerials for radio or television reception excluding for satellite broadcast (by 61.7\%), computers (by 54,0\%), food grinders, mixers and juice extractors (by 47.7\%), gas meters (by 39.6\%), primary cells and batteries (by 36.9\%). In the division Machinery and equipment production decreased
of e.g. pick-up straw and fodder balers (by 64.7\%), machinery for construction, road and drainage work (by 48.0\%), centrifugal pumps for liquids, excluding: pumps used in fluid power equipment, fuel, coolant, lubricant and concrete pumps (by 47.6\%), ploughs (by 42.4\%). In the divisions Motor vehicles and Other transport equipment production decreased of e.g. sea-going boats for pleasure or sports (by 65.8\%), bicycles (by 55.8\%), containers for freight transport (by 25.8\%), goods vehicles, with spark-ignition internal combustion piston engine; other goods vehicles (by 16.1\%). In the division Furniture production decreased of e.g. seats with wooden frames (by 17.2\%), kitchen furniture of wood (by 12.1\%).
In August 2023 in comparison to August 2022, production increase was recorded for, among others: : millet groats (by 301.5\%), road tractors for semi-trailers (by 250.2\%), wire of aluminium (by 163.6\%), refined sunflower-seed oil and its fractions, for human consumption; confectioned (by 151.7\%), electric motors and generators, excluding traction motors (by 137.0\%), articles of bedding of feathers or down (by 128.6\%), woven fabrics of man-made filament yarns obtained from high tenacity yarn, strip or the like (by $109.8 \%$ ), woven fabrics of cotton weighing more than $200 \mathrm{~g} / \mathrm{m} 2$ (by 100.0\%), reciprocating displacement compressors (by 99.2\%), fire-fighting vehicles (by $87.5 \%$ ), frozen salt water fish (by $81.4 \%$ ), animal or vegetable fats and oils and their fractions, hydrogenated, esterified, but not further prepared (by 73.2\%), compressors for refrigeration equipment (by 68.6\%), domestic gas cookers with an oven (by 66.5\%), citrus fruit jams, marmalades, jellies, purees or pastes, being cooked preparations (by 64.6\%), rail goods wagons (by 62.3\%), air-cooled transformers (by 59.7\%), rubberised textile fabrics, except tyre cord fabric (by $58.4 \%$ ), lead-acid accumulators working with non-liquid electrolyte, other than of a kind used for starting piston engine (by $56.0 \%$ ), jams, marmalades, fruit jellies, fruit or nut purees and pastes, being cooked preparations (by 54.4\%), rendered pork fat suitable for consumption (by $52.3 \%$ ), iron or steel reservoirs, tanks and similar containers lined or heat-insulated, for liquids, of a capacity > 300 litres (by $51.4 \%$ ), cooked or uncooked pasta stuffed with meat, fish, cheese or other substances in any proportion (by 48.2\%), women's or girls' overcoats and similar articles, not knitted (by 45.4\%), groundnuts and nuts, shelled and sunflower seeds, peeled (by 43.4\%), dried, undried and frozen pasta and pasta products (including prepared dishes) (excluding uncooked pasta, stuffed pasta) (by 42.3\%), heavy fuel oils (by 42.0\%), nitric acid (by $40.9 \%$ ), unsweetened, non-flavoured mineral and aerated waters (by $40.5 \%$ ), radio receivers of a kind used in motor vehicles (by 38.0\%).
In August 2023 in comparison to August 2022, unchanged remained the production of other polyamide tow and staple and mechanical ventilation apparatus, non-invasive.

Compared to July 2023, in August 2023 manufactured production increased for 247 products. In the divisions covering energy raw materials production increased of e.g. petroleum oils and oils obtained from bituminous minerals (by 33.1\%), natural gas (by 18.0\%). In the division Food products production increased of e.g. margarine and spreads (by 102.9\%), sugar confectionery containing cocoa (by 87.2\%), muesli type preparations based on unroasted cereal flakes (by $86.4 \%$ ), frozen salt water fish (by $80.2 \%$ ), prepared or preserved nuts (other than groundnuts); and other seeds and mixtures (by 71.3\%), dried, undried and frozen pasta and pasta products (including prepared dishes) (excluding uncooked pasta, stuffed pasta) (by 65.0\%), canned fish (by 63.6\%), frozen salt water fish fillets (by 48.0\%), tomato juice (by 31.3\%). In the divisions Wearing apparel and Leather and related products production increased of e.g. panty hose and tights (by 98.2\%), women's or girls' overcoats and similar articles, knitted or crocheted (by 63.3\%), men's or boys' trousers, overalls and shorts, not knitted (by 60.4\%), footwear with leather uppers (by 54.4\%), hosiery (by 48.2\%), waterproof footwear, with uppers in rubber or plastics (by 47.0\%), men's or boys' overcoats and similar articles, knitted or crocheted (by 39.3\%). In the divisions Wood and products of wood and Paper and paper products production increased of e.g. windows of wood (by 45.4\%), wadding; other articles of wadding (by 38.3\%), flat pallets and pallet collars of wood (by 25.7\%), toilet paper (by 18.2\%), doors of wood (by 10.8\%). In the division Chemical products production increased of e.g. nitric acid (by 103.6\%), potassic
fertilizers (by 89.8\%), nitrogenous fertilizers (by 61.9\%), phosphatic fertilizers (by 59.0\%), anhydrous ammonia (by 49.3\%), pesticides and agrochemicals used in agriculture and forestry (by $47.7 \%$ ), synthetic rubber (by $43.6 \%$ ), organic surface-active products and preparations for washing the skin; whether or not containing soap, p.r.s. (by 40.3\%), sulphuric acid (by $38.6 \%$ ). In the divisions Rubber and plastic products and Other non-metallic mineral products production increased of e.g. non-woven glass fibre webs, felts, mattresses and boards (by 85.9\%), multiple glazed units (by 28.7\%), porcelain or china tableware and kitchenware (by 15.1\%), boards, sheets and similar articles of plaster, faced or reinforced only with paper (by 12.4\%), plates, sheet, film, foil of cellular polymers of styrene (by 12.4\%), building blocks of light concrete (by $11.0 \%$ ), sheets, foil and strip, of non-cellular polymers of ethylene, not reinforced, of a thickness not exceeding 0.125 mm (by 10.1\%), float glass and surface ground glass (by 9.2\%). In the divisions Basic metals and Fabricated metal products production increased of e.g. hand tools of a kind used in agriculture, horticulture or forestry (by 71.5\%), refined unwrought lead (by 29.5\%), iron or steel reservoirs, tanks and similar containers for gases, of a capacity > 300 litres (by 28.7\%), aluminium reservoirs, tanks and similar containers for any material (other than compressed or liquefied gas), of a capacity > 300 litres (by 19.2\%), steel doors (by 14.3\%), radiators for central heating of iron or steel (by 11.3\%), pig iron (by 10.8\%), welded tubes (by $8.8 \%$ ). In the divisions Computer, electronic and optical products and Electrical equipment production increased of e.g. automatic drying machines (by 72.9\%), automatic washing and washing-drying machines (by 49.7\%), dish washing machines (by $35.2 \%$ ), vacuum cleaners (by $34.1 \%$ ), inside aerials for radio or television reception (by 33.6\%), filament lamps (by 32.9\%), refrigerators and freezers, including combined refrigerators-freezers (by $30.8 \%$ ), filament lamps for a voltage < 100 V , for general use (by $28.8 \%$ ), electric hobs for building-in (by 22.0\%). In the division Machinery and equipment production increased of e.g. reciprocating displacement compressors (by 53.7\%), ploughs (by 45.2\%), machining centres, unit construction machines and multi-station transfer machines for working metal (by 38.7\%), field sowers (by 32.8\%), compressors for refrigeration equipment (by 23.0\%), machine tools for machining metals (by 20.1\%). In the divisions Motor vehicles and Other transport equipment production increased of e.g. goods wagons (by 55.7\%), rail fire-fighting vehicles (by 25.0\%), In the division Furniture production increased of e.g. seats convertible into beds (by 43.6\%), wooden furniture for the dining-room and living-room (by 35.6\%), wooden bedroom furniture (by 15.2\%), kitchen furniture of wood (by 12.2\%).
Compared with the previous month, production decrease was recorded in August 2023 for 198 products, among others for: disinfectant wipes (by 83.7\%), woven fabrics of carded wool or carded fine animal hair (by 77.1\%), sea-going boats for pleasure or sports (by 76.5\%), pick-up straw and fodder balers (by 71.4\%), yarn of carded wool (by 69.8\%), bronze (by 68.5\%), bricks made of clay (by 66.4\%), other polyamides filament tow and staple fibres (by 60.0\%), tyres for tractors (by 52.3\%), twine, cordage, rope and cables, of jute or other textile bast fibres (by 50.8\%), tents (including caravan awnings, temporary canopies and similar articles) (by 49.7\%), single-phase current motors (by 47.5\%), footwear with rubber, plastic or leather outer soles and leather uppers, and with a protective metal toe-cap (by 47.4\%), cold-rolled steel sheet width 600 mm or wider (by 46.7\%), road tractors for semi-trailers (by 45.2\%), tyres for agricultural machinery (by 43.7\%), ball bearings (by 43.2\%), parts of therapeutic respiration apparatus (by 42.6\%), ball and roller bearings (by 42.4\%), bicycles (by 41.3\%), computers (by 40.5\%), frozen fruit and nuts (by 40.3\%), edible rock salt (by 39.8\%), oil or petrol-filters for internal combustion engines (by 38.4\%), machinery for construction, road and drainage work (by 38.3\%).
Production of antibiotics and mechanical non-invasive ventilation apparatus remained at the same level as in the previous month.

Summarizing the manufactured production in the period January-August 2023, in comparison with the corresponding period of the previous year decrease of production was recorded for 321 items, among others for: bricks made of clay (by 97.1\%), other protective face masks (by 94.2\%), toluene (by 91.1\%), food grinders, mixers and juice extractors (by 79.1\%), refined sunflower-seed
oil and its fractions, for human consumption; confectioned (by $73.0 \%$ ), vacuum pumps (by $71.3 \%$ ), structural-floor clay hollow bricks (by $66.1 \%$ ), ceramic ridge tiles (by $65.3 \%$ ), men's or boys' overcoats and similar articles, knitted or crocheted (by 59.1\%), outside aerials for radio or television reception via satellite (by 58.1\%), non-woven glass fibre webs, felts, mattresses and boards (by $56.7 \%$ ), rubber gloves (by $56.4 \%$ ), assembled parquet panels of wood for mosaic floors (by $56.2 \%$ ), filament lamps (by $55.9 \%$ ), bed linen (by $52.9 \%$ ), phosphatic fertilizers (by $51.5 \%$ ), buckwheat groats and meal (by 49.3\%), disinfectant wipes (by $48.6 \%$ ), bicycles (by $48.4 \%$ ), concrete mixers (by $46.5 \%$ ), potassic fertilizers (by $46.4 \%$ ), woven fabrics of cotton, not of yarns of different colours, weighing $\leq 200 \mathrm{~g} / \mathrm{m}^{2}$, for technical or industrial uses (by $45.8 \%$ ), sugar (by $45.1 \%$ ), woven fabrics of cotton, not of yarns of different colours, weighing $>200 \mathrm{~g} / \mathrm{m}^{2}$, for household linen or home furnishing textiles (by 45.1\%), 6-hexanelactam (by 45.0\%), women's or girls' trousers, overalls and shorts, not knitted (by 44.6\%), waterproof footwear, with uppers in rubber or plastics (by 43.1\%), non-refractory clay building bricks (by 42.7\%), footwear with uppers of textile materials (by 42.5\%).
In January - August compared with the corresponding period of the previous year, production increase was recorded for 128 products, among others for: rail goods wagons (by $63.8 \%$ ), reciprocating displacement compressors (by 63.7\%), goods vehicles, with compression-ignition internal combustion piston engine (by $61.0 \%$ ), iron or steel reservoirs, tanks and similar containers lined or heat-insulated, for liquids, of a capacity > 300 litres (by $60.0 \%$ ), animal or vegetable fats and oils and their fractions, hydrogenated, esterified, but not further prepared (by $58.6 \%$ ), lorries and road tractors for semi-trailers (by $58.2 \%$ ), groundnuts and nuts, shelled and sunflower seeds, peeled (by 54.7\%), road tractors for semi-trailers (by $51.3 \%$ ), lead-acid accumulators working with non-liquid electrolyte, other than of a kind used for starting piston engine (by $50.2 \%$ ), air-cooled transformers (by $46.0 \%$ ), women's or girls' overcoats and similar articles, not knitted (by 43.4\%), fruit, vegetable and fruit and vegetable mousses, unhomogenized (by 41.8\%), antibiotics (by 41.1\%), textile floor coverings (by 39.7\%), fire-fighting vehicles (by $38.3 \%$ ), woven fabrics of man-made filament yarns obtained from high tenacity yarn, strip or the like (by $36.2 \%$ ), compressors for refrigeration equipment (by $35.9 \%$ ), textile fabrics, impregnated, coated or covered n.e.c. (by $34.0 \%$ ), vehicle compression-ignition engines (by $33.7 \%$ ), bronze (by $33.1 \%$ ), electricity meters (by $32.5 \%$ ), rubberised textile fabrics, except tyre cord fabric (by 32.3\%), lead-acid accumulators working with liquid electrolyte, other than of a kind used for starting piston engine (by 31.3\%), woven fabrics of cotton, not of yarns of different colours, weighing > $200 \mathrm{~g} / \mathrm{m}^{2}$, for clothing (by $31.3 \%$ ), frozen salt water fish (by $30.6 \%$ ), heavy fuel oils (by 27.8\%), radio receivers of a kind used in motor vehicles (by 27.1\%), paints and varnishes, based on polyesters, weight of the solvent more than $50 \%$ (by $26.9 \%$ ).
Production of dried fruit (excluding grapes); mixtures of dried nuts and/or dried fruits and wheat flour was at the same level as in the corresponding period of the previous year.

## SOLD PRODUCTION

Indicators of the dynamics of manufacturing industrial products were different in various sectors. In August 2023 in comparison to August 2022, in the divisions covering energy raw materials production decreased of hard coal (by 10.8\%). In the divisions Food products and Beverages production decreased of e.g. sweetened or flavoured waters (by 42.5\%), canned poultry meat (by $35.8 \%$ ), vinegar (by 33.4\%), fruit wines (by 31.1\%), chocolate buttons (by 30.9\%), dried fruit (excluding grapes); mixtures of dried nuts and/or dried fruits (by 26.2\%). In the divisions Wearing apparel and Leather and related products production decreased of e.g. men's or boys' overcoats and similar articles, knitted or crocheted (by 75.4\%), women's or girls' trousers, overalls and shorts, not knitted (by 43.0\%), men's or boys' suits and ensembles, not knitted (by $33.4 \%$ ), men's or boys' shirts, not knitted (by $30.2 \%$ ), women's or girls' dresses and skirts, not knitted (by 21.7\%), waterproof footwear, with uppers in rubber or plastics (by 18.7\%), women's or girls' jackets, not knitted (by 18.5\%), women's or girls' blouses and shirts, not knitted
(by $18.2 \%$ ), footwear with uppers of textile materials (by 10.4\%). In the divisions Wood and products of wood and Paper and paper products production decreased of e.g. assembled parquet panels of wood for mosaic floors (by 66.8\%), non-coniferous sawnwood (by 32.5\%), wooden flooring materials (by $32.2 \%$ ), other paper and paperboard for graphic purposes (by 31.7\%), flat pallets and pallet collars of wood (by 26.3\%), sacks and bags of paper (by 21.4\%), doors of wood (by 17.9\%), windows of wood (by 12.9\%), paper and paperboard (by 12.6\%). In the division Chemical products production decreased of e.g. chemical fibres (by 49.2\%), paints and varnishes, based on acrylic or vinyl polymers, weight of the solvent more than $50 \%$ (by 47.7\%), sulphuric acid (by $30.2 \%$ ), synthetic calcium sulphate (by $24.2 \%$ ), disinfectants put up in forms or packings for retail sale or as preparations or articles (by 22.7\%), anhydrous ethyl alcohol (by $17.8 \%$ ), phosphatic fertilizers (by $11.7 \%$ ). In the division Rubber and plastic products production decreased of e.g. plastic sacks and bags (by 18.8\%), tyres (by 16.2\%), plastic doors (by $10.5 \%$ ). In the division Other non-metallic mineral products production decreased of e.g. bricks made of clay (by $90.5 \%$ ), ceramic roof tiles (by $61.5 \%$ ), structural-floor clay hollow bricks (by $53.2 \%$ ), ceramic ridge tiles (by $53.1 \%$ ), porcelain or china tableware and kitchenware (by $52.4 \%$ ), lime (by $36.9 \%$ ), boards, sheets and similar articles of plaster, other than faced or reinforced only with paper (by $36.5 \%$ ), double glazed units (by $32.6 \%$ ), products of heat insulation of mineral wools (by 32.6\%). In the division Basic metals production decreased of e.g. refined unwrought lead (by 44.9\%), hot-rolled steel rods and bars (by $24.6 \%$ ), steel rods and flat bars (by $21.4 \%$ ), hot rolled steel products (by $15.2 \%$ ), flat cold-rolled steel products width less than 600 mm (by $15.2 \%$ ), wire of steel (by $12.0 \%$ ). In the division Fabricated metal products production decreased of e.g. welded grill, netting and fencing manufactured from wire of a diameter of < 3 mm (by $30.2 \%$ ), nails (by $25.2 \%$ ), iron or steel reservoirs and similar containers for solids, of a capacity > 300 litres (by 19.8\%), hand tools of a kind used in agriculture, horticulture or forestry (by $16.8 \%$ ), iron or steel containers for compressed or liquefied gas (by 15.5\%). In the divisions Computer, electronic and optical products and Electrical equipment production decreased of e.g. gas meters (by $55.8 \%$ ), single-phase current motors (by $38.9 \%$ ), automatic drying machines (by $35.1 \%$ ), domestic gas cookers with an oven (by $35.1 \%$ ), nickelcadmium, nickel metal hydride, lithium-ion, lithium polymer, nickel-iron and other electric accumulators (by 28.5\%), optical fibre cables (by 27.7\%), television receivers (by 19.1\%), electric conductors, for a voltage > 1000 V (by 14.6\%), multi-phase current motors, excluding traction motors (by 13.4\%), refrigerators and freezers, including combined refrigerators-freezers (by 12.6\%). In the division Machinery and equipment production decreased of e.g. machinery for construction, road and drainage work (by 56.7\%), ploughs (by 44.4\%), centrifugal pumps for liquids, excluding: pumps used in fluid power equipment, fuel, coolant, lubricant and concrete pumps (by $39.9 \%$ ), scarifiers and cultivators (by $33.7 \%$ ), pick-up straw and fodder balers (by 29.1\%), soil machinery for agriculture and forestry (by $22.2 \%$ ), refrigerated show-cases and counters (by 20.5\%), loaders for general use in agriculture (by 16.2\%), kitchen and bathroom mixing valves (by $14.8 \%$ ), articulated link chain of iron or steel (by $14.7 \%$ ). In the divisions Motor vehicles and Other transport equipment production decreased of e.g. bicycles (by $45.9 \%$ ), seagoing boats for pleasure or sports (by 45.0\%), containers for freight transport (by 28.0\%). In the division Furniture production decreased of e.g. seats with wooden frames (by 18.8\%), kitchen furniture of wood (by 11.9\%).
Compared with the corresponding month of the previous year, production decrease was recorded for, among others: bricks made of clay (by $90.5 \%$ ), men's or boys' overcoats and similar articles, knitted or crocheted (by 75.4\%), assembled parquet panels of wood for mosaic floors (by $66.8 \%$ ), ceramic roof tiles (by 61.5\%), city/touring bicycles (by $60.7 \%$ ), machinery for construction, road and drainage work (by $56.7 \%$ ), gas meters (by $55.8 \%$ ), structural-floor clay hollow bricks (by $53.2 \%$ ), ceramic ridge tiles (by $53.1 \%$ ), porcelain or china tableware and kitchenware (by 52.4\%), first-aid boxes and kits (by 51.4\%), chemical fibres (by 49.2\%), paints and varnishes, based on acrylic or vinyl polymers, weight of the solvent more than $50 \%$ (by $47.7 \%$ ),
bicycles (by 45.9\%), sea-going boats for pleasure or sports (by 45.0\%), refined unwrought lead (by 44.9\%), ploughs (by 44.4\%), women's or girls' trousers, overalls and shorts, not knitted (by $43.0 \%$ ), sweetened or flavoured waters (by 42.5\%), centrifugal pumps for liquids, excluding: pumps used in fluid power equipment, fuel, coolant, lubricant and concrete pumps (by 39.9\%), single-phase current motors (by 38.9\%), medicaments, containing penicillins or other antibiotics (by 37.3\%), lime (by 36.9\%), boards, sheets and similar articles of plaster, other than faced or reinforced only with paper (by 36.5\%), canned poultry meat (by 35.8\%), automatic drying machines (by $35.1 \%$ ), domestic gas cookers with an oven (by $35.1 \%$ ), scarifiers and cultivators (by 33.7\%), vinegar (by 33.4\%), men's or boys' suits and ensembles, not knitted (by 33.4\%), double glazed units (by 32.6\%), products of heat insulation of mineral wools (by 32.6\%).
In comparison with the corresponding month of the previous year, production of footwear (including waterproof footwear), incorporating a protective metal toecap, with outer soles and uppers of rubber or of plastics and wadding, gauze, etc., with pharmaceutical substances, p.r.s., n.e.c. was at the same level.

Compared to July 2023, in August 2023 sold production increased for 190 products. In the division Food products production increased of e.g. wheat groats and meal (by $32.5 \%$ ), frozen salt water fish (by $30.8 \%$ ), tomato juice (by 25.1\%). In the divisions Wearing apparel and Leather and related products production increased of e.g. panty hose and tights (by 101.6\%), men's or boys' overcoats and similar articles, knitted or crocheted (by 66.9\%), footwear with uppers of textile materials (by 57.5\%). In the divisions Wood and products of wood and Paper and paper products production increased of e.g. windows of wood (by 47.4\%), fibreboard of wood or ligneous materials (by 28.5\%), toilet paper (by 8.4\%). In the divisions Coke, briquette and refined petroleum products and Chemical products production increased of e.g. sodium hydroxide in aqueous solution (by 101.1\%), lubricating petroleum oils and heavy preparations n.e.c. (by $30.1 \%$ ), nitrogenous fertilizers (by 23.5\%), toilet waters (by 13.1\%). In the division Rubber and plastic products production increased of e.g. plates, sheet, film, foil of cellular polymers of styrene (by 17.7\%), rigid tubes, pipes and hoses of polymers of vinyl chloride (by 9.5\%), plastic doors (by 6.3\%). In the division Other non-metallic mineral products production increased of e.g. multiple glazed units (by 29.3\%), structural-wall clay hollow bricks (by 22.1\%), non-refractory clay building bricks (by 21.8\%), building bituminous felt (by 14.5\%). In the division Basic metals production increased of e.g. refined unwrought lead (by 52.6\%), cold-rolled steel sheet width 600 mm or wider (by 11.2\%), copper wire (by $6.9 \%$ ). In the division Fabricated metal products production increased of e.g. hand tools of a kind used in agriculture, horticulture or forestry (by 79.3\%), hand saws; blades for saws of all kinds (by 16.1\%), aluminium windows (by 6.4\%). In the divisions Computer, electronic and optical products and Electrical equipment production increased of e.g. automatic washing and washing-drying machines (by 33.8\%), dish washing machines (by 31.2\%), electricity meters (by 18.4\%). In the division Machinery and equipment production increased of e.g. kitchen and bathroom mixing valves (by 32.5\%), ploughs (by 26.0\%), hydraulic pumps (by 11.3\%). In the division Furniture production increased of e.g. wooden furniture for the dining-room and living-room (by 40.6\%), seats convertible into beds (by 37.1\%). Compared with the previous month, production decrease was recorded for 111 products, among others for: sea-going boats for pleasure or sports (by 55.8\%), gas meters (by 55.6\%), city/touring bicycles (by 52.4\%), pick-up straw and fodder balers (by 50.4\%), medicaments, containing penicillins or other antibiotics (by 45.7\%), structural-floor clay hollow bricks (by 45.6\%), sweetened or flavoured waters (by 36.6\%), women's or girls' blouses and shirts, not knitted (by 36.4\%), public transport vehicles (by 32.9\%), bricks made of clay (by 30.1\%), syringes, with or without needles (by 28.9\%), single-phase current motors (by 25.6\%), containers for freight transport (by 25.4\%), passenger cars (by 25.2\%), sulphuric acid (by $25.0 \%$ ), non-alcoholic beer (by 24.6\%), assembled parquet panels of wood for mosaic floors (by 22.4\%), electric ovens for building-in (by 19.4\%), internal combustion engines for vehicles (by 19.2\%), ceramic sanitary fixtures (by 18.5\%), liquid buttermilk (by 18.0\%).

Production of edible evaporated salt and first-aid boxes and kits remained at the same level as in the previous month.

In January - August 2023 compared with the corresponding period of the previous year, production increase was recorded for 90 products, among others for: women's or girls' overcoats and similar articles, knitted or crocheted (by 84.3\%), electric conductors, for a voltage $\leq 1000 \mathrm{~V}$, fitted with connectors (by 70.5\%), rail goods wagons (by 63.4\%), rusks, toasted bread and similar toasted products (by 59.5\%), air-cooled transformers (by 43.9\%), motor oils (by 43.2\%), vehicle compression-ignition engines (by 37.7\%), panty hose and tights (by 30.1\%), crude rape and colza oil and their fractions, for human consumption (by $26.2 \%$ ), electricity meters (by 25.4\%), prepared meals and dishes based on meat (by 23.7\%), cash registers (by 23.3\%), fruit, vegetable and fruit and vegetable mousses, unhomogenized (by 20.0\%), polyurethane adhesives (by $18.5 \%$ ), hand towels of paper pulp, paper, cellulose wadding or webs of cellulose fibres (by 18.1\%), medicaments, containing penicillins or other antibiotics (by 15.7\%), passenger cars (by 14.7\%).
In January - August compared with the corresponding period of the previous year, production decrease was recorded for 212 products, among others for: bricks made of clay (by 93.3\%), ceramic ridge tiles (by $58.9 \%$ ), men's or boys' overcoats and similar articles, knitted or crocheted (by 58.8\%), assembled parquet panels of wood for mosaic floors (by 55.9\%), single-phase current motors (by 50.7\%), ceramic roof tiles (by 48.1\%), phosphatic fertilizers (by $42.6 \%$ ), building blocks of light concrete (by 40.3\%), products of heat insulation of mineral wools (by $39.5 \%$ ), wooden flooring materials (by 38.6\%), waterproof footwear, with uppers in rubber or plastics (by 38.4\%), rotary displacement compressors (by 38.4\%), potassic fertilizers (by 37.1\%), chemical fibres (by 36.0\%), buckwheat groats and meal (by 35.4\%), structural-wall clay hollow bricks (by 34.6\%), automatic drying machines (by 33.8\%), other paper and paperboard for graphic purposes (by 33.2\%), nails (by 32.5\%), city/touring bicycles (by 32.1\%), flat pallets and pallet collars of wood (by 31.3\%), domestic gas cookers with an oven (by 30.9\%).

## Methodological notes

The data were compiled on the basis of a monthly survey of production of industrial products on the P-02 form "Report on production and inventory of industrial products". In case of electricity, the data are derived from specialist surveys conducted by Minister responsible for energy and the President of Energy Regulatory Office.

Data are collected according to groupings indicated in the PRODPOL nomenclature for monthly surveys in the reporting year. The nomenclature is based on the Polish Classification of Goods and Services (PKWiU 2015) - introduced on January 1, 2016 for use in statistics, registration, documentation and accounting, and also in official registers and public administration information systems (Regulation of the Council of Ministers of 4 September 2015, Journal of Laws, item 1676) and on the PRODCOM List used in the European Union.

## 1. Scope of units and products surveyed

The monthly survey covers legal entities, organizational units without legal personality (excluding budgetary units and establishments) and natural persons conducting business activities, with the number of persons employed exceeding 49. Units producing electricity are included in the survey regardless of the number of persons employed. The survey applies to all business entities which manufacture products specified in the PRODPOL nomenclature for a given reporting year, regardless of the kind of economic activity classified according to the Polish Classification of Activities (PKD 2007).

The survey of production of industrial products does not include the following units:

- trade units, which ordered the manufacture of goods in a production company and did not provide raw materials for the manufacture of these goods,
- running only publishing activities and not directly involved in the printing preparation process or printing process,
- engaged only in activities related to the production of films, video recordings, television programs, sound and music recordings and not directly involved in the process of reproduction of sound recordings, video recordings or reproduction of computer storage media.

The survey provides data on the quantity of production of finished products manufactured on own account or under subcontracting, from material provided by the principal, as of the end of the reporting month. The processing or modification of a purchased product, which did not change the characteristics of its use and purpose, is not considered as production.

The basic principle in determining the quantity of production is its homogeneity which allows aggregation of particular product ranges.

In order to obtain comparable data on the production of industrial products, the PRODPOL nomenclature is used. It contains a list of products with the symbol and the name of the product or assortment group and assigned to them units of measure in which production should be reported. This allows the units to report the data on production of products which belong to the same category but are traded under different own names, in one PRODPOL grouping under the same name and in the same unit of measure.

The PRODPOL nomenclature is compliant at six-digit level with the PKWiU 2015 classification and at eight-digit level with the PRODCOM List. 10- and 12-digit groupings result from the demands reported by domestic users. The PRODPOL nomenclature is updated annually and is available on the Statistics Poland website
https://stat.gov.pl/Klasyfikacje/doc/prodpol/opis mc2023.html.

It is very important to determine the unit of measurement for each grouping that corresponds to physical characteristics and intended use of particular type of product.

In most cases, the data is collected in the physical units of measure. For non-homogeneous product groupings, if they have at least one common feature defining their properties, conventional units of measure are used. A typical example of the use of conventional units of measure are chemical products in which the quantity is expressed in terms of pure ingredient. For groupings containing products of considerable diversity, e.g. pharmaceutical products, it is not possible to use physical units of measure. In this case, data are collected only on the value of sold production in current prices expressed in thousands zloty.
In cases where one unit of measure does not specify sufficiently the functional features of a given product as well as the volume of its production, several units of measure are used at the same time.

Differences between manufactured production and sold production in the monthly surveys result from the fact that:

- products can be produced for stock and sold in the following reporting periods, e.g. due to the seasonal availability of raw materials for production (e.g. frozen vegetables), increased seasonal sales of certain products (e.g. mineral waters, beer in the summer), in connection with planned holidays or downtime for maintenance,
- products can be sold from stock,
- the products were manufactured under subcontracting, and the contractor or principal is not covered by the P-02 surveys (this especially applies to products from the Wearing apparel division),
- some products may be manufactured by enterprises for their own purposes and used in the further production of other products, therefore they do not appear in the course of trade or appear only in small quantities (this applies especially to basic chemicals).

Monthly data on production of industrial products may be subject to monthly revisions up to 14 months after the end of the reporting year. The revisions result from the specificity of the survey of production of industrial products related to difficulties in classifying certain products to relevant headings of PRODPOL nomenclature and to short period for preparing monthly data by reporting units.

## 2. Explanation of basic concepts

Manufactured production is the result of manufacturing processes mutually interrelated and conditioned, occurring at a given time.

Manufactured production includes the total quantity of finished products produced in the reporting period, both from manufacturer's own raw material and from raw material provided by another enterprise or natural person. It also includes the total volume of semi-finished products, parts, sets of machinery and equipment, regardless of whether they were intended for sale or to the parent company, to other plants of the same company, or intended for further processing (assembly) in the enterprise. Therefore, manufactured products include products manufactured by the enterprise, meeting certain standards, technical conditions or contractual terms concluded between the contractor and the recipient. Products made of secondary raw material are considered as production, if they are of utility and are a direct result of the manufacturing work of the enterprise. The production also includes the so-called by-products, created in the production process simultaneously with the main product.

Sold production of industrial products is the quantity and value of products of own production or production ordered in another enterprise from provided materials, sold outside of the enterprise in the reporting period, regardless of the moment of their production.

Production under subcontracted operations is the production made on order by the contractor, from materials provided by the ordering company (principal).

Finished products are products that are not further processed within the same enterprise in which they were produced, that means products completely finished and completed, after passing the entire production process. Finished products should comply with certain standards, and in case of lack of such requirements - with specifications or contractual conditions concluded between the manufacturer and the recipient.

