



Warsaw 2022

Production of major industrial products in September 2022



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Content-related works

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Preface

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

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Symbols

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

Main abbreviations

Symbol	Description
Cu	copper
dam ³	cubic decametre
GWh	gigawatt-hour
hm ³	cubic hectometre
km	kilometer
MVA	megavolt-ampere
MW	megawatt
PLN	Polish zloty
thousand hectolitre 10%	thousand hectolitre of converted volume of product with 10% component content

Introduction

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 324 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.

Table 1 presents the data on manufactured production of products in September 2022 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 September 2022 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.

Table 5 presents the data on manufactured production of products related to the prevention of spreading / combating COVID-19 by the months, 2022.

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 September 2022, 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 2022.

The publication presents data on manufactured production for 324 products and assortment groups and on sold production for 233 products and assortment groups. In September 2022, manufactured production of 105 items and sold production of 78 items was higher than in September 2021. Decrease was noted on manufactured production for 216 items and on sold production for 150 items. Data on production of rugs and plastic sacks and bags 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 September 2022 in comparison to September 2021**, in the divisions covering energy raw materials production decreased of petroleum oils and oils obtained from bituminous minerals (by 18.4%), hard coal (by 15.2%). In the division *Food products* production decreased of sugar confectionery containing cocoa (by 31.0%), buckwheat groats and meal (by 28.9%), rendered pork fat suitable for consumption (by 19.0%), liquid buttermilk (by 18.3%). In the divisions *Wearing apparel* and *Leather and related products* production decreased of women's or girls' trousers, overalls and shorts (by 38.9%), women's or girls' overcoats and similar articles (by 20.8%), men's or boys' shirts (by 14.6%), footwear with leather uppers (by 13.5%). In the division *Wood and products of wood* production decreased of fibreboard of wood or ligneous materials (by 35.9%), doors of wood (by 32.8%), particle and similar boards of wood and ligneous materials (by 32.0%), assembled parquet panels of wood for mosaic floors (by 27.4%). In the division *Chemical products* production decreased of oleum (by 82.2%), nitric acid (by 75.0%), anhydrous ammonia (by 74.2%), sodium hydroxide, solid (by 61.9%). In the division *Rubber and plastic products* production decreased of tyres for tractors (by 38.8%), rigid tubes, pipes and hoses of polymers of vinyl chloride (by 34.7%), rigid tubes, pipes and hoses of polymers of ethylene (by 22.5%), rigid tubes, pipes and hoses of polymers of propylene (by 22.1%). In the division *Other non-metallic mineral products* production decreased of ceramic ridge tiles (by 44.1%), structural-wall tiles of calcium-silicate (by 26.0%), lime (by 25.8%). In the division *Basic metals* production decreased of brass (by 65.9%), wire of aluminium (by 53.5%), cold-rolled steel sheet width 600 mm or wider (by 52.6%), flat bars, rods and profiles of aluminium (by 33.0%). In the division *Fabricated metal products* production decreased of radiators for central heating of iron or steel (by 55.8%), cans other than for preserving food and drink of iron or steel, of a capacity < 50 l (by 39.0%), aluminium windows (by 21.2%). In the division *Electrical equipment* production decreased of food grinders, mixers and juice extractors (by 91.1%), vacuum cleaners (by 60.0%), domestic gas cookers with an oven (by 51.3%). In the division *Machinery and equipment* production decreased of scarifiers and cultivators (by 54.8%), loaders for general use in agriculture (by 53.9%), field sowers (by 47.1%), cash registers (by 45.5%). In the division *Other transport equipment* production decreased of rail goods wagons (by 40.6%), city/touring bicycles (by 25.0%). In the division *Furniture* production decreased of wooden furniture for the dining-room and living-room (by 28.2%), kitchen furniture of wood (by 25.9%). Compared with the corresponding month of the previous year, in September 2022, production increase was recorded for, among others: edible rock salt (by 181.5%), lorries and road tractors for semi-trailers (by 118.3%), vehicle compression-ignition engines (by 115.4%), polyurethane adhesives (by 100.7%), machinery for construction, road and drainage work (by 88.6%), non-alcoholic beer (by 88.1%), toilet waters (by 82.1%), public transport vehicles (by 80.8%), telephone sets, excluding cellular phones (by 79.0%), canned beef and veal meat (by 64.5%), air-

cooled transformers (by 60.3%), men's or boys' overcoats and similar articles (by 59.1%), basic pharmaceutical products (by 49.7%), prepared meals and dishes based on meat (by 46.4%), sea-going boats for pleasure or sports (by 38.5%), phenol (by 37.3%), women's or girls' suits and ensembles (by 37.2%), multi-phase current motors, excluding traction motors (by 37.0%), apple juice (by 31.8%), sanitary towels and similar articles of paper pulp, paper and cellulose wadding (by 31.8%), soap and organic surface-active products and preparations for use as soap; (by 26.7%), agricultural tractors (by 26.1%), ceramic roof tiles (by 24.8%), welded tubes (by 23.4%), footwear (by 22.8%), soups and broths and preparations therefor (by 21.0%), boards, sheets and similar articles of plaster, other than faced or reinforced with paper only (by 20.3%). In comparison with September of the previous year, production of machining centres, unit construction machines and multi-station transfer machines for working metal was at the same level.

Compared to August 2022, in September 2022 manufactured production increased for 181 products. In the division *Food products* production increased of apple juice (by 131.6%), soups and broths and preparations therefor (by 95.0%), canned beef and veal meat (by 59.8%), frozen vegetables (by 45.8%), frozen salt water fish (by 42.9%). In the divisions *Wearing apparel* and *Leather and related products* production increased of men's or boys' jackets and blazers (by 67.9%), women's or girls' suits and ensembles (by 49.4%), leather of bovine animals (by 48.6%). In the divisions *Wood and products of wood* and *Paper and paper products* production increased of veneers (by 74.2%), assembled parquet panels of wood other than for mosaic floors (by 26.9%), fluting paper (by 18.1%), wooden flooring materials (by 17.5%). In the divisions *Coke, briquette and refined petroleum products* and *Chemical products* production increased of light fuel oils (by 149.0%), chemical fibres (by 45.7%), soap and organic surface-active products and preparations for use as soap (by 39.5%). In the division *Rubber and plastic products* production increased of tyres for agricultural machinery (by 114.3%), tubes, pipes and hoses of vulcanised rubber other than hard rubber (by 55.2%), tyres for tractors (by 44.0%), tyres for passenger cars (by 35.9%). In the division *Other non-metallic mineral products* production increased of building bituminous felt (by 22.7%), gypsum plasters (by 21.5%), non-woven glass fibre webs, felts, mattresses and boards (by 14.1%). In the divisions *Computer, electronic and optical products* and *Electrical equipment* production increased of domestic gas cookers with an oven (by 169.4%), gas-electric cookers (by 58.0%), electric ovens for building-in (by 50.7%), single-phase current motors (by 48.1%), television receivers (by 44.8%), water meters (by 44.0%). In the division *Machinery and equipment* production increased of concrete mixers (by 195.5%), pick-up straw and fodder balers (by 106.5%), oil or petrol-filters for internal combustion engines (by 81.8%), ball bearings (by 81.5%), agricultural tractors (by 61.0%), machinery for construction, road and drainage work (by 41.2%). In the division *Motor vehicles* production increased of public transport vehicles (by 92.4%), vehicle compression-ignition engines (by 69.4%), lorries and road tractors for semi-trailers (by 63.5%).

Compared with the previous month, production decrease was recorded for 138 products, among others for: 6-hexanelactam (by 99.1%), oleum (by 81.6%), polyvinyl chloride not mixed with any other substances (by 60.9%), nitric acid (by 60.6%), anhydrous ammonia (by 59.9%), ammonia in aqueous solution (by 59.0%), sodium hydroxide, solid (by 53.6%), ceramic ridge tiles (by 51.8%), frozen fruit and nuts (by 50.2%), petroleum oils and oils obtained from bituminous minerals (by 48.1%), nitrogenous fertilizers (by 46.9%), rail goods wagons (by 43.1%), vegetable pickles (by 42.7%), liquid buttermilk (by 39.8%), food grinders, mixers and juice extractors (by 37.7%), sodium hydroxide in aqueous solution (by 35.5%), paints and varnishes, based on acrylic or vinyl polymers, weight of the solvent more than 50% (by 33.7%), cold-rolled steel sheet width 600 mm or wider (by 32.9%).

In comparison with previous month, production of canned fish was at the same level.

Summarizing the production in the period January-September 2022, with the corresponding period of the previous year, production increase was recorded for 156 products. In the divisions covering energy raw materials production increased of lignite (by 7.7%). In the division *Food products* production increased of prepared meals and dishes based on meat (by 48.1%), barley groats and meal (by 45.3%), buckwheat groats and meal (by 41.1%), edible rock salt (by 39.5%), canned poultry meat (by 37.1%). In the division *Wearing apparel* production increased of women's or girls' suits and ensembles (by 114.8%), men's or boys' overcoats and similar articles (by 77.0%), men's or boys' shirts (by 22.7%), men's or boys' suits and ensembles (by 20.6%). In the division *Paper and paper products* production increased of sanitary towels and similar articles of paper pulp, paper and cellulose wadding (by 38.9%), toilet paper (by 17.7%), napkins and napkin liners for babies (by 15.1%). In the division *Chemical products* production increased of butadiene-1,3 (by 78.7%), polyethylene (by 62.5%), ethylene (by 60.2%), polyvinyl chloride not mixed with any other substances (by 48.7%), propylene (by 41.5%), polyurethane adhesives (by 28.2%), toilet waters (by 28.2%). In the division *Other non-metallic mineral products* production increased of non-woven glass fibre webs, felts, mattresses and boards (by 33.7%), ceramic ridge tiles (by 25.6%), ceramic roof tiles (by 15.6%). In the division *Fabricated metal products* production increased of food cans of tins (by 20.5%), conductors not electrically insulated (by 11.1%), steel doors (by 9.9%). In the divisions *Computer, electronic and optical products* and *Electrical equipment* production increased of telephone sets, excluding cellular phones (by 35.4%), air-cooled transformers (by 32.5%), multi-phase current motors, excluding traction motors (by 20.6%). In the division *Machinery and equipment* production increased of agricultural tractors (by 36.5%), machinery for construction, road and drainage work (by 29.1%), machining centres, unit construction machines and multi-station transfer machines for working metal (by 13.8%). In the divisions *Motor vehicles* and *Other transport equipment* production increased of sea-going boats for pleasure or sports (by 37.1%), vehicle compression-ignition engines (by 28.4%), bicycles (by 23.6%).

In January-September 2022 compared with the corresponding period of the previous year, production decrease was recorded for 166 products. In the divisions covering energy raw materials production decreased of petroleum oils and oils obtained from bituminous minerals (by 6.0%), hard coal (by 3.1%). In the divisions *Food products* and *Beverages* production decreased of frozen salt water fish (by 13.7%), sugar confectionery containing cocoa (by 8.9%), rendered pork fat suitable for consumption (by 8.8%), fruit wines (by 7.7%). In the divisions *Wearing apparel* and *Leather and related products* production decreased of footwear with leather uppers (by 30.3%), unsplit bovine leather for shoes (by 29.0%), women's or girls' overcoats and similar articles (by 23.8%), hosiery (by 19.2%). In the division *Wood and products of wood* production decreased of particle and similar boards of wood and ligneous materials (by 17.7%), assembled parquet panels of wood for mosaic floors (by 17.4%), doors of wood (by 16.6%), veneers (by 11.9%). In the division *Chemical products* production decreased of acetic acid (by 53.3%), paints and varnishes, based on acrylic or vinyl polymers, weight of the solvent more than 50% (by 44.8%), toluene (by 29.1%), phosphatic fertilizers (by 27.1%), sodium hydroxide, solid (by 23.6%). In the division *Rubber and plastic products* production decreased of rigid tubes, pipes and hoses of polymers of vinyl chloride (by 15.1%), tyres for tractors (by 15.0%), plastic doors (by 9.8%), plastic boxes, cases, crates (by 9.5%). In the division *Other non-metallic mineral products* production decreased of bricks made of clay (by 13.2%), lime (by 7.4%), factory made mortars (by 6.7%), gypsum plasters (by 5.7%). In the division *Basic metals* production decreased of brass (by 81.3%), bronze (by 50.6%), cold-rolled steel sheet width 600 mm or wider (by 18.5%), wire of aluminium (by 14.1%). In the divisions *Computer, electronic and optical products* and *Electrical equipment* production decreased of food grinders, mixers and juice extractors (by 63.8%), domestic gas cookers with an oven (by 57.6%), LED light bulbs (by 56.6%), radio receivers of a kind used in motor vehicles (by 40.1%). In the division *Machinery and equipment* production decreased of cash registers (by 58.1%), concrete mixers (by 29.9%),

loaders for general use in agriculture (by 21.2%). In the division *Motor vehicles* production decreased of passenger cars (by 8.3%), containers for freight transport (by 7.9%). In the division *Furniture* production decreased of wooden furniture for the dining-room and living-room (by 12.5%), kitchen furniture of wood (by 10.9%).

SOLD PRODUCTION

Indicators of the dynamics of sold industrial products were different in various sectors. **In September 2022 in comparison to September 2021**, in the divisions covering energy raw materials production decreased of hard coal (by 27.1%). In the division *Food products* production decreased of rendered pork fat suitable for consumption (by 33.6%), fresh or chilled pig meat (by 27.8%), sugar confectionery containing cocoa (by 26.8%), vegetable pickles (by 23.1%). In the division *Wearing apparel* production decreased of women's or girls' trousers, overalls and shorts (by 36.3%), men's or boys' suits and ensembles (by 26.6%), panty hose and tights (by 24.3%). In the division *Wood and products of wood* production decreased of doors of wood (by 38.8%), veneers (by 37.8%), non-coniferous sawnwood (by 29.6%), fibreboard of wood or ligneous materials (by 26.0%), assembled parquet panels of wood other than for mosaic floors (by 25.9%). In the division *Chemical products* production decreased of nitrogenous fertilizers (by 60.6%), paints and varnishes, based on acrylic or vinyl polymers, weight of the solvent more than 50% (by 60.3%), hair care products (by 43.1%), phosphatic fertilizers (by 42.0%), potassic fertilizers (by 38.4%), paints and varnishes other than colodium containing in solution more than 50% of solvent by weight (by 33.6%). In the division *Other non-metallic mineral products* production decreased of bricks made of clay (by 60.7%), ceramic ridge tiles (by 39.9%), lime (by 36.4%), calcium-silicate brick (by 36.2%), structural-wall clay hollow bricks (by 31.0%), structural-floor clay hollow bricks (by 28.6%), float glass and surface ground glass (by 20.2%). In the division *Fabricated metal products* production decreased of cans other than for preserving food and drink of iron or steel, of a capacity < 50 l (by 30.9%), aluminium windows (by 23.7%). In the divisions *Computer, electronic and optical products* and *Electrical equipment* production decreased of vacuum cleaners (by 59.8%), domestic gas cookers with an oven (by 59.6%), single-phase current motors (by 58.1%), electric cookers including gas-electric cookers (by 45.4%), electric ovens for building-in (by 30.9%), gas meters (by 30.8%). In the division *Machinery and equipment* production decreased of scarifiers and cultivators (by 54.1%), field sowers (by 42.7%), loaders for general use in agriculture (by 41.6%), pick-up straw and fodder balers (by 40.8%). In the divisions *Motor vehicles* and *Other transport equipment* production decreased of rail goods wagons (by 52.8%), containers for freight transport (by 17.2%).

Compared with the corresponding month of the previous year, production increase was recorded for, among others: vehicle compression-ignition engines (by 162.3%), polyurethane adhesives (by 107.8%), public transport vehicles (by 86.3%), special fabrics including pile fabrics and terry towelling (by 70.5%), air-cooled transformers (by 56.6%), soups and broths and preparations therefor (by 56.3%), toilet waters (by 55.6%), basic pharmaceutical products (by 49.7%), sanitary towels and similar articles of paper pulp, paper and cellulose wadding (by 42.5%), bottles of coloured glass of a nominal capacity < 2,5 litres, for beverages and foodstuff (by 37.2%), passenger cars (by 36.6%), prepared meals and dishes based on meat (by 30.6%), machinery for construction, road and drainage work (by 29.6%), multi-phase current motors, excluding traction motors (by 29.3%), napkins and napkin liners for babies (by 27.1%), buckwheat groats and meal (by 26.2%).

Compared to August, in September 2022 sold production increased for 139 products. In the divisions *Food products* and *Beverages* production increased of frozen salt water fish fillets (by 116.8%), frozen salt water fish (by 81.0%), soups and broths and preparations therefor (by 59.6%), apple juice (by 31.0%), buckwheat groats and meal (by 29.9%), vodka (by 23.9%), margarine and spreads (by 21.3%), edible evaporated salt (by 19.8%), pasta (by 18.2%). In the

divisions *Wearing apparel* and *Leather and related products* production increased of panty hose and tights (by 71.7%), footwear (by 37.4%), men's or boys' jackets and blazers (by 34.5%). In the divisions *Wood and products of wood* and *Paper and paper products* production increased of veneers (by 122.1%), wooden flooring materials (by 22.3%), coniferous sawnwood (by 18.0%), particle and similar boards of wood and ligneous materials (by 17.7%), fluting paper (by 16.5%), corrugated paperboard (by 14.4%). In the division *Chemical products* production increased of toilet waters (by 35.5%), sulphuric acid (by 31.6%), soap and organic surface-active products and preparations for use as soap; (by 25.0%), polyurethane adhesives (by 22.9%), pesticides (by 14.8%), glues (by 10.8%). In the division *Rubber and plastic products* production increased of rubber products (by 25.3%), plastic floor, wall, ceiling coverings (by 18.6%), tyres (by 17.6%), plastic windows (by 16.2%), rigid tubes, pipes and hoses of polymers of vinyl chloride (by 12.1%). In the division *Other non-metallic mineral products* production increased of structural-wall clay hollow bricks (by 33.8%), ceramic tiles and flags (by 23.8%), gypsum plasters (by 14.9%), building bituminous felt (by 12.9%), ceramic sanitary fixtures (by 12.6%), double glazed units (by 10.4%), building blocks of light concrete (by 10.0%). In the division *Basic metals* production increased of copper and copper alloy bars, rods and profiles (by 18.6%), sheets and strips of non-alloy steel coated with zinc (by 15.9%), cold-rolled steel sheet width 600 mm or wider (by 14.4%), wire of steel (by 11.9%). In the division *Fabricated metal products* production increased of steel doors (by 18.5%), aluminium windows (by 12.0%), food cans of tinsplate (by 7.9%). In the divisions *Computer, electronic and optical products* and *Electrical equipment* production increased of electric ovens for building-in (by 46.4%), gas meters (by 45.2%), electric cookers including gas-electric cookers (by 33.9%), television receivers (by 33.3%), multi-phase current motors, excluding traction motors (by 27.1%), domestic gas cookers with an oven (by 26.7%), lead-acid accumulators for motor vehicles (by 24.9%), air-cooled transformers (by 24.7%). In the division *Machinery and equipment* production increased of cash registers (by 109.2%), pick-up straw and fodder balers (by 29.1%), machinery for construction, road and drainage work (by 23.9%). In the divisions *Motor vehicles* and *Other transport equipment* production increased of public transport vehicles (by 90.4%), vehicle compression-ignition engines (by 47.3%), passenger cars (by 14.4%), city/touring bicycles (by 12.7%).

Compared with the previous month, production decrease was recorded for 89 products, among others for: non-alcoholic beer (by 50.3%), rail goods wagons (by 49.1%), liquid buttermilk (by 38.0%), vacuum cleaners (by 35.3%), men's or boys' suits and ensembles (by 33.8%), nitrogenous fertilizers (by 32.9%), vinegar (by 32.1%), unsweetened, non-flavoured mineral and aerated waters (by 30.9%), phosphatic fertilizers (by 29.5%), lime (by 27.1%), vegetable pickles (by 26.4%), calcium-silicate brick (by 24.1%), men's or boys' shirts (by 22.5%), beer (by 22.3%), potassic fertilizers (by 20.6%), frozen fruit and nuts (by 20.3%), canned poultry meat (by 19.9%), refined unwrought lead (by 18.6%), doors of wood (by 17.8%), sodium hydroxide in aqueous solution (by 16.7%), fresh or chilled pig meat (by 16.1%), sugar confectionery containing cocoa (by 15.7%), ceramic ridge tiles (by 15.1%), ceramic roof tiles (by 14.5%), products of heat insulation of mineral wools (by 14.4%), scarifiers and cultivators (by 14.3%).

In January - September 2022 compared with the corresponding period of the previous year, production increase was recorded for 107 products. In the division *Food products* production increased of prepared meals and dishes based on meat (by 37.1%), barley groats and meal (by 31.7%), canned poultry meat (by 31.5%), buckwheat groats and meal (by 28.4%), edible evaporated salt (by 17.0%), apple juice (by 16.3%), wheat bread (by 13.6%), chocolate (by 13.5%), margarine and spreads (by 13.5%), wheat groats and meal (by 13.0%). In the division *Wearing apparel* production increased of men's or boys' jackets and blazers (by 17.0%), men's or boys' shirts (by 14.6%), men's or boys' trousers, overalls and shorts (by 12.4%). In the division *Paper and paper products* production increased of sanitary towels and similar articles of paper pulp, paper and cellulose wadding (by 40.1%), napkins and napkin liners for babies (by 27.2%), toilet paper (by 16.9%). In the divisions *Coke, briquette and refined petroleum products* and *Chemical*

products production increased of sodium hydroxide in aqueous solution (by 32.3%), synthetic calcium sulphate (by 28.3%), polyurethane adhesives (by 27.0%), toilet waters (by 25.0%), diesel oils (by 12.3%). In the division *Other non-metallic mineral products* production increased of boards, sheets and similar articles of plaster, other than faced or reinforced with paper only (by 12.0%), multiple glazed units (by 9.8%), porcelain or china tableware and kitchenware (by 8.8%). In the division *Fabricated metal products* production increased of food cans of tinplate (by 21.3%), aluminium doors (by 9.9%). In the divisions *Computer, electronic and optical products* and *Electrical equipment* production increased of air-cooled transformers (by 29.5%), multi-phase current motors, excluding traction motors (by 18.2%), single-phase current motors (by 16.0%). In the divisions *Motor vehicles* and *Other transport equipment* production increased of vehicle compression-ignition engines (by 37.3%), sea-going boats for pleasure or sports (by 30.5%).

In January - September 2022 compared with the corresponding period of the previous year, production decrease was recorded for 121 products. In the divisions covering energy raw materials production decreased of hard coal (by 5.5%). In the divisions *Food products* and *Beverages* production decreased of frozen salt water fish (by 22.8%), rendered pork fat suitable for consumption (by 14.1%), vegetable pickles (by 13.2%), sugar confectionery containing cocoa (by 12.9%), fresh or chilled pig meat (by 12.2%). In the divisions *Wearing apparel* and *Leather and related products* production decreased of leather of bovine animals (by 28.1%), panty hose and tights (by 19.6%), women's or girls' trousers, overalls and shorts (by 16.1%), footwear (by 13.6%). In the division *Wood and products of wood* production decreased of non-coniferous sawnwood (by 24.3%), assembled parquet panels of wood other than for mosaic floors (by 15.8%), doors of wood (by 15.7%), veneers (by 15.0%), coniferous sawnwood (by 11.9%), assembled parquet panels of wood for mosaic floors (by 11.6%). In the division *Chemical products* production decreased of paints and varnishes, based on acrylic or vinyl polymers, weight of the solvent more than 50% (by 42.3%), nitrogenous fertilizers (by 27.7%), potassic fertilizers (by 24.8%), phosphatic fertilizers (by 24.5%), paints and varnishes, based on acrylic or vinyl polymers in an aqueous medium (by 21.5%), paints and varnishes other than colodion containing in solution more than 50% of solvent by weight (by 19.9%), liquefied propane and butane (by 18.6%), pesticides (by 14.9%). In the division *Rubber and plastic products* production decreased of rigid tubes, pipes and hoses of polymers of vinyl chloride (by 12.6%), plastic doors (by 9.8%). In the division *Other non-metallic mineral products* production decreased of structural-wall clay hollow bricks (by 18.7%), ceramic tiles and flags (by 13.0%), structural-floor clay hollow bricks (by 12.8%), boards, sheets and similar articles of plaster, faced or reinforced with paper only (by 12.6%), float glass and surface ground glass (by 11.6%), lime (by 10.6%). In the division *Basic metals* production decreased of sheets and strips of non-alloy steel coated with zinc (by 14.1%), flat cold-rolled steel products width less than 600 mm (by 10.3%), flat bars, rods and profiles of aluminium (by 9.6%), copper and copper alloy bars, rods and profiles (by 7.9%). In the division *Fabricated metal products* production decreased of cans other than for preserving food and drink of iron or steel, of a capacity < 50 l (by 23.7%), iron or steel reservoirs and similar containers for solids, of a capacity > 300 litres (by 5.6%). In the divisions *Computer, electronic and optical products* and *Electrical equipment* production decreased of domestic gas cookers with an oven (by 58.1%), electric cookers including gas-electric cookers (by 35.0%), vacuum cleaners (by 32.2%), gas meters (by 31.0%), lead-acid accumulators for motor vehicles (by 28.1%), electricity meters (by 22.7%), electric ovens for building-in (by 19.3%), automatic drying machines for households (by 16.3%). In the division *Machinery and equipment* production decreased of cash registers (by 57.2%), loaders for general use in agriculture (by 24.7%), field sowers (by 16.0%), ploughs (by 14.5%), pick-up straw and fodder balers (by 11.9%). In the division *Furniture* production decreased of wooden furniture for the dining-room and living-room (by 10.6%), kitchen furniture of wood (by 10.4%).

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_mc2022.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.