



Warsaw 2022

Production of major industrial products in May 2022



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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 May 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 May 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.

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 May 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 May 2022, manufactured production of 171 items and sold production of 112 items was higher than in May 2021. Decrease was noted on manufactured production for 145 items and on sold production for 118 items. Data on production of steel seamed tubes and pipes, primary cells and primary batteries and refrigerated show-cases and counters 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 May 2022 in comparison to May 2021**, in the divisions covering energy raw materials production increased of lignite (by 18.8%), natural gas (by 10.4%), hard coal (by 2.0%). In the divisions *Food products* and *Beverages* production increased of e.g. barley groats and meal (by 97.3%), edible rock salt (by 78.6%), buckwheat groats and meal (by 70.0%), prepared meals and dishes based on meat (by 62.4%), canned poultry meat (by 60.5%), canned beef and veal meat (by 57.9%), sugar confectionery containing cocoa (by 49.8%), margarine and spreads (by 34.6%), apple juice (by 34.0%). In the division *Wearing apparel* production increased of e.g. women's or girls' suits and ensembles (by 90.8%), women's or girls' jackets (by 35.0%), men's or boys' suits and ensembles (by 34.1%), men's or boys' shirts (by 33.3%), women's or girls' blouses and shirts (by 28.3%), men's or boys' trousers, overalls and shorts (by 20.6%), women's or girls' trousers, overalls and shorts (by 15.5%). In the divisions *Wood and products of wood* and *Paper and paper products* production increased of e.g. sanitary towels and similar articles of paper pulp, paper and cellulose wadding (by 56.7%), toilet paper (by 37.4%), napkins and napkin liners for babies (by 27.5%), sacks and bags of paper (by 25.4%), flat pallets and pallet collars of wood (by 13.0%), testliner-recycled paper for cover layer of corrugated cardboard (by 11.9%), windows of wood (by 10.3%). In the divisions *Coke, briquette and refined petroleum products* and *Chemical products* production increased of e.g. synthetic calcium sulphate (by 54.1%), fuel oils (by 52.5%), motor oils (by 45.5%), plastics (by 41.7%), sodium hydroxide in aqueous solution (by 41.3%), toilet waters (by 27.3%), soap and organic surface-active products and preparations for use as soap; (by 26.4%). In the division *Rubber and plastic products* production increased of e.g. plastic floor, wall, ceiling coverings (by 31.6%), plates, sheet, film, foil of cellular polymers of styrene (by 28.3%), tyres for agricultural machinery (by 20.0%). In the division *Other non-metallic mineral products* production increased of e.g. structural-floor clay hollow bricks (by 36.1%), ceramic roof tiles (by 33.8%), building bituminous felt (by 27.2%), multiple glazed units (by 19.1%), non-woven glass fibre webs, felts, mattresses and boards (by 16.6%), calcium-silicate brick (by 15.1%). In the division *Basic metals* production increased of e.g. wire of aluminium (by 116.7%), copper plates, sheets and strip (by 46.2%), hot-rolled steel rods and bars (by 33.2%), wire of steel (by 10.9%), refined unwrought lead (by 10.6%). In the divisions *Computer, electronic and optical products* and *Electrical equipment* production increased of e.g. telephone sets, excluding cellular phones (by 28.5%), insulated power cables (by 21.1%), air-cooled transformers (by 20.6%), electric motors and generators, excluding traction motors (by 19.6%). In the division *Machinery and equipment* production increased of e.g. agricultural tractors (by 63.3%), machinery for construction, road and drainage work (by 57.0%). In the divisions *Motor vehicles* and *Other transport equipment* production increased of e.g. lorries and road tractors for semi-trailers

(by 55.7%), sea-going boats for pleasure or sports (by 45.1%), vehicle compression-ignition engines (by 31.0%), bicycles (by 20.2%). In the division *Furniture* production increased of e.g. seats convertible into beds (by 16.4%), seats with wooden frames (by 6.2%).

Compared with the corresponding month of the previous year, in May 2022, in the divisions *Food products* and *Beverages* production decreased of e.g. frozen salt water fish (by 19.7%), wheat bread (by 17.3%), frozen salt water fish fillets (by 9.8%). In the divisions *Wearing apparel* and *Leather and related products* production decreased of e.g. unsplit bovine leather for shoes (by 61.0%), footwear with leather uppers (by 20.9%), women's or girls' dresses and skirts (by 16.9%), hosiery (by 16.7%). In the divisions *Wood and products of wood* and *Paper and paper products* production decreased of e.g. soda or sulphate wood pulp (by 13.8%), veneers (by 13.5%), doors of wood (by 13.1%), assembled parquet panels of wood for mosaic floors (by 13.0%), sawnwood (by 10.0%). In the division *Chemical products* production decreased of e.g. sodium hydroxide, solid (by 78.2%), phenol (by 48.2%), paints and varnishes, based on acrylic or vinyl polymers, weight of the solvent more than 50% (by 47.0%), toluene (by 45.6%), acetic acid (by 36.6%), phosphatic fertilizers (by 30.4%), paints and varnishes, based on acrylic or vinyl polymers in an aqueous medium (by 25.4%), sulphuric acid (by 25.1%), 6-hexanelactam (by 19.6%), paints and varnishes, based on polyesters, weight of the solvent not more than 50% (by 19.4%). In the division *Other non-metallic mineral products* production decreased of e.g. bricks made of clay (by 48.4%), bottles of colourless glass of a nominal capacity < 2,5 litres, for beverages and foodstuff (by 17.8%), ceramic ridge tiles (by 16.2%). In the division *Basic metals* production decreased of e.g. bronze (by 75.4%), brass (by 64.9%), crude steel (by 34.4%), pig iron (by 10.8%), copper wire (by 10.3%). In the divisions *Computer, electronic and optical products* and *Electrical equipment* production decreased of e.g. food grinders, mixers and juice extractors (by 89.4%), LED light bulbs (by 70.4%), filament lamps (by 65.8%), domestic gas cookers with an oven (by 55.3%), gas-electric cookers (by 54.3%), radio receivers of a kind used in motor vehicles (by 44.9%), electricity meters (by 43.7%), lead-acid accumulators for motor vehicles (by 33.1%). In the division *Machinery and equipment* production decreased of e.g. cash registers (by 80.9%), pick-up straw and fodder balers (by 24.7%), loaders for general use in agriculture (by 17.8%), scarifiers and cultivators (by 12.3%). In the divisions *Motor vehicles* and *Other transport equipment* production decreased of e.g. rail goods wagons (by 34.9%), public transport vehicles (by 30.6%), containers for freight transport (by 20.0%), passenger cars (by 12.0%). In the division *Furniture* production decreased of wooden furniture for the dining-room and living-room (by 10.8%), kitchen furniture of wood (by 9.3%).

In comparison with May of the previous year, production of cartons, boxes and cases made of corrugated paper or corrugated paperboard was at the same level.

Compared to the previous month, in May 2022 production increased for 185 products. In the divisions *Food products* and *Beverages* production increased of canned beef and veal meat (by 95.6%), edible rock salt (by 34.5%), liquid buttermilk (by 27.0%), unsweetened, non-flavoured mineral and aerated waters (by 22.5%), kefir, sour milk and sour cream (by 21.9%), sugar confectionery containing cocoa (by 20.5%), prepared pet foods (by 18.5%). In the division *Wearing apparel* production increased of men's or boys' trousers, overalls and shorts (by 55.0%), women's or girls' overcoats and similar articles (by 47.7%), men's or boys' jackets and blazers (by 38.6%), women's or girls' jackets (by 31.8%), women's or girls' blouses and shirts (by 25.5%). In the divisions *Wood and products of wood* and *Paper and paper products* production increased of testliner-recycled paper for cover layer of corrugated cardboard (by 28.5%), assembled parquet panels of wood for mosaic floors (by 16.4%), sacks and bags of paper (by 11.1%). In the divisions *Coke, briquette and refined petroleum products* and *Chemical products* production increased of paints and varnishes, based on acrylic or vinyl polymers, weight of the solvent more than 50% (by 39.9%), polyvinyl chloride not mixed with any other substances (by 31.8%), motor gasoline (by 23.8%), liquefied propane and butane (by 20.4%), asphalt (by 19.5%), synthetic calcium sulphate (by 18.4%). In the division *Rubber and plastic products* production increased

of plastic floor, wall, ceiling coverings (by 14.4%), tyres for tractors (by 13.6%), tyres for lorries and buses (by 12.5%). In the division *Other non-metallic mineral products* production increased of structural-floor clay hollow bricks (by 91.3%), boards, sheets and similar articles of plaster, other than faced or reinforced with paper only (by 36.1%), bottles of coloured glass of a nominal capacity < 2,5 litres, for beverages and foodstuff (by 24.2%), ceramic tiles and flags (by 13.2%). In the division *Basic metals* production increased of railway or tramway steel rails (by 43.0%), copper and copper alloy bars, rods and profiles (by 25.9%), pig iron (by 24.2%), brass (by 22.1%), copper plates, sheets and strip (by 20.7%), hot-rolled steel rods and bars (by 19.8%). In the division *Fabricated metal products* production increased of food cans of tinsplate (by 27.4%), aluminium doors (by 21.7%). In the division *Machinery and equipment* production increased of concrete mixers (by 34.1%), machine tools for machining metals (by 14.7%), ball bearings (by 13.8%), loaders for general use in agriculture (by 13.8%). In the division *Motor vehicles* production increased of internal combustion engines for vehicles (by 17.5%), lorries and road tractors for semi-trailers (by 14.7%).

Compared to April 2022, in May 2022 production decreased for 132 products, among others for: sodium hydroxide, solid (by 72.6%), food grinders, mixers and juice extractors (by 70.8%), light fuel oils (by 68.5%), women's or girls' suits and ensembles (by 60.8%), phenol (by 48.2%), buckwheat groats and meal (by 47.9%), toluene (by 47.5%), automatic drying machines for households (by 43.4%), rugs (by 43.1%), kitchen and bathroom mixing valves (by 40.6%), LED light bulbs (by 38.4%), bronze (by 33.8%), unsplit bovine leather for shoes (by 32.8%), computers (by 29.7%), crude steel (by 28.7%), bottles of colourless glass of a nominal capacity < 2,5 litres, for beverages and foodstuff (by 26.2%), frozen salt water fish fillets (by 26.0%), wheat bread (by 25.3%), scarifiers and cultivators (by 25.2%), frozen salt water fish (by 25.1%).

In May 2022 compared with the previous month, production of structural-wall clay hollow bricks and machining centres, unit construction machines and multi-station transfer machines, for working metal unchanged.

Sumarazing the production in the period January-May 2022, in comparison with the corresponding period of the previous year increase of production was recorded for 192 items, among others: women's or girls' suits and ensembles (by 158.2%), butadiene-1,3 (by 116.0%), polyethylene (by 107.7%), ethylene (by 105.9%), propylene (by 90.5%), polyvinyl chloride not mixed with any other substances (by 76.7%), table candles (by 76.5%), barley groats and meal (by 70.7%), telephone sets, excluding cellular phones (by 68.5%), structural-floor clay hollow bricks (by 64.7%), rugs (by 61.7%), buckwheat groats and meal (by 58.3%), yarn of carded wool (by 53.6%), prepared meals and dishes based on meat (by 52.7%), polypropylene (by 47.4%), apple juice (by 47.2%), men's or boys' shirts (by 44.1%), sanitary towels and similar articles of paper pulp, paper and cellulose wadding (by 43.0%), men's or boys' suits and ensembles (by 42.7%), machinery for construction, road and drainage work (by 41.1%), canned poultry meat (by 39.6%), soap and organic surface-active products and preparations for use as soap; (by 37.5%), agricultural tractors (by 34.9%), bicycles (by 34.7%), electric motors and generators, excluding traction motors (by 33.9%), sea-going boats for pleasure or sports (by 33.8%), special fabrics including pile fabrics and terry towelling (by 31.7%), synthetic calcium sulphate (by 31.6%), tyres for agricultural machinery (by 31.5%), food cans of tinsplate (by 29.0%), air-cooled transformers (by 28.5%).

In January-May 2022 compared with the corresponding period of the previous year, production decrease was recorded for 127 products, among others for: brass (by 79.4%), filament lamps (by 65.1%), bronze (by 62.0%), cash registers (by 61.9%), acetic acid (by 59.3%), LED light bulbs (by 53.1%), food grinders, mixers and juice extractors (by 50.6%), domestic gas cookers with an oven (by 50.4%), unsplit bovine leather for shoes (by 42.0%), women's or girls' overcoats and similar articles (by 41.4%), radio receivers of a kind used in motor vehicles (by 40.5%), electricity meters (by 33.4%), footwear with leather uppers (by 32.2%), gas-electric cookers (by 31.2%), lead-acid accumulators for motor vehicles (by 26.5%), passenger cars (by 26.5%), phosphatic

fertilizers (by 26.1%), potassic fertilizers (by 24.1%), electric hobs for building-in (by 24.0%), pick-up straw and fodder balers (by 20.9%), evaporated salt not suitable for consumption (by 20.0%), women's or girls' blouses and shirts (by 19.4%), sodium hydroxide, solid (by 19.4%), vacuum cleaners (by 19.1%).

In the period January-May 2022 compared with the corresponding period of the previous year, production of dish washing machines for households unchanged.

SOLD PRODUCTION

Indicators of the dynamics of sold industrial products were different in various sectors. **In May 2022 in comparison to May 2021**, in the division *Food products* production decreased of wheat bread (by 18.0%), frozen salt water fish (by 16.1%), fresh or chilled pig meat (by 12.1%), frozen fruit and nuts (by 10.7%), rye flour (by 10.4%). In the divisions *Wearing apparel* and *Leather and related products* production decreased of leather of bovine animals (by 39.7%), footwear (by 28.7%), hosiery (by 12.1%), men's or boys' suits and ensembles (by 9.5%). In the division *Wood and products of wood* production decreased of non-coniferous sawnwood (by 25.4%), assembled parquet panels of wood other than for mosaic floors (by 13.0%), doors of wood (by 13.0%), particle and similar boards of wood and ligneous materials (by 12.3%). In the divisions *Coke, briquette and refined petroleum products* and *Chemical products* production decreased of paints and varnishes, based on acrylic or vinyl polymers, weight of the solvent more than 50% (by 27.7%), sulphuric acid (by 25.6%), liquefied propane and butane (by 23.4%), nitrogenous fertilizers (by 22.1%), potassic fertilizers (by 21.5%), pesticides (by 20.1%), phosphatic fertilizers (by 19.2%), coke (by 15.3%). In the division *Other non-metallic mineral products* production decreased of calcium-silicate brick (by 18.3%), structural-wall clay hollow bricks (by 15.1%), structural-wall tiles of calcium-silicate (by 14.7%), non-refractory clay building bricks (by 13.9%), ceramic tiles and flags (by 12.5%), ceramic ridge tiles (by 11.1%). In the division *Basic metals* production decreased of hot rolled steel products (by 13.4%), steel rods and flat bars (by 13.4%), sheets and strips of non-alloy steel coated with zinc (by 9.2%). 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 25.1%), iron or steel reservoirs and similar containers for solids, of a capacity > 300 litres (by 18.9%). In the divisions *Computer, electronic and optical products* and *Electrical equipment* production decreased of domestic gas cookers with an oven (by 57.2%), electricity meters (by 44.3%), lead-acid accumulators for motor vehicles (by 37.3%), gas meters (by 34.9%), electric cookers including gas-electric cookers (by 34.4%), television receivers (by 27.8%), automatic drying machines for households (by 21.1%), vacuum cleaners (by 18.8%), electric ovens for building-in (by 17.4%). In the division *Machinery and equipment* production decreased of cash registers (by 70.6%), kitchen and bathroom mixing valves (by 29.5%), loaders for general use in agriculture (by 21.8%). In the divisions *Motor vehicles* and *Other transport equipment* production decreased of rail goods wagons (by 29.0%), containers for freight transport (by 23.7%), public transport vehicles (by 23.0%), passenger cars (by 15.4%).

Compared with the corresponding month of the previous year, in the division *Food products* production increased of edible evaporated salt (by 45.9%), buckwheat groats and meal (by 44.0%), canned poultry meat (by 39.7%), prepared meals and dishes based on meat (by 36.2%), margarine and spreads (by 33.2%), vegetable pickles (by 28.1%), wheat groats and meal (by 27.3%), chocolate and chocolate confectionery (by 25.6%), sugar confectionery containing cocoa (by 25.3%), frozen salt water fish fillets (by 25.0%), chocolate (by 24.1%), vinegar (by 16.3%). In the division *Wearing apparel* production increased of women's or girls' jackets (by 39.1%), women's or girls' trousers, overalls and shorts (by 31.6%), men's or boys' shirts (by 10.3%). In the divisions *Wood and products of wood* and *Paper and paper products* production increased of sanitary towels and similar articles of paper pulp, paper and cellulose

wadding (by 54.1%), sacks and bags of paper (by 28.6%), napkins and napkin liners for babies (by 27.7%), toilet paper (by 19.2%), flat pallets and pallet collars of wood (by 11.2%), windows of wood (by 10.5%). In the divisions *Coke, briquette and refined petroleum products* and *Chemical products* production increased of motor oils (by 63.1%), synthetic calcium sulphate (by 55.0%), sodium hydroxide in aqueous solution (by 54.6%), plastics (by 27.1%), diesel oils (by 15.9%), toilet waters (by 14.8%), polyurethane adhesives (by 13.5%). In the division *Rubber and plastic products* production increased of plates, sheet, film, foil of cellular polymers of styrene (by 23.9%), plastic floor, wall, ceiling coverings (by 9.9%). In the division *Other non-metallic mineral products* production increased of building bituminous felt (by 22.6%), multiple glazed units (by 19.5%), bricks made of clay (by 16.9%), boards, sheets and similar articles of plaster, other than faced or reinforced with paper only (by 13.4%). In the division *Fabricated metal products* production increased of aluminium doors (by 33.9%), aluminium windows (by 25.6%). In the divisions *Computer, electronic and optical products* and *Electrical equipment* production increased of single-phase current motors (by 14.9%), dish washing machines for households (by 14.9%), automatic washing and washing-drying machines for households (by 11.6%), insulated wires and conductors (by 10.6%). In the divisions *Motor vehicles* and *Other transport equipment* production increased of sea-going boats for pleasure or sports (by 47.9%), internal combustion engines for vehicles (by 23.6%), bicycles (by 11.0%). In comparison with the corresponding month of the previous year, production of rubber products was at the same level.

Compared to April, in May 2022 sold production increased for 133 products. In the divisions *Food products* and *Beverages* production increased of vinegar (by 50.0%), prepared meals and dishes based on meat (by 30.7%), sugar confectionery containing cocoa (by 24.5%), rendered, edible animals fats (by 20.6%), kefir, sour milk and sour cream (by 19.3%), unsweetened, non-flavoured mineral and aerated waters (by 17.6%), edible evaporated salt (by 15.0%). In the divisions *Wearing apparel* and *Leather and related products* production increased of men's or boys' trousers, overalls and shorts (by 49.3%), panty hose and tights (by 9.4%), men's or boys' suits and ensembles (by 7.7%). In the divisions *Wood and products of wood* and *Paper and paper products* production increased of assembled parquet panels of wood for mosaic floors (by 36.6%), coniferous sawnwood (by 18.6%), sacks and bags of paper (by 16.9%), fluting paper (by 12.6%). In the divisions *Coke, briquette and refined petroleum products* and *Chemical products* production increased of potassic fertilizers (by 59.1%), phosphatic fertilizers (by 43.3%), paints and varnishes, based on acrylic or vinyl polymers, weight of the solvent more than 50% (by 41.1%), asphalt (by 38.9%), soap and organic surface-active products and preparations for use as soap (by 23.0%), liquefied propane and butane (by 22.2%), synthetic calcium sulphate (by 18.2%), nitrogenous fertilizers (by 16.0%). In the division *Rubber and plastic products* production increased of tyres (by 10.3%), rigid tubes, pipes and hoses of polymers of ethylene (by 7.3%). In the division *Other non-metallic mineral products* production increased of structural-floor clay hollow bricks (by 35.3%), boards, sheets and similar articles of plaster, other than faced or reinforced with paper only (by 26.9%), bottles of colourless glass of a nominal capacity < 2,5 litres, for beverages and foodstuff (by 17.8%), factory made mortars (by 13.0%), cement (by 12.6%), products of heat insulation of mineral wools (by 12.5%), ceramic tiles and flags (by 11.0%), ceramic roof tiles (by 10.2%), building bituminous felt (by 9.1%). In the division *Basic metals* production increased of flat bars, rods and profiles of aluminium (by 13.5%), hot-rolled steel rods and bars (by 12.1%), copper and copper alloy bars, rods and profiles (by 10.8%), flat cold-rolled steel products width less than 600 mm (by 10.5%). In the division *Fabricated metal products* production increased of aluminium doors (by 19.9%), aluminium windows (by 12.0%). In the divisions *Computer, electronic and optical products* and *Electrical equipment* production increased of domestic gas cookers with an oven (by 41.8%), vacuum cleaners (by 30.3%), household refrigerators and freezers (by 13.3%), automatic washing and washing-

drying machines for households (by 9.1%), dish washing machines for households (by 8.3%), electric cookers including gas-electric cookers (by 8.2%). In the division *Machinery and equipment* production increased of cash registers (by 40.2%), ploughs (by 30.4%), pick-up straw and fodder balers (by 27.7%), loaders for general use in agriculture (by 20.8%). In the divisions *Motor vehicles* and *Other transport equipment* production increased of bicycles (by 33.0%), sea-going boats for pleasure or sports (by 31.9%), rail goods wagons (by 17.6%), internal combustion engines for vehicles (by 14.3%), passenger cars (by 8.3%). In the division *Furniture* production increased of kitchen furniture of wood (by 10.0%).

Compared with the previous month, production decrease was recorded for 98 products, among others for: barley groats and meal (by 46.4%), kitchen and bathroom mixing valves (by 36.4%), sulphuric acid (by 28.3%), automatic drying machines for households (by 27.9%), wheat bread (by 26.3%), prepared meals and dishes based on vegetables (by 25.5%), electric motors and generators, excluding traction motors (by 22.6%), scarifiers and cultivators (by 20.7%), bricks made of clay (by 20.1%), fruit wines (by 19.9%), porcelain or china tableware and kitchenware (by 19.8%), canned pig meat (by 19.3%), insulated wires and conductors (by 17.7%), gas meters (by 16.1%), vodka (by 15.1%), veneers (by 15.1%), public transport vehicles (by 14.4%), footwear with uppers of textile materials (by 13.8%), frozen salt water fish fillets (by 13.6%).

In January - May compared with the corresponding period of the previous year, production increase was recorded for 130 products, among others for: table candles (by 55.4%), men's or boys' jackets and blazers (by 51.0%), sodium hydroxide in aqueous solution (by 46.8%), barley groats and meal (by 45.1%), bricks made of clay (by 40.3%), sanitary towels and similar articles of paper pulp, paper and cellulose wadding (by 39.6%), buckwheat groats and meal (by 39.2%), prepared meals and dishes based on meat (by 34.8%), synthetic calcium sulphate (by 33.5%), canned poultry meat (by 32.6%), single-phase current motors (by 31.5%), special fabrics including pile fabrics and terry towelling (by 31.4%), men's or boys' shirts (by 30.7%), men's or boys' suits and ensembles (by 28.6%), sea-going boats for pleasure or sports (by 28.5%), women's or girls' jackets (by 28.2%), napkins and napkin liners for babies (by 25.0%), building bituminous felt (by 24.3%), air-cooled transformers (by 23.3%), apple juice (by 22.5%), sweetened or flavoured waters (by 22.2%), chocolate (by 21.6%), ceramic ridge tiles (by 21.1%), plastics (by 20.7%), wheat groats and meal (by 20.3%), steel doors (by 20.2%).

In January - May compared with the corresponding period of the previous year, production decrease was recorded for 100 products, among others for: cash registers (by 63.3%), domestic gas cookers with an oven (by 56.6%), electricity meters (by 37.0%), leather of bovine animals (by 32.6%), passenger cars (by 31.2%), lead-acid accumulators for motor vehicles (by 30.5%), vegetable pickles (by 26.8%), nitrogenous fertilizers (by 26.7%), gas meters (by 25.4%), non-coniferous sawnwood (by 25.3%), phosphatic fertilizers (by 24.3%), potassic fertilizers (by 24.0%), pick-up straw and fodder balers (by 23.5%), frozen salt water fish (by 23.0%), liquefied propane and butane (by 22.9%), footwear (by 22.2%), vacuum cleaners (by 19.9%), paints and varnishes, based on acrylic or vinyl polymers in an aqueous medium (by 19.3%), pesticides (by 19.2%), plastic doors (by 19.2%), textile sacks and bags (by 16.4%), fruit wines (by 16.3%), cans other than for preserving food and drink of iron or steel, of a capacity < 50 l (by 15.3%), loaders for general use in agriculture (by 14.8%), sugar confectionery containing cocoa (by 14.1%), women's or girls' trousers, overalls and shorts (by 13.4%), public transport vehicles (by 12.5%), assembled parquet panels of wood for mosaic floors (by 12.4%).

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.