# **International Sourcing 2021–2023**

## General information about the inquiry

The aim of the survey on international sourcing is to produce versatile data on the position of enterprises operating in Finland in global value chains. The inquiry also surveys outsourcing and relocation of enterprises' business activities abroad. The inquiry is carried out every three years. The statistics on global value chains and international sourcing, compiled based on the inquiry, are based on the Statistics Act (280/2004, amended 361/2013), on Regulation (No 2019/2152) of the European Parliament and of the Council on European business statistics and on the Commission Implementing Regulation (No 2022/918).

## Main concepts of the statistics

**International outsourcing**: Outsourcing of functions previously performed in Finland by an enterprise in part or in full to another enterprise located abroad. The functions may have been outsourced to an enterprise in the same group or to an outside enterprise. Outsourcing does not refer to functions where an enterprise establishes a new production line abroad without a reduction of functions or a termination of persons' work relationships or transfer to new tasks in Finland.

**Business function**: The business function is a collection of similar tasks and activities carried out in the enterprise. The purpose of the concept is to help find out what kinds of tasks connected to the function are transferred from Finland abroad.

## Activities are divided into the following categories:

#### 1. Production of goods and materials

Manufacturing, assembly, processing, printing and binding, casting of metals, shipbuilding, mining, gas and oil production, quarrying of stone, energy production (excluding trade of electricity), development of building projects, civil engineering, specialised construction (including demolition), crop production, livestock farming, hunting, forestry and harvesting, fishing

#### 2. Transport, storage and logistics

Road, water, rail and air transport activities, passenger and freight transport, postal services, storage, packaging

# 3. Sales, marketing and after-sales services (e.g. different customer services, Helpdesk and Call Centre)

Advertising and media representation, market research and public opinion polling, telephone call centres, retail and wholesale trade, trade of gas and electricity, sales commission trade and real estate trade



#### 4. Information technology

Software publishing and computer hardware and software consultancy, radio and television activities, telecommunications, data processing, hosting, web portals and related information services, installation of mainframe computers, repair and maintenance of computers and communications systems, computer programming activities and related activities

#### 5. Management and administration (incl. financial services)

Financial services (such as banking, insurance, financial leasing and asset management), activities of head offices, human resources activities, administration of financial markets, legal services, bookkeeping, accounting and auditing, office administrative and support services, public administration activities

#### 6. Engineering and related technical services

Activities serving the production of raw materials (e.g. support activities for petroleum and natural gas extraction), sound recording and music publishing activities, video production, architectural and engineering activities, and technical analysis

#### 7. Research and development

Research and experimental development on natural sciences and engineering, research and experimental development on social sciences and humanities

#### 8. Other business functions

Accommodation (e.g. hotels and camping sites), food service activities (e.g. cafés and restaurants), cleaning services, landscape services, real estate rental services, libraries, museums, sports facilities, repair and maintenance of electrical equipment (excluding repair and maintenance of computers and communications systems), repair and maintenance of transport equipment, repair and maintenance of personal and household goods, water supply, waste collection, sewerage, remediation activities, professional, scientific and technical activities (e.g. photography and translation), publishing of books and periodicals, travel agency activities, rental and operating leasing activities, security, education, human health activities and residential care activities, social work activities, cultural activities, gambling and betting activities, sports activities, activities of organisations, activities of households

## Classification of geographical areas

**EU countries:** Austria, Belgium, Bulgaria, Croatia, Cyprus, Czech Republic, Denmark, Estonia, France, Germany, Greece, Hungary, Ireland, Italy, Latvia, Lithuania, Luxembourg, Malta, the Netherlands, Poland, Portugal, Romania, Slovakia, Slovenia, Spain and Sweden.

#### **United Kingdom**

EFTA-countries: Iceland, Liechtenstein, Norway and Switzerland

**Other European countries\*:** Albania, Andorra, Armenia, Azerbaijan, Belarus, Bosnia and Herzegovina, Georgia, Iceland, Kosovo, Liechtenstein, Moldova, Monaco, Montenegro, Norway, North Macedonia, Russia, San Marino, Serbia, Switzerland, Türkiye, Ukraine and Vatican.

\*This group changes according to the question. If the question has a category for the United Kingdom, the category of other European countries does not include



the United Kingdom. If the question does not have a category for the United Kingdom, the United Kingdom is included in other European countries.

China

India

Other Asian countries and Oceania: Japan, Korea, Vietnam, Australia, New Zealand, etc.

**United States and Canada** 

Central and South America: including Brazil and Mexico

Africa: African countries

Rest of the world: Includes all geographical areas not mentioned in other categories of the same question

#### **Materials**

Materials or raw materials include goods used in the enterprise's own production processes or used in production processes by foreign customers. Raw materials are usually natural resources extracted from the earth or from nature or produced using chemical or similar methods (e.g. steel production). They are often converted into final products by means of manufacturing and production processes. Typical examples of raw materials are:

- Metals: materials such as iron, aluminium and copper used in the production of various products from cars to electronics and construction materials.
- Chemicals: materials such as oil, gas and plastics used in the production of various products from synthetic fibres to medicines and fertilisers.
- Wood: e.g. timber, plywood and chipboard used in the construction of buildings, furniture and other products;
- Agricultural products: e.g. wheat, maize and soya beans used in the production of food and other consumer products.
- Textiles and fabrics: materials such as cotton, wool and silk used in the manufacture of clothing, bed linen and other textile products;
- Minerals: e.g. salt, hard coal and diamonds used in many industries from energy to construction and jewellery.

For the purposes of classification, the intended use of the product is crucial; only intermediate consumption of the raw material (including its conversion) should be recorded under the "materials" category.

Some examples of what **is included** in the category "materials" are listed below. The assumption is that purchase/sale transactions cross borders.

> a) An enterprise sells apples to another enterprise located abroad that uses them to manufacture apple juice. The enterprise selling apples must report the



transaction under "Raw materials that are used by your customers in their own production process".

- b) An enterprise purchases copper from abroad, which it uses to produce copper wire, which is subsequently sold on the enterprise's domestic market. The enterprise purchasing copper must report the purchase under item "Raw materials used in your enterprise's own production process".
- c) An enterprise purchases apples from abroad and sells them in its home retail shop directly to consumers (for private consumption). The enterprise's activity produces further added value to the apples (e.g. through packaging or delivery). The activity must be reported as a purchase transaction under "Raw materials used in your enterprise's own production process" even if the apples are not used in the production process but they are resold (because the enterprise's activity still generates added value to the apples).

Below are some examples of what is not included in the category "materials".

- a) An enterprise buys water from abroad in large water containers (water dispensers) which are used by employees and customers in offices. The enterprise buying water is the end consumer. Its activity does not bring added value to the product and is therefore not part of the global value chain. The activity should be reported as a purchase transaction under "Other goods".
- b) An enterprise sells apples to foreign customers (for consumption). Because the apples are not resold or used in production processes, the activity must be reported as a sale transaction under "Other goods".

Most of the raw materials purchased by the enterprise are classified under the "materials" commodity category because the threshold for the purchase and sale of raw materials is EUR 100,000.

If the raw material is purchased or sold for resale, it should also be reported under this commodity category.

## Components

This product category includes parts and components that form part of the enterprise's own products or that the enterprise's customers use abroad as part of their own products, such as:

- electronic components: e.g. resistors, capacitors and transistors used for building electronic circuits;
- mechanical components: e.g. gears, bearings and axles used in machinery and equipment;
- car components: e.g. engines, gears and braking systems used for passenger cars, lorries and other vehicles;
- aerospace components: e.g. turbine wings, landing gear and wings used on aircraft;

- electric components: e.g. switches, relays and transformers used in electric systems;
- hydraulic and pneumatic components: e.g. valves, cylinders and hoses used in hydraulic and pneumatic systems;
- structural parts: e.g. beams, poles and framed structures used in building projects;
- medical components: e.g. surgical instruments, prostheses and implants or technical apparatus used in medical procedures.
- packaging materials

Components can also be semi-finished products that are part of the final (end) product, such as:

- intermediate agricultural products: flour, animal fodder and pesticides;
- textiles and fabrics as intermediate products: e.g. yarns, fabric dyes, chemicals and fabric finishing materials;
- other intermediate products as part of a final product: e.g. paper pulp, wood panels, plastic resin, plastic containers, cases and glasses.

Some examples of what is included in this category are listed below.

- a) An enterprise sells semiconductors to another enterprise, which in turn uses these semiconductors to manufacture microchips.
- b) An enterprise purchases electric cables, which it then sells as a package with computers that are its main product. Components that are sold together as part of some other products are bought in this case. The cables are also reported under this item even if the electric cables were purchased for resale (without bundling them with other products), as it can be assumed that the enterprise's activity adds value to the electric cables through transportation, storage and delivery or alternatively by exploiting them in the marketing of its main product.
- c) An enterprise buys components from abroad. The components are then released to another enterprise for further processing (assembly) either abroad or in Finland. Both components and processed final products remain in the ownership of the responding enterprise.
  - 1) Reporting of purchases: the enterprise buys components from abroad. These components purchased from abroad are not used directly in the enterprise's own production process but they are used in the production process of the processing enterprise/subcontractor. However, the components concerned are part of the final product sold by the responding enterprise, so this item should be reported under "Components that form part of your own product".



2) Reporting of sales: if the respondent enterprise "releases" components to a processing enterprise located abroad, the item should be reported under "Components that are used by your customers as part of their own product".

The following is an example of what is not included in this category.

a) The enterprise sells surgical instruments to a local hospital. Because the enterprise can be fairly certain that the instruments are used by the hospital, this transaction is not reported as international trade and thus it is not reported in this survey.

Components are also included in this category in case they are purchased or sold for resale.

## Machinery and other technical equipment

This category includes machinery and other technical equipment used by the enterprise or by its customers abroad. Machinery and other technical equipment are an extensive classification covering various kinds of tools, devices and machines used for different purposes in manufacturing and other industrial processes. Unlike intermediate products, machines and technical equipment are long-term capital goods used to produce other goods and services. They are often costly investments requiring regular maintenance and improvements. Some examples of machinery and technical equipment are:

- machines used in manufacture: this includes machines, such as lathes, milling machines and presses, which are used in the production of goods;
- packaging machines: this includes machines such as filling machines,
  labelling machines and corking machines used for packaging final products;
- material handling equipment: this includes forklift trucks, conveyor belts and cranes used for moving materials and goods in the factory;
- industrial robots: automated machines used, e.g. for welding, painting and assembly in the manufacturing process;
- 3D printers: these machines use computer-controlled processes to create 3D objects from digital models;
- computer hardware: computers, servers and other equipment used for steering and controlling manufacturing processes;
- testing and measuring equipment: equipment such as measuring devices and sensors used to measure and test the quality of products during the manufacturing process;
- medical apparatus: such as magnetic resonance imaging devices, x-ray apparatuses and surgical apparatuses used in the healthcare sector.

The following are examples of what **is included** in this category.



- a) An enterprise purchases surgical gloves and other medical devices from abroad for use in connection with its supply of dental services. As the enterprise uses medical apparatuses for its business activities, the activity must be reported under "Machinery and other technical equipment used by your own enterprise".
- b) An enterprise supplies 3D printers to its foreign trading partners that use them to manufacture their own products. The activity must be reported under "Machinery and other technical equipment used by your customers".
- c) An enterprise purchases a crane for more than EUR 100,000 from abroad for the construction of a block of flats. The enterprise has never previously traded internationally and does not sell its products abroad (the blocks of flats are located in Finland). Although buying a crane from abroad was a one-off event, the enterprise should still report the acquisition under "Machinery and other technical equipment used by your own enterprise".

If machinery and other technical equipment are purchased or sold for resale, they are included in this category.

## Final products designed by your enterprise for resale

This category includes final products and finished products designed by the enterprise for resale. This category includes products designed and developed by the enterprise for reselling them.

Resale refers to business in which final products/finished products are first bought, their sales value is increased (e.g. through packaging, transport or delivery) and ultimately sold to customers (consumers or other enterprises). A typical example of this is when wholesalers supply goods to retailers.

An enterprise manufactures and designs these products or uses an outside producer. The products are usually marketed and sold (but not necessarily) under the enterprise's own brand. These cases may often be connected to "contract manufacturing", "goods sent out for processing" or "factoryless goods production".

Examples of goods designed by an enterprise for resale include:

- clothes and accessories: a fashion company that designs and produces its own product line of clothes and accessories such as hats, handbags and jewellery;
- electronics: an electronics company that designs and produces its own product line of smartphones, laptops and other accessories;
- household supplies: an enterprise that designs and sells furniture, furnishings and other household items;
- food and beverages: a food enterprise which develops and sells its own snack product line, packaged food and beverages;
- health and beauty treatment: a beauty care enterprise that produces and sells its own cosmetic, skincare and other personal care products;



- sports equipment: a sports equipment enterprise which designs and produces its own product line related to sportswear, footwear and equipment;
- toys and games: a toy enterprise that designs and produces its own product line of toys, games and jigsaw puzzles.

The following are examples of what **is included** in this category.

- a) A clothes enterprise designs and sells handbags in its shop in Finland. The enterprise has designed a handbag model and asked one of its contract manufacturers to manufacture the handbags in factories abroad. The clothes enterprise sells the bags with its own logo in a shop located in Finland. The enterprise must report the purchases from its contract manufacturer under item "Products designed by your enterprise for resale on domestic or foreign markets". The final sale of handbags from the shop should not be reported under "Products designed by your enterprise for resale" because the handbags are sold on the domestic market. If the enterprise had sold several handbags online to customers abroad, it would report that it had sold "Other goods" (because this would most likely mean goods sold for consumption instead of resale).
- b) A furniture manufacturer designs and manufactures chairs it sells to a foreign retail chain. The activity must be reported under item "Products designed by your enterprise for resale on domestic or foreign markets".
- c) A local cucumber producer designs jars for pickled cucumbers and sells the jars containing cucumbers to a foreign wholesaler. The foreign wholesaler sells them in their shop under its own trademark. The local cucumber producer must report the transaction under item "Final products designed by your enterprise for resale".

Note: final products designed by an enterprise for resale may be sold under its own brand (examples (a) and (b)) but also under another brand (example (c)).

## Final products designed by another enterprise for resale

This product category covers final products/finished products designed by another enterprise for resale. The products in question which an enterprise purchases - for resale - from another enterprise are designed either by another enterprise or completely by a third party. Examples of goods designed by another company for resale include:

- consumer electronics: a retailer that purchases smartphones, laptops and other equipment from a manufacturer and sells them under its own brand name;
- clothes and accessories: a clothes shop which purchases clothes and accessories from a manufacturer and sells them under its own brand name;
- household supplies: a retailer that purchases furniture, furnishings and other household utensils from a manufacturer and sells them under its own brand name;

- food and beverages: a grocery shop which purchases snacks, packaged food and beverages from a manufacturer and sells them under its own brand name;
- health and beauty treatment: a pharmacy that purchases cosmetics, skincare products and other personal care products from a manufacturer and sells them under its own brand name;
- sports equipment: a sports retailer that purchases general sportswear, footwear and equipment from a manufacturer and resells them under its own trademark;
- toys and games: a toy retailer that buys toys, games and jigsaw puzzles from a manufacturer and sells them under its own brand name.

The following are examples of what is included in this category.

- a) A retailer purchases ordinary toilet paper from abroad. After this, the retailer packages the toilet paper under its own trademark and resells it to the customers of its store. The retailer must report the activity in the data collection question concerning purchases under "Products designed by another enterprise for resale on domestic or foreign markets".
- b) A pharmaceutical wholesaler purchases painkillers from domestic suppliers and sells them abroad to a pharmacy engaged in retail sales. The wholesaler supplies the medicines to the pharmacy abroad, which will bring added value to the product through transport and storage. The wholesaler must report the activity in the data collection question concerning sales under "Final products designed by another enterprise for resale".

In neither case the enterprise buying the goods does not design or manufacture the goods but purchases them from a manufacturer and resells them.

# Other goods

This goods category includes all goods and materials that cannot be classified in the five abovementioned categories. Goods of this type are most likely to be used for final consumption or resale without the enterprise having created added value to the goods.

This category usually refers to various types of products that enterprises buy and consume directly as part of their activities. Examples of other goods used by enterprises for their own consumption are:

- office supplies: purchasing of fountain pens, paper, staplers, notepads and other stationary for use in the organisation;
- cleaning supplies: purchase of office or institutional cleaning products, detergents and vacuum cleaners;



- food and beverages: purchase of food and beverages for kitchens or cafeterias used by employees, provision of meals or snacks for employees during working hours;
- fuels for company cars, delivery cars or machines;
- vehicle parts and maintenance: maintenance of the vehicle stock, purchase of spare parts, tyres and other maintenance parts for operating vehicles;
- software licences: obtaining software licences to use different applications or programs in internal functions such as productivity applications, accounting software or customer relationship management systems (CRM);
- office furniture and equipment: acquisition of desks, chairs, filing cabinets, computers, printers and other such furnishings;
- uniforms and work wear: purchasing of uniforms or special clothing for workers, in particular in the hotel and restaurant sector, healthcare and manufacturing;
- training materials: purchasing of training materials, books or online courses for improving the skills of employees.

In the following cases, enterprises should report these sales under the category "Other goods":

- a) The enterprise carries out all stages of the value chain in Finland within the enterprise and sells products only to foreign end users. Since the only transaction in the value chain is sales abroad, the sale transaction does not bring added value, i.e. the entire value is in the sales transaction. The enterprise records the transaction as sales of "other goods" abroad.
- b) An enterprise purchases ready-made products (final products) and sells them to consumers abroad without adding any value to the product, e.g. if the original supplier of the product has included transport and storage services in the price. The enterprise selling the final products to foreign consumers records the transaction under "other goods".

Enterprises can also buy raw materials and components in cases when the purchases should be reported under the category "Other goods".

a) A manufacturer purchases components from abroad to use them in its own production process, not in the actual product itself. The manufacturer reports the purchased goods as "Other goods". What is important is that the manufacturer uses these goods/components not in its own "products" but in the "production process". However, components directly used in the product are reported under "Components". For example, a manufacturer that uses semiconductors acquired from abroad as parts of the microchips it sells would report the purchased products under "Components that form part of your own product". If the same manufacturer purchases electrical cables to enable the operation of production machines connected to the microchip, these electrical cables are reported as purchases in category "Other goods" as they are used in the production process.



b) A manufacturer sells components manufactured in its production process abroad (e.g. a factoryless goods producer). If the buyer uses the components as part of its products, this sale is reported under "Components that are used by your customers as part of their own product". If the buyer uses the components in its production process (e.g. to enable the use of manufacturing machines), the sales of components are reported under "Other goods" because the components are used in the production process.