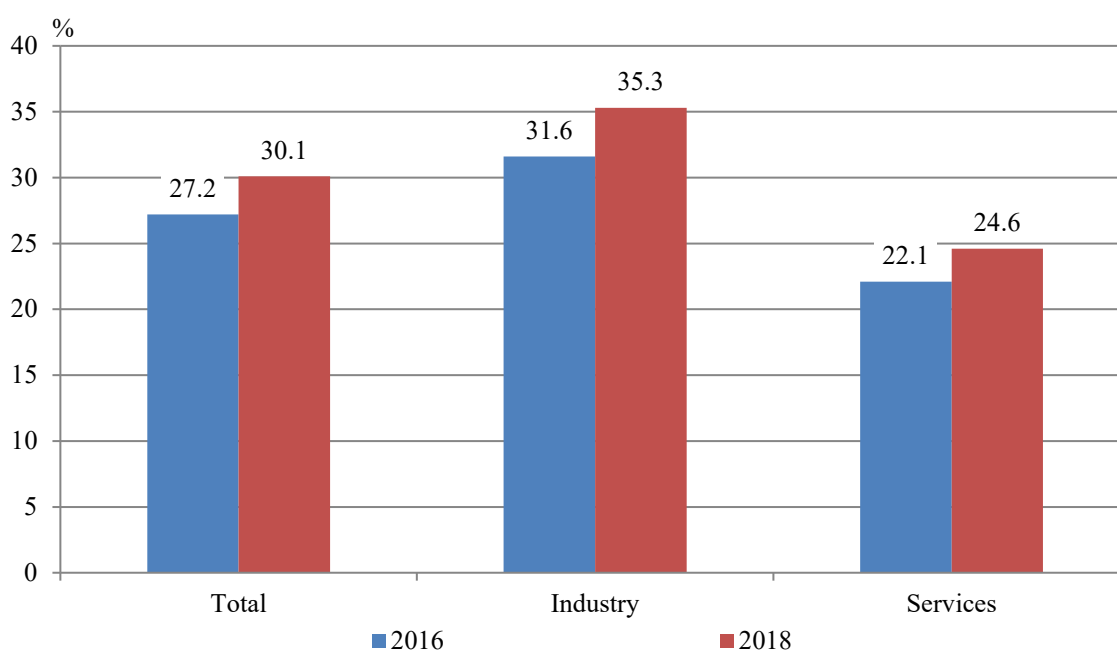


## **INNOVATION ACTIVITY OF THE ENTERPRISES<sup>1</sup>** **DURING THE PERIOD 2016 - 2018**

During the period 2016 - 2018 30.1% of the enterprises with 10 or more persons employed carried out an innovation activity. Compared to the previous innovation survey (2014 - 2016) the innovation activity increased by 2.9 percentage points (from 27.2% to 30.1%). An increase was observed in the enterprises in industrial sector<sup>2</sup> as well as in those in services sector<sup>3</sup> - respectively by 3.7 and 2.5 percentage points.

**Figure 1. Share of innovation-active enterprises by economic sectors**



Innovation activity of the enterprises in industry (35.3%) was higher than of those providing services (24.6%). The largest share of innovation-active enterprises was in the group of large enterprises (with 250 and more persons employed) - 76.1%.

<sup>1</sup> Non-financial and financial enterprises with 10 or more persons employed, which have submitted annual report for their activity for 2018 at the NSI.

<sup>2</sup> Sector Industry includes: Mining and quarrying; Manufacturing; Electricity, gas, steam and air conditioning supply; Water supply; sewerage, waste management and remediation activities.

<sup>3</sup> Sector Services includes: Wholesale trade, except of motor vehicles and motorcycles; Transportation and storage; Information and communication; Financial and insurance activities; Architectural and engineering activities; technical testing and analysis; Scientific research and development; Advertising and market research.

<sup>2</sup> "P. Volov" Str., 1038 Sofia, Bulgaria, tel. (+359 2) 9875 111, www.nsi.bg, e-mail: info@nsi.bg

In 2018, turnover of innovation-active enterprises constituted 57.0% of the turnover, and the persons employed - 57.8% of the persons employed in all enterprises.

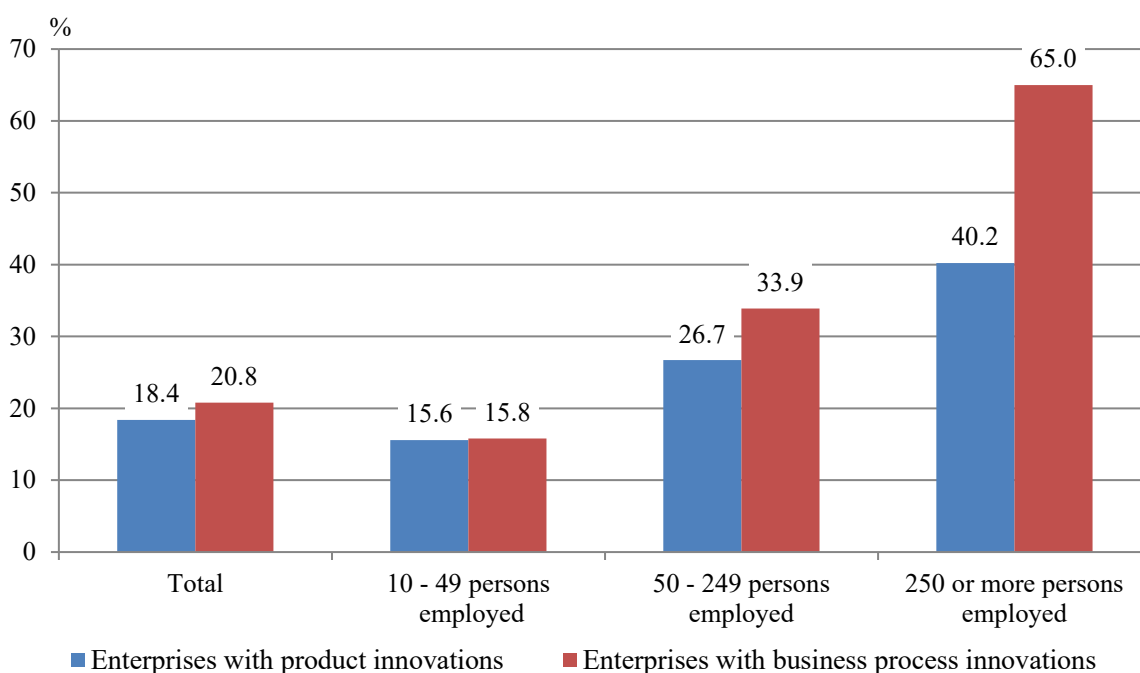
In 29.2% of innovation-active enterprises, more than half of the persons employed are with tertiary education, while in not innovation-active enterprises this share is 17.3%.

### 1. Innovation activity during the period 2016 - 2018 by economic sectors and size classes

	Innovation-active enterprises	Turnover of innovation-active enterprises	Persons employed in innovation-active enterprises
	(Per cent)		
<b>Total</b>	<b>30.1</b>	<b>57.0</b>	<b>57.8</b>
Industry	35.3	70.3	61.4
Services	24.6	44.9	52.5
10 - 49 persons employed	24.2	24.0	26.8
50 - 249 persons employed	46.8	47.4	50.1
250 and more persons employed	76.1	83.4	81.1

During the observation period 18.4% of all enterprises realized product innovations (new or improved goods or services), while 20.8% implemented new or improved business processes.

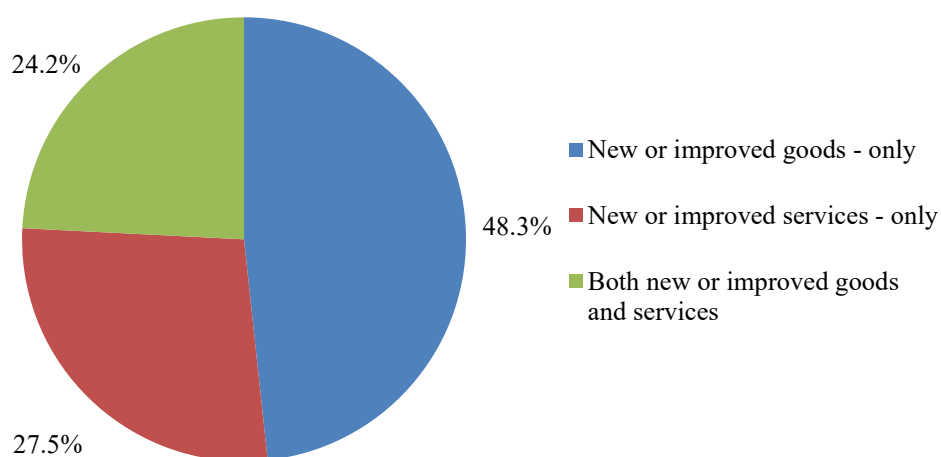
**Figure 2. Share of enterprises with product and business process innovations during the period 2016 - 2018 by size class**



Among the enterprises with product innovations, the largest share was of those that during the period 2016 - 2018 realized on the market only new or improved goods - 48.3%. New or improved services were provided by 27.5% of the enterprises, while both new or improved goods and services - 24.2% (Figure 3).

More than half (51.5%) of enterprises with product innovations realized goods or services that were new not only to them but to the market as well, i.e. not previously offered by their competitors.

**Figure 3. Structure of enterprises with product innovations during the period 2016 - 2018 by type of innovation product**



During the observation period the enterprises implemented various business process innovations, as the most of them introduced new or improved:

- methods for producing goods or providing services - 11.6%;
- business practices for organising procedures or external relations - 9.2%;
- methods for information processing or communication - 8.9%;
- marketing methods for promotion, packaging, pricing, product placement or after sales services - 8.6%.

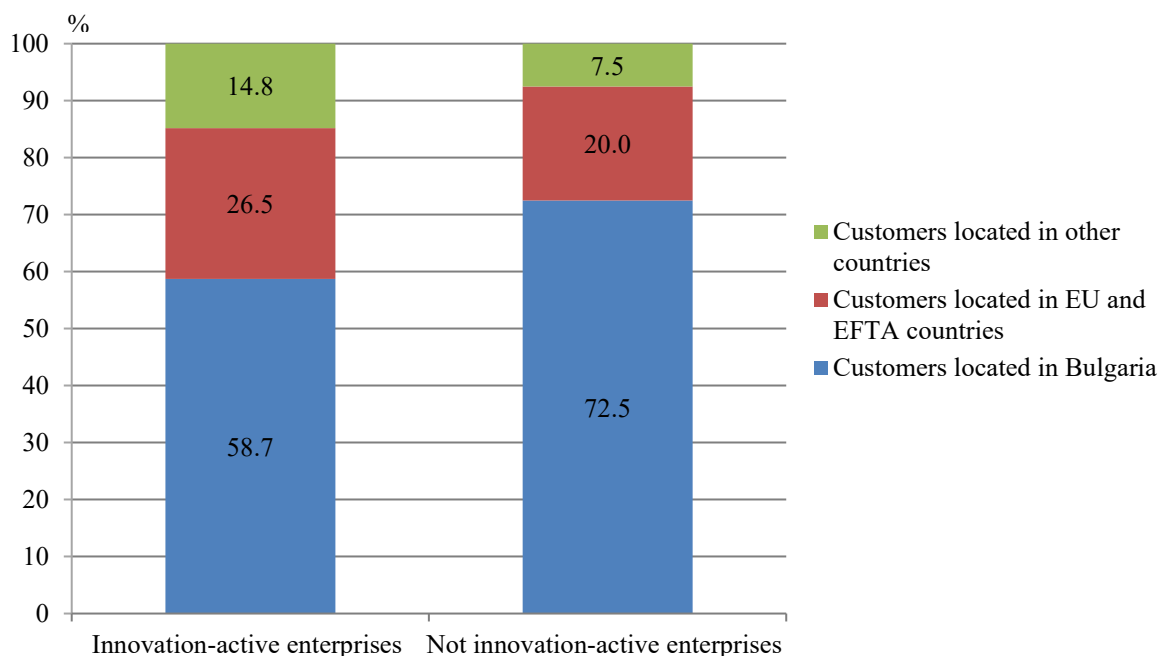
**Figure 4. Share of enterprises with business process innovations during the period 2016 - 2018 by type**



In order to carry out their innovation activity 15.9% of the innovation-active enterprises were involved in co-operation with other enterprises, scientific organizations and other partners. For large enterprises (with 250 or more persons employed) this share was 26.9%.

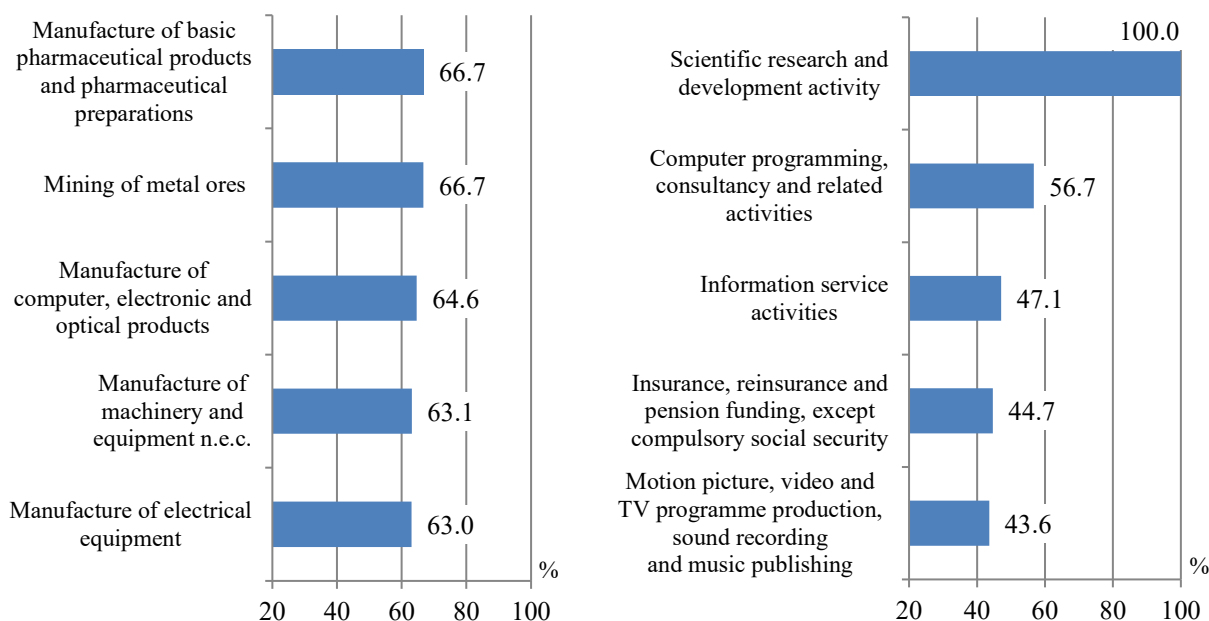
In 2018, 41.3% of the turnover of innovation-active enterprises was realized by sales to foreign customers, as 26.5% was due to customers from Member States of the European Union and the European Free Trade Association, and 14.8% - to customers from other countries. Clients from Bulgaria generated 58.7% of the turnover of innovation-active enterprises, while for not innovation-active enterprises this share was higher by 72.5%.

**Figure 5. Structure of turnover of enterprises in 2018 by type of customers**



The economic activity that had the highest percentage of innovation-active enterprises in the Industry was “Manufacture of basic pharmaceutical products and pharmaceutical preparations” (66.7%). In the Service sector after “Scientific research and development (R&D) activity” in which all enterprises were innovation-active, as R&D is a type of innovation, were computer programming, consultancy and related activities (56.7%).

**Figure 6. Economic activities with the highest innovation activity share in industry and services during the period 2016 - 2018**



## Methodological notes

The statistical survey on innovation activity is conducted every even year and the observation period covered by the survey is the three-year period.

Units of observation are all enterprises of non-financial and financial sector with 10 or more persons employed engaged primarily in the following economic activities (NACE Rev. 2): Mining and quarrying; Manufacturing; Electricity, gas, steam and air conditioning supply; Water supply; sewerage, waste management and remediation activities; Wholesale trade, except of motor vehicles and motorcycles; Transportation and storage; Information and communication; Financial and insurance activities; Architectural and engineering activities; technical testing and analysis; Scientific research and development; Advertising and market research.

An **innovation** is a new or improved product (good or service) or business process that differs significantly from the enterprise's previous products or business processes and that has been implemented on the market or brought into use by the enterprise.

An **innovation-active enterprise** is an enterprise engaged during the observation period 2016 - 2018 in one or more activities to develop or implement new or improved products or business processes.

A **product innovation** is a new or improved good or service that differs significantly from the enterprise's previous goods or services and that has been implemented on the market. It includes significant changes to the design of the goods. Simple re-sale of new goods and changes of a solely aesthetic nature are excluded.

A **business process innovation** is a new or improved business process for one or more business functions that differs significantly from the enterprises' previous business processes and that has been implemented within the firm. Business process innovations include new or improved methods for: producing goods or providing services; logistics, delivery or distribution; information processing or communication; accounting or other administrative operations; business practices for organising procedures or external relations; organising work responsibility, decision making or human resource management and marketing methods for promotion, packaging, pricing, product placement or after sales services.

Innovations should be new to the enterprise concerned, but they do not necessarily have to be new to the market, i.e. the enterprise does not necessarily have to be the first one to have produced these products (goods or services) or introduced these business processes.

**Innovation activity** includes all developmental, financial and commercial activities undertaken by the enterprise that are intended to result in innovations.

More information and data from the survey on innovation activity of the enterprises can be found at the NSI's web site (<https://www.nsi.bg/en/content/6785/innovation-activity>) and in Information System Infostat ([https://infostat.nsi.bg/infostat/pages/module.jsf?x\\_2=90](https://infostat.nsi.bg/infostat/pages/module.jsf?x_2=90)).