Digital economy and society statistics - enterprises

Statistics Explained

Data extracted in March 2018
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This article presents recent statistical data on several different aspects of the digital economy and society in the European Union (EU) , focusing on the use of information and communication technologies (ICTs) by enterprises .

Progress in the development of the digital economy is regarded as critical to improve the competitiveness of the EU's economy. ICTs have quickly become an integral part of how enterprises function: indeed, their extensive use has had a profound impact on how businesses are run, touching upon a range of aspects such as how they organise their internal communications, share their information with business partners, or communicate with their customers.

This article presents recent statistics on the use of the internet by enterprises, covering fixed broadband access, the speed of internet connections, the use of social media and technologies for e-business. The widespread use of ICTs in the workplace has resulted in an increased demand for ICT specialists and the article also provides information pertaining to their recruitment, in particular the difficulties faced by some enterprises in filling vacancies. The article closes with information on e-commerce , which continues to develop across a broad range of activities.

Enterprises' presence on the internet

Enterprises connected to the internet via fixed broadband

In 2017, the vast majority (93 %) of enterprises in the EU-28 with at least 10 persons employed made use of a fixed broadband connection to access the internet (see Figure 1). This share remained between 92 % and 93 % during the most recent four years, suggesting that the uptake of this technology had reached saturation. With almost all enterprises connected to the internet via broadband, the attention of policymakers has more recently switched to the uptake of mobile internet connections (as enterprises increasingly equip their staff with portable computers, smartphones and other mobile devices) and to the speed of fixed broadband connections.

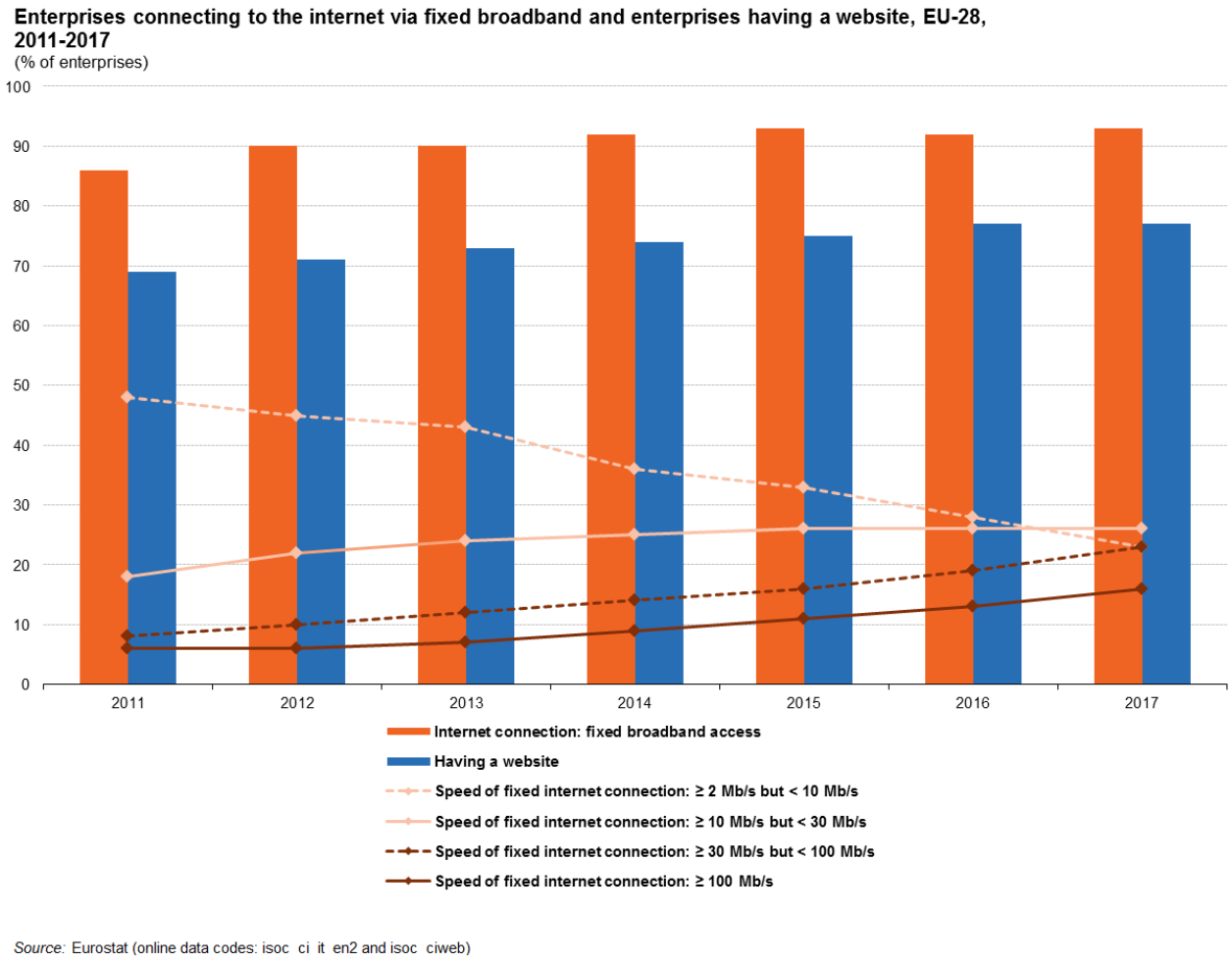
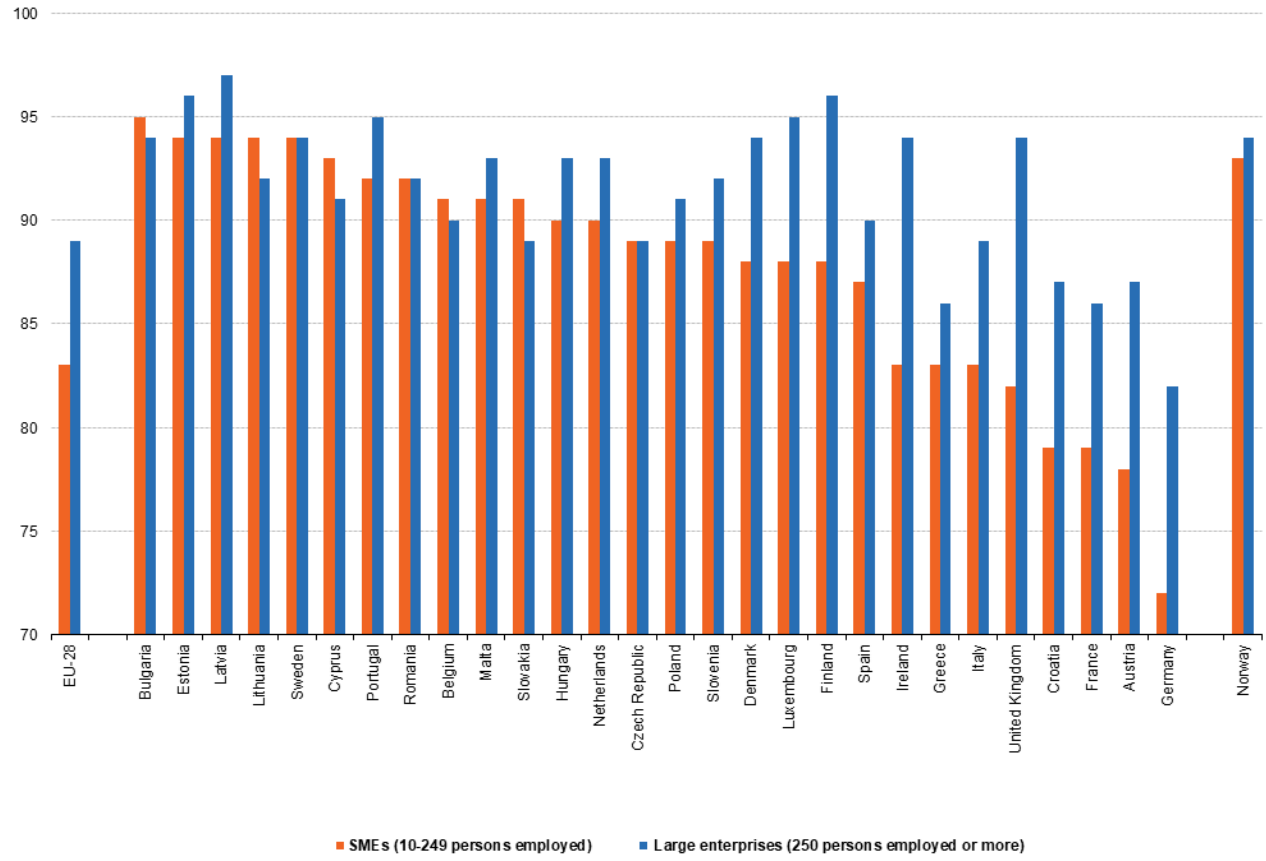


Figure 1: Enterprises connecting to the internet via fixed broadband and enterprises having a website, EU-28, 2011-2017(% of enterprises)Source: Eurostat (isoc_ci_it_en2) and (isoc_ciweb)

The share of enterprises using the fastest internet connections grew from 6 % to 16 % between 2011 and 2017

In 2017, almost one quarter (23 %) of enterprises in the EU-28 had an internet connection speed that was within the range of $\geq$ 2 Mb/s but $<$ 10 Mb/s, with a slightly higher share (26 %) having a connection that was in the range of $\geq$ 10 Mb/s but $<$ 30 Mb/s. Almost one quarter (23 %) had a connection in the range of $\geq$ 30 Mb/s but $<$ 100 Mb/s, while the fastest internet connections (at least 100 Mb/s) were enjoyed by around one sixth (16 %) of enterprises in the EU-28. As can be seen from Figure 1, the share of enterprises using the slowest connection speeds fell during successive periods between 2012 and 2017 while the share using the two fastest connections increased.Figure 2 provides information relating to the proportion of enterprises that considered the speed of their fixed internet connection to be sufficient for their actual needs. In 2017, this share was 83 % across the whole of the EU-28, ranging from a high of 95 % in Bulgaria (where 19 out of 20 enterprises considered the speed of the fixed internet connection to be sufficient) down to lows of less than four fifths of all enterprises in France, Austria (both 79 %) and especially Germany (73 %).

It is interesting to note that in the EU Member States with relatively high proportions of enterprises considering their fixed internet connection to be sufficient for their actual needs, there was little difference in levels of satisfaction between enterprises from different size classes. By contrast, those Member States where a relatively low share of enterprises considered their internet connection to be sufficient were often characterised by much lower levels of satisfaction among small and medium-sized enterprises (SMEs); this gap in satisfaction between SMEs and large enterprises rose to at least 10 percentage points in Germany, Ireland and the United Kingdom.



Note: ranked on the average for all enterprises (SMEs and large enterprises).
Source: Eurostat (online data code: isoc_ci_it_en2)

Figure 2: Enterprises considering the speed of their fixed internet connection to be sufficient, by enterprise size, 2017(% of enterprises using a fixed broadband connection)Source: Eurostat (isoc_ci_it_en2)

The use of ICTs has the potential to make significant changes to the way that enterprises are run, the adoption of ICT-based solutions within business processes is often referred to using the generic term of 'e-business'. Figure 1 presents information in relation to one of the most basic types of e-business that is used by enterprises, namely having a website. In 2017, more than three quarters (77 %) of enterprises in the EU-28 gave importance to their visibility on the internet and had a website. This share was eight percentage points higher than it had been in 2011, when 69 % of enterprises had a website. Although the rate of growth for the proportion of enterprises with a website slowed and even stagnated in 2017, some enterprises attach increasing importance to their internet presence, as witnessed through the development of increasingly complex online functionalities, for example, online sales, order-tracking, product customisation and/or links to social media.

Enterprises using social media

Over the last decade there has been a shift away from static webpages towards web applications which draw on user data. Enterprises have not only progressively embraced this new generation of dynamic web applications, but have also adopted new behaviours. Those with websites have sought to enhance their internet presence by using these possibilities and have, for example, integrated social media into the way they run their business, as well as using these tools to organise internal communications or how they interact with customers.

Social media refers to internet-based applications, for example, social networks, blogs, multimedia content-sharing sites or wikis. Most enterprises that use social media tend to do so for image building and/or marketing products, in order to reach as wide an audience as possible. Corporate blogs are websites that are updated frequently, up to several times a day, with posts that contain text, images, audio or videos. Blogs can be used either inside an enterprise or for communicating with outside parties such as customers, business partners or

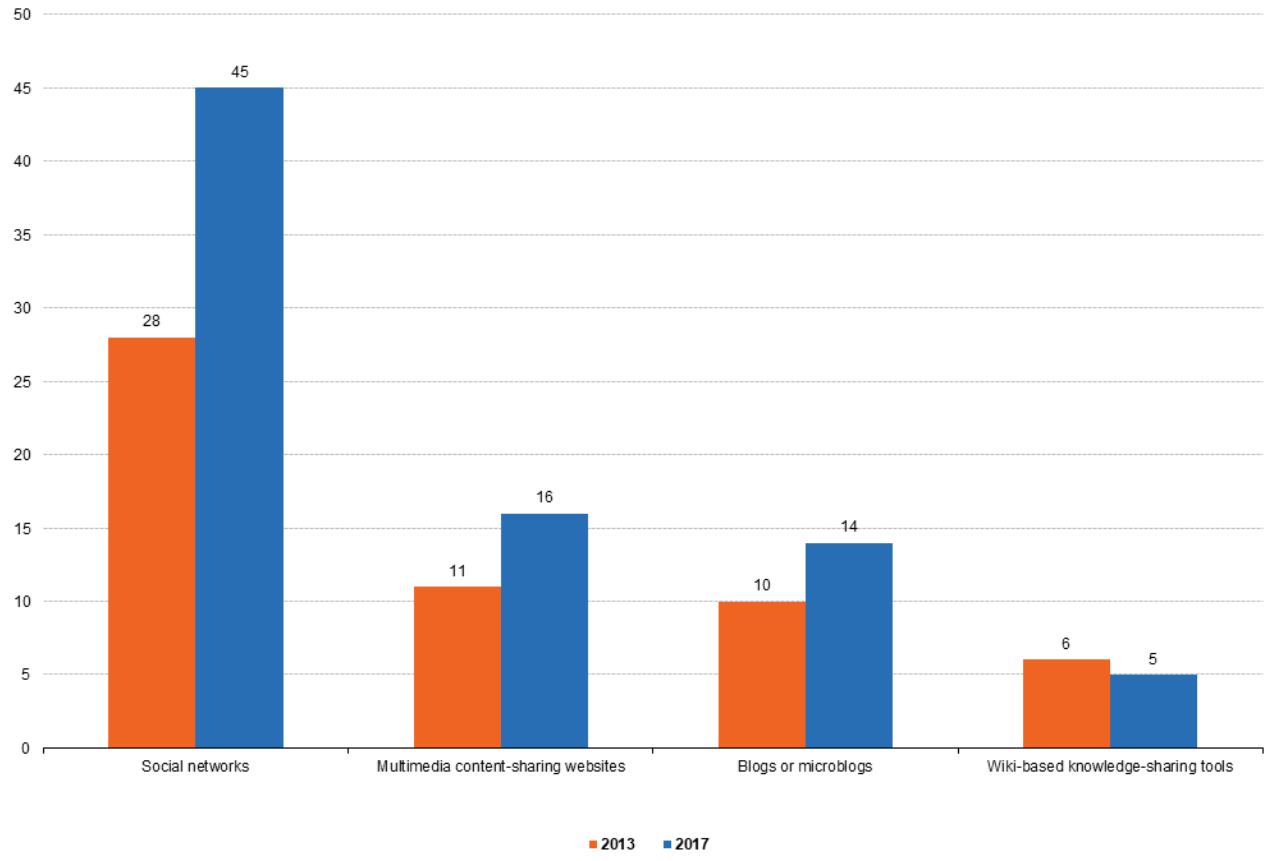
other organisations. A wiki is a website that, in principle, allows multiple users to create and collaboratively edit interlinked webpages using an internet browser. Wiki-based communication platforms may be open to a global audience or may be restricted to a selected network or community of partners.

In 2017, almost half (47 %) of EU-28 enterprises made use of any type of social media. This proportion rose at a relatively fast pace, growing by 17 percentage points between 2013 and 2017.

The most popular form of social media among enterprises was social networks

The four most widely used categories of social media are shown in Figure 3. In 2017, more than two fifths (45 %) of EU-28 enterprises used social networks. Some 16 % of enterprises used multimedia content-sharing websites, while a similar share (14 %) used blogs and microblogs. The share of enterprises using wiki-based knowledge-sharing tools was considerably lower, at 5 %.

Between 2013 and 2017, the use of social networks increased at a faster pace than for any of the other types of social media, rising by 17 percentage points, while the gains for multimedia content-sharing websites and blogs or microblogs were less marked (up 5 and 4 percentage points respectively); there was almost no change in the share of enterprises using wiki-based knowledge-sharing tools (down 1 percentage point).

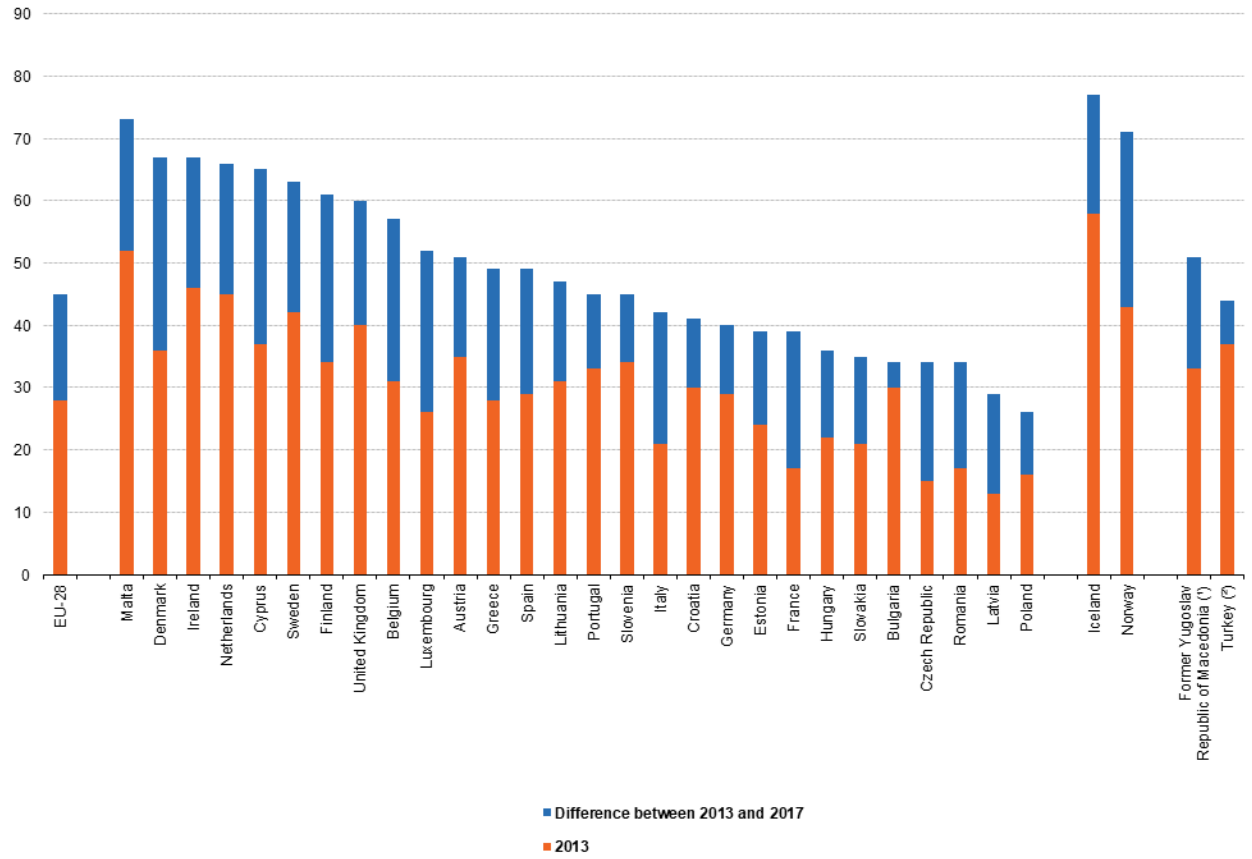


Source: Eurostat (online data code: isoc_cismt)

Figure 3: Enterprises using social media, by type of social media, EU-28, 2013 and 2017(% of enterprises)Source: Eurostat (isoc_cismt)

There were 11 EU Member States where more than half of all enterprises made use of social networks in 2017, with this share peaking at 73 % in Malta. Although the use of social networks increased at a more rapid pace than the use of any other type of social media between 2013 and 2017, there were some considerable disparities between the EU Member States (see Figure 4). Just over half (16) of the Member States recorded an increase in their enterprise use of social networks that was at least as fast as the EU-28 average (up 17 percentage points); this group included all but one of the 11 Member States where more than half of the enterprise population made

use of social networks (the only exception was Austria). The most rapid increases in enterprise use of social networks between 2013 and 2017 were recorded for Denmark and Cyprus (up 31 and 28 percentage points), followed by Finland (27 points), Belgium and Luxembourg (both 26 points). By contrast, the proportion of enterprises using social networks in Bulgaria increased by just four percentage points between 2013 and 2017 to reach 34 %.



(1) 2016 instead of 2017.
(2) 2015 instead of 2013.
Source: Eurostat (online data code: isoc_cismt)

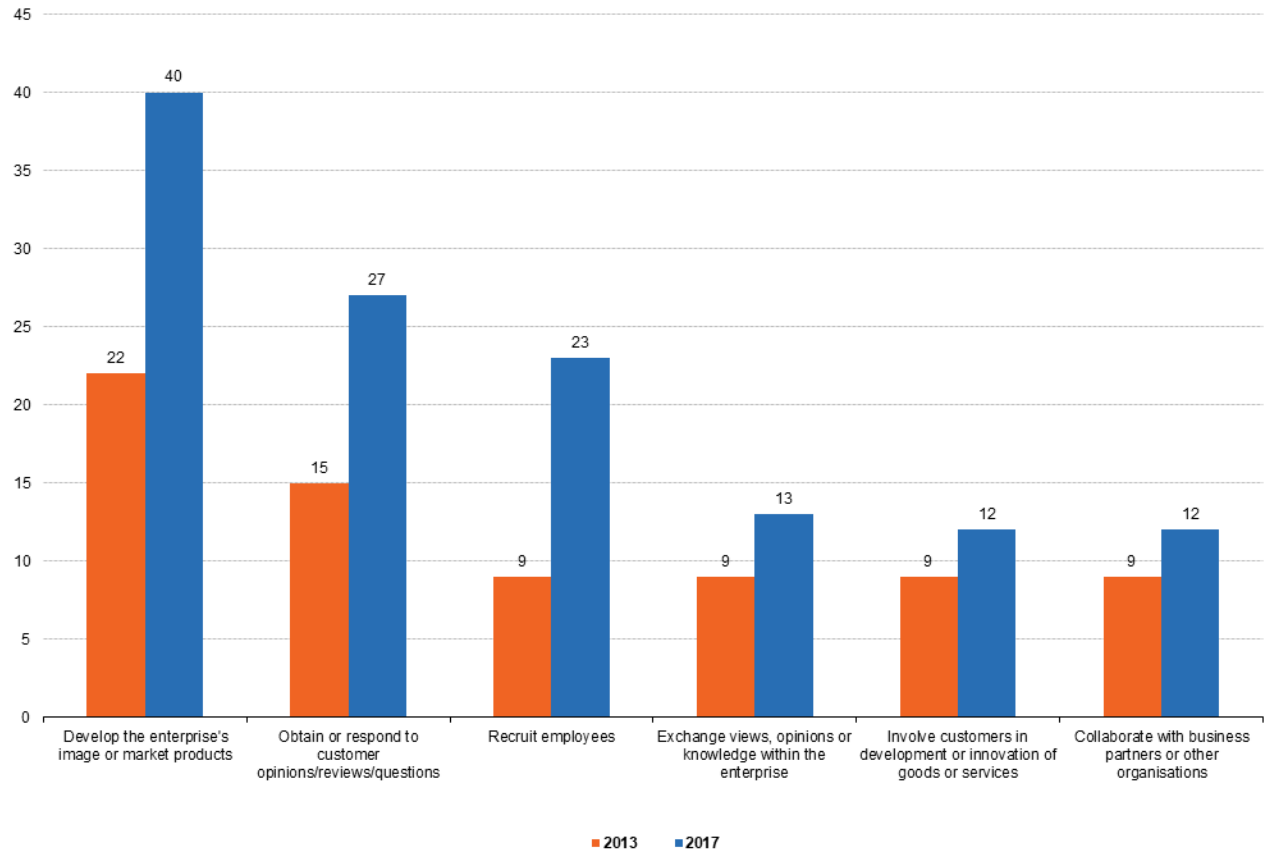
Figure 4: Enterprises using social networks, 2013 and 2017(% of enterprises)Source: Eurostat (isoc_cismt)

Social media — a business paradigm shift

As noted above, during the last decade there has been a shift from the static webpages of early websites towards greater use of web applications which draw on user data and relevant applications stored in the 'cloud'. A multitude of internet-based services, collaborative web applications and interactive websites have appeared. Users have been encouraged to subscribe to these services, to author, post and share user-generated content and to add links to other websites. In addition, individuals and enterprises have been supported in exchanging information, experiences and opinions in the form of 'many-to-many dialogues' over internet communication platforms. These virtual interaction platforms have, in fact, been part of a paradigm shift. Enterprises have not only progressively embraced this new generation of highly dynamic web applications, but have also adopted new behaviours. They have integrated social media into the way they run their business, organised forms of internal communication apart from the management chain and, most importantly, communicated and interacted with customers. From this point of view it has been possible for customers to influence business decisions and assist companies in designing and marketing their products.

It is important to distinguish the purposes for which enterprises were using social media: it might be to reach the 'outside world' — customers, business partners or other organisations — or it may be to communicate within the enterprise itself or alternatively for specific purposes such as to recruit employees. Figure 5 shows

that across the EU-28, 40 % of all enterprises used social media to develop their image or to market their products. This marked an increase of 18 percentage points compared with 2013. The second most common reason for using social media among enterprises within the EU-28 was to obtain or respond to customers' opinions, reviews or questions (27 %); this share was almost twice as high as that recorded in 2013 (15 %). Using social media to recruit employees also registered a considerable increase in its use, which rose from 9 % to 23 % during the period under consideration. There was a slower expansion in the use of the remaining purposes for which enterprises were using social media during the period 2013 to 2017: the share of enterprises that used social media to exchange views, opinions or knowledge within the enterprise rose to 13 %, while the share that involved customers in development/innovation or the share that collaborated with business partners or other organisations stood at 12 %.



Source: Eurostat (online data code: isoc_cismp)

Figure 5: Enterprises using social media, by purpose of use, EU-28, 2013 and 2017(% of enterprises)Source: Eurostat (isoc_cismp)

E-business integration

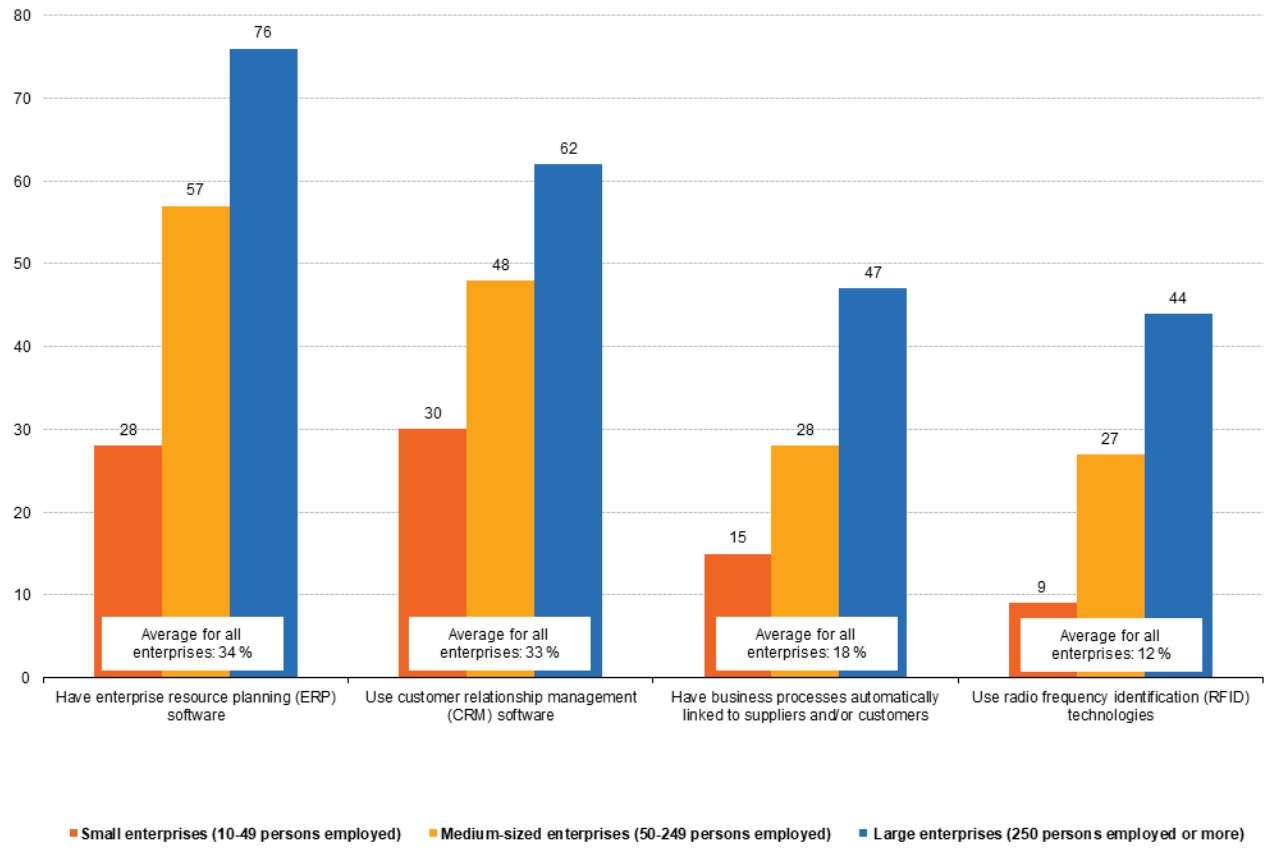
Access to the internet is often viewed as being at the cornerstone of developing e-business solutions given the internet's limitless capacity for connecting enterprises and people across the globe. This potential has led to a range of new technologies being made available for sharing information electronically and automatically between different business functions, both within a single enterprise and/or in cooperation with suppliers or customers.

ERP software applications aim to facilitate the flow of information and the potential to integrate internal and external management information across several functions of an enterprise. One characteristic of ERP is that it is delivered in 'modules' that typically integrate processes relevant to planning, purchases, marketing, sales, customer relationship, finance and human resources. The share of EU-28 enterprises that used ERP software applications stood at 34 % in 2017 (see Figure 6), with a considerable difference in its use between small enterprises (those with 10-49 persons employed; 28 %) and large enterprises (those with at least 250 persons employed; 76 %).

Enterprises may choose to streamline their marketing efforts and target (better) their customers to maximise their business potential. For this specific purpose, they might adopt software applications for managing information about their customers — customer relationship management (CRM) applications. It is believed that the adoption of CRM improves marketing and sales performance by improving customer service and customer relationships. Improvements come, for instance, from providing user-friendly mechanisms for receiving complaints, identifying potential problems before they occur, by facilitating communication with the customer and by anticipating customer preferences. These technology enabled improvements may lead to long term customer satisfaction and increased customer loyalty, decrease marketing costs and increase sales. Some 33 % of EU-28 enterprises used CRM software applications in 2017, with the share among small enterprises (30 %) about half that recorded for large enterprises (62 %).

Supply chain management includes all activities concerning the exchange of information between an enterprise and its suppliers and/or customers. This information may concern, for example, inventory levels, production plans, demand and supply forecasts or progress of deliveries. Accordingly, the use of SCM software applications aims to coordinate effectively the availability and delivery of products to final consumers, in the right quantity, at the right time, into the right hands at optimal cost. Across the EU-28, some 18 % of enterprises made use of business processes that automatically linked them to suppliers and/or customers in 2017, with the share recorded among small enterprises (15 %) about one third of that recorded for large enterprises (47 %).

Enterprises that use radio frequency identification may automatically store and retrieve data through the use of tags or transponders (devices that can be applied to or incorporated into products) so they transmit data via radio waves. Less than 1 in 10 (9 %) small enterprises in the EU-28 made use of this technology in 2017, while the share for large enterprises was more than four times as high (44 %).



Source: Eurostat (online data codes: isoc_eb_iip and isoc_eb_ics)

Figure 6: Enterprises adopting technologies for e-business, by enterprise size, EU-28, 2017(% of enterprises)Source: Eurostat (isoc_eb_iip) and (isoc_eb_ics)

Recruitment of ICT specialists

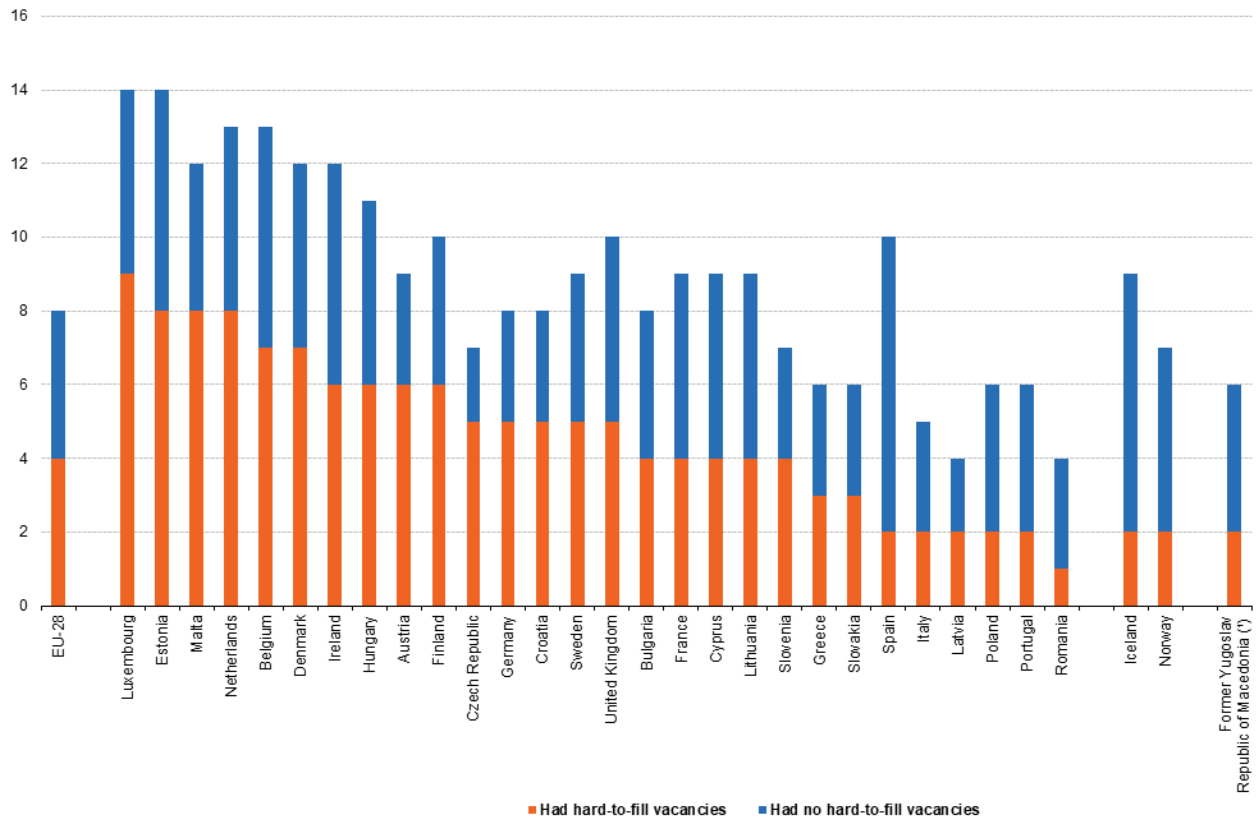
It has become increasingly common (especially in relatively large enterprises) to have a dedicated IT team or department. ICT-enabled solutions that require specialists to develop, adapt, maintain or support IT systems may include: web solutions for enterprise websites and e-commerce; enterprise resource planning; supply chain management; customer relationship management applications; or the use of cloud computing services. For the data presented in Figure 7, ICT specialists are defined as people whose main job involves ICT and who are capable of dealing with a wide range of tasks concerning corporate IT systems.

In 2016, some 8 % of EU-28 enterprises recruited or tried to recruit personnel for jobs requiring specialist ICT skills, while 4 % of enterprises reported that it was hard to fill vacancies for jobs requiring specialist ICT skills. These figures are heavily skewed by the large number of small enterprises in the population of enterprise with at least 10 persons employed. More than two fifths (42 %) of large enterprises recruited or tried to recruit personnel for jobs requiring specialist ICT skills in 2016, while more than one fifth (22 %) of large enterprises reported that they had hard-to-fill vacancies for jobs requiring specialist ICT skills. By contrast, the corresponding shares for medium-sized enterprises were 17 % and 8 % respectively, and for small enterprises they were 6 % and 3 % respectively.

Enterprises in the Benelux countries and Estonia were more likely to report difficulties in recruiting ICT specialists

The proportion of enterprises that recruit ICT specialists reflects, among others, differences at a national level in: the size and structure of enterprises; industrial specialisations; or the propensity to outsource various business functions. Compared with the EU-28 average — 8 % of enterprises in 2016 — the highest shares of enterprises that recruited or tried to recruit personnel for jobs requiring specialist ICT skills were recorded in the Benelux countries of Belgium, Luxembourg and the Netherlands, as well as Estonia (all 13 %).

Figure 7 focuses on two particular subgroups, enterprises that had difficulties and enterprises that had no difficulties in filling ICT vacancies. Among those enterprises that recruited or tried to recruit ICT specialists in 2016, the ratio of those facing difficulties in filling vacancies to those that did not face difficulties was lowest in Spain, Romania, Poland and Portugal, where at least twice as many enterprises recruiting ICT specialists had no hard-to-fill vacancies as the number who had hard-to-fill vacancies. By contrast, in the Czech Republic, Malta and Austria the situation was reversed, as there were at least twice as many enterprises having hard-to-fill vacancies as the number who did not.



(') 2015.
Source: Eurostat (online data code: isoc_ske_itrcrn2)

Figure 7: Enterprises that recruited or tried to recruit ICT specialists, with and without difficulties in filling vacancies, 2016(% of enterprises)Source: Eurostat (isoc_ske_itrcrn2)

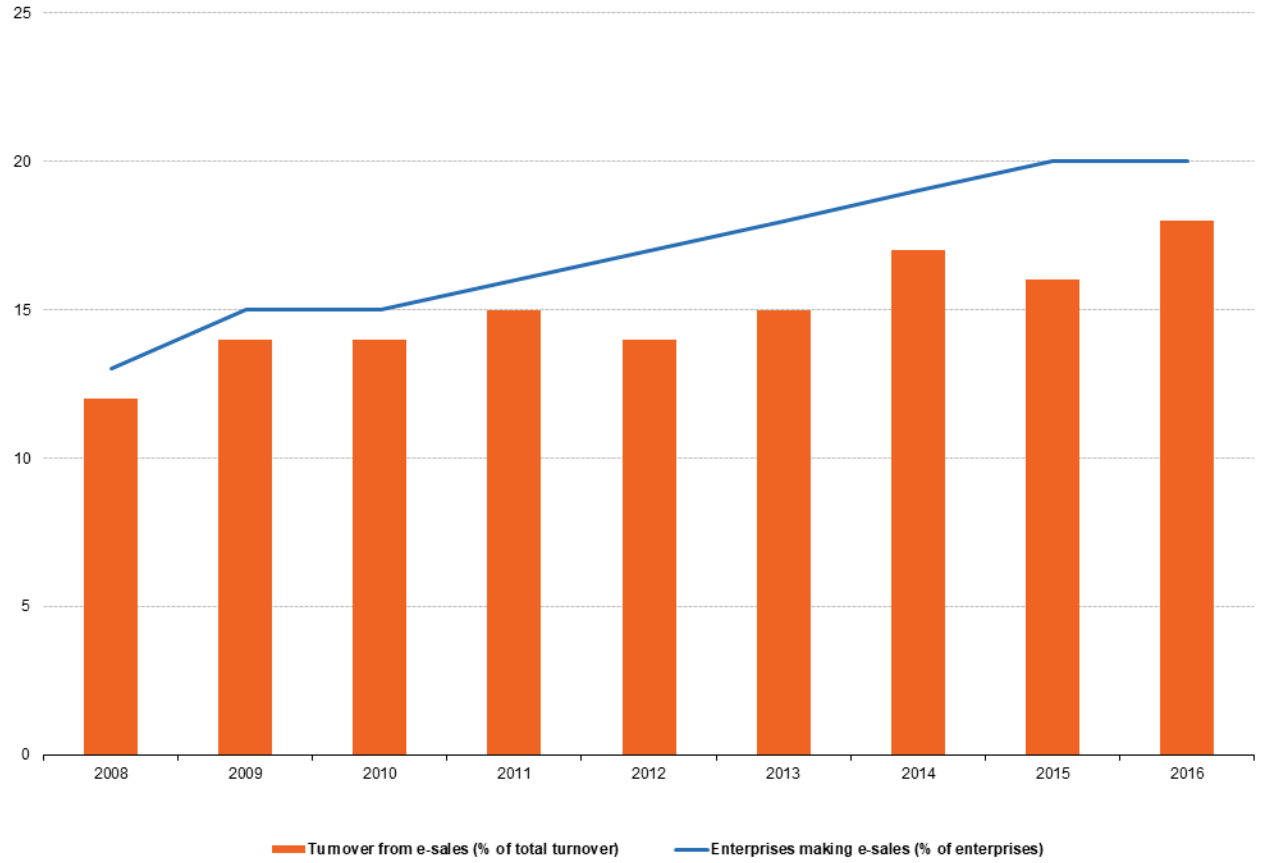
Enterprises engaged in e-commerce

For the purpose of this analysis, e-commerce refers to the trading of goods or services over computer networks such as the internet. E-sales concern the receipt of orders by methods specifically designed for the purpose of receiving orders, either via electronic data interchange (EDI) or through websites or apps; orders received by way of manually typed e-mail messages are excluded.

Figure 8 shows that e-sales accounted for 18 % of the total turnover generated by EU-28 enterprises in 2016, which was the highest share recorded during the period from 2008 to 2016. Overall, the share of e-sales in total turnover rose by 6 percentage points between 2008 and 2016, as the share had been 12 % at the start of the period under consideration.

The share of enterprises in the EU-28 making e-sales stood at 20 % in 2016

One fifth (20 %) of all enterprises in the EU-28 made e-commerce sales in 2016, reflecting a rise of seven percentage points compared with 2008. As with many other ICT indicators, the incidence of e-sales is skewed according to enterprise size: 44 % of large enterprises made e-sales in 2016, with this share dropping to 29 % for medium-sized enterprises and to 18 % for small enterprises, in other words less than half the share for large enterprises.



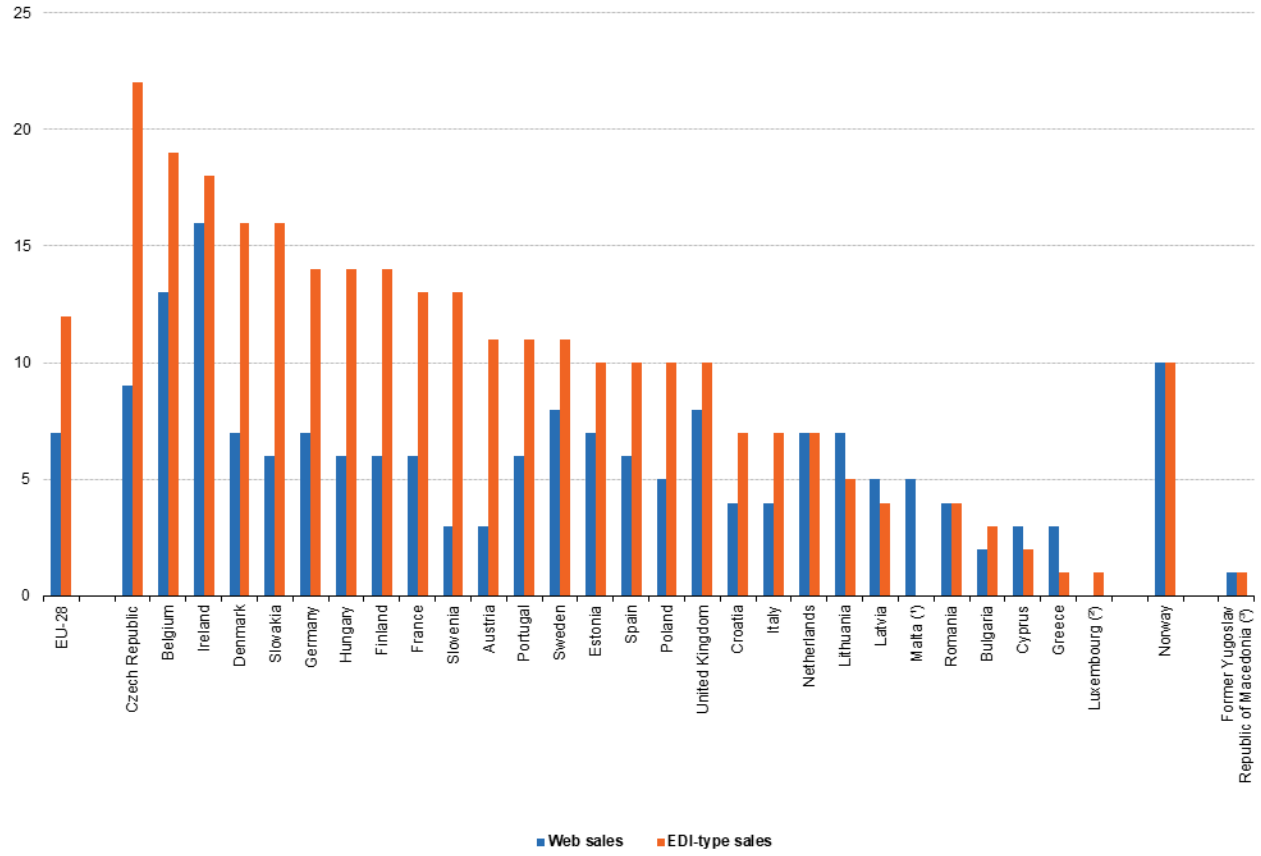
Source: Eurostat (online data code: isoc_ci_eu_en2)

Figure 8: Enterprises making e-sales and turnover from e-sales, EU-28, 2008-2016Source: Eurostat (isoc_ci_eu_en2)

The share of turnover from EDI-type sales was greater than that from web sales

Enterprises which receive e-commerce orders may be divided at a basic level into those making e-sales via a website or apps (web sales) and those making e-sales via EDI. Although a higher proportion (16 %) of enterprises used websites to make e-sales in 2016 than used EDI-type sales (7 %), the share of web sales in the total turnover generated by EU-28 enterprises was relatively low, standing at 7 % in comparison with 12 % for EDI-type sales (see Figure 9).

In relative terms, the split in turnover between that generated from e-sales via EDI-type messages and that generated by web sales was most pronounced in Slovenia, where EDI-type sales were 4.3 times as high as web sales in 2016. In Austria, Slovakia, the Czech Republic, Hungary, Finland, Denmark and France, EDI-type sales accounted for a share of total turnover that was more than twice as high as that recorded for web sales. By contrast, in Latvia, Cyprus, Lithuania and Greece the share of total turnover generated by web sales was higher than the share generated via EDI-type sales.



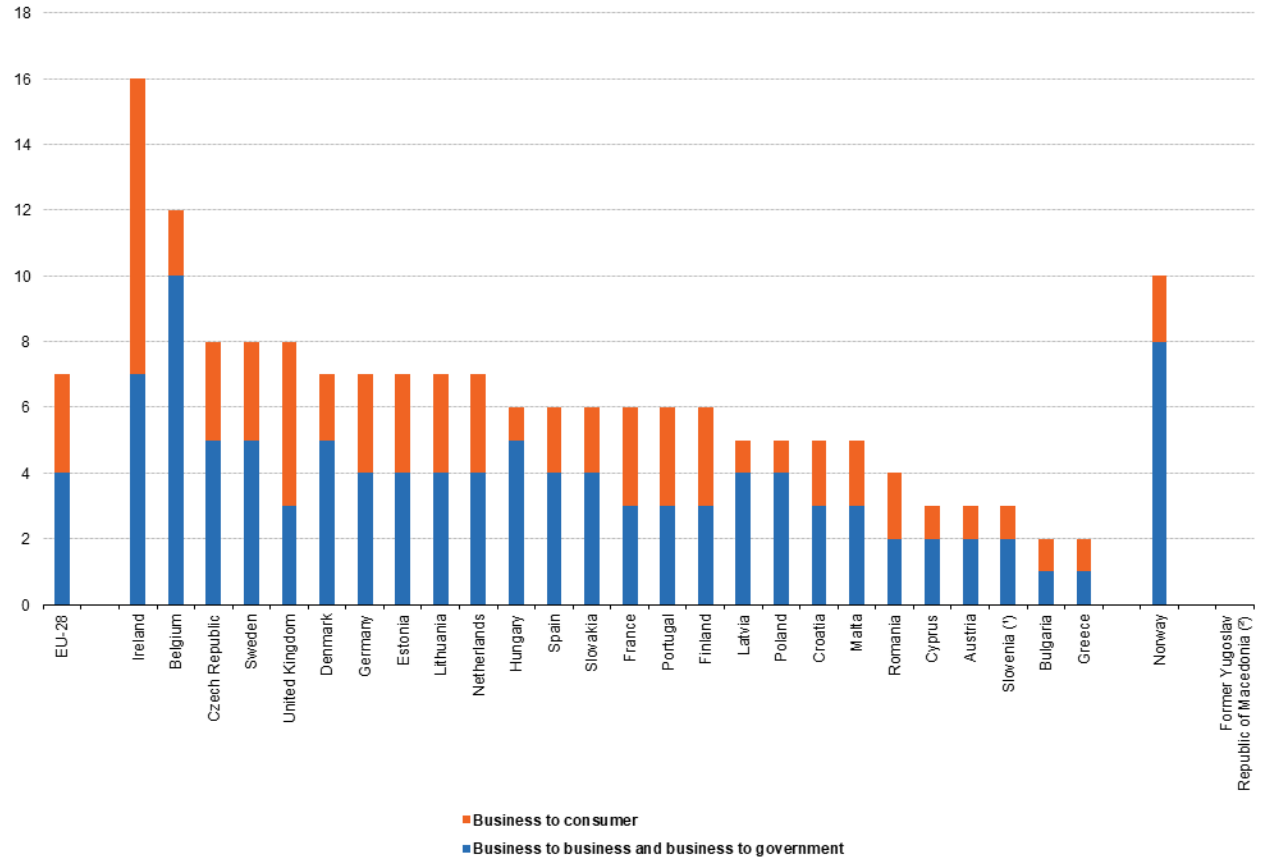
(1) EDI-type sales: not available.
(2) Web sales: not available. 2014.
(3) 2014.
Source: Eurostat (online data code: isoc_ec_evaln2)

Figure 9: Turnover from e-sales, by type of order, 2016(% of total turnover)Source: Eurostat (isoc_ec_evaln2)

Slightly more turnover came from e-sales to other businesses and public authorities than from business to consumer web sales

Across the EU-28, enterprises generated 7 % of their total turnover from web sales during 2016, consisting of orders via a website or apps. Figure 10 presents an analysis of how these sales were divided between different types of customer. Some 4 % of total turnover came from e-sales to other businesses and public authorities, while 3 % of total turnover came from business to consumer web sales.

In 2016, the United Kingdom and Ireland were the only EU Member States to report that a majority of their turnover from web sales was derived from business to consumer relationships. By contrast, the share of total turnover that was derived from web sales made through business to business and business to government relationships was five times as high as the share from business to consumer relationships in Belgium and Hungary and four times as high in Latvia and Poland.



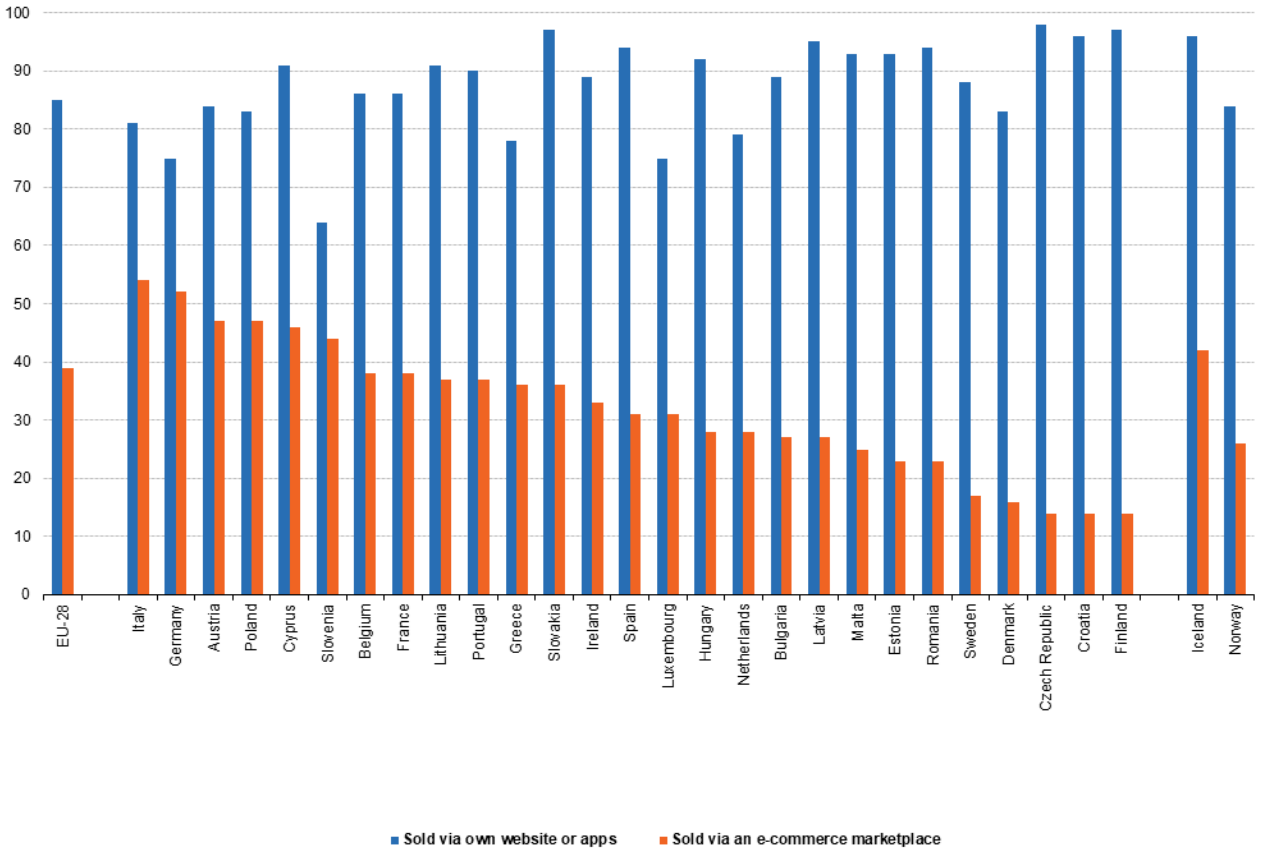
Note: Italy and Luxembourg, not available.
(1) 2015.
(2) 2014.
Source: Eurostat (online data code: isoc_ec_evaln2)

Figure 10: Turnover from web sales, by type of customer, 2016(% of total turnover)Source: Eurostat (isoc_ec_evaln2)

More than twice as many enterprises with web sales used their own websites or apps for sales than used e-commerce marketplaces

Looking in more detail at web sales, Figure 11 provides an analysis by type of sale of enterprises that made web sales in 2016. The information is split between those enterprises that made web sales via their own website or apps and those enterprises that made web sales via e-commerce marketplaces; the latter may facilitate economic growth by enabling sellers to access new markets and reach new customers at lower cost.

During 2016, 85 % of enterprises in the EU-28 with web sales used their own website or apps for sales, while 39 % used an e-commerce marketplace. The highest percentages of enterprises with web sales via their own website or apps were recorded in the Czech Republic (98 %), Slovakia and Finland (both 97 %), Croatia (96 %) and Latvia (95 %), while the lowest shares were registered in Slovenia (64 %), Germany and Luxembourg (both 75 %). The share of enterprises with web sales that made use of e-commerce marketplaces peaked at 54 % in Italy and 52 % in Germany (none of the remaining Member States recorded shares above one half). By contrast, just 14 % of enterprises with web sales in the Czech Republic, Croatia and Finland sold via e-commerce marketplaces, while this share was also less than one fifth of all enterprises with web sales in Denmark (16 %) and Sweden (17 %).



Note: United Kingdom, not available.
Source: Eurostat (online data code: isoc_ec_eseln2)

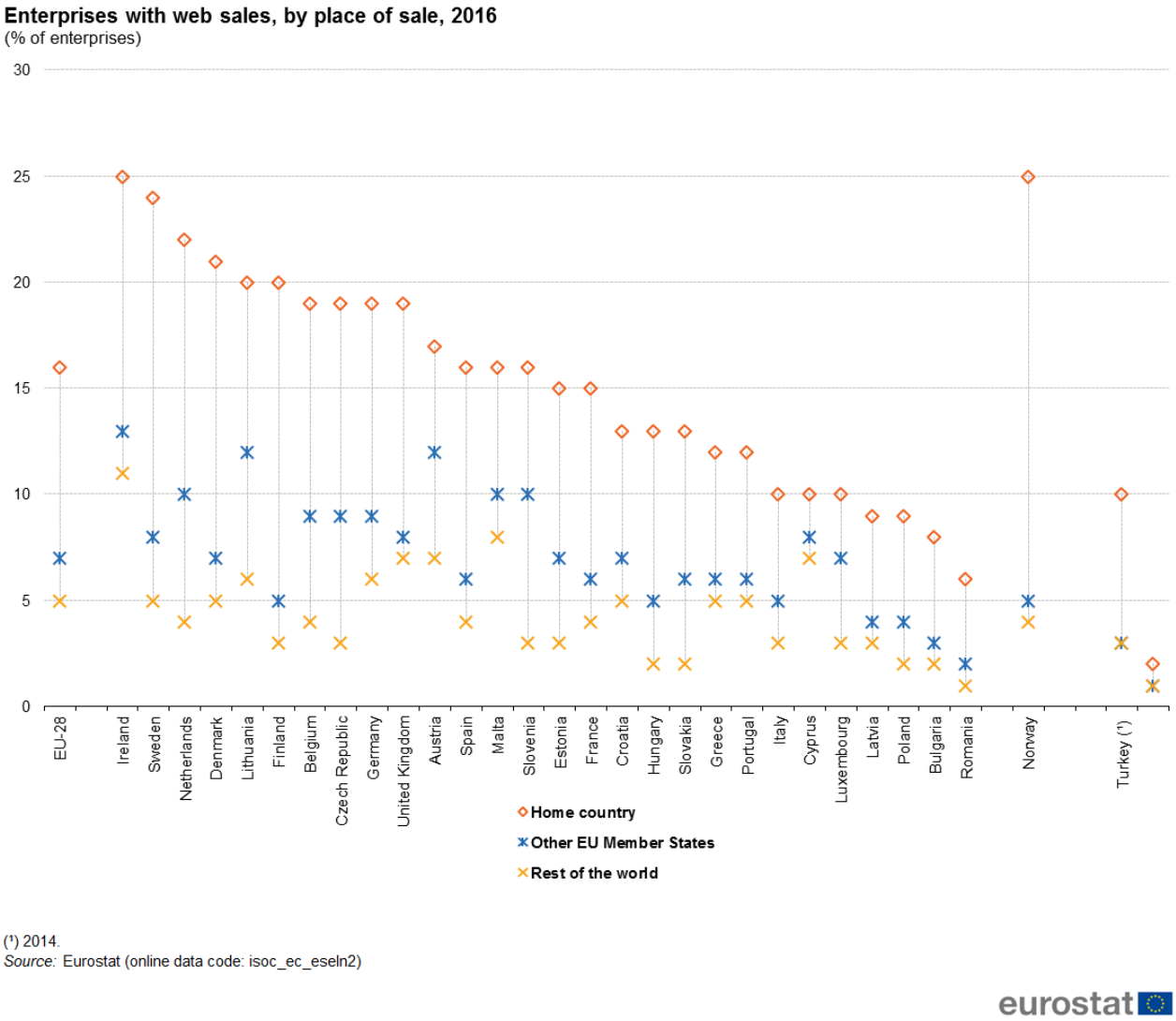
Figure 11: Enterprises with web sales, by type of sales, 2016(% of enterprises with web sales)Source: Eurostat (isoc_ec_eseln2)

A greater share of enterprises made web sales within their own national markets than elsewhere within the EU or outside of the EU

E-commerce enables enterprises to establish a presence not only in local or regional markets, but also in national and international markets, allowing some businesses to extend their economic activities beyond national borders. Moreover, e-commerce has the potential to reshape the European Single Market for enterprises and private consumers by enabling price and product-related comparisons.

In 2016, almost all enterprises in the EU-28 that made web sales (16 %) sold to customers in their own (home) country, while 7 % of all EU-28 enterprises made web sales to other EU Member States and 5 % to other countries in the rest of the world. In 2016, the highest proportions of enterprises with web sales to other EU Member States countries were recorded in Ireland (13 %), followed by Lithuania and Austria (both 12 %), while Malta, the Netherlands and Slovenia also recorded double-digit shares. By contrast, the share of enterprises making web sales to other EU Member States fell to less than 5 % in Latvia, Poland, Bulgaria and Romania (see Figure 12).

In 2016, Ireland also recorded the highest share of enterprises declaring that they made web sales to the rest of the world (outside of the EU), this proportion rising to 11 %; Ireland was the only EU Member State with a share that was in double-digits. The next highest shares were recorded in Malta (8 % of enterprises made web sales to the rest of the world), Cyprus, Austria and the United Kingdom (all 7 %).



(1) 2014.
Source: Eurostat (online data code: isoc_ec_eseln2)

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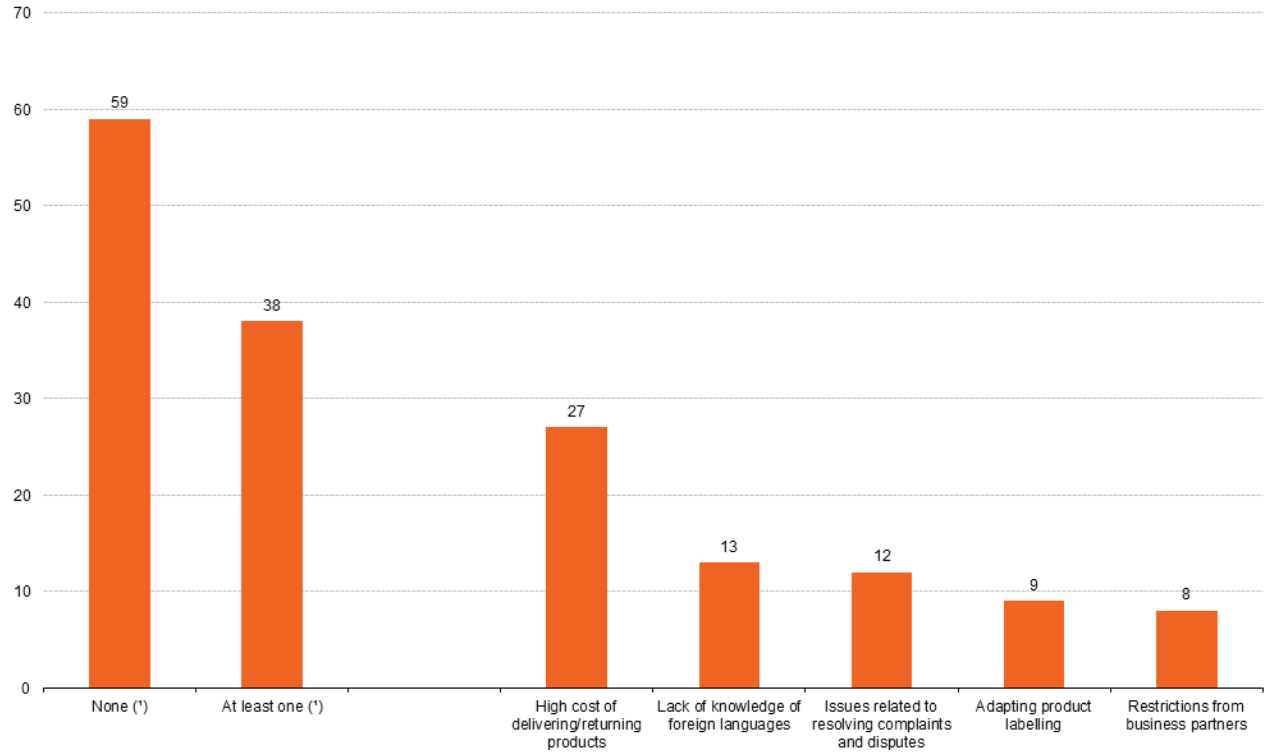
Figure 12: Enterprises with web sales, by place of sale, 2016(% of enterprises)Source: Eurostat (isoc_ec_evaln2)

Around two fifths of enterprises in the EU-28 having received orders via a website or via apps reported difficulties for making web sales to other EU Member States

The majority (59 %) of enterprises in the EU-28 having received orders via a website or via apps during 2016 reported no difficulties for making web sales to other EU Member States (see Figure 13). However, almost four in ten (38 %) EU-28 enterprises reported hampering factors: these concerned economic reasons — such as the high cost of delivering/returning products (27 %), linguistic or technical barriers — such as a lack of knowledge for foreign languages (13 %) or issues linked to being unable to adapt product labelling (9 %), or judicial reasons — such as issues related to resolving complaints and disputes (12 %).



(') The shares do not sum to 100 % due to non-response.
Source: Eurostat (online data code: isoc_ec_wsobs_n2)

Figure 13: Difficulties experienced when making web sales to other EU Member States, EU-28, 2016(% of enterprises with web sales to other EU Member States)Source: Eurostat (isoc_ec_wsobs_n2)

Source data for tables and graphs

- Digital economy and society — enterprises: tables and figures

Data sources

Rapid technological changes in areas related to the internet and other new applications of ICTs pose challenges for statistics. As such, this area of statistics changes at a relatively rapid pace, compared with most other official statistics. Indeed, statistical tools are adapted to satisfy new demands for data and the ICT survey is reassessed on an annual basis in order to reflect the rapid pace of technological change.

The information presented in this article is based on the results of a Community survey on ICT usage and e-commerce in enterprises . The statistics were obtained from enterprise surveys conducted by national statistical authorities. The results of this annual survey are used to benchmark ICT-driven developments, both by following developments for core variables over time and by looking in greater depth at other aspects at a specific point in time.

While the survey on ICT usage in enterprises initially concentrated on e-commerce, internet access and connectivity issues, its scope has subsequently been extended to cover a wider variety of subjects (for example, cloud computing, social media, mobile connections to the internet, the use of e-business solutions, ICT specialists and the outsourcing of ICT functions).

Coverage

The statistical observation unit is the enterprise, as defined in Regulation (EEC) No 696/93 . Note that the annual survey on ICT usage in enterprises covers enterprises that have at least 10 persons employed.

The activity coverage of the survey is restricted to those enterprises whose principal activity is within NACE Rev. 2 Sections C to N excluding Section K and Division 75, but including Group 95.1: manufacturing; elec-

tricity, gas, steam and water supply, sewerage and waste management; construction; wholesale and retail trade, repair of motor vehicles and motorcycles; transportation and storage; accommodation and food service activities; information and communication; real estate; professional, scientific and technical activities (excluding veterinary activities); administrative and support activities; and the repair of computers and communication equipment.

The data collected can be analysed according to enterprise size classes (defined in terms of persons employed), with information presented for small (10-49 persons employed), medium-sized (50-249 persons employed) and large (250 or more persons employed) enterprises.

The data are organised in Eurostat's online database according to the year in which the survey was conducted. Most data refer to the situation during the early part of the same year as the survey. However, data on ICT specialists and on e-commerce refer to the calendar year preceding the survey (in other words, to 2016 for the 2017 survey).

Context

Broadband technologies are considered to be important when measuring access to and use of the internet, as they offer users the possibility to rapidly transfer large volumes of data and keep access lines open. Indeed, the take-up of high-speed and superfast broadband are considered as key indicators within the domain of ICT policymaking. While digital subscriber lines (DSL) remain the main form of delivery for broadband technology in the EU, alternatives such as cable, satellite, fibre optics and wireless local loops are becoming more widespread.

In May 2015, the European Commission adopted a digital single market strategy (COM(2015) 192 final) as one of its top 10 political priorities for the period 2015-2019. The digital single market strategy had 16 initiatives that covered three broad pillars: promoting better online access to goods and services across Europe; designing an optimal environment for digital networks and services to develop; ensuring that the European economy and industry takes full advantage of the digital economy as a potential driver for growth. In the European Commission's work programme for 2017 *Delivering a Europe that protects, empowers and defends* (COM(2016) 710), the European Commission proposed to advance swiftly on proposals that had already been put forward and to undertake a review of the progress made towards completing the digital single market. In May 2017, the European Commission published a mid-term review of its digital single market strategy, which took stock of the situation, while outlining actions in relation to online platforms, the data economy and cybersecurity.

The European Commission is working on a number of initiatives to boost ICT skills in the workforce, as part of a broader agenda for better skills upgrading, anticipating skills demand and matching skills supply to demand. In order to increase the supply of ICT specialists, the European Commission has launched a Grand Coalition for Digital Jobs , an EU-wide partnership that seeks to use European structural and investment funds to alleviate difficulties related to the recruitment of ICT specialists.

On 10 June 2016, the European Commission adopted a new Skills Agenda for Europe which seeks to promote a number of actions to ensure that the right training, the right skills and the right support is made available to people in the EU so that they are equipped with skills that are needed in a modern working environment, including the promotion of digital skills.

Other articles

- E-commerce statistics
- Social media - statistics on the use by enterprises
- Cloud computing - statistics on the use by enterprises
- E-business integration
- ICT specialists - statistics on hard-to-fill vacancies in enterprises

- ICT specialists in employment
- Internet advertising of businesses - statistics on usage of ads
- ICT security in enterprises
- Digital economy and digital society statistics at regional level
- Digital economy and society statistics - households and individuals

Main tables

- Digital economy and society see:

ICT usage in enterprises (t_isoc_e)

Digital skills (t_isoc_sk)

ICT sector (t_isoc_se)

Database

- Digital economy and society , see:

ICT usage in enterprises (isoc_e)

Summary of EU aggregates (isoc_ci_eu_en2)
E-commerce (isoc_ec)
Connection to the internet (isoc_ci)
Websites and use of social media (isoc-cism)
E-business (isoc_eb)

Digital skills (isoc_sk)

Dedicated section

- Digital economy and society

Publications

- Digital economy and society in the EU — 2017 edition — Digital publication
- Science, technology and innovation in Europe — 2013 edition — Pocketbook
- News releases
- Statistical articles

Methodology

- ICT usage and e-commerce in enterprises (ESMS metadata file — isoc_e_esms)
- Methodological manuals for statistics on the information society

External links

- A Digital Single Market Strategy for Europe COM(2015) 192 final
- Monitoring the Digital Economy & Society 2016–2021 , European Commission, Directorate-General Communications Networks, Content & Technology
- OECD — Internet

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