

# Consumer Digital Empowerment Index

2025 Edition  
Research Report



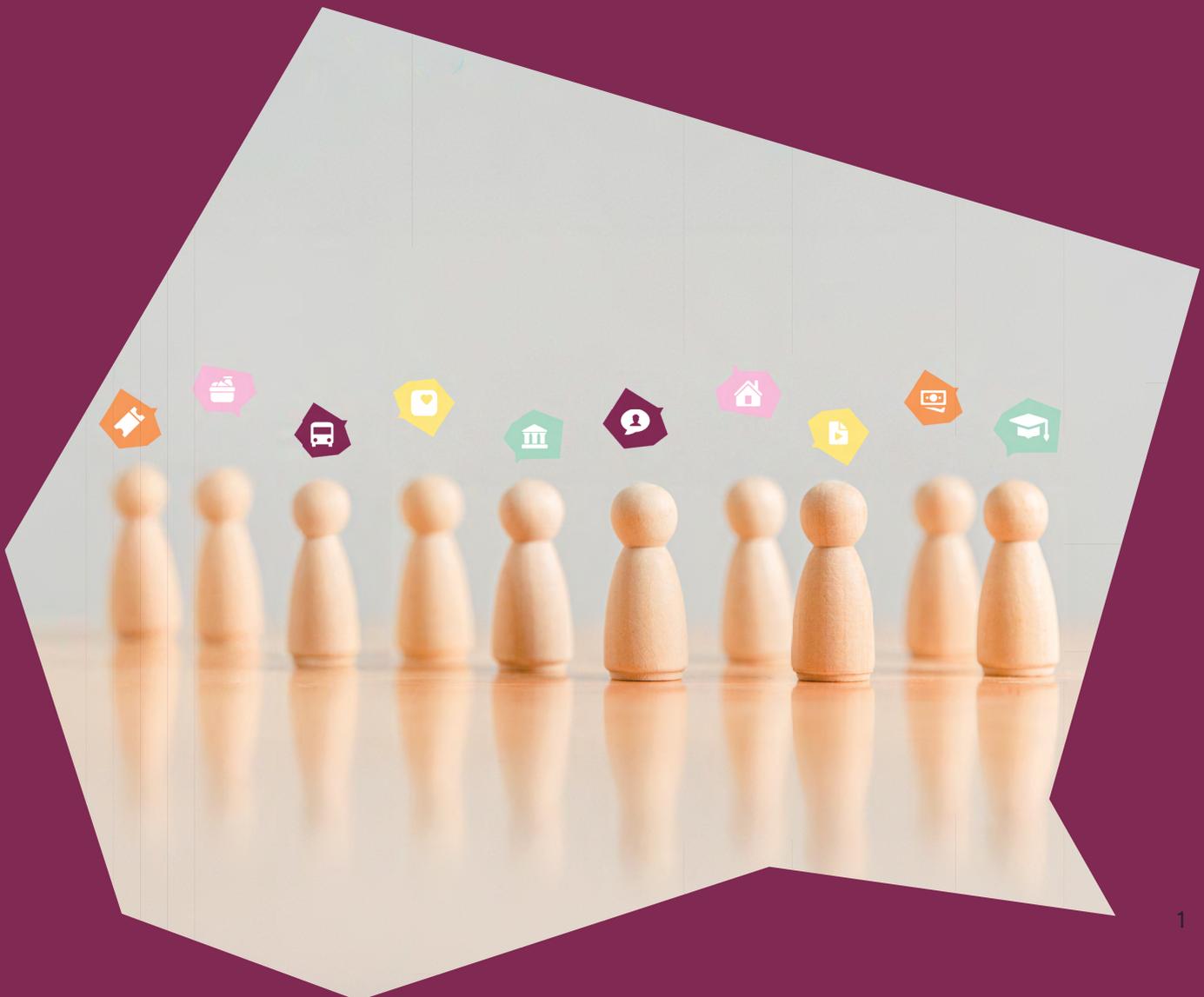
CONSUMER  
EMPOWERMENT  
PROJECT

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## CONSUMER EMPOWERMENT PROJECT

### ABOUT THE CONSUMER EMPOWERMENT PROJECT

The Consumer Empowerment Project (CEP) – powered by Euroconsumers and Google, serves as a collaborative space where consumer organizations, industry, and civil society come together to discuss and address critical issues regarding the consumer empowerment. The goal is to foster dialogue, collaboration, and tangible initiatives that contribute to creating a better consumer environment. CEP aims also to help consumers understand their rights so that they can make better-informed decisions. Besides the Consumer Digital Empowerment Index, we work to achieve our mission through several other initiatives, including:

**The Consumer Leadership Academy (CLA):** A three-day intensive course, hosted twice a year at a prestigious university in Europe, designed to foster informed discussions on key policy debates shaping the future of consumerism.

**The My Data is Mine Award:** Aimed at supporting young scholars with an innovative approach to data protection issues and who can offer a visionary contribution to data processing in Europe and worldwide.

**CLAx:** An initiative that provides events as a platform to explore major policy debates and emerging trends in the realm of consumerism and digital/green transformation.

**CEP Scholarship:** A groundbreaking project designed to ignite academic interest in consumer rights providing research grants to exceptional Ph.D. students eager to advance the field of consumer rights.

**At School with AI - Kids Leadership Academy:** An educational initiative to raise awareness among the younger generations about the challenges and opportunities of AI, thereby helping to grow the “digitally empowered” citizens of tomorrow.

For more information, please visit: [cep-project.org](https://cep-project.org)

#### Disclaimer

The Consumer Empowerment Project operates independently: project activities and results do not necessarily reflect the views or official standing of Euroconsumers AISBL or Google. This study was conducted by Synallagma SA and was funded by Google. However, Google exercised no editorial control or influence over the methodology, findings, or conclusions. The results presented herein are the product of the authors' independent research and analysis.

**Research team coordinated by**  
Marco Anelli and Lucia Napoli, Euroconsumers

Executive Summary	4
A Pan-European Snapshot: Key Insights	7
The most empowering digital services for consumers	8
AI and Consumers: Perceptions, Challenges, and Trust	12
Conclusion	17
Annex	18
Methodology	19



# Consumer Digital Empowerment **Index**

Launched in 2022, the **Consumer Digital Empowerment (CDE) Index** is an annual research study that analyzes how digital services empower people in their daily lives.

As the flagship initiative of the Consumer Empowerment Project (CEP), the Index provides robust, actionable data on the evolving digital landscape. Since 2024, the study has expanded to include a deep dive into Artificial Intelligence, exploring how consumers experience AI, their attitudes toward the technology, and their primary concerns.

# Executive Summary

The CDE Index shows if and how digital services empower consumers in their daily lives across a wide range of consumption areas such as online learning, streaming websites or online payments. The CDE Index is built on consumers' experiences and opinions, and it serves as a comparative overview across the following European countries: Belgium, Bulgaria, Denmark, France, Germany, Italy, Poland, Portugal, Spain, and Sweden. Additionally, it is an authoritative source of how consumers use web services in different geographies.

The index aims to:

- Assess the **availability** or (need for) **awareness** of digital services in key European countries.
- Outline **which digital services consumers access** online.
- Provide a view on **if and how these digital services empower consumers** in their daily lives.
- Provide relevant, and robust data about important topics such as consumer choice, barriers to entry and other key issues that consumers face when leveraging digital services.

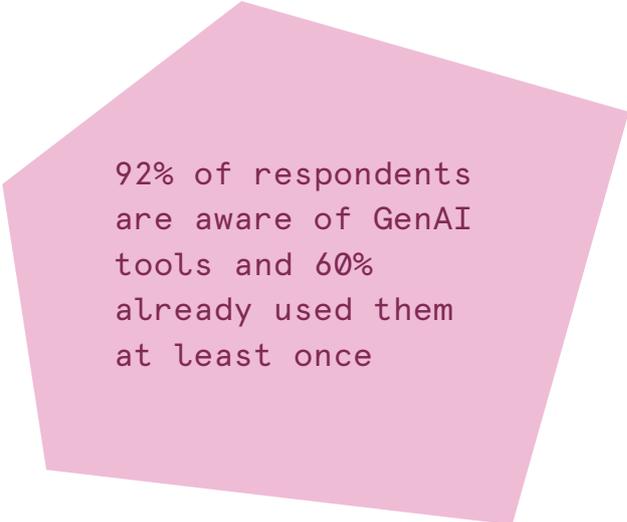
Since the 2024 edition, the study includes a special focus on Artificial Intelligence (AI). The 2025 edition introduces the AI PULSE indicator as a cross-country measure of consumers' attitudes and experience regarding AI

The CDE index was not intended to provide any measurement related to phenomena such as digital fraud or data privacy.

Digital services have become an essential part of consumer journeys by providing easier access, wider choice, and more information. A large majority of users using digital services in the last 24 months found them useful, easy to use and preferable to offline services.

Consumers perceive AI as increasingly present in their daily lives, but data suggests that skills are not keeping pace. Consumers' perception of AI presence has grown especially in the Health, Wellbeing & Sports, Education & Training, Culture & Entertainment and Information & Media areas. Moreover, half of respondents use GenAI applications at least

occasionally, showing a significant increase (+20%) since last year. 40% of consumers feel capable of using AI-based services, with age, education and financial resources influencing the skills gap the most.



92% of respondents are aware of GenAI tools and 60% already used them at least once

Looking at digital services on a broader scale, Sweden had the strongest scores in 4 consumption areas and ranked first overall. Portugal gained the highest score in Information & Media and Education & Training and ranked second overall. Denmark ranked first in Health, Wellbeing & Sport and Culture & Entertainment and third overall. Notably, Belgium had the highest score in Home & Domestic energy while Spain in the Community & Communication area. The digital divide remains evident, as Millennials (persons born between the early 1980s to 1996) and Gen Z (persons born between 1997 and early 2010s) with higher education levels and with higher levels of disposable income feel twice as empowered compared to Baby Boomers (persons born between 1946 to 1964) with lower incomes and lower levels of education. In some areas, people who live alone also feel less empowered as online consumers.

Among the ten consumption areas, Community & Communication had the highest score, with Instant messaging platforms and email being the most empowering indicator. Money & Investment is the second most relevant consumption area, as consumers find particularly empowering managing their bank accounts online. Finally, Shopping had the third-highest score, with online shopping being its most digitally powerful indicator.

At the country level, we see some significant improvements in specific areas. For example:

- For Denmark, data show increased use of digital tools for tracking domestic utilities consumption and automatically switching providers, along with a rising in appreciation for platforms to compare energy suppliers.
- For Poland, consumers are increasingly empowered in the mobility sector, due to a wider use of online tools for booking local transportation tickets or for ride-hailing.
- For Bulgaria, the empowerment score of services related to health has significantly grown. Bulgarian consumers are increasingly empowered by services that allow them to get medicine prescriptions online (by +7.7) and to access their online health profiles (+6.8), reflecting concrete government actions taken in order to boost this kind of services.

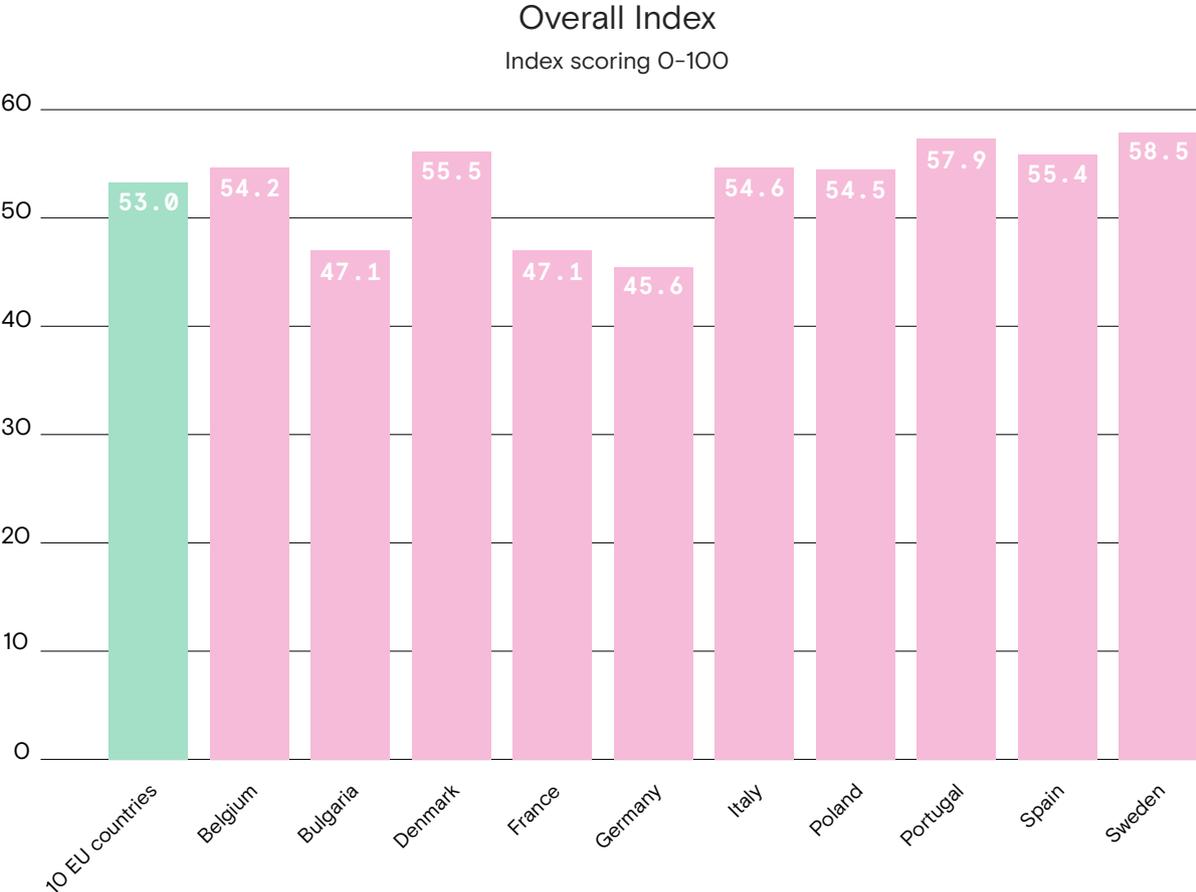
# A Pan-European Snapshot: Key Insights

Although digital services empower most consumers, there is still room for improvement, especially when it comes to their usage.

The consumption areas with the lowest empowerment scores were Education & Training, Home & Domestic Energy, and Mobility & Tourism. The last two were specifically highlighted by experts among the most important for consumer empowerment, alongside Government & Public Administration.

What makes consumers less empowered when using digital services? The biggest obstacles are a lack of awareness that such services exist, for example, trackers that monitor energy consumption (23% total) and fact-checking tools (22%), and a lack of trust in providers when using certain services, such as using social media (10%), using open banking and finance to manage bank accounts and financial tools from a single platform (10%), managing bank accounts online (9%).

In the following section a list and overview of the 10 consumption areas of the Index can be seen. For each digital service, a score is provided in parentheses.



# The most empowering digital services for consumers

Below is a ranking of the 40 digital services analysed in the study, ordered from the most to the least empowering. Each digital service is accompanied by a score, along with the improvement compared to the previous year's results.

Ranking	Consumption Areas	Digital Service	Score	Improvement
1	Community & Communication (personal & professional reasons)	Using messaging tools (e.g.: Whatsapp, Telegram) or email services for communication (with friends, relatives, work related, etc.)	83.7	0
2	Money & Investment	Managing your bank accounts online	82.7	-0.6
3	Community & Communication (personal & professional reasons)	Using social media	80.7	-0.1
4	Shopping	Buying products online (from digital shops and marketplaces)	78.8	-1.2
5	Community & Communication (personal & professional reasons)	Videocalling another person or a group of people (friends, relatives, work related, etc.)	73.0	0.3
6	Information & Media	Online translation (for both text and multimedia sources)	71.6	-0.9
7	Culture & Entertainment	Using platforms for streaming of audio or video content	70.1	-0.4
8	Shopping	Using online consumer reviews of products	67.9	-1.2
9	Health, Wellbeing & Sport	Booking a consultation with a doctor	66.2	1.2

Ranking	Consumption Areas	Digital Service	Score	Improvement
10	Shopping	Using platforms to compare products by different aspects (price, characteristics, reliability, quality, etc.)	65.9	-2.0
11	Information & Media	Consulting online newspaper and news channels	65.4	-1.9
12	Money & Investment	Using apps for transferring small amounts of money directly from person to person, outside of your normal banking app	65.0	0.2
13	Government & Public administration	Making online payments to public entities (e.g. paying fines, fees for public services, etc.)	62.7	-0.2
14	Government & Public administration	Filing a tax declaration online	61.1	-0.7
15	Government & Public administration	Using a digital identity authentication for public administration procedures	60.4	0.3
16	Health, Wellbeing & Sport	Accessing your online health profile/history (viewing health records, test results, etc.)	60.3	1.0
17	Health, Wellbeing & Sport	Getting medicine prescriptions online	57.7	1.2
18	Mobility (local & long distance) & Tourism	Booking a long distance trip (flight, train, etc.) online	57.6	-0.8
19	Culture & Entertainment	Buying tickets or getting information about physical cultural events, online	56.1	-1.3
20	Mobility (local & long distance) & Tourism	Booking a local public transportation ticket online (to be stored on your smartphone)	52.3	1.3
21	Community & Communication (personal & professional reasons)	Contacting companies or consumer services via live chats	50.3	-0.8

Ranking	Consumption Areas	Digital Service	Score	Improvement
22	Information & Media	Online sources for checking the trustworthiness of information (websites for news/fact checking or tracing the origin of content, ranking of bias in media, disclaimers of sponsored content, etc.)	50.1	1.2
23	Government & Public administration	Requesting documents or certifications online from public entities (e.g.: registration in the city administration, birth certificate )	49.2	-0.3
24	Money & Investment	Using platforms to compare insurances and financial products (deposits, accounts, credit cards, etc.) by different aspects (price, service, reliability, etc.)	46.7	-0.4
25	Money & Investment	Managing all your bank accounts and financial tools from a single platform (open banking and finance) outside of your normal banking app	46.4	1.1
26	Mobility (local & long distance) & Tourism	Using platforms for booking rides (e.g: Taxi, Uber)	44.4	0.7
27	Education & Training	Learning about a certain topic informally (without an official course or exam) through online tutorials, self-learning materials, forums, etc.	43.9	-1.3
28	Home & Domestic energy	Signing up fully online for services and utility providers (water, Internet, energy, waste management etc.)	41.9	-0.8
29	Home & Domestic energy	Using platforms to compare energy providers by different aspects (price, quality, etc.)	39.6	-1.8
30	Culture & Entertainment	Accessing library services online (the catalogue, checking out books, etc.) and buying e-books	38.9	-1.1

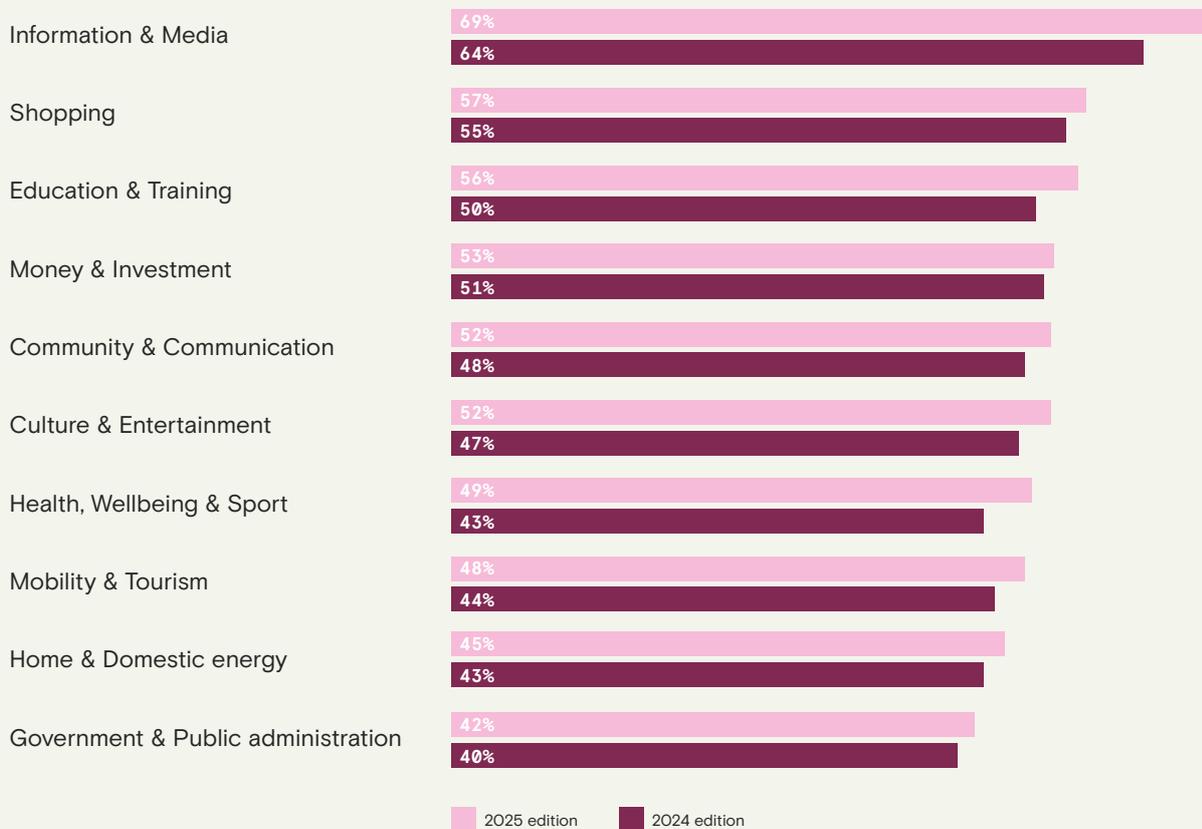
Ranking	Consumption Areas	Digital Service	Score	Improvement
31	Education & Training	Online official learning (taking courses, exams, certifications, etc.)	35.6	-0.1
32	Information & Media	Bypassing censorship (VPNs, secure connectivity, dedicated apps)	35.4	0.6
33	Education & Training	Accessing and managing childrens' academic information (report cards, online lessons, contacts with professors, etc.)	34.6	0
34	Home & Domestic energy	Using digital trackers for domestic energy and water consumption	33.9	1.1
35	Health, Wellbeing & Sport	Using wearables and apps for monitoring health conditions and assisted living solutions (e.g.: emergency button for elderly)	30.3	0.9
36	Mobility (local & long distance) & Tourism	Using shared mobility platforms/ solutions (car, scooter, or bike sharing, car pooling, etc.)	28.6	-0.2
37	Home & Domestic energy	Automatically switching to the most convenient energy provider based on your habits and available offers, via a dedicated service	28.0	0
38	Education & Training	Using platforms to compare academic credentials and programmes at different universities/schools	25.9	-0.1
39	Shopping	Borrowing or renting products instead of buying them, via online platforms (e.g.: small household appliances, clothes, tools, equipment, etc.)	24.7	0.1
40	Culture & Entertainment	Using platforms for crowdfunding cultural and artistic projects	22.5	0

# AI and Consumers: Perceptions, Challenges, and Trust

Since 2024, the Consumer Digital Empowerment Index includes a deep dive into consumer attitudes and challenges regarding Artificial Intelligence (AI).

AI has emerged as a transformative force across diverse sectors of consumers' daily lives. Consumers perceive AI as increasingly present throughout various consumption areas. Compared with last year, consumers' perception of AI presence has especially grown in the Information & Media (+5%), Education & Training (+6%), Culture & Entertainment (+5%), and Health, Wellbeing & Sport (+6%) areas. In the Government & Public Administration, Home & Domestic Energy, Health, Wellbeing and Sport and Mobility & Tourism areas AI presence is less perceived.

## Perception of AI presence in daily life, by consumption area

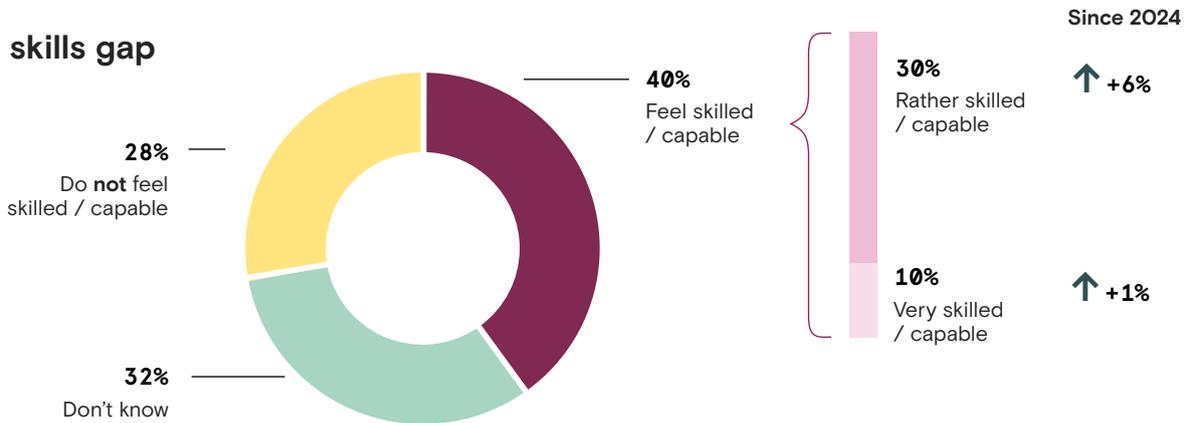


Question: "To what extent do you think AI is present in the following areas of your daily life?"

Note: For each consumption area, percentages refer to the share of respondents who perceive AI as quite or very present.

Awareness of AI technologies is high, but only 40% of the respondents (+8% since last year) feel capable of using AI-based services. Age, gender and professional situations are the factors that influence the skills gap the most. Poorly educated consumers, aged over 66, feel significantly less equipped to deal with AI.

### AI skills gap



Question: "To what extent do you agree with the statement 'I feel skilled/capable of using most AI-based services'?"

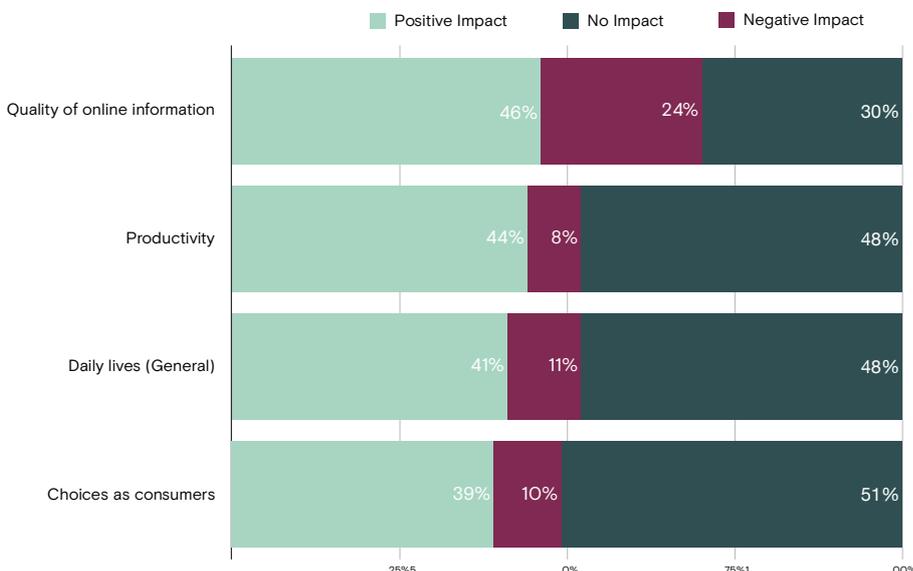
## Impact of AI on consumers' daily lives

Overall, 41% of respondents say that AI had a positive impact on their daily lives, in the past 12 months, while 11% stated that it had a negative impact.

39% of respondents say that AI improved their choices as consumers, in the past 12 months, while 10% stated that it had a negative impact.

44% of respondents say that AI improved their productivity in the past 12 months, while 8% said that it had a negative impact.

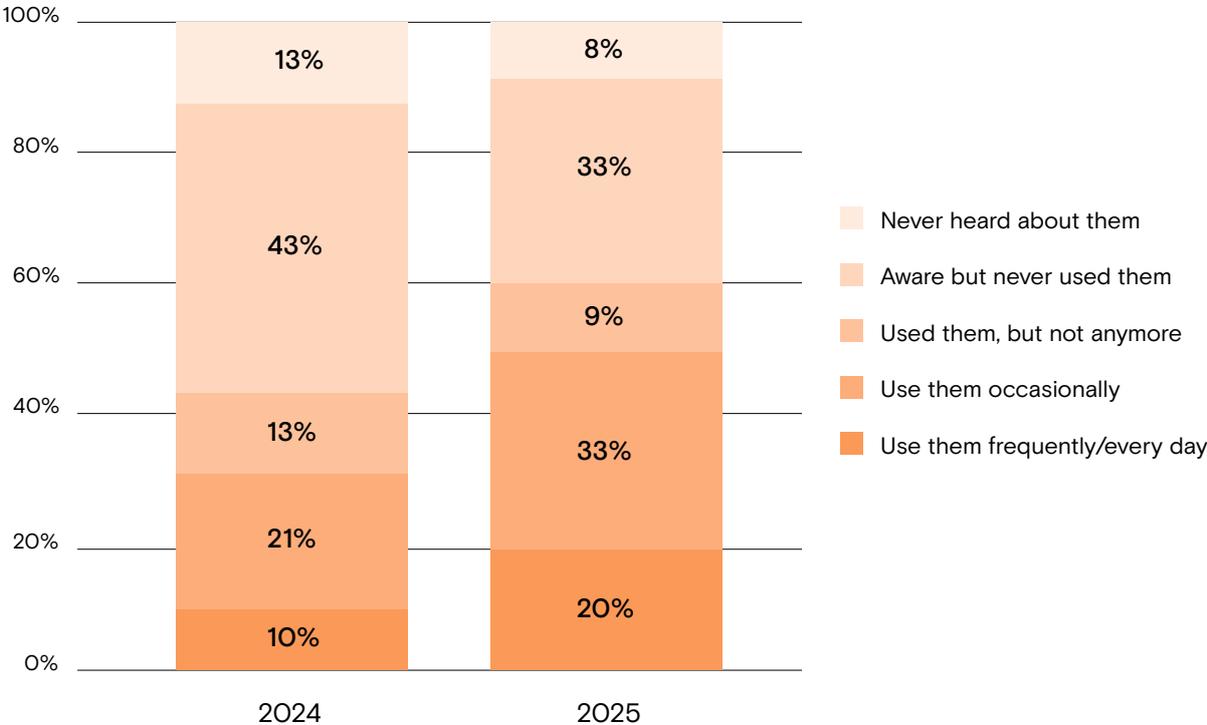
46% feel that the impact was positive on the quality of online information in the past 12 months, while 24% feel that AI had a negative impact.



# Generative AI tools

92% of respondents are aware of GenAI tools and 60% of them have already used tried these applications. Usage has significantly grown since last year: 51% of respondents use GenAI tools at least occasionally (+20%) and 18% use them frequently or even every day (+8%).

## Utilization of GenAI tools



Question: "Have you ever used generative AI tools?"

As GenAI adoption grows, satisfaction with the accuracy of GenAI results has decreased slightly, moving from 60% down to 56%, while 13% (+3%) of users believe that GenAI tools do not provide precise answers or solutions. Younger respondents, professionally active and with higher levels of disposable income, are the most satisfied

### Satisfaction with GenAI results



Question: "To what extent do you agree with the statement 'Generative AI tools provide me with accurate results for my needs'?"

## AI regulation and trust

The level of trust, both in private companies and public authorities, has slightly improved since last year. 35% of respondents trust companies who develop and implement AI systems to do it in a fair and responsible manner.

Similarly, 37% of respondents trust public authorities to properly enforce existing regulations over organizations and companies applying AI.

At the same time, almost one third have not yet developed a clear opinion on their trust in regulatory checks and in businesses that use AI.

## General attitudes towards AI

EU consumers seem to have an ambivalent attitude towards AI.

34% of respondents believe that AI will be a tool for sustainable development and 38% believe that it will contribute to substantially increasing human life expectancy. At the same time, two thirds of the sample (66%) are concerned about the impact of AI in manipulating public opinion and 53% fear that AI implementation will bring more unemployment than new job opportunities.

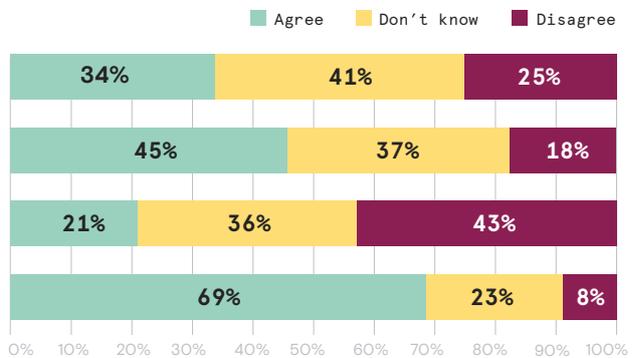
### AI (potential) impact on society

AI will contribute to make the world more sustainable

AI will contribute to substantially improving healthcare

AI will create more occupations than unemployment

I'm concerned about AI impact in manipulating public opinion



Question: "To what extent do you agree with each of the following statements?"

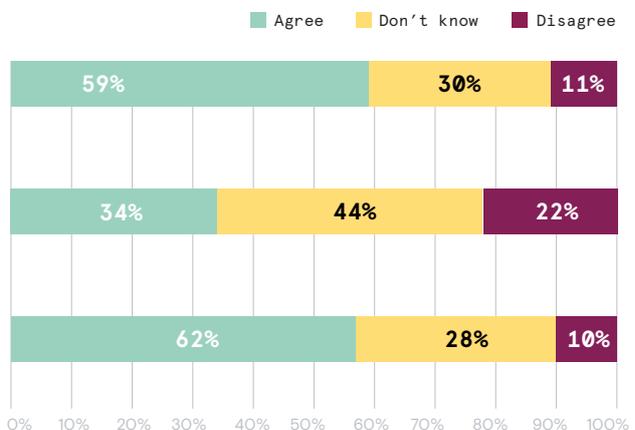
Additionally, 59% believe that AI will pose more risks to cybersecurity than benefit and 57% are afraid that AI-based services could collect personal data without their explicit authorization.

### Concerns about AI

AI will pose more risks to cybersecurity than benefits

AI will drive to unfair discrimination based on race, gender or other individual characteristics

AI-based services could collect personal data without explicit authorization of the users



Question: "To what extent do you agree with each of the following statements?"

# AI Pulse indicator

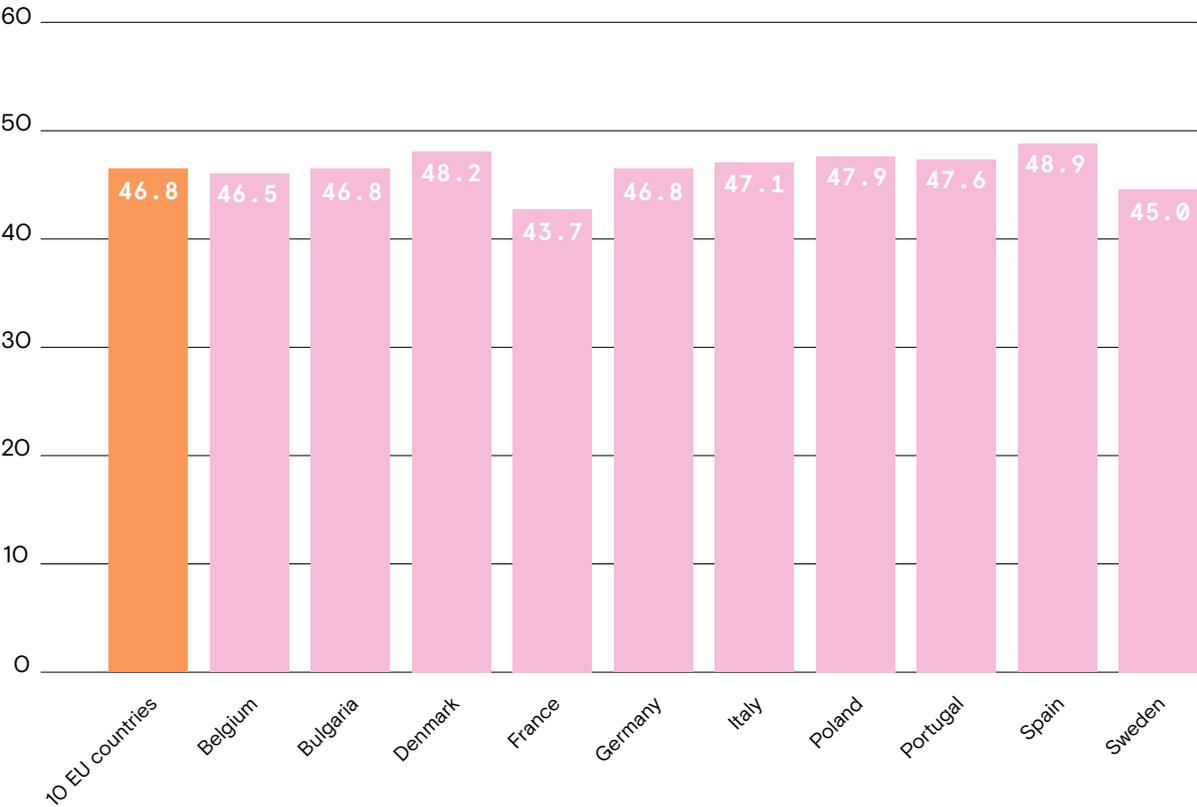
The 2025 edition introduces the AI PULSE (Perception Usage Life-impact Sentiment Empowerment) indicator as a cross-country measure of consumers' attitudes and experience regarding AI. The AI PULSE indicator combines 5 key dimensions:

- the perceived impact of AI on consumers' daily lives, in the past 12 months;
- the level of awareness and frequency of use of GenAI tools;
- consumers' skill level in dealing with AI-based services;
- the level of trust in private companies and public authorities;
- the overall sentiment towards AI.

Spain has the highest AI PULSE score, while Germany, Bulgaria, Belgium, Sweden and France lie below the cross-country average.

The analysis shows that consumers who are more empowered by digital services have higher AI PULSE scores.

## AI PULSE score



# Conclusion

The overall Consumer Digital Empowerment Index has remained stable over the last year, slightly reducing from a score of 53.2 in 2024 to a score of 53.0 in 2025, without significant changes.

The country with the highest CDE Index score is Sweden, while the country with the lowest score is Germany. Furthermore, Denmark, Bulgaria and Poland are the only countries that experienced an improvement, since last year.

As we continue to collect yearly data and expand into new areas, such as AI, the Consumer Digital Empowerment Index provides useful reference points and allows us to dive deeper into the most relevant trends in the use of digital services over the years.

The Consumer Empowerment Project strives to improve the digital environment for consumers of all age groups and to educate them about their rights to make informed choices for a beneficial online experience. For more information on the Consumer Digital Empowerment Index, the Consumer Empowerment Project and to dive deeper into the data, please visit [cep-project.org](https://cep-project.org).

# Annex



Explore the CDE  
Index Data

Take a deep dive into the Index data by exploring consumption areas or digital services and see how countries within the Euroconsumers network scored.

Learn more about the sustainability impact of various digital services and the methodology by scanning the QR code and visiting the CEP website.



# Consumer Digital Empowerment Index

Methodology

The research  
was conducted  
in two stages:

- From April to September 2022: Identification of digital services and development of a digital empowerment index through the DELPHI procedure involving a panel of experts
- Since September 2022: An annual online survey to collect data on representative samples of Internet users, with the 2025 wave marking the fourth edition.

## DELPHI procedure

The panel consisted of 21 experts across nine countries with diverse expertise in the digital and Internet landscape, and consumer behaviour and rights. Through four DELPHI rounds, it was possible to identify the leading 10 consumption areas, the list of the 40 most empowering digital services (4 per consumption area) and the importance to be attributed to them for the calculation of the index. In a fifth round, experts evaluated the impact of each digital service on sustainability.

### About DELPHI

DELPHI is a method for structuring group communication processes so that they are effective in allowing a group of experts (commonly referred to as panelists) to deal with a research question. This is done through rounds of questionnaires where experts (also known as panelists) are asked to give their opinion on different issues, until a consensus is reached. This technique is very practical for coming to agreements between a group of experts when there is no unique answer.

To build the index, the panel was composed of 13 experts.  
The main research question for the DELPHI procedure was:

"What are the most relevant consumption areas and digital services that the index should include, in order to measure consumer empowerment on digital services?"

This question was divided in 3 different sub-questions related to the consumption areas:

1. For the consumption areas proposed, which ones do you consider **more relevant to be included in the index?**

2. For each consumption area, which are the most **relevant digital services to be included in the index?**

3. What is the **importance/weight** that each of the consumption **areas/digital services** should have in the index?

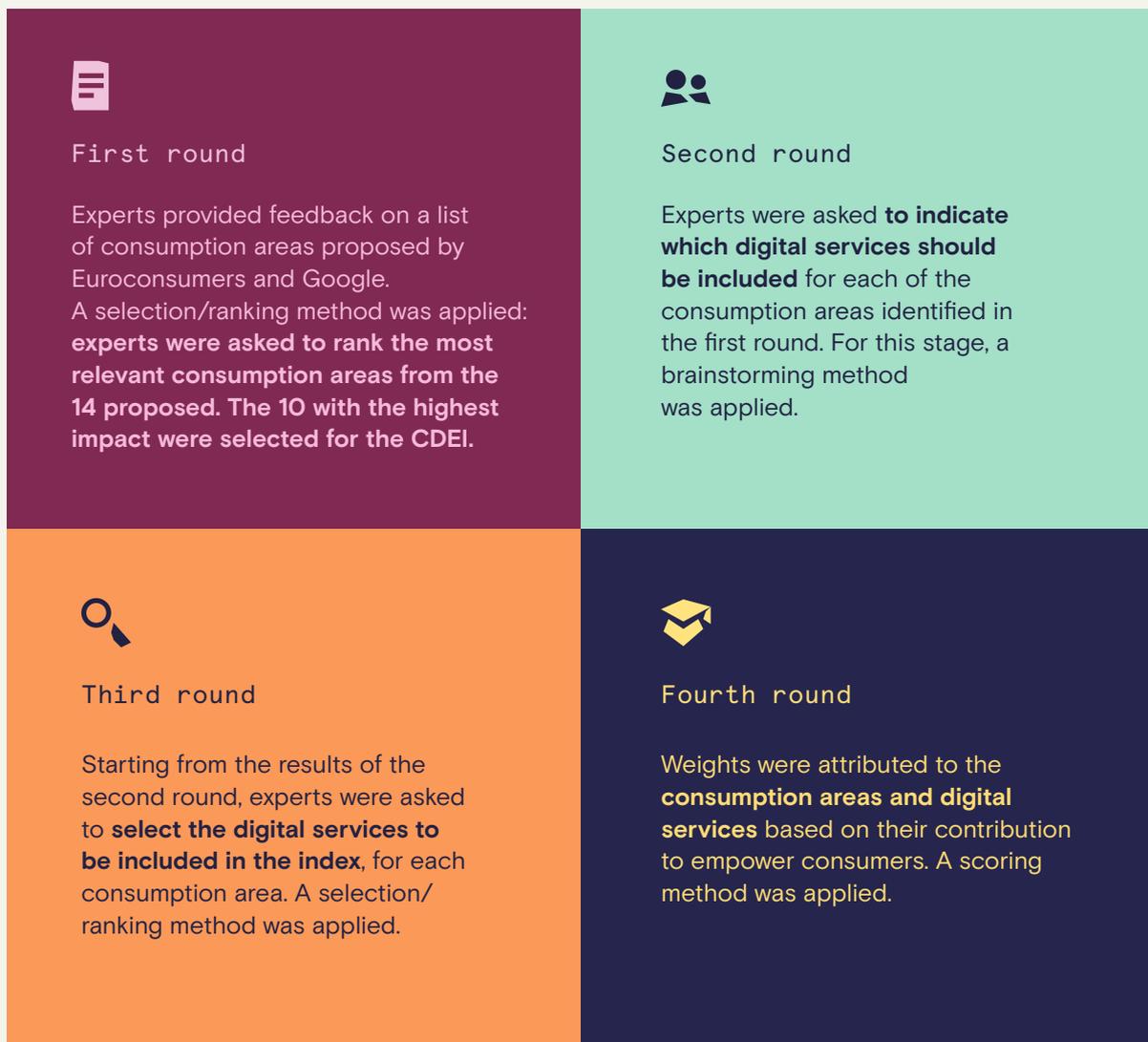
Experts were selected according to the following criteria:

1. Area of expertise: digital and Internet, and consumer behaviours and rights;
2. Previous participation in projects related to the mentioned areas of expertise;
3. Being active in the field within the last 1-2 years;
4. A good command of English.

Three different methods were applied throughout the DELPHI rounds, structured as follows

1. **Brainstorming:** involves asking the panelists to state the most relevant elements to consider in relation to the subject under research, through open-ended questions. Then, the research team must analyse their answers to develop a structure and, through a process of progressive re-organization, order them into a list of closed items for the following rounds of the study;
2. **Selection/ranking:** panelists are confronted with a set of closed items from which they select and rank the ones that they consider most relevant for each research question. However, experts can provide detailed additional comments, factors or dimensions not covered in the original set that could eventually help to redefine the pre-existing list of closed items;
3. **Scoring:** panelists are asked to attribute 100 points to a set of closed items. The overall average is considered as the final weight of each of the items

Three different methods were applied throughout the DELPHI rounds, structured as follows



## Index scoring

CDE Index provides a structured set of indicators to explore digital consumer empowerment, in quantitative terms, with different layers of information:

- 1. The overall index score:** : a synthetic measure of a country's performance and a comparative overview across European countries.
- 2. The consumption areas scores:** how the digitalization of services has empowered consumers, for each of the consumption areas.

**3. The digital services scores:** consumers' experience with each digital service. The relative contribution of each consumption area and digital service to the CDE Index is based on the weights ( $W_{ca}$ ,  $W_{ds}$ ), defined by experts during the fourth round of the DELPHI procedure.

The score of a digital service is based on **the combination of consumer usage and evaluation**. For each service, respondents are asked if they have used it during the last two years and, if they did not use it, why this was the case. They are then categorised into three groups:

- a. Respondents who have already used the service at least once in the past two years.
- b. Respondents who have not used it in the past two years, even though they know it's available in their country.
- c. Respondents who never used it because, to their knowledge, the service is not available in their country. It is assumed that the lack of awareness of the availability of an existing digital service means that that service is failing in empowering consumers. For the purposes of this project, it is the same as if the service was not available

Only respondents that used the digital service during the past two years (group 'a') are asked to evaluate it across 3 key criteria, on a scale from 1 (lower) to 5 (higher score):

1. Usefulness: how useful respondents find a service.

2. Usability: how easy a service is to use.

3. Preference: to what extent do respondents prefer the digital service, over the offline alternative.

The average of those three scores, converted on a 100 points scale, represents the digital service's score for that respondent.

For respondents who didn't use the service in the past 2 years, even if they know it was available (group 'b'), a score of 1 (corresponding to the minimum evaluation) is automatically assigned to usefulness and preference and a score of 0 to the usability criteria. The assumption here is that if consumers do not use an available service it means that it is neither essential nor attractive to them. The average of these values (0.66) is then converted on a 100 points scale.

For respondents not aware of the availability (or aware of the unavailability) of the service (group 'c'), a score of 0 is automatically assigned.

The following formula synthesises the approach:

$$ds_{ij} = \frac{(C_{\text{usefulness},ij} + C_{\text{usability},ij} + C_{\text{preference},ij})}{3}$$

where  $ds_{ij}$  is the score of the  $i^{\text{th}}$  digital service, calculated for the  $j^{\text{th}}$  respondent.

$$C_{\text{usefulness}} = \begin{cases} 1 \leq n \leq 5, u = 2 \\ 1, u = 1 \\ 0, u = 0 \end{cases}$$

$$C_{\text{usability}} = \begin{cases} 1 \leq n \leq 5, u = 2 \\ 0, u = 1 \\ 0, u = 0 \end{cases}$$

$$C_{\text{preference}} = \begin{cases} 1 \leq n \leq 5, u = 2 \\ 1, u = 1 \\ 0, u = 0 \end{cases}$$

$$u = \begin{cases} 2 & \text{if used at least once in P2Y} \\ 1, & \text{if never used in P2Y, even if they know it exists} \\ 0, & \text{if never used and they don't think it exists} \end{cases}$$

The overall score of a digital service is calculated as the average of the scores obtained for each of the respondents.

$$ds_i = \frac{\sum_{j=1}^N ds_{ij}}{N}$$

where N is the total number of respondents for the country.

For each respondent, the consumption area's score is calculated as the weighted average of the scores of its digital services, as follows:

$$ca_{ij} = \frac{\sum_{n=1}^k w_{in} * ds_{nj}}{k}$$

where:

$ca_{ij}$  is the score of the  $i^{\text{th}}$  consumption area, calculated for the  $j^{\text{th}}$  respondent;

k is the number of digital services of that area;

$ds_{nj}$  is the score of the  $n^{\text{th}}$  digital service of that area, for the  $j^{\text{th}}$  respondent;

$w_{in}$  is the weighting coefficient of the  $n^{\text{th}}$  digital service of the  $i^{\text{th}}$  consumption area.

The overall score of the consumption area corresponds to the average score of that area among the sample.

$$ca_i = \frac{\sum_{j=1}^N ca_{ij}}{N}$$

where N is the total number of respondents for the country.

Analogously, the index is calculated first at respondent level (as the weighted average of the consumption areas' scores) and then for the whole sample (as the mean value among respondents):

$$CDEI_j = \frac{\sum_{m=1}^k w_m * ca_{mj}}{K} \qquad CDEI = \frac{1}{N} \sum CDEI_j$$

where:

$CDEI_j$  is the Index score, calculated for the  $j^{th}$  respondent;

$K$  is the total number of consumption areas;

$ca_{mj}$  is the score of the  $m^{th}$  consumption area, for the  $j^{th}$  respondent;

$w_m$  is the weighting coefficient of the  $m^{th}$  consumption area

$N$  is the total number of respondents for the country.

All the scores are rescaled on a 100 points scale, to enable meaningful comparison.

## An additional fifth round focused on sustainability

The impact of digitalization and the Internet on different aspects of sustainability is undeniable but still quite difficult to assess for a consumer. Therefore, new panellists were added to the 13 that were already part of the previous four rounds. They had to have expertise in the field of digital and Internet, consumer behaviours and rights, with a focus on sustainability in general and more specifically on the role and implications of digitalization and the Internet on sustainability. In this round, experts were asked to:

- Indicate the impact of sustainability of each of the digital services included in the Index;
- Provide explanations related to their answers on the impact of digital services;
- Answer some general questions about sustainability and digitalization.

The main output of this extra round of the DELPHI procedure was to establish a synthetic indicator (on a labelled scale), for each of the digital services.

## Online Survey

After having identified the digital services to be considered for the index and their importance for assessing consumer digital empowerment, an online survey was organised for collecting data on consumers' experience and digital services evaluation. The survey has been conducted annually since 2022 (every September) in 10 selected countries with the purpose of evaluating the evolution of the indicators over time. The samples were a priori stratified, and a posteriori weighted to mirror the national distributions of internet users. For each of the four waves carried out so far, representative samples of about 2.000 Internet users per country, aged 18–74, have participated, ensuring consistency and comparability of results. The 2025 wave surveyed 18.015 Internet users, monitoring the latest opinions on digital services' usefulness, usability, and preference.

The second phase of the project was an online survey done in 10 countries: Belgium, Bulgaria, Denmark, France, Germany, Italy, Poland, Portugal, Spain and Sweden. In each of these countries, the questionnaire was addressed to a sample of around 2,000 Internet users in the 18–74 age range.

Year	Wave	Number of respondents
2022	1 <sup>st</sup>	18.861
2023	2 <sup>nd</sup>	20.103
2024	3 <sup>rd</sup>	18.855
2025	4 <sup>th</sup>	18.015

For the purpose of this project, an “Internet user” is an individual fulfilling at least one of the following conditions:

- using an internet browser to search for products, services or information online, for personal reasons, at least once a week;
- checking a personal email account at least once a week.

Each national sample was a priori stratified based on interlocking quotas by age, gender and geographical area and a posteriori weighted based on interlocking quotas by age, gender, geographical area and educational level. Since data

concerning the distribution of the target population were not available for all the countries, a preliminary CATI survey was conducted on the general population. The survey was conducted, during the first half of September for four consecutive years (2022 to 2025), through CAWI (computer-assisted web interviewing) method.

Data were analysed by the Euroconsumers Statistical Survey Department, using IBM SPSS Statistics. Along with the information needed for the index calculation, the questionnaire was designed to collect data for result segmentation and further in-depth analysis (consumers' choices and needs, barriers to accessing digital services, etc.).

## Taking the pulse of Consumer AI Adoption

Introduced in 2025, the AI PULSE (Perception, Usage, Life-impact, Sentiment, Empowerment) indicator serves as a cross-country benchmark in 10 European countries to assess how consumers view and experience AI, as well as to identify key challenges and gaps. It is based on five key dimensions: the perceived impact of AI on consumers' daily life, awareness and use of generative AI tools, consumers' ability to navigate AI services, trust in businesses and regulatory authorities, and overall attitudes toward AI.

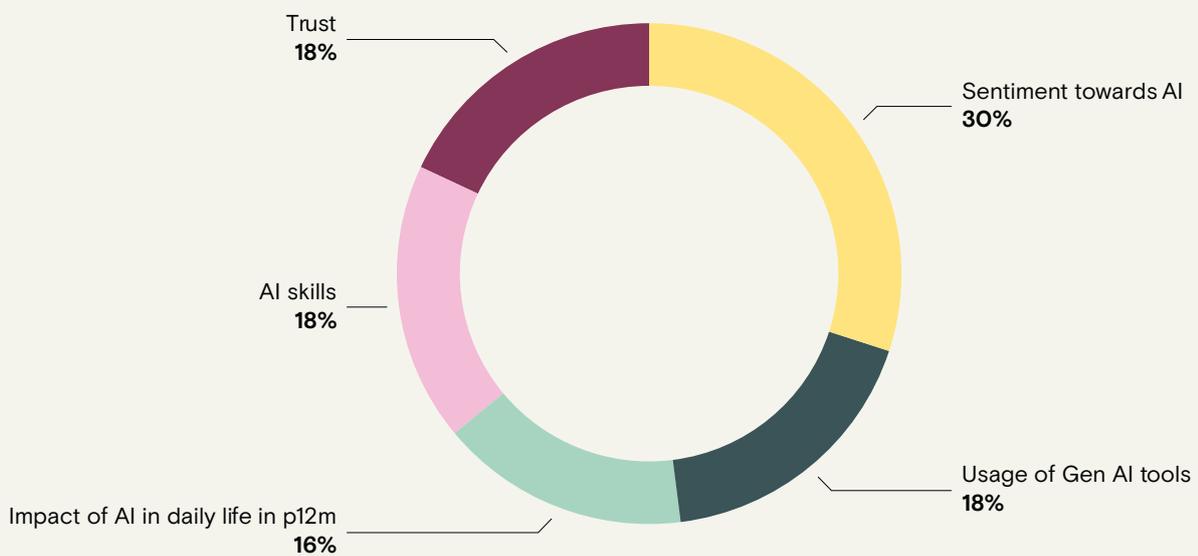
Since 2025, the AI PULSE (Perception Usage Life-impact Sentiment Empowerment) indicator was introduced, as a benchmark across 10 European countries to measure consumers' attitudes and experience regarding AI and highlight challenges and unmet needs.

The AI PULSE indicator combines 5 key dimensions:

1. The perceived impact of AI on consumers' daily lives, in the past 12 months
2. The level of awareness and frequency of use of GenAI tools
3. Consumers' skill level in dealing with AI-based services
4. The level of trust in private companies and public authorities
5. The overall sentiment towards AI

Each dimension was assessed through a dedicated set of questions included in the online survey and fed into the overall indicator.

The final score reflects consumers' experience with AI – and particularly GenAI tools –, their level of trust and skills, and their overall sentiment toward these technologies. A weighting method ensures that each of these components contributes approximately one third to the overall score, based on the scheme outlined below.



The final score (AI PULSE) was calculated at respondent level and rescaled on a 100 points scale, to enable meaningful comparisons.





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