

# BUILDING THE EUROPEAN DATA ECONOMY

Fields marked with \* are mandatory.

## INTRODUCTION

Data has become an essential resource for economic growth, job creation and societal progress. Data analysis facilitates better decision-making, innovation and the prediction of future events. Europe aims to exploit this potential without infringing the rights and freedoms of people or damaging economic investments made into generating data. Within this context, the Commission aims to foster an efficient, competitive single market for data services including cloud-based ones. It needs to identify the legal, economic, and regulatory challenges, and to launch a discussion with stakeholders on future action.

On 10 January 2017, the Commission adopted the "Building the European Data Economy" package consisting of a [Communication](#) and a [Staff Working Document](#). These policy documents give an overview of issues at stake, and of the context of this consultation. Respondents are invited to read them prior to completing the questionnaire.

## **Purpose**

The public consultation will help shape the future policy agenda on the European data economy. It will feed into a possible Commission's initiative in 2017 on Building the European Data Economy.

The objective of the consultation is to collect information on:

- whether and how local or national data localisation restrictions inhibit the free flow of data in Europe
- whether and to what extent digital non-personal machine-generated data are traded and exchanged
- the nature and magnitude of any barriers to accessing such data
- ways of tackling those barriers
- emerging Internet of Things and robotics liability challenges
- practices and issues relating to data portability, interoperability and standards

## Context

The "Building the European Data Economy" package addresses restrictions on the free flow of data, including legal barriers on the location of data for storage and/or processing purposes, and a series of emerging issues relating to data such as ownership, access, reuse, portability and liability.

While the questions on liability issues in this consultation are addressed in a data economy context, a [separate consultation](#) separate consultation on the overall evaluation of the application of the [Product Liability Directive \(85/374/EEC\)](#) is being launched.

This consultation does not cover any issues related to personal data protection. These are extensively regulated elsewhere, namely in the [new EU data protection rules](#), as well as through the [review of the ePrivacy Directive](#). Issues of access to and re-use of public sector information are excluded from this consultation because they will be tackled under the upcoming review of the [Directive on the re-use of public sector information \(2003/98/EC\)](#).

The Commission has already engaged in an extensive dialogue on the data economy with stakeholders, in the form of sector-specific (e.g. manufacturing and financial sectors) and cross-sector round-tables, [workshops](#), [conferences](#), bilateral meetings including targeted consultations of the Member States on data economy topics, and a [public consultation](#) in which the data economy was one of a broader range of topics.

## Targeted respondents

This consultation targets:

- Businesses of all sizes
- Manufacturers and users of connected devices
- Operators and users of online platforms
- Data brokers
- Businesses commercialising data-based products and services
- Public authorities
- Non-governmental organisations
- Researcher and research organisations
- Consumers

As data collected by sensors are used in many areas, this consultation targets all sectors. Some of the sectors likely to be concerned are manufacturing, energy, automotive, health, consumer-facing commerce, Internet of Things (IoT), etc.

## Consultation period

10 January – 26 April 2017

Replies received after the closing date will not be considered.

## How to respond

You can reply in any EU language, even to the online English version of the questionnaire. The questionnaire in all of the other EU languages will be available as from 1 February 2017.

Only responses received through the online questionnaire will be considered for analysis. Questionnaires sent by e-mail or on paper will not be analysed except those due to accessibility needs of persons with disabilities (see below).

All questions and sections are optional. You can pause any time and continue later. You can download your contribution once you have submitted your answers.

Given the volume of this consultation, you can download [a PDF version](#) before responding to the survey online. The PDF version includes all possible questions. When you fill the survey in online, you will not see all of the questions; only those applicable to your chosen respondent category and to other choices made when you answer previous questions.

The questionnaire is divided between 4 sections:

- 1. Localisation of data for storage and / or processing purposes*
- 2. Access to and re-use of non-personal data*
- 3. Liability*
- 4. Portability of non-personal data, interoperability and standards*

While you may want to contribute to the entire questionnaire, it is also possible for you to contribute only to the sections (s) that is / are relevant to you or your organisation.

### **Accessibility for persons with disabilities**

We accept questionnaires by e-mail or by post from people with disabilities and their representative organisations.

Please send either e-mail with your reply attached as Word, PDF or ODF document

to CNECT-CONSULTATION-DATA-ECONOMY@ec.europa.eu

or write to us at:

European Commission

DG Communication Networks, Content & Technology

Unit G1 – Data Policy and Innovation

Euroforum Building

10 rue Robert Stumper

L-2557 Luxembourg

Luxembourg

## **Transparency**

In the survey you will be asked whether you are responding as an individual or representing the views of an organisation. We ask responding organisations to register in the Transparency Register.

We publish the submissions of non-registered organisations separately from those of registered ones.

## **Replies & next steps**

We shall publish all contributions to the consultation unless non-publication is specifically requested in the 'About you' section of the questionnaire.

A short summary of the consultation results will be published on this page 1 month after the consultation closes. We shall issue a report with the qualitative analysis of the contributions in due course.

In case your response includes confidential data please provide a non-confidential version. Please read the Specific Privacy Statement below on how we deal with your personal data and contribution.

## **Protection of personal data & privacy statement**

[Protection of personal data](#)

[Specific privacy statement](#)

## **Contact**

CNECT-CONSULTATION-DATA-ECONOMY@ec.europa.eu

## About you

---

\* My contribution (Note that, whatever option chosen, your answers may be subject to a request for public access to documents under Regulation (EC) N° 1049/2001):

- can be published with my personal information** (I consent to the publication of all information in my contribution in whole or in part including my name or my organisation's name, and I declare that nothing within my response is unlawful or would infringe the rights of any third party in a manner that would prevent publication.)
- can be published provided that I remain anonymous** (I consent to the publication of any information in my contribution in whole or in part (which may include quotes or opinions I express) provided that it is done anonymously. I declare that nothing within my response is unlawful or would infringe the rights of any third party in a manner that would prevent the publication.)

\* You are replying as:

- an individual in your personal capacity
- as a self-employed individual
- on behalf of a business/ organisation

\* First Name

Raegan

\* Last Name

MacDonald

\* e-mail address

raegan@mozilla.com

\* Name of your organisation

Mozilla

Website of your organisation

<https://www.mozilla.org>

\* Contact details of your organisation

331 E. Evelyn Avenue  
Mountain View, CA  
94041  
USA

\* Please indicate the place(s) of operation of your business/organisation.

- Austria
- Belgium
- Bulgaria
- Czech Republic
- Croatia
- Cyprus
- Denmark
- Estonia
- Finland
- France
- Germany
- Greece
- Hungary
- Italy
- Ireland
- Latvia
- Lithuania
- Luxembourg
- Malta
- Netherlands
- Poland
- Portugal
- Romania
- Slovakia
- Slovenia
- Spain
- Sweden
- United Kingdom
- Other

\* Please specify

We also have offices in Canada, China, Japan, New Zealand, and the USA.

Please indicate the sector/s in which your business/organisation mainly operates:

- Manufacturing and processing
- IT services, including app/software developers
- Agriculture and Food
- Health and Care
- Energy and utilities
- Automotive and Transport
- Financial services/banking/insurance
- Retail/electronic commerce
- Wholesale trade
- Electronic communications
- Media, communication, entertainment
- Education
- Public sector
- Research
- Other

Which (if any) of these statements apply to you (it is possible to answer yes to several of these statements)?

- My organisation has significant business in the production and market commercialisation of sensor-equipped machines, tools, devices
- My organisation has significant business in internet-based platforms that also aim at generating data through the usage of such platforms by the various users
- My organisation is or is interested in accessing data held by an organisation which has significant business in the production and market commercialisation of sensor-equipped machines, tools, devices
- My organisation is or is interested in accessing data held by an organisation which has significant business in internet-based platforms that also aim at generating data through the usage of such platforms by the various users
- My organisation is an SME and/or a start-up

\* Is your organisation included in the Transparency Register?

If your organisation is not registered, we invite you to register [here](#), although it is not compulsory to be registered to reply to this consultation. See [Why a transparency register?](#)

- Yes
- No
- Not applicable

If yes, please indicate your Register ID Number.

174457719063-67

## 1. Localisation of data for storage and/or processing purposes

---

The main objective of this part of the questionnaire is to get detailed insights into the extent, nature and impacts of data localisation restrictions within the EU and what could constitute limited, justified grounds for such restrictions without unduly jeopardising the free movement of data within the EU (except for restrictions to the free movement of personal data for reasons connected with the protection of natural persons with regard to the processing of personal data. The Treaty on the Functioning of the European Union and the General Data Protection Regulation (GDPR) establish the free flow of personal data within the EU and set out the rules relating to that free movement).

Another important aspect is to find out to what extent businesses store or process data in multiple geographical locations within the EU and what are the reasons for this multiple location and, respectively, local storage or processing. The Commission also seeks respondents' views on the perceived impacts of the removal of data localisation restrictions within the EU. The Commission welcomes replies particularly from businesses, including SMEs, and public sector organisations.

Which of these statements apply to you in relation to data storage or processing?

- My organisation is a data service provider
- My organisation operates its own data infrastructure without using third-party services
- My organisation is a user of third-party data services
- My organisation is a scientific research organisation
- None of the above
- I don't know

Do you know about legislation or administrative rules or guidelines (including those adopted in the context of public procurement) requiring to store or process data in your or other EU countries (please see part 2 of the Staff Working Document linked to on the consultation webpage for the summary of data localisation restrictions identified so far)?

- Yes
- No

For your own organisation's purposes, do you store or process your data in multiple locations within the EU?

- Yes
- No

When providing IT-related services (e.g. cloud, applications, software, infrastructure, hosting, Over-The-Top, etc.), have your customers demanded that their data is stored or processed locally (in the same country as their relevant business establishment)?

- Yes
- No
- I don't know

In your opinion, should data localisation restrictions be removed within the EU?

- Yes
- No
- I don't know

In your opinion, what grounds would justify keeping data localisation restrictions within the EU?

- Public security
- Law enforcement needs
- Public policy (such as immediate availability of data for supervisory authorities)
- Public health (please note that patient data may already be covered by a free movement provision under the General Data Protection Regulation)
- Other

Please describe

*1000 character(s) maximum*

There are 2 possible sorts of data localisation restriction in relation to a particular MS – “At least one copy must be kept in this MS”, and “All copies must be kept in this MS”. “one copy” restrictions may sometimes be justifiable for law enforcement or public policy reasons, but “all copies” restrictions aren’t. “one copy” restrictions say “this data must always be easily available to the authorities in this country”, and one can imagine certain sorts of data where such a restriction is appropriate. “All copies” restrictions say “this data may not leave this country under any circumstances”; as well as being practically very difficult to achieve in today’s cloud-based systems, it is also a principle antithetical to the DSM. Any data localization restrictions need to be carefully-scoped, proportional, evidence-based and regularly reviewed.

If you answered yes, how would the removal of the localisation restrictions be beneficial to your business or organisation?

- Faster start-up or scale-up of business
- Cost reduction
- Accessing more performant or secure technologies
- Entering new Member States market(s)
- Expanding sales to foreign market(s)
- Developing new products/services
- Other

Please describe

*1000 character(s) maximum*

One of Mozilla’s core principles is “The Internet is a global public resource that must remain open and accessible.” Localisation restrictions fundamentally hamper the openness of the global Internet, and thus the ceiling of its economic and social potential. Within Europe, the vision of the Digital Single Market recognizes this: Europe would be better off in many ways if data were more freely transferable in the Single Market. We note the possibility of carefully tailored regulations on the free movement of data to serve other purposes, such as law enforcement or public policy. But where an alternative approach is available to address those concerns that would not restrict the openness of the Internet, that other approach must be preferable. Data localization restrictions should be seen as a policy of last resort.

What kind of action at EU level do you consider appropriate to address the restrictions?

- The EU should not address the issue
- A legislative instrument
- Guidance on data storage / processing within the EU
- Increasing the transparency of restrictions
- Other
- I don't know

## 2. Access to and re-use of non-personal data

---

This part of the questionnaire aims to understand the data trading practices of businesses, and how all businesses, in particular SMEs, and other stakeholders access and trade non-personal data, and what are the perceived barriers to such trading and re-use of such data. The Commission seeks the views of businesses and other respondents on ways to enhance access to and re-use of data and data trading in Europe today.

### 2.1. Accessing data

This section is addressed to businesses and organisations of any size, and especially SMEs and start-ups which are seeking access to non-personal or anonymised data for running their businesses or developing new businesses. For consumer access issues, please see section 4.1 on data portability for non-personal. The aim is to find out whether and to what extent businesses and organisations have access to the data they need to develop or conduct their tasks, and furthermore to find out what role existing legislation plays in today's data markets, and whether there is a need to revise or introduce legislation to support the European data economy.

Do you currently depend to a significant extent on data resources that you acquire from others (for products or services you offer, for your internal business processes)?

- Yes
- No

Have you had difficulties in acquiring data from other business actors (i.e. limited or no access to the data) or have you been exposed to business practices that you consider unfair with respect to access to such data?

- Yes
- No

When acquiring data from other economic operators or when negotiating such acquisition: To what extent do you consider to be in a situation of equal bargaining power when negotiating data usage licences?

- To a great extent
- To some extent
- To a minor extent
- Not at all
- I don't know

When acquiring data from other economic operators or when negotiating such acquisition: How often do you consider having been exposed to a situation that in your view would amount to an abuse of dominant position (as defined in competition law)?

- Never
- Rarely
- A number of times
- Often
- I don't know

Does current competition law and its enforcement mechanisms sufficiently address potentially anti-competitive behaviour of companies holding or using data?

- To a great extent
- To some extent
- To a minor extent
- No
- I don't know

Please explain

*1000 character(s) maximum*

We answered to "some extent" as competition policy has in some ways lagged behind the rapid development of the data economy. Exploration of how competition law can be adapted to address potentially anti-competitive behaviour as it relates to data rich companies is encouraged, but we do not think that any sector specific legislation, nor the introduction of licensing or property rights for non-personal data, would be the correct policy response in this burgeoning area.

Have you entered contracts in which certain data was defined as a trade secret?

- Yes
- No

## 2.2. Holding and supplying data

This section is addressed mostly to businesses that hold non-personal or anonymised data not subject to significant data processing ("raw" data), in particular data collected by sensors embedded in machines, tools and/or devices and who are in a position to share them. The aim is to get more information about data licensing practices.

Do you believe existing EU legislation sufficiently protects investments made into data collection by sensors embedded in machines, tools and/or devices?

- Yes
- No
- Only in some scenarios
- I don't know

If you/your organisation hold/s raw data or data sets, do you license its usage to others?

- No / to a minor extent
- Only to sub-contractors that perform tasks closely related to the organisation's business processes
- Only to companies within an economic group (e.g. parent and subsidiaries in a corporate group /holding; affiliate, etc.)
- Only within IT innovation environments, collaborating with other companies on concrete projects
- Yes, to a wider range of players based on paying licences
- My company makes certain datasets accessible as open data (accessible online, e.g. through a web API), licensing conditions allow many re-use options and re-use is free of charge, at least for non-commercial re-use of the data
- Other

Are you including the value of at least some of the data you hold as a business asset in your balance sheets?

- Yes
- No

Please explain why.

- This is not required by the applicable accounting/financing reporting standards
- I am not sure how to measure the value of the data I have or do consider that this would prove difficult
- Considerations of commercial strategy
- I have not given this a thought
- Other

## **2.3. Possible solutions**

Sections 2.3.1 and 2.3.3 are directed at all respondents, including consumers and businesses. Section 2.3.2 is directed at businesses that deal with data collected by sensors embedded in machines, tools and/or devices. The aim is to receive input on what a possible future EU framework should look like to support a thriving, diverse and innovative European data economy.

### *2.3.1. General objectives for a future EU framework for data access*

To what extent do you agree with the following statements (1=not at all,2=to a minor extent, 3=neutral/I don't know, 4=to some extent, 5=to a great extent):

	1	2	3	4	5
Trading of non-personal machine-generated data should be enabled to a greater extent than it is today.	<input type="radio"/>				
The sharing of non-personal machine-generated data should be facilitated and incentivised.	<input type="radio"/>				
Investments made into data collection capabilities and data assets should be protected.	<input type="radio"/>				
Sensitive business and confidential data should always be safeguarded.	<input type="radio"/>				
Lock-in effects in the data market should be minimised, especially for SMEs and start-ups.	<input type="radio"/>				

2.3.2. Access for public sector bodies and scientific research

Could you agree to an obligation to license the use of (non-personal) data you hold for any of the following purposes (subject to conditions)?

- For the establishment of statistics by public statistical offices
- For government agencies for the prevention of public health or other specified risks
- For government agencies in order to address other societal challenges (e.g. improving urban planning, manage supply of energy)
- For scientific research that is funded from public resources
- Other
- I would not agree to such an obligation for any purpose

Please specify

*1000 character(s) maximum*

There are many reasons why such obligations would be concerning. First is precedent. If EU requires businesses to provide gov't agencies with access to privately-held data, countries around the world may consider other gov't access mandates to be justifiable - + measures with less well-intended objectives. State-owned businesses might even be given access to the data and thus receive competitive advantages, including against EU firms. Also, it seems potentially contrary to public interest to derive public stats or set public policy on basis of private data sets, whose data collection, mgmt practices, & data acquisition goals, may be different from a state, which has a responsibility to be equitable & fair in its data gathering. Any sharing of privately held non-personal data to public entities should remain voluntary & conditions negotiated on a case by case basis. Also, there has been no compelling evidence to point to need for any sort of licensing system in this burgeoning area.

Could such access be given at no cost or only the cost related to making the data available?

- Yes
- No

Do you consider there should be action at EU level to address access to such data for the entities mentioned in the previous question (the establishment of statistics by public statistical offices, government agencies for the prevention of public health or other specified risks, government agencies in order to address other societal challenges (e.g. improving urban planning, manage supply of energy), scientific research that is funded from public resources)?

- The EU should not address the issue
- Yes, but only voluntary measures (e.g. industry self-regulation)
- Yes, through legislative measures (for a scope to be defined)
- I don't know

### 2.3.3. Access for other commercial entities

The following questions ask for an assessment of a number of potential measures that might help to make more data held by one commercial entity available for re-use by another commercial entity.

Would you agree with the following statement: More data would become available for re-use if the Commission would issue guidance on how access, use and re-use of data should be addressed in contracts (data usage licences) – based on existing legislation (in particular the Trade Secrets Protection Directive, copyright legislation and the Database Directive)?

- Yes
- Sometimes
- No
- I don't know

What impacts (if any, including economic) on competition and innovation would you expect from the solution described in the previous question?

*1000 character(s) maximum*

Would you agree with the following statement: The optimal solution for making data collected by sensors embedded in machines, tools and/or devices available for re-use is to leave it entirely to the parties to decide (by contract) who should have the right to license the usage of these data, how and to whom.

- Yes
- Sometimes
- No
- I don't know

What impacts (if any, including economic) on competition and innovation would you expect from the solution described in the previous question?

*1000 character(s) maximum*

Would you agree with the following statement: More data would become available for re-use if more data holders used Application Programming Interfaces (APIs) to facilitate access to the data they hold, and these APIs were designed and documented in a way easy to use by third party application developers.

- Yes
- Sometimes
- No
- I don't know

Please explain.

*1000 character(s) maximum*

We would neither agree nor disagree. As a general comment, the more providers who offer open APIs and documentation to enable effective interoperability with online services and applications, the more open the digital ecosystem will be, and the better for overall economic benefit. But, offering APIs is not the same thing as offering access to data; offering access to data through APIs may be more or less useful than functional APIs designed to interoperate with the applications and services themselves without needing to offer access to any data. Ultimately the veracity of this statement depends on the specific circumstances of the data, applications, and services in question.

What impacts (if any, including economic) on competition and innovation would you expect from the solution described in the previous question?

*1000 character(s) maximum*

In general, technology businesses are probably sufficiently well-versed in the public benefits of using APIs as well as how to design APIs; the problems visible today in the technology marketplace arise not from any awareness or education obstacles, but rather that incentives to offer open APIs are in some circumstances not sufficient to justify the potential costs associated with the offering.

Would you agree with the following statement: More data would become available for re-use if legislation would define a set of (cross-sector or sector-specific) non-mandatory contract rules for B2B contracts, possibly coupled with an unfairness control in B2B contractual relationships) for allocating rights to access, use and re-use data collected by sensors embedded in machines, tools and/or devices were defined.

- Yes
- Sometimes
- No
- I don't know

What impacts (if any, including economic) on competition and innovation would you expect from the solution described in the previous question?

*1000 character(s) maximum*

Would you agree with the following statement: More data would become available for re-use if a set of recommended standard contract terms were to be drafted in close collaboration with stakeholders.

- Yes
- Sometimes
- No
- I don't know

What impacts (if any, including economic) on competition and innovation would you expect from the solution described in the previous question?

*1000 character(s) maximum*

Would you agree with the following statement: More data would become available for re-use if a company holding data which it protects through technical means against illicit misappropriation had civil law remedies against such misappropriation (e.g. the right to seek injunctions, market exclusion, or to claim damages).

- Yes
- Sometimes
- No
- I don't know

What impacts (if any, including economic) on competition and innovation would you expect from the solution described in the previous question?

*1000 character(s) maximum*

Would you agree with the following statement: More data collected by sensors embedded in machines, tools and/or devices would become available for re-use if both the owner or user of the machine, tool or device and the manufacturer share the right to license the use of such data.

- Yes
- Sometimes
- No
- I don't know

Please explain.

*1000 character(s) maximum*

Although there are many possibilities for encouraging broader, including public, access to data, this question addresses one significant reality that many policy frameworks seem to miss: Users of systems ought to have control over those systems. The question asks whether system users ought to be able to share the data that results from their use, and in general, the answer should be 'yes'.

What impacts (if any, including economic) on competition and innovation would you expect from the solution described in the previous question?

*1000 character(s) maximum*

Would you agree with the following statement: More data would become available for re-use if the companies active in the production and market commercialisation of sensor-equipped machines, tools or devices were awarded an exclusive right to license the use of the data collected by the sensors embedded in such machines, tools and/or devices (a sort of sui generis intellectual property right).

- Yes
- Sometimes
- No
- I don't know

Please explain.

*1000 character(s) maximum*

Recent history shows that the creation of new intellectual property rights tends to stifle innovation and market activity, not promote it. Also, such a provision would be unworkable - such devices are often sold to customers so that the customers can collect data using them and then profit from it. If all rights in such data belonged to the manufacturer, why would the customer buy the device?

What impacts (if any, including economic) on competition and innovation would you expect from the solution described in the previous question?

*1000 character(s) maximum*

We would expect negative impacts on competition and innovation from the creation of new exclusive rights as suggested.

Would you agree with the following statement: More data would become available for re-use if the persons or entities that operate sensor-equipped machines, tools or devices at their own economic risk ("data producer") were awarded an exclusive right to license the use of the data collected by these machines, tools or devices (a sort of sui generis intellectual property right), as a result of the data producer's operation, to any party it wishes (subject to legitimate data usage exceptions for e.g. manufacturers of the machines, tools or devices).

- Yes
- Sometimes
- No
- I don't know

Please explain.

*1000 character(s) maximum*

Recent history shows that the creation of new intellectual property rights tends to stifle innovation and market activity, not promote it.

What impacts (if any, including economic) on competition and innovation would you expect from the solution described in the previous question?

*1000 character(s) maximum*

To what extent would you agree to an obligation to license for the re-use of data generated by machines, tools or devices that you have commercialised under fair, reasonable and non-discriminatory (FRAND) terms?

- To a large extent
- To some extent
- To a minor extent
- Not at all

To what extent would you agree to an obligation to license for the re-use of data generated in the context of your online platform through its users under fair, reasonable and non-discriminatory (FRAND) terms?

- To a large extent
- To some extent
- To a minor extent
- Not at all

### 3. Liability

---

This part of the questionnaire aims to understand the level of awareness, as well as the respondents' experiences and issues related to liability for products and services coming out of Internet of Things (IoT) technologies and autonomous systems. The questions are also meant to gather evidence for a proper assessment of the adequacy of the [Product Liability Directive \(85/374/CEE\)](#) to respond to IoT and robotics liability challenges. The Commission seeks the views of producers and users of IoT technologies and autonomous systems in this section.

### 3.1. Extra-contractual liabilities: IoT and robotics products and services

#### Questions for producers/suppliers/manufacturers

As a producer/supplier: please indicate which new IoT and/or robotics technological developments you deal with.

- Non-embedded software/mobile apps
- Advanced and new sensor equipment
- Smart medical devices
- Robots, e.g. for care, surgery, industrial robots, other
- Automated cars
- Smart objects, i.e. thermostats, fridges, watches, cars
- Drones
- Other

As producer of IoT/robotics devices, did you ever experience problems in not knowing in which category (product/service) to classify the device in order to comply with a specific liability regime on provision of services or manufacturing of products?

- Yes, to a significant extent
- Yes, to a moderate extent
- No, I never experienced this problem
- I don't know

Do you, as a producer, take into account the possibility of being held liable for potential damages when pricing IoT/robotics devices?

- Yes
- No

Have you ever been held liable for damage caused by your IoT/robotics defective device?

- Yes
- No
- I don't know

As a producer, do you have a specific insurance for IoT/robotics products to cover your liability in case of compensation?

- Yes
- No
- I don't know

Questions for consumers/end-users

As a consumer, have you suffered damage due to a defective IoT/robotics device?

- Yes
- No

As a consumer/user have you ever experienced a software security problem (e.g. failure of the software, cyber-attack) when using your IoT/robotics product?

- Yes
- Yes, but I do not know the exactly problem or cause.
- No

As a consumer/user of an IoT/robotics device, how easy it is to update the software of your device?

- Easy
- I can manage
- It is too inconvenient, complex, difficult
- My device is automatically updated/patched by the manufacturer or developer
- I do not have to update it
- Other

As a consumer, what (if anything) makes you reluctant to buy IoT/robotics products or services?

- They are technologically too complicated to use
- Price
- I am not interested
- Privacy risks
- Software security problems, Cyber security risks
- Legal uncertainty: I didn't know whether I would receive a compensation in case of damage
- In case of damage, it is difficult to understand where the cause of damage lies
- No reluctance at all
- Other

Do you think IoT/robotics products and services should be equipped with an event data recorder to track what the device was doing when the damage occurred?

- Yes
- No
- I don't know

In the EU country where you live, are there specific rules on liability for damage caused by the new technological developments, such as IoT/robotics products? If you are aware of such rules, please indicate them.

*1500 character(s) maximum*

In your opinion, who should bear the liability in case of damages caused by defects or malfunctioning of a smart device which combines tangible goods (a car), digital goods (an app) and services (e.g data services)?

- The producer of the physical device
- The provider of the digital good (software and/or app)
- The producer of the physical device jointly with the provider of the digital good (software and/or app)
- The attribution of liability is better dealt through contracts on a case-by-case basis
- To be established on a case-by-case basis based on the best positioned to avoid risks
- To be established on a case-by-case basis based on the entity generating the highest risks
- Other

As end-user (consumer/company) active in the data economy, have you directly experienced/entered into agreements, or are you aware of contracts that reduce substantially the liability of providers of IoT products/services/robots?

*1000 character(s) maximum*

What type of contractual liability limitations have you faced (e.g. on errors, accuracy and reliability of data, defects, functionality and availability of service, risk of interception of information, cyber-attacks)?

*1000 character(s) maximum*

Which exclusions (damage to property, financial loss) or limitations of damages (e.g. caps) connected in any way with the use of IoT products/services/robots have you experienced or are you aware of?

*1000 character(s) maximum*

Do you think the attribution of liability in the context of IoT/Autonomous systems products and services can adequately be dealt with through contracts?

- Yes
- Partially
- No

### **3.2. Possible options and a way forward (both for consumers/end users and producers of IoT /Robotics devices)**

Do you think a risk management approach in which the party that is best placed to minimise or avoid the realisation of the risk (e.g. the manufacturer of the IoT device, or the software designer) could be a way forward?

- Yes
- No
- I don't have information about what a risk management approach would entail and would thus prefer not to answer
- I don't know

In your opinion, who should bear the liability in case of damages caused by defects or malfunctioning of a smart device which combines tangible products, digital products and services?

*1000 character(s) maximum*

What type of liability, contractual or extra-contractual, is, in your opinion, the most consumer-friendly way to deal with damages caused by defects or malfunctioning in smart devices, which combine tangible products, digital products and services?

- Contractual
- Extra-contractual
- None of them
- I do not know

Do you think that the liability in relation to smart devices combining products and services require an ad hoc approach at EU level?

*1000 character(s) maximum*

Independently of who is considered liable, should there be a liability cap, i.e. an upper bound to the compensation of damages?

- Yes, for all IoT products
- Yes, but only for specific products in the experimentation/testing phase
- Yes, but only for specific products abiding by strict safety standards
- No
- I do not know

What is your opinion on the idea of best practices guidelines and/or expected care and safety standards that, if fulfilled, would automatically exclude/limit liability?

- I agree, for all IoT products
- I agree, but only for specific products in the experimentation/testing phase
- I agree, but only for product performing automated actions or taking independent decisions
- I do not agree
- I do not know

Is there a need for mandatory cyber insurance?

- Yes, for all IoT products
- Yes, but only for specific products in the experimentation/testing phase
- Yes, but only for product performing automated actions or taking independent decisions
- No
- I do not know

Do you feel protected by the current legal framework (both Business-to-Business and Business-to-Consumer) for algorithms, e.g. in case it can be proven that an accident has been caused by a bug in the algorithm?

- Yes
- No
- I don't know

Should some sorts of standard certification or testbedding be envisaged for algorithm based services?

- Yes
- No
- I don't know

Who should be liable for defects or accidents caused by products embedding open algorithms, i.e. algorithms developed through cooperative platforms?

- The producer
- The user
- The participants to the cooperative platform jointly
- Nobody
- Other

## 4. Portability of non-personal data, interoperability and standards

---

### 4.1. Portability of non-personal data

This section is directed towards all respondents, including consumers, organisations and businesses. The objective of this section is to explore business situations where portability of non-personal data can unlock opportunities and/or eliminate blockages in the data economy, as well as the effects of such conditions on all the concerned actors.

Are you using or have you used services which allow you to port or retrieve non-personal data that you had previously provided?

- Yes
- No
- I don't know

What advantages does/would portability of non-personal data bring to you/your business?

- Build value deriving from these data
- Trade data on data trading platforms
- Give access to third parties to the data
- Switch easily service provider without losing these data
- Other

Is your business offering portability of non-personal data to its business or individual clients?

- Yes
- No

Are you aware of other good examples of services offering data portability? Please specify.

*1000 character(s) maximum*

If you are a business user of cloud services or online platforms: Have you experienced difficulties in switching providers?

- Yes
- No
- I was not interested in switching providers

Do you see a specific need for businesses to receive non-personal data in a machine-readable format, as well as the right to licence the use of such data to any third party (i.e. the right of data portability under article 20 GDPR extended to any user and to non-personal data)?

- Yes
- No
- I don't know

If you have further comments on portability rights, please insert them below.

*1000 character(s) maximum*

What are the possible effects of introducing a portability right for non-personal data regarding cloud services? Please consider positive and possible adverse effects, and consequences for your business and, more generally, for the user of the cloud service as well as the service provider and other concerned actors.

*1500 character(s) maximum*

The ease with which one can extract one's data from a service has always been a mark by which customers can choose services. As long as there is no false advertising, leaving this issue to the market allows people to put more or lesser weight on the ability to extract their data later, compared to their other concerns. Conversely, making this a right runs into definitional issues - if the data is non-personal, which persons have a right to it? - and questions about what constitutes full fidelity data availability.

What are the possible effects of introducing a portability right regarding non-personal data generated by sensor-equipped machines, tools and/or devices? Please consider positive and possible adverse effects, and consequences for your business and, more generally, for the user of the services as well as manufactures, service providers and other concerned actors.

*1500 character(s) maximum*

The ease with which one can extract one's data from a service has always been a mark by which customers can choose services. As long as there is no false advertising, leaving this issue to the market allows people to put more or lesser weight on the ability to extract their data later, compared to their other concerns. Conversely, making this a right runs into definitional issues - if the data is non-personal, which persons have a right to it? - and questions about what constitutes full fidelity data availability.

What are the possible effects of introducing a portability right for non-personal data regarding online platforms? Please consider positive and possible adverse effects, and consequences for your business and, more generally, for the business user of the platform, consumers, intermediary (data) services, the online platform and other concerned actors.

*1500 character(s) maximum*

The ease with which one can extract one's data from a service has always been a mark by which customers can choose services. As long as there is no false advertising, leaving this issue to the market allows people to put more or lesser weight on the ability to extract their data later, compared to their other concerns. Conversely, making this a right runs into definitional issues - if the data is non-personal, which persons have a right to it? - and questions about what constitutes full fidelity data availability.

## 4.2. Interoperability and standards

This section is primarily directed towards businesses and organisations. The objective of this section is to get the stakeholders' opinions on the best approaches to technically support data portability and access to data.

As a provider of cloud services, do you provide "standard-compliant" solutions?

- Yes
- No

As a user of cloud services, do you give preference to "standard-compliant" solutions?

- Yes
- No

If yes, based on which standards?

*1000 character(s) maximum*

We prefer standards which are open standards. The European Interoperability Framework version 1.0 gives a good definition of what an open standard is.

For which reasons would/do you use a “standard-compliant” cloud solution

- Data portability of non-personal data
- Service interoperability
- Privacy, data protection compliance & Security
- Cloud management
- Service Level Agreement
- Other

What do you consider as a priority for facilitating access to data and to improve its technical and semantic discoverability and interoperability?

- Common metadata schemes (including differentiated access, data provenance, quality)
- Data catalogues
- Use of controlled (multilingual) vocabularies
- Common identifiers
- Other

What technical instruments should be used for promoting/implementing your priorities suggested in the previous question?

- Definition of new standards
- Improvement of existing standards
- Recommendations

What legal instruments should be used for promoting/implementing your priorities suggested in the same question?

- EU regulation
- Guidelines
- Support actions
- Other

Do you see the need for the definition of a reference architecture recommending a standardised high-level framework identifying interoperability interfaces and specific technical standards for facilitating seamless exchanges across data platforms?

- Yes  
 No

Please explain.

*1000 character(s) maximum*

Such an architecture and such a framework already exist - the architecture is REST <[https://en.wikipedia.org/wiki/Representational\\_state\\_transfer](https://en.wikipedia.org/wiki/Representational_state_transfer)> and the framework is HTTP <<https://en.wikipedia.org/wiki/Http>>. We respectfully submit that setting technical standards for the Internet is best left to the Internet technical community.

## Additional contribution

---

Please feel free to upload a concise document, such as a position paper. The maximal file size is 1MB.

Please note that the uploaded document will be published alongside your response to the questionnaire which is the essential input to this open public consultation. The document is an optional complement and serves as additional background reading to better understand your position.

**7cfdc0d8-4472-4874-bf7a-ef74889db920/Mozilla\_decentralization-and-openness.pdf**

If you wish to add further information - within the scope of this questionnaire - please feel free to do so here.

*2000 character(s) maximum*

Please find attached two issue briefs which provide an overview of Mozilla's approach to issues tackled in this survey, namely interoperability, open standards, and competition in the context of the data economy.

## Contact

CNECT-CONSULTATION-DATA-ECONOMY@ec.europa.eu

---