



# TITAN

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## EXECUTIVE SUMMARY

This deliverable reports on the results of the citizens co-creation process in eight countries and with 215 citizens participating in the workshops. The workshop took the citizens through four different sessions. The main topics of the report are news consumption and disinformation signals, sharing of news and information, and considerations about the functionalities of the TITAN system, bringing forward ideas for design principles in the topics of; data, user experience (UX), coaching- and learning aspects and trust in an AI system. All topics are substantiated by arguments and considerations from the citizens.

The citizens especially consume news and information on social media. They use various information signals to evaluate if news is true or not, however, there is a duality of the information signals that the TITAN system must pay attention to. The same information signals are sometimes categorized as both signals of true news and of disinformation, depending on personal experience and cultural differences among the citizens.

Citizens get a lot of their news and information online, but when it comes to sharing news and information it is often via direct messages apps or in offline conversations. This is an important finding when considering in what way TITAN wants to interact with the user to tackle the potential spread of disinformation.

Data is a topic of much attention from the citizens. Citizens want to have control of their data, they want transparency about how data is used in the TITAN system, and they want to be able to choose if they give the system access to data or not. The long consent forms that citizens are used to “agree” to when using a digital tool, is not desirable and they ask for informed consent, to not fear what their data is being used for. There is distrust associated with AI and disinformation and the citizens want to know the political or economic interest behind the tool. Citizens suggest that the system is free to use, since it will make it more accessible for everyone, but they understand that if it is free to use, they must “pay” with their data. They want to know how they “pay” and want to know how the system is funded and maintained after it has been developed.

Considering the different UX requirements, there is a high demand for functionality and to have the possibility of different versions of the system. This shows a contradiction in citizens wish for giving limited data to a passive and generic system, and wanting a system that can adapt to many different use needs, which would require citizens to provide the system with data. The citizens have many suggestions on how to make the system attractive, efficient, and user-friendly, which TITAN must consider how to balance in relation to other design principles. The discussion between the positive and the negative sides of TITAN as either a fact-checker or an intelligent coach, raises a question about how to make the system attractive to use for many citizens.

Ideally the TITAN system will be able to attract different kind of users, but in the development stage it is worth considering what users to focus on first and consider how these types of users can be part of spreading the word about the tool to family and friend, since this process can contribute to building trust in the system. Trust, or rather distrust towards how an AI system like TITAN will work is a concern for many citizens, and building a trustworthy AI which deals with disinformation will be an important barrier to overcome.

To conclude, the TITAN system must accommodate the complexity of identifying disinformation online with creating a tool that is attractive to use. There is an ambiguity between citizens unwillingness to share personal data with the system and offering the functionalities that the citizens demand. TITAN must mitigate the concern of the citizens about sharing and storing data, while developing a tool that has transparency of the use of data, accommodate different types of user needs, offers attractive coaching functionalities, and is trustworthy.

Part of the co-creation process in WP3 is to discuss the most relevant topics from the citizen co-creation with relevant stakeholders. The topics that have been identified is how the TITAN system can work with informed consent and transparent communication about the use of data in the system. Ideally citizens should understand what they give consent to when using the TITAN-system. Citizens want control and transparency of how their data is used in TITAN and we want stakeholders to give input on how this is embedded in the technical functionality of the TITAN system. Both the topic of informed consent and giving the users control of their data, will be discussed in relation to how this can influence the trust in the TITAN system. The last topic is how to build a good learning platform, which will be key for the citizens to start using the TITAN system and enhance their critical thinking with the help of the system.

## 1 INTRODUCTION

The TITAN project wants to apply a human-centered and ethical approach to the development of the TITAN artificial intelligence (AI) technology. Citizens across Europe have been involved in workshops, as part of a broader co-creation process. This deliverable will present the results of the citizen co-creation workshops which will be the fundamental design principles of the TITAN AI system. The TITAN AI system will be referred to as the *TITAN system* or the *TITAN tool* throughout the deliverable.

### 1.1 The citizen co-creation workshops

The topics for the workshop were developed based on desk research followed by an internal workshop with TITAN consortium partners, where the topics were narrowed down. Furthermore, there has been continuously feedback meetings with Vrije Universiteit Brussel (VUB).

The final co-creation workshop format consisted of four sessions. The first two sessions focused on citizens' news and information consumption as well as their ability to identify disinformation. The two last sessions focused on citizens' concrete input for how to develop the TITAN system. The eight countries that hosted the co-creation workshops, all followed the same workshop methodology.

- In *session 1* the citizens made timelines of an ordinary day in their life and a second timeline where they placed their different news and information habits during the day. The timelines were followed by a small discussion in groups about how they share news and information.
- In *session 2* the main moderator presented 10 news bits in plenum (see annex 2) and the citizens were asked to evaluate if they believed the news presented was true news or disinformation. They had 30 seconds to evaluate each one, to mimic the situation of scrolling through news headlines online. Afterwards the citizens were put back in their groups where they discussed what they had answered and what reasons had made them come to that decision. In the end the correct results were presented for the citizens.
- In *session 3* the citizens were asked to participate in a scenario game where they had to physically move around according to their answer to a given scenario (see annex 3). They were presented with different scenarios based on different functionalities of the TITAN system. According to their answers they were asked to further discuss their answer, explain their motivation for the answer, and what reservations they might have towards the functionality of the system.
- In the last session, *session 4*, the citizens brainstormed on what reasons could lead to the TITAN system failing. The answers were clustered by the citizens into categories.

The first two sessions were structured to prepare the citizens and give them self-awareness of their own habits regarding news and information consumption as well as a get them into a mindset of how difficult it can be to identify disinformation. The last two sessions were structured to let the citizens give concrete input on using an AI tool to help them identify disinformation.

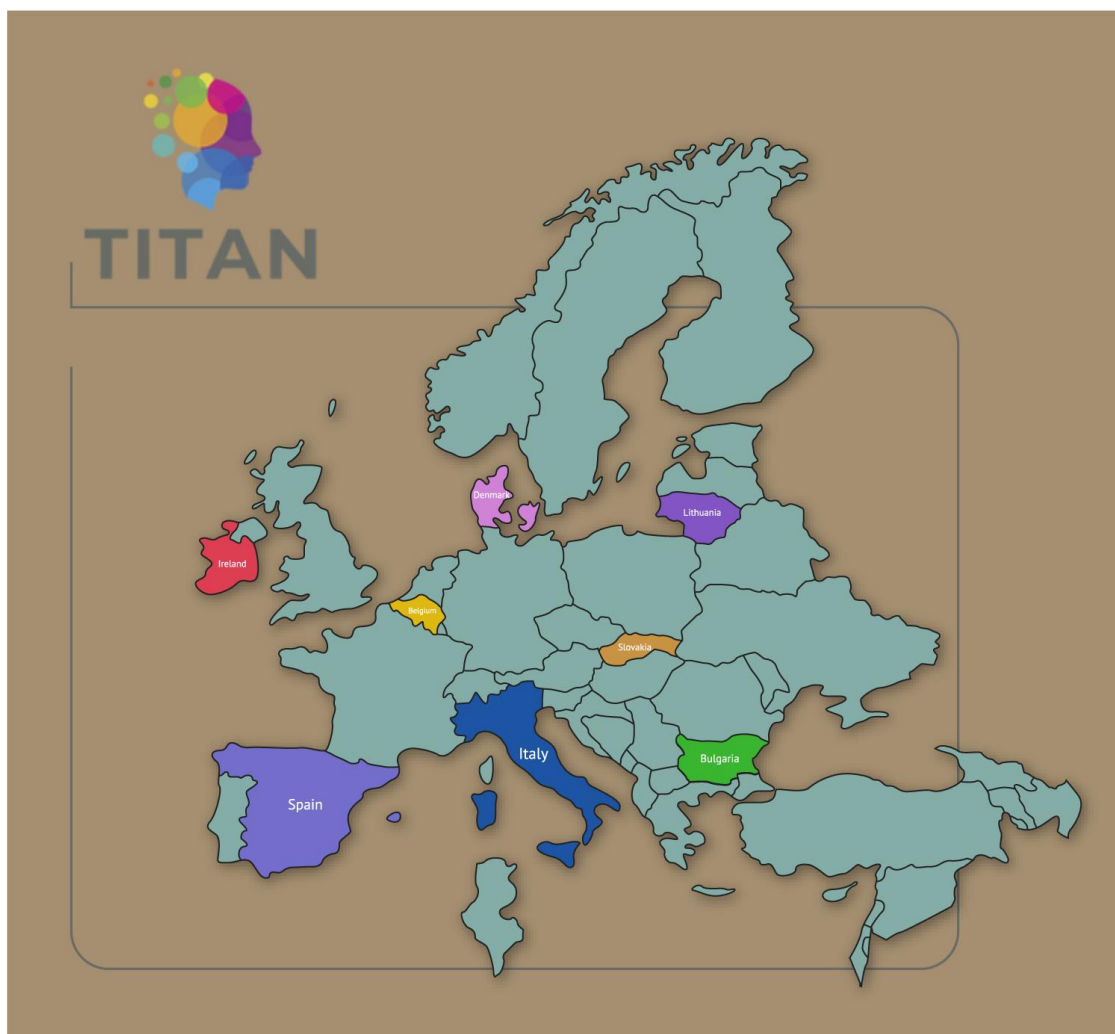
This deliverable will present the main findings from the citizen co-creation workshops. The deliverable will be used to develop the design principles for the TITAN system.

Furthermore, the results will be used to focus the content of the forthcoming stakeholder workshops, where we will engage different experts and stakeholders within various fields to help further develop and translate the citizens thoughts for the use of the TITAN project.

## 2 PARTICIPANT PRESENTATION

The results from the citizen co-creation workshops are based on citizen participation across eight European countries; Belgium, Bulgaria, Denmark, Ireland, Italy, Lithuania, Slovakia, and Spain. In total **215 citizens participated**, on average 27 citizens in each co-creation workshop. The citizens were recruited via various forms of communication; social media channels, flyers, posters, citizen mailing lists, organisations newsletters, radio, and telephone. In total 445 citizens signed up for participation in the workshop, 260 citizens were invited to join the workshop and in the end 215 citizens participated in the workshops. The citizens who were selected to participate, were selected to represent diversity across the following criteria: age, gender, educational background, current occupation and what geographical zone they live in.

These criteria were defined based on common demographic criteria. Furthermore, the eight countries represent Eastern, Western, Southern, and Northern European countries.



**Figure 1: Map of Europe highlighting what countries the co-creation workshops were hosted in.**

Looking at the statistics of all citizens across the eight countries, we see diversity among the citizens across all the defined categories, which was the intention of the recruitment strategies utilised in the different countries. We will not claim to have complete statistical representation of the eight countries as this was never the aim or ambition for the citizen co-creation workshops.

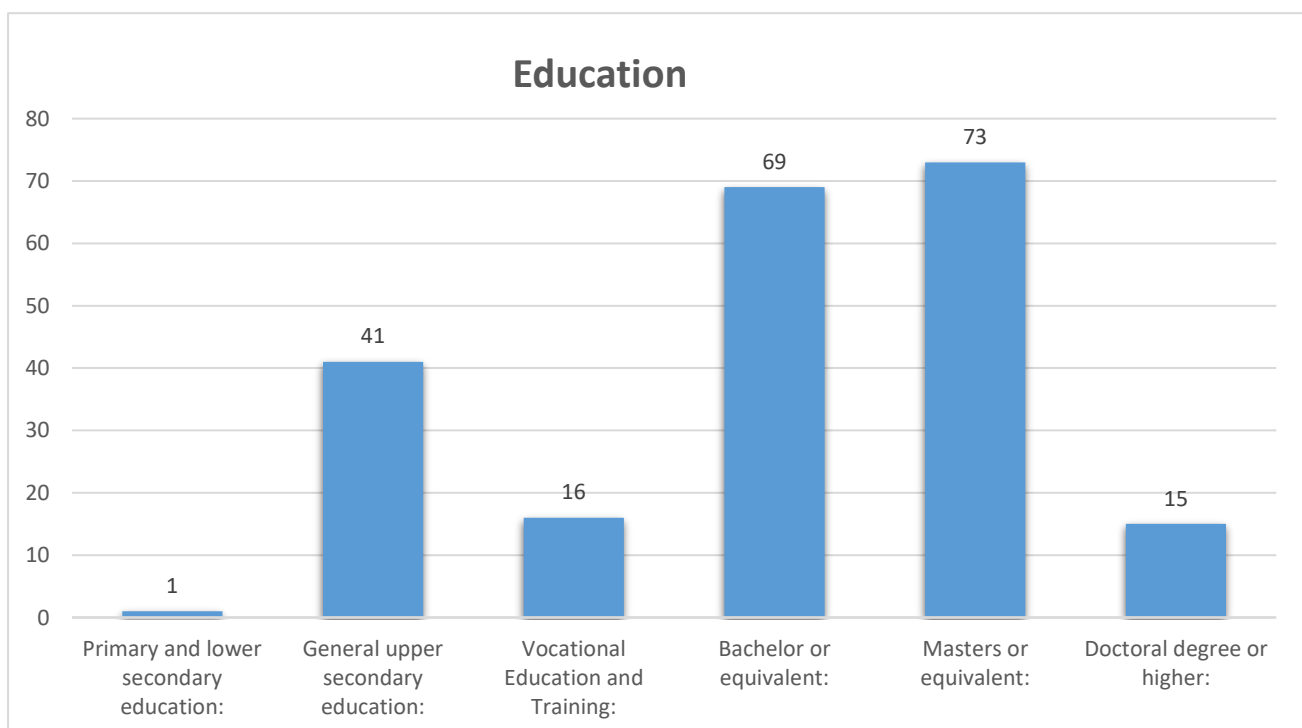
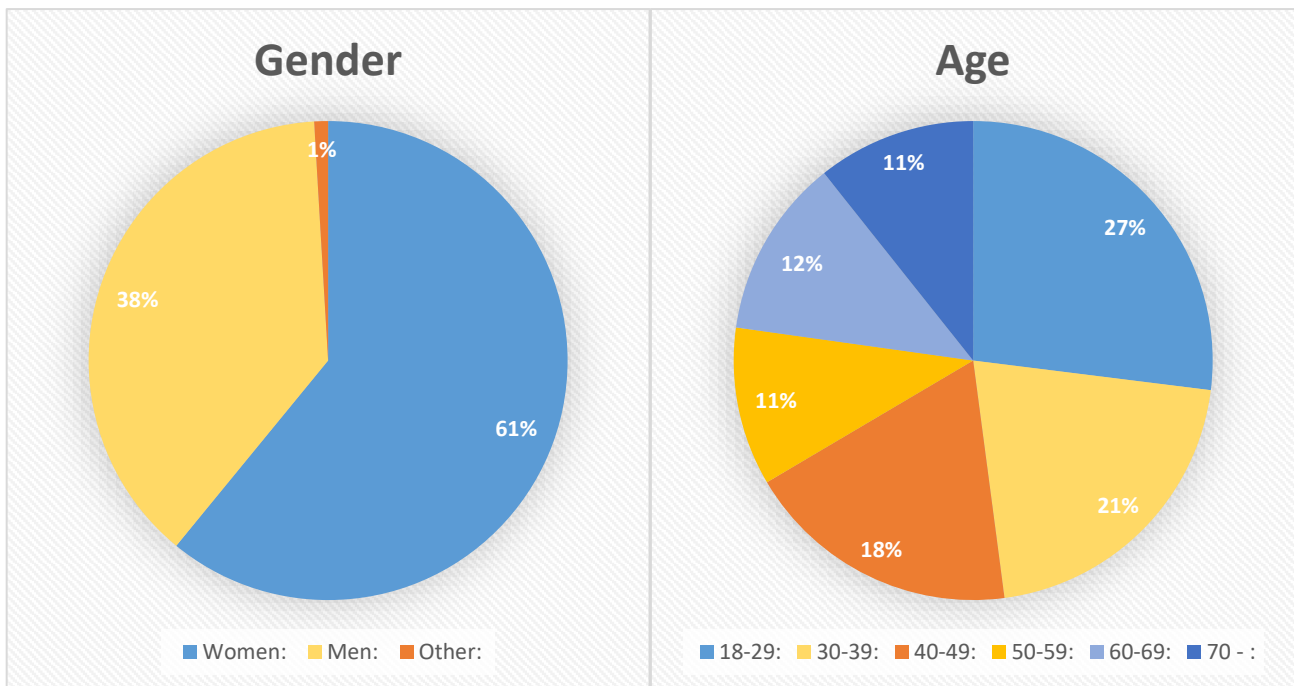
While there are over- and underrepresentation in some demographic criteria, we do not believe that these fluctuations have significant impact on the usability of the results. In the group of citizens women are overrepresented and there are many students too. Regarding education level there are few citizens with

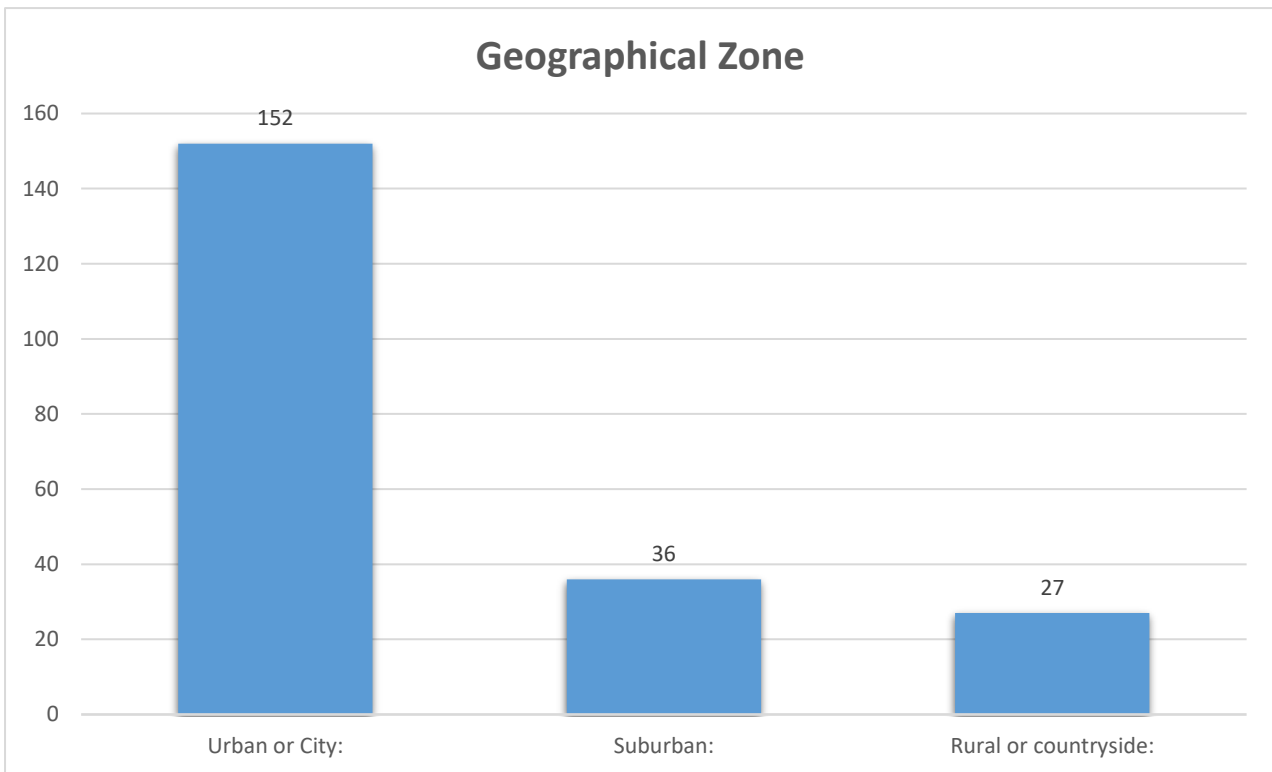
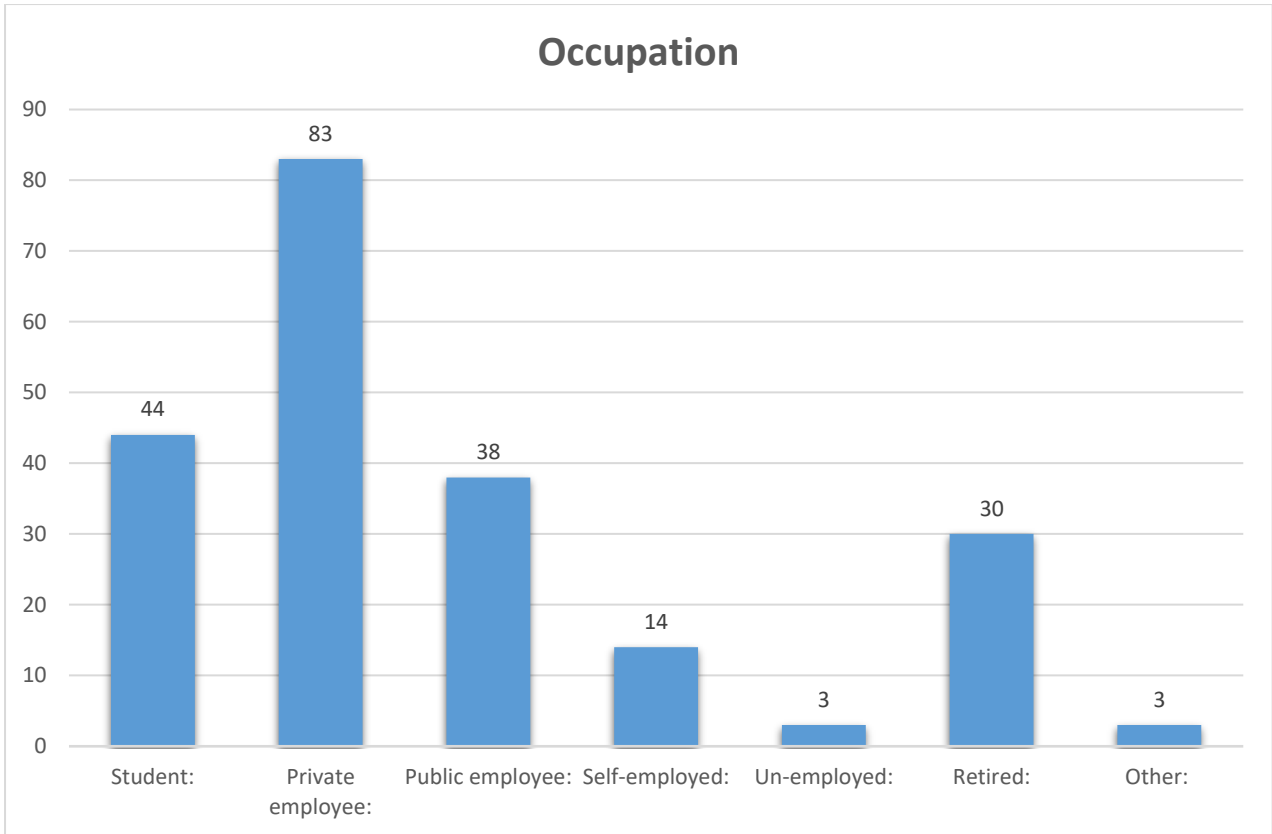
primary and lower secondary education, and with vocational education and training, making the higher educations overrepresented. There are few unemployed citizens and many who lives in urban areas.

Altogether, the group of participants represent a broad group of citizens from the different countries and give insight into a broad perspective of opinions of European citizens. The participating citizens are referred to as citizens throughout the deliverable.

## 2.1 The Demography of the Participants

The demography of the 215 citizens who participated in the workshops are presented in the following graphs.





### 3 NEWS CONSUMPTIONS AND DISINFORMATION SIGNALS

The entire foundation of the TITAN system is that citizens read and consume news and information, and that with the use of online and social media it has become increasingly easy for people and organisations with malicious intentions to spread disinformation as the sharing of news and information online have wide reach. Therefore, the news and information consumption habits of the citizens has been researched in the co-creation workshop session 1. The results are presented in this chapter together with a list of information signals, which citizens identified based on the evaluation of news bits in session 2. The list of information signals is combined with an analysis of the citizens evaluation of news bits.

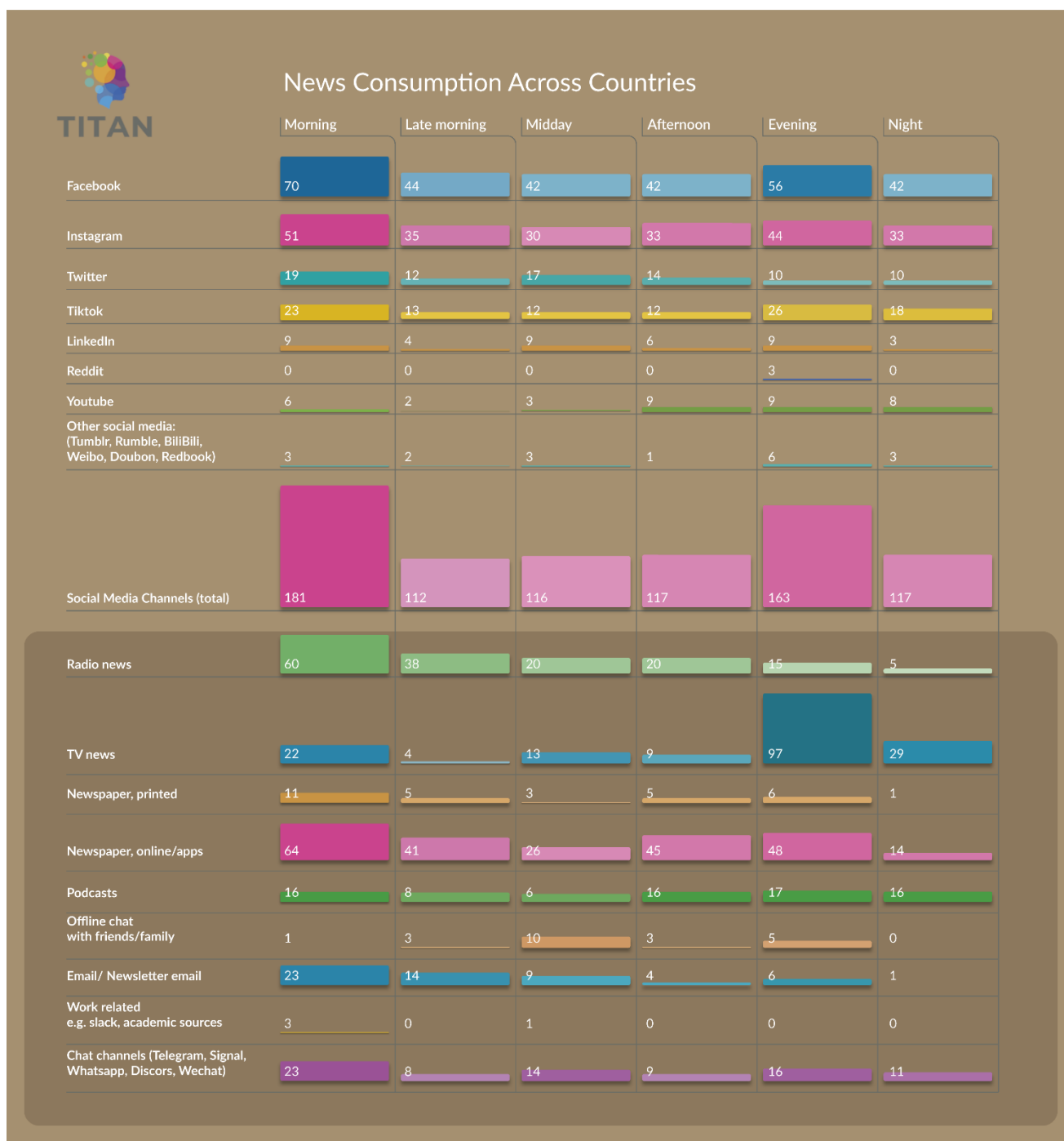
#### 3.1 News and information consumption

The citizens use a lot of different sources when they consume news and information. There is a broad variety in the sources they use, from the use of radio, TV news, news apps and to different social media. Especially within the use of social media there are a lot of different medias and platforms. Overall, citizens especially get their news and information from online medias of different kinds, radio and TV news are also popular. Few get their news and information from offline sources, like printed newspaper and offline conversations (see Table 1).

The citizens continuously consume news and information throughout the day but with most consumption in the morning and evening, which is logical when most of the citizens are either students or working, which means they are occupied during the day.

Table 1 (next page) visualise how different news sources are used throughout the day. As one person could use the same sources multiple times a day the accumulated value of each source exceeds the number of citizens participating in the workshops. To show the diversity of the use of social media channels, the table shows how the different social medias are used throughout the day and an accumulated amount of the social media channels.

The consumption of news and information online does not necessarily say anything about what they do with those news and information after they have read them. This matter will be explored further in the next section.



**Table 1: Table showing the consumption of news and information across all countries (numbers from the Italian workshop is not included). Numbers are based on session 1 in the citizen co-creation workshops.**

### 3.2 Sharing of news and information

Most citizens do not share news and information regularly on social media but if they do share, they mostly do it because they find something funny or humorous, because it relates to their personal interests, if it is troubling news, to enlighten others, or in work context to promote something and create traction on something they work with.

It was brought up in several countries that the citizens refrain from sharing online because they do not want to contribute to the negative atmosphere they experience online. Rather than sharing online they share in person or through direct message. There seems to be a tendency that citizens mostly share directly with specific people rather than sharing broadly with unknown reach. The use of direct communication to the receiver is also something the citizens experience themselves as they receive news from friends and family.

### 3.3 Information signals

As part of session 2, the citizens had to argue why they placed each news bit as either true news or disinformation. In groups the citizens explained to each other what signals made them evaluate the news as disinformation or valid news. It gives insight into nuances of working with information signals in the development of the TITAN system.

The list of information signals in table 2 is compiled based on the arguments from the groups in session 2. It is therefore not a comprehensive list of information signals, but it does provide meaningful insight into signal trends and shows the ambiguity that citizens face when they evaluate news, since some signals are identified as both disinformation- and true information signals.

Disinformation Signals	True Information Signals
<b>Media</b>	
<ul style="list-style-type: none"> <li>• Social media</li> <li>• Interaction on social media</li> </ul>	<ul style="list-style-type: none"> <li>• Interaction on social media (comments, shares, likes)</li> </ul>
<b>Source</b>	
<ul style="list-style-type: none"> <li>• Unverified/no mentioned source</li> <li>• Nationalistic/polarizing source (political agenda)</li> <li>• Unknown/no mentioned author</li> <li>• End of URL (doesn't end with the countries' characteristics)</li> </ul>	<ul style="list-style-type: none"> <li>• Look of an official/reliable source</li> <li>• Other sources mentioned</li> <li>• Similarity (with other news sources)</li> <li>• Research from reliable source</li> <li>• Mentioned author</li> </ul>
<b>Title</b>	
<ul style="list-style-type: none"> <li>• Catchy/shocking/biased headlines</li> <li>• Clickbait headlines</li> </ul>	<ul style="list-style-type: none"> <li>• N/A</li> </ul>
<b>Layout</b>	
<ul style="list-style-type: none"> <li>• Visuals (video/picture) unreliable/shocking/misleading</li> <li>• Advertisements/banners on webpage</li> <li>• Logo of newspaper</li> </ul>	<ul style="list-style-type: none"> <li>• Logo of newspaper</li> <li>• Lay-out of webpage (professional)</li> <li>• Visuals (video/picture) reliable, matches with content</li> </ul>
<b>Content</b>	
<ul style="list-style-type: none"> <li>• Fallacies/ framing</li> <li>• Absurdity</li> <li>• Stereotypes</li> <li>• Bots/cyborgs</li> <li>• Non-cross-checked information</li> <li>• Hate speech</li> <li>• Polarizing content</li> <li>• Framing of/ missing facts, numbers, statistics</li> <li>• Limited information</li> <li>• Missing details/specificity in content</li> <li>• Causes harm/fear</li> </ul>	<ul style="list-style-type: none"> <li>• Numbers/statistics mentioned</li> <li>• Depth in content</li> <li>• Non-controversial</li> <li>• Does not cause harm/fear</li> <li>• Plausible</li> </ul>

<b>Text</b>	
<ul style="list-style-type: none"> <li>• Emotional/subjective/sensational text</li> <li>• Incoherent text, discrepancies</li> <li>• Use of exaggerated, provocative words</li> <li>• Low lexical/content diversity</li> <li>• Low language complexity</li> <li>• Use of capital letters</li> <li>• Strange punctuation</li> </ul>	<ul style="list-style-type: none"> <li>• Neutral/objective phrasing and use of words</li> <li>• Good arguments/reasoning</li> <li>•</li> </ul>
<b>General</b>	
<ul style="list-style-type: none"> <li>• No societal reproduction (when should have been worldwide news)</li> <li>• Contradiction of objective/general knowledge</li> <li>• Contradicts citizens' previous knowledge/opinion</li> <li>• Topic is controversial, provokes spread of fake news</li> <li>• Against EU legislation</li> </ul>	<ul style="list-style-type: none"> <li>• Reasonable in society</li> <li>• Matches with previous knowledge/opinion - familiarity</li> <li>• No reasons for sharing content as fake</li> <li>• Mentioning of familiar and known names, companies, institution etc.</li> </ul>

**Table 2: Information signals**

Certain examples of information signals are relevant to unfold, with the citizens arguments of how they evaluate the news bit.

The type of (social) **media** that the news is published/posted on influence how the citizen evaluates the news. In two workshops citizens argue that the trust less in news posted on social media (news posted on Twitter and Facebook is a disinformation signal). News bit 2 (true news) and news bit 9 (fake news) are both from social media channels and are both voted as disinformation by 70% of the citizens. Evaluating it as disinformation is, however, also argued to relate to how it is visually presented (poor image quality), and both news bits are about migrants, a topic that some citizens connect with risk of disinformation. The amount of interaction on social media post will influence how the news is perceived by the citizens. In two workshops few retweets are reason to believe the news are disinformation, but it is not conclusive if a lot of interaction necessarily means more credibility.

How **source** is evaluated is reliant on personal experience of what is a known source or not, which will influence citizens evaluation. In Italy an overall finding from the evaluation of news bit shows that citizens who were strongly in doubt often expressed opposing views to one another, especially inherent in the nature of sources: the same source was perceived as very reliable or not at all reliable. Some things about the source are however clearer such as a mention of an author or if there is the impression of extensive research behind the news.

Different arguments from citizens identified that some found it harder to evaluate news that were not from their home country or from **sources** that they did not know. The news bit was from the eight different workshop countries making some sources familiar to some citizens and not to others. The arguments of national differences are the following:

- One citizen from Spain argue that you need knowledge on international law to identify if news bit 6 (about NATO giving 14 Su-25s to Ukraine) is true news or disinformation.
- In Slovakia citizens pointed out that for news bit 3 (about lack of power after a storm in Ireland) it is harder to verify if a storm took place in a different country than if it had been in Slovakia, where they could ask friends or family to verify the news.
- In Bulgaria they found news bit 9 (about social benefits of pensioners and migrants in Denmark) confusing, because they could not relate the news to a local context.

One thing that is mentioned as a clear disinformation signal is the **title of the news**. The use of title with elements of bias, shock, or similar will make citizens more likely to evaluate the news as disinformation. Likewise, the **layout**, e.g. the use of graphics, will influence the evaluation of the news. The use of provoking, shocking or alike graphics will make the citizen evaluate the news as disinformation.

The list of information signals, show that certain signals appear in both the list of disinformation and true news. E.g., *logo of website*, *visuals of the website (layout)* and *interactions on social media (media)* are used from both sides to make opposing argument. What some citizens consider as giving the news bit credibility, was by others considered as a disinformation signal. One example is from news bit 5 (see Annex 2), about the finding of drugs an antibiotic in milk in Italy: The name of the website “greenme” (*logo/name of the website*) was understood in two different ways. Some citizens argue that the news bit has a climate focus/political agenda, and their hidden agenda could be that people should not drink cows’ milk (possibly disinformation), while another citizen argue that because the name of the website contained the word “green” it gave creditability to the source (possibly true news). The logo of the website can influence how the news is evaluated but it dependent on the individual’s own perception and bias what they will deem credible or uncredible. While 72% of the citizens across all workshops evaluated news bit 1 as disinformation, as it indeed is, citizens in in Ireland and Belgium found that the logo of new bit 1 looks trustworthy.

*Visuals of the website (layout signal)* is mentioned as both a disinformation- and a true information signal and comments from the citizens show that what looks trustworthy, official, or reliable, varies from person to person. Opinions on good or poor design differs depending on personal preferences and cultural context. Examples from the workshop show that in relation to layout some news bits were found trustworthy in one country and not in another, while other news bit had opposing arguments within the same country:

- The picture of new bit 2 is in Bulgaria used as an argument for both true news and disinformation.
- The picture of news bit 4 is in Ireland reason to evaluate it as true news, while in Bulgaria it is reason to evaluate it as disinformation.
- The layout of news bit 6 is evaluated as both true news and disinformation by citizens in Denmark and Belgium, where some citizens in both countries argue that the layout looks professional (true news), while other citizens in both countries argue that the logo and the Cyrillic letters make the layout look fake (disinformation).

When it comes to the **content** of the news article, the use of polarizing language can be seen as a disinformation signal whereas content referring to statistics and numbers will be seen as granting credibility to the news. The tone of the **text** also impacts how the news is evaluated. Credibility is linked with the use of neutral language and good argumentation whereas signals of disinformation are use of emotional language and low complexity in the language.

**General** observations show that news can grant themselves more credibility by referring to sources or reasoning that are widely accepted by society as credible. Across all eight workshops citizens argue that news about covid-19 (news bit 4) is a typical topic of disinformation. Whereas news about a storm (news bit 3) seems likely to be true as there is no reason why someone would lie about a storm and news about reducing the length of women’s pregnancy (news bit 8) is unlikely to be true. It does however seem that (dis)information can thrive in echo chambers as news that go against the individuals’ opinions are likely to be considered as a disinformation signal and likewise if some news supports their view or opinion, it will likely be deemed trustworthy. In the Danish workshop several of the citizens rationalize for why news bit 5 about antibiotics in cows’ milk was true by referencing them recalling a case in Denmark about findings of antibiotics in Danish pork, which is fallible argumentation.

A summary of how alle the citizens evaluated the 10 news bit is available in Annex 2. The results of what news bit are true news, and which is disinformation is indicated in the same table.

### 3.4 Recommendation to the TITAN system

The analysis of information signals from the co-creation process show that we can find some patterns among what citizens consider disinformation signals, paying attention to the overlap of what is perceived as true information signals and the many details of the signals. The list of information signals can be used in the development of the functionality of the TITAN system in terms of what elements of a website/app/platform the user needs guidance on. Furthermore, the analysis of information signals also show that evaluation of disinformation signals differs from personal perception, bias, and cultural context. The recommendation to the TITAN system is that guidance and training of the user's ability to identify disinformation signals can consider personal differences. National differentiation can possibly also be built into the system. In section 4.2 and 4.3 the analysis will touch upon some of the issues that citizens express with using a personalised tool.

## 4 CONSIDERATIONS ABOUT THE TITAN SYSTEM

In this chapter, the citizens' reflections on the development of the TITAN system are presented. The results are arranged into thematic sections and subsections and there are overlaps between the different subsections as they present different considerations to the same thematic. The chapter will touch upon the sharing of information online and offline, the use of data in an AI system, the expected user experience (UX) of the TITAN system, citizens' perspective on a coaching platform and the importance of users trusting the TITAN system. Each section will end with a summary of what the reflections have of significance for TITAN and recommendations for the further development of the tool.

Results from all 4 sessions of the workshop is included in this section, and especially from session 3. The numbers in percentage presented in the following sections are based on how many citizens decided for a specific option in the four scenarios of session 3. The opinions will be presented with arguments for or against certain ways of using data in the functionality of TITAN.

### 4.1 Sharing of news and information

Knowing how citizens share news and information (potentially disinformation) is relevant knowledge in the TITAN project, since it is fundamental knowledge for how and when the TITAN system can influence the spread of disinformation. Looking at the citizens' daily consumption of news and information in section 3.1, it shows that citizens especially get informed via online media and social media platforms. When asking the citizens how they share the information they get from online sources, citizens especially share information in private conversations with friends, family, or colleagues. Sharing in private conversations is both in face-to-face/offline conversations and via online private messenger apps, like *WhatsApp* and *Telegram*, or via email directly to friends, family, or people in their social circle. Some citizens do not share any information they get from online sources. The following section will analyse how these findings about how citizens share news and information, influences the possibilities of developing the TITAN tool to fight disinformation.

Some citizens across all eight countries, do not share any news or information online, in neither public nor private online communication. Their reasons for not sharing online is that either they never started a habit of sharing online, do not see a need to, or they have other specific reasons for not sharing online. Some examples are that they do not understand who will see what they share online, if they share in public (e.g., on a Facebook timeline). Some find that it is too big of a responsibility to share news online, or they do not trust online sources and do not want to risk spreading disinformation. One citizen stopped sharing online, because of an experience with sharing fake news unintentionally. When citizens do not share online, they do not risk sharing any disinformation online, however, they still risk sharing disinformation in offline conversations.

Some citizens in all eight workshops explain that they share information in direct communication to specific people or specific groups of people (e.g., in Facebook groups) online and offline. They choose who they want

to share with, which often is people that they share interest, view, and opinion with. When sharing publicly online you risk that people you do not know, or people you disagree with read what you share, which many citizens are not interested in. Part of the reason for this can be found in the negativity that some citizens experience online. Citizens across several workshops describe social networks, online comment threads, and the tone of online comments as *negative*, *hateful*, *vulgar*, and *harsh*. This leads to citizens not sharing online, because they are afraid of other people's reaction, do not want to get into arguments with other people, and do not want to be part of this negative environment. A few citizens mention that there is too much negative news online, which prevent some citizens from sharing news or stops them for following the news closely.

Some citizens do share news and information publicly online, e.g., on Facebook, Twitter, LinkedIn, Instagram and TikTok. When sharing publicly they share information on topics that are relevant/trending at the current moment, they try to promote a topic (sometimes work related) and a few mentions that they share to refute misinformation. Some citizens do share news and information in public online channels, but there seems to be an awareness among the citizens of the risk of sharing disinformation online.

When citizens share news and information in either offline conversations or conversations via private messages apps, an AI tool cannot interfere in the process of sharing potential disinformation. Some citizens commented on this challenge, because they are not interested in TITAN tracking any of their interactions on private messenger apps, however, they see a potential risk in people sharing disinformation via these private communication channels. Some citizens did however point out that they could see the potential and benefit of having the TITAN tool monitor what they receive from friends and family on private message platforms.

#### 4.1.1 Recommendation to the TITAN system

To counter disinformation TITAN must consider how citizens share information and news. Since citizens use many different platforms to share from, TITAN needs to consider how and when to best interact with the users to make them aware of the risk of sharing disinformation. It is therefore important that TITAN considers when in the process of news consumption, the user should and could interact with the system. It does not seem like that targeting an interaction in the moment when citizens share news will be the most fruitful way to utilise the TITAN tool. The interaction with the tool must come into play earlier on in the news consumption. How this interaction will be, will be explored later in section 4.3, where we present the citizens' thoughts on how they imagine interacting with the system.

## 4.2 Data

Part of the co-creation workshops presented the citizens with questions regarding their views on sharing and using personal data because data is necessary to develop an AI tool. The use of personal data such as data about online social media behaviour or use of demographic data for the functioning of an AI was greatly discussed by the citizens at the workshops. The discussions ranged from the necessity of the user providing data to TITAN but also discussion on consent, data storage and data security, and using data as payment to access a service. Below we present the considerations that occurred across the workshops.

A prevailing discussion throughout the workshops was *why* the TITAN system needed personal data and how the users benefit if they gave access to their data. The benefit of personalising the TITAN system is not clear to the citizens and did not immediately make sense to them. Since, the framing for the TITAN tool is very limited at the stage of the workshops, it might have increased the level of confusion about why data was at all needed, but nonetheless the citizens have clear preferences for how they prefer an AI tool as TITAN to function. In scenario 1, citizens were asked if they want to use a generic version or personalised version of the TITAN system or not use the system at all. 57% of the citizens prefers to use the TITAN system without being obligated to share personal data. Among the people deciding for a generic version, some mention that they are not necessarily against trying out a personalised version once they have experienced the benefit of using

a generic version of the TITAN system. A lot of the citizens see the handing over of their personal data as a form of ‘payment’ and they, therefore, express a need for clearly knowing and understanding what they personally would gain from this ‘payment’ to the system. There is a willingness to share data if it makes the system perform better, although the meaning behind “better” is not clear.

In the four different scenarios the citizens were asked what kind of data they were willing to share with the TITAN system. 71% of the citizens prefer not to give TITAN any data at all (scenario 1), but when pushed to consider what data they would allow if they had to set up a personalised profile (scenario 3), most citizens are willing to give some data. However, some of the citizens have a strong negative reaction when they were asked to consider a personalised version, since they see no need for this. For the citizens who are willing to share some data, there is no concise answer to what kind of data, that citizens would consider allowing the TITAN system to access, but there were examples of what the citizens were willing to share and what not. There are even some conflicting opinions on what data is consider appropriate and what is too sensitive. Among the types of data, citizens are willing to share, they mention; name, age, gender, material status, number of kids, location, phone number, email, hobbies, their profession, and area of interest. There were suggestions that the user could indicate what topics they were interested in and which of them they were knowledgeable/not knowledgeable about. This could also be presented as a list of topics in the system that each user decides their level of knowledge about. Some would allow that the system track online behaviour, like number of clicks on a website or interactions on social media. The data that citizens are not willing to share, is data about political opinion or stance, sexual orientation, cognitive data, exact location, religious views, and health data. Tracking data or behaviour online was mentioned as data they were not willing to share (but also mentioned above in willing to share). As mentioned earlier the citizens do predominantly not want the system to track data from personal communication like chat and emails.

In scenario 3, 29% wanted a personalised profile that track their behaviour online. They argue that the service would perform better, be more detailed, and be faster and easier to use. They argue that the system would be more efficient if it tracks their online behaviour, can interact with them, detect their unconscious bias, and adapt to their personal interest, and adapt if their attitude and interest change over time. Ultimately, some citizens argue that this would guide them better on avoiding disinformation. These benefits are reasons for the citizens to allow the system to access their data.

What citizens consider appropriate data for the TITAN system to use differs from person to person. The citizens clearly express that they want to have control and transparency around their personal data and what it is used for. This is argued in various scenarios but shows in scenario 3, where 41% wants to use a questionnaire to give data to a personalised profile in TITAN (control what data to give) and 30% want to use a questionnaire and allow tracking on their profile (partly have control of what data to give). The same scenario show that 59% of the citizens would allow some kind of tracking of their behaviour online to use for creating a personalised version of the TITAN system. Still, some comment that they want to be able to know how this data is used within the TITAN system. Many wants to know how their behaviour is being monitored if they allow tracking, while others are less concerned about tracking because they see it happening in so many other contexts and with the TITAN system it would be “for the sake of good”.

The citizens were asked about the preference between local storage on a single device or central storage. 47% of the citizens preferred local storage and 53% preferred central storage and both options come with considerations about cost and benefits of storing the data locally or centrally. The benefits of local storages are that it gives users a larger feeling of being in control of their own data and they do not mind being the ones responsible for setting up the correct security measurements for this. Not having the possibility of accessing the same profile across different devices, is seen as a cost by some but others see it as a benefit e.g., if they prefer separating what they do professionally and personally. The benefits of central storage are that they trust a professional storage setup more than they trust themselves to keep their data secure, therefore, central storage is preferred. Additionally, it was noted that it would be a benefit to have access to the same profile across different devices. It is considered a cost if the user cannot access and delete one’s own data, but

this cost could easily be mitigated by the citizens being able to request access to the central storage to see what kind of data is stored about them and that they should be able to request that the data are deleted. An argument for cost and benefit that is made from both sides of preferring local or central storage, is that it would be easier to hack into the opposite option or that the opposite option was a preferred target for hackers. Others argue that it can be safe either way if safety is regulated in the right way. The citizens don't perceive one option safer than the other but want to avoid that hackers or third parties get access to their data. Regarding storage of data, it is mentioned, that it is important what company/institution is responsible for the storage of the data. Some citizens pointed out that if it is a company with commercial interest, they do not want to store their data centrally, while others felt comfortable with having knowledge institutions such as universities being responsible for storing their data centrally. A few citizens argue that there is always a political or economic interest behind a tool, and it would be important for them to know what this is in the context of TITAN, to decide whether they want local or central storage of their data. This relates back to the wish for transparency about data.

The topic of consent was also frequently discussed across all workshops as citizens want control of their data and transparency about what their data is used for. Citizens demand that consent for handing over data to the TITAN system is transparent and easy to understand and it should therefore not just be another long, legal text. Citizens want to take ownership of their own data and are tired of blindly providing their data to get access to services. It would increase the transparency for users about data use, storage and more if TITAN succeeds with making citizen-centred consent. Additionally, citizens note that the TITAN system of course must oblige to the rules of GDPR.

#### 4.2.1 Recommendation to the TITAN system

What can be generally said about data and data use in the TITAN system, is that citizens demand a large degree of control over data and transparency about how their data is used in the system. TITAN can accommodate this demand in various ways. Using a citizen-centred approach to communication within the system about consent and transparency regarding data, will make it possible to explain why data is needed and for what. In developing the functionalities of the TITAN system, it should be considered if/when personal data is needed and make the user able to decide what data they want to give access to, to get specific functionalities. The citizens who did not see any need for a personalized profile, can be accommodated by offering a version where they are not obligated to share any personal information.

Data security is important for all citizens, but there is no clear preference among citizens for local or central storage when it comes to security. The preference for either local or central storage relates to functionality preferences and control of data. No matter how the TITAN system will store data, the citizens should be able to be informed about what happens to their data and know how to delete their data again. Transparency is key in central storage of data, not only in relation to security in storage but also knowledge on who is storing and using the data and what is the interest behind storing the data in this way.

The recommendation for the TITAN system is to thoroughly consider the benefits and disadvantages with respectively local and central storage and make it clear and understandable for the users why one option was decided on. Furthermore, it is recommended that the data needed for TITAN to be a useful tool cannot be too rigid as there are great variance among the citizens in what they consider appropriate data they are willing to hand over to get access to the tool. There must be ability for the individual to choose what kind of data they feel comfortable with delivering to the system in exchange for the service they can receive.

### 4.3 User experience (UX)

In the scenarios of session three, citizens had to decide what functionalities they preferred as a user of the TITAN system. We have collected this in a section about user experience (UX) since it gives insight to citizens preferences for how to interact with the TITAN system. It will touch upon some of the same topics as the

section about data but focusing on the usability of the tool rather than on data. In scenario 1 the citizens were asked to decide for a generic or personalized version of the system, and scenario 3 made them consider further how a personalized version could work. In scenario 2 the citizens were asked to decide for an active system that alerts them about the risk of disinformation or a passive system that they consult on own initiative. What the citizens consider cost and benefits of the different versions is presented, together with considerations about how to accommodate different types of users, consider time and functionality, and present citizens' concrete ideas for how the system could work.

In scenario 1, 57% of the citizens prefers to use a generic version of the TITAN system. Citizens argue that if the TITAN system offers a generic version, without login requirement, they get a chance to test and become familiar with the system and build trust to the system before having to provide any personal data. They might then consider a personalised version if they like the generic version. Others only want to use a generic system and will not consider a personalised version, because they do not see the advantages. They think a personalised system might be biased and they do not want to spent time on login or on creating a profile. Since some of the citizens might consider a personalised version if they like the generic version, it indicates that some citizens see limitations of what a generic version can offer the user (more on this later in this section). 29% of the citizens see the personalised version as their preferred tool, since it can adapt to their personalised needs, hence, provide a better service. They want a system that is available on all their devices, a system that can be used on different platforms/websites, that can guide them in their native language, adapt the service to cultural differences, and guide them on both national and international news. Furthermore, it is mentioned that the system should accommodate visually impaired people or people with other disabilities, for the system to be accessible for everyone in society.

In scenario 2, 33% of the citizens prefers an active system that alerts them in one way or another (option 1 and 2) and 67% prefers a passive system, which is available for them to consult on their own initiative. The arguments for the benefits of an active system, is that it is smart and useful to be notified on the news the user interacts with, and it is a quick way to help the user. If the system were to randomly flag news (option two in scenario 2), the user will become more aware of the risk of disinformation on various news, various platforms, and various communication channels, which all together could increase the users own critical thinking. Some citizens see this as benefitting them, since they can develop their own identification strategy over time and enable them to decide if they trust the information or not. The arguments for the cost of an active system are the same as the arguments for the benefits of the passive system. Citizens are concerned that an active system would be annoying or too invasive in daily consumption habits. Citizens argue that there are enough things that pop-up or force the user to do something online in an annoying way; an example mentioned in the Danish workshop is *Clippy*, which was the small paperclip assisting Microsoft Office users in the 1990s, and they want to avoid something similar happening with the TITAN system. The word *overwhelmed* and *burden with information* is used to describe why they do not want an active system. Furthermore, the citizens argue that if the user relies on an active system, the user risks that their own critical thinking decreases. A separate argument for the benefits of a passive system is that it can help the users be curious to know more about a source, if the user wants to reflect further or are in doubt about a source - it gives the user the freedom to decide when they need help to verify a source. Citizens wish to control their personal data, is reflected in many citizens deciding for a passive system, since citizens argue that the passive system better allow them to control data and would require less data.

Because many citizens prefer a generic version (57%) and a passive system (67%) there are less arguments for the cost of a generic system and the cost of a passive system. However, part of the answer can be found in what the citizens argue is a good user experience and a user-friendly system, because some of these topics can be harder to deliver on in a generic or passive system.

- **Time:** Citizens see the need for being guided on how to avoid disinformation, but they want to spend as little time as possible on identifying whether a piece of information or news is disinformation. Some citizens define themselves as lazy, who desire things to be easy and fast when using a digital tool.

- **Attention:** Since, the TITAN system will be operating in the sphere of news and information streams, it will be “battling” for citizens’ attention, competing with social media and websites where people’s attention is part of their business model.

Even if the TITAN system is developed to meet many types of users’ needs, but is too time consuming to use, there is a risk that citizens will not prioritise to use it in their everyday life where many other services “win” their time and attention.

The citizens represent many types of users, from various countries across Europe. The citizens have different needs for guidance on how to avoid disinformation, have different digital habits, and they speak different languages. There will not be a one-size-fits-all solutions in the TITAN system. Some core differences among users, should be considered in the development of TITAN to make it attractive to citizens across Europe:

- **Language:** With TITAN being a European project, the citizens highlight the importance of the system offering guidance in citizens’ native language. It is important to the users that the translation to the native languages is done properly and is not just a machine translation. This would make it more likely for citizens to use the system.
- **Age:** Young citizens and older citizens might require different functionalities, for the system to be attractive for them to use.
- **Different versions:** If the TITAN system will be able to offer various “versions” of how it can be used (generic/personalised or passive/active) if can be attractive to more citizens, however, risk that it loses user-friendliness which is mentioned as important for it to be attractive to use.

In the development of the TITAN system, it is worth considering if there are some “preferred” users to target first, before trying to accommodate the needs of all the different users, since it will set even higher standards to the development of the system functionalities. The same applies for the functionality, citizens have many concrete ideas for how the TITAN system should work, but trying to accommodate all of them will not be feasible.

Some examples of how citizens perceive the format of the TITAN system:

- As an app.
- As a plug-in or extension for the browser.
- As a system that could work on/with other tools or websites that the citizens already use.

Some examples of how citizens imagine that the system can guide them:

- The user will be presented with various articles on a topic they are interested in.
- The user will decide what topic they want guidance on.
- The user want some kind of warning, with a highlight of text, a label, or a colour code of risk, to help them identify disinformation.

In general citizens are critical towards using pop-up notifications in the system, still, many citizens imagine some kind of warning system that pop-up with a disinformation risk-assessment.

#### 4.3.1 Recommendation to the TITAN system

The citizens have many concrete ideas on how the UX of the system should look like. The citizens wish for a system that can adapt to different needs, while many prefer a passive and generic system, which to some extent is contradictory, since a personalized version can better adapt to different users’ needs. However, the wish for a passive and generic system is to some extent grounded in citizens wanting to be in control of their data and having a choice in how much data they need to give the system. This can be bridged by what is mentioned in section 4.2.1, about creating informed consent and transparency about use of individuals data. Leaving users with a choice of what data they are willing to give and explaining how certain data can improve the functionalities of the system, might appeal to more citizens using a personalised system, instead of a generic system.

With the TITAN system the goal is that the users develop a critical thinking mindset in their news consumption habits, and citizens argue that this can be enabled both via an active and a passive system. Overall, the citizens

wish for a system with simplicity, high user friendliness, with good design on the interface and general fast response (time efficient) and with limited bugs. Most digital tools would ideally aim for these criteria in their UX to attract users. The recommendation to the TITAN system is that the service is offered in several languages, that age differences are considered, and that time and attention is considered as key to attract users. Furthermore, if possible, TITAN can consider offering different versions of the system to accommodate the need for more/less personalisation.

#### 4.4 Coaching and learning perspectives

A critical feature of the TITAN system is the development and enhancement of users' abilities to critical asset news and information online. As mentioned above, citizens have different perspectives on what functionalities will enhance the users critical thinking. Although, the citizens were explained that TITAN will be a dialogue tool providing educational value, some citizens perceived it as a fact checking tool. Several citizens at each workshop express either a desire for it to be so, or a fear that it will be so. The argument for the opposing views is presented below.

Citizens who do indeed expressed a desire to the TITAN system to be fact checking tool say that they do not want to spend a lot of time fact checking but would like to get an easy answer about if news is disinformation. The citizens mention several ways the fact checking could be presented:

- An estimation of the source's validity.
- An estimation of the likelihood of the actual content of the information could be disinformation.
- In some other way quick give the user an idea about if the piece of information they are look at, is disinformation or not.
- Provide an assessment of the credibility of a source (not directly fact-checking but things the users need to consider themselves and investigate).

It is, however, also pointed out that users should be able to see how the system comes to its conclusion, and therefore there is a high demand for transparency in a fact checking system, for it to be able to explain openly what the fact checker used to decide if it is true news or not.

The citizens who expressed a fear of the TITAN system being a fact checking tool, explain that they fear it will be a threat to free speech, democracy and hence suppress different opinions. This fear of the TITAN system impacting the free and democratic debate made the citizens question if personal data could impact the way the system would coach the user, making them blind or biased to divergent opinions. Some citizens had a similar line of thought about TITAN as a coach. Why would a coach perform better if it had personal data of the user available? Should the coaching not be the same for all people? Some citizens pointed out they do not want to be judged by their previous decision or behaviour when they are coached. Other citizens raised concern about if a personalised version will provide a biased coaching, because the personal data will impact how the system will coach the user, and possibly not challenge the users' views sufficiently. Others argued that a personalized version of TITAN as a coach would create an echo chambre or a bubble of information for the user, where they will never be presented with topics that are not of interest to them or views that they disagree with. Some citizens express a fear that the intelligent coach becomes a "tool of control" for institutions and will decrease peoples critical thinking and make them too reliant of the digital tool.

If the users are to interact with a coaching chatbot, several aspects should be considered, as it was pointed out by the citizens that the coaching and interaction with a chatbot might be too time consuming for the users and they would therefore not use it, especially if the answers that the chatbot provides is either too vague or too complex to understand. This relates back to the time aspect in section 4.3, time is a key factor for the TITAN-system to be used by citizens. For some citizens the idea about bettering their skills within critical thinking will be sufficient outcome of using the TITAN system. For others it might require more to keep their interest going. One idea is to add an element of gamification or some other element to keep people interested in continuously using the system. The gamification element can add to the learning aspect of TITAN. Gamification is just one idea out of many from citizens, which adds to the consideration of how the TITAN system convince citizens to spend their valuable time and attention on a new online tool.

#### 4.4.1 Recommendation to the TITAN system

The balance between having an easy to use and at-hand tool to help citizens fact-check information on one hand, and having a learning tool at the other hand creates some kind of obstacle for how the users will interact with the TITAN system. It should be considered how the chatbot is utilised so that it does not become an obstacle for the users and the learning aspects could be more integrated into other aspects of the TITAN-system than in the chatbot.

The recommendation about having TITAN being a coach that offers a learning element should be clearly communicated so users are aware of how the tool function. It should however be considered if some of the citizens' suggestions could be implemented or taken into consideration in designing the tool. What nonetheless is crucial for TITAN to be a successful tool is that it is clearly and transparently communicated to the user how the system works to mitigate some of the concerns that the citizens have expressed regarding oppression of free speech or creation of echo chambers.

#### 4.5 Creating Trustworthiness

Trust is an important factor to consider in the development of the TITAN system at different levels. Some citizens have distrust in artificial intelligence (AI), some citizens have distrust to how data is handled and stored in the system, and some have distrust in the coaching element, fearing that TITAN will become a censoring tool that limits freedom of speech. The following section will touch upon trust and distrust in the above-mentioned topics and debate how communication efforts can be part of creating trust in the TITAN system.

many citizens, understanding how AI work is difficult and they might not even try to understand how it works due to the complex nature of it. If citizens do not understand how AI work, it can be difficult to trust the TITAN system that is based on AI technology. It does, however, not mean that people are not willing to use it. The popularity of *ChatGPT* shows that people are willing to use an AI tool, without knowing or caring about how it works. Still, *fear* is mentioned repeatedly by the citizens when discussing the development of the TITAN system. Ideally, citizens want to understand how TITAN works, how the algorithms use the data they provide, and know how the system evaluates information/disinformation. Some citizens have general distrust towards technology and digital development, some arguing that “machines should not do the job of people” and it might be hard to convince this group to use the TITAN system. Citizens that are not as such sceptical towards technology, would possibly be more interested in using the system and recommending the system to others, if the system manages to explain how it works. A few citizens mention that if TITAN was an open-source project it would be more trustworthy and a few citizens mention that they would rather trust a system that friends, or family recommend to them. As mentioned earlier in section 4.2, giving the user a choice of how much data they need to share to use the system, and explaining how the data provided benefit the service offered, is another way to create trust in the system.

Since, TITAN deals with the topic of disinformation in online news and information, they system operates in a field of negative connotation. In section 4.1 citizens mention that the online environment can be negative and harsh, and many do not share online because of that. Being a system interfering in citizens' news consumption habits, citizens fear that the system will suppress certain opinions or in other ways censor what users read and share. The combination of dealing with AI and disinformation, are sensitive topics, which might make it harder for the citizens to trust the coach. Even though it was made clear to the citizens that the TITAN system will not tell the user if a piece of information is true or disinformation, rather guide them to make an informed decision themselves, the coaching approach is not a trusted approach per se. In general, citizens do see disinformation as a problem, but this might not be the case for all citizens. For citizens to use the system, TITAN also have a task of explaining why disinformation is a problem and why citizens should act in limiting the spread of disinformation.

#### 4.5.1 Recommendation to the TITAN system

TITAN must build trust to the citizens from the start to make them use the system and potentially also recommend friends and family to use the system. This requires an effort in communication within the system and in the dissemination of the system to the citizens. This might be a difficult task because the topics of AI and disinformation are associated with negative connotations of distrust and censoring freedom of speech.

For TITAN to infuse trust in the system, communication is key in various aspects. As mentioned earlier TITAN should be able to explain how the system works, both explaining how AI technology is used, how a system functionality like data handling works and explain the coaching approach. TITAN can be transparent about who is offering the service and what is their interest in citizens using the system.

Continues updates of the development of the TITAN tool is already part of the dissemination strategy of the TITAN project via the website [Titanthinking.eu](http://Titanthinking.eu), which can be part of creating trust already in the development process. Citizens testing the tool in the development process can also help spread the word about the tool.

TITAN must consider its competitors. Facebook claims to act on the spread of fake news and checking facts, and more competitors might exist or will be developed in the future. The recommendation is that TITAN consider and communicate how it is different from other services and what the unique selling points of TITAN are - a human-centred, ethical, and trustworthy AI tool. The trustworthy part is important for the citizens and above suggestions, give recommendation on how to implement it to communicate trustworthiness and offer a trustworthy system.

## 5 CONCLUSION: RECOMMENDATION ON DESIGN PRINCIPLES FOR THE TITAN SYSTEM

It became evident in the analysis of the citizens evaluation of news bits that it is highly complex to make firm assessments of what information and disinformation signals truly is. While there are some clear tendencies, it is evident that it is fundamentally influenced by the individuals own prior experiences, knowledge, and biases. It is crucial that the TITAN tool can accommodate this complexity in the coaching.

This requirement is however complicated by the insights gathered in session 3 and 4 of the citizen co-creation workshop. Citizens seemingly unwillingness to allow the TITAN tool to use personal data for its functionality complicates how the system should be able to accommodate to the differences in users' individuality. It is therefore of the utmost importance that the TITAN system is developed to mitigate the concerns that the citizens have expressed about data sharing and storage.

For the TITAN system to ensure its acceptance in society, it is first and foremost necessary to develop the tool according to the desires expressed in the recommendations:

- The TITAN system must be transparent about data – need, use, and storage.
- The TITAN system needs to be adaptable for the different users' individuals needs and preferences.
- The TITAN systems coaching aspect must be transparent in its functionality and user-friendly.
- The TITAN system must create trustworthiness by clearly communicating the reasoning behind the tool and its design.

As this citizen co-creation and the subsequent stakeholder workshops are only the first phase of co-creating the TITAN tool, the second and third phase can and should be used to test and validate different design choices in order for the system to meet its aspirations of being a tool used by citizens to fight disinformation.

## 6 ANNEX 1: SESSION 1: TIMELINE

This is the numbers from session 1, where citizens indicated their news consumption habits during the day. The table does not include numbers from the Italian workshop, since their results were delayed.

Type of news	Late						Number of people total
	Morning	morning	Midday	Afternoon	Evening	Night	
Facebook	70	44	42	42	56	42	296
Instagram	51	35	30	33	44	33	226
Twitter	19	12	17	14	10	10	82
LinkedIn	9	4	9	6	9	3	40
Reddit	0	0	0	0	3	0	3
Youtube	6	2	3	9	9	8	37
Tiktok	23	13	12	12	26	18	104
Other social media (Tumblr, Rumble, Bilibili, Weibo, Doubon, Redbook)	3	2	3	1	6	3	18
<b>Social Media Channels overall</b>	<b>181</b>	<b>112</b>	<b>116</b>	<b>117</b>	<b>163</b>	<b>117</b>	<b>806</b>
Radio news	60	38	20	20	15	5	158
TV-news	22	4	13	9	97	29	174
Newspaper, printed	11	5	3	5	6	1	31
Newspaper, online/apps	64	41	26	45	48	14	238
Podcasts	16	8	6	16	17	5	68
Chat with friends or family offline	1	3	10	3	5	0	22
Email/ Newsletter email	23	14	9	4	6	1	57
Work related, slack, academic sources, Chat channels (Telegram, Signal, Whatsapp, Discors, Wechat)	3	0	1	0	0	0	4
	23	8	14	9	16	11	81

## 7 ANNEX 2: SESSION 2: NEWS BITS

The blue colour indicates which news bits were true news and which were disinformation.

News Bit No.	News Bit True or Disinformation	Amount of participants	In %
1	True	60	27,8
	Disinformation	156	72,2
2	True	65	29,8
	Disinformation	153	70,2
3	True	201	92,6
	Disinformation	16	7,4
4	True	4	1,9
	Disinformation	212	98,1
5	True	101	46,8
	Disinformation	115	53,2
6	True	72	33,3
	Disinformation	144	66,7
7	True	176	81,1
	Disinformation	41	18,9
8	True	13	6,0
	Disinformation	203	94,0
9	True	64	29,8
	Disinformation	151	70,2
10	True	95	44,4
	Disinformation	119	55,6

Below all the 10 news bit that was presented to the citizens in session 2 at the co-creation workshop is shown.

**1**



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MENU ULTIME NOTIZIE CRONACA POLITICA ECONOMIA SANITÀ CINEMA E TV SPORT

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### VINO CANCEROGENO?/ È nella black list dell'Ue: l'ultima minaccia al Made in Italy

Pubblicazione: 10.02.2021 - Manuela Falchero

*Le reazioni di Unione Italiana Vini e Confagricoltura al piano Ue, che potrebbe danneggiare un settore che in Italia occupa 1,3 milioni di addetti*

**CARCINOGENIC WINE? It's on the European Union's blacklist, here's the latest threat to Made in Italy**  
 The reactions to the EU plan by the Italian Wine Union and the and General Confederation of Italian Agriculture, is that it would damage a sector that employs 1.3 million people in Italy.

2



Horror in Stuttgart: immigrant slaughters man with a sword (Video)

ilprimatonazionale.it

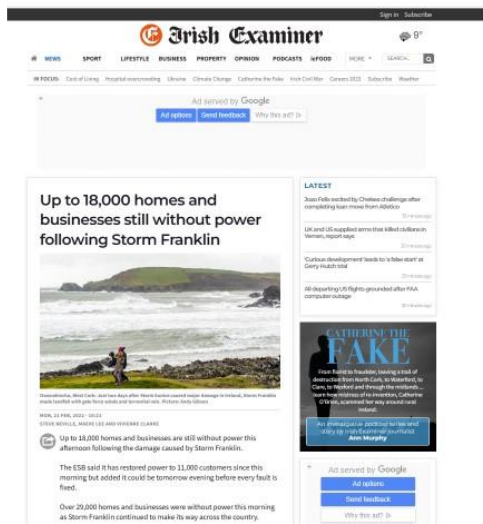
Horror in Stuttgart: immigrant slaughters man with a sword (Video)

82 Retweets

10 Quoted tweets

105 Likes

3



Up to 18,000 homes and businesses still without power following Storm Franklin.

Up to 18,000 homes and businesses are still without power this afternoon following the damage caused by Storm Franklin. The ESB said it has restored power to 11,000 customers since this morning but added it could be tomorrow evening before every fault is fixed. Over 29,000 homes and businesses were without power this morning as Storm Franklin continued to make its way across the country.

4



COVID-19 is not a virus, it is an exosome influenced by electromagnetic pollution.

While 5G technology is imposed on us, countless scientific studies are published that warn about the negative effects of electromagnetic pollution on health. Somethings is not right.

5



Italian milk is full of antibiotics and drugs. Traces in more than half of the brands that has been analyzed.

6



“Bloomberg”: NATO countries bought 14 Su-25s from Bulgaria and gave them to Ukraine.

7

CIENCIA

## Una inteligencia artificial de Google consigue programar código al nivel de un humano experto

Un nuevo sistema creado por DeepMind supera una competición de código informático con resultados similares a los de un participante medio. Podría revolucionar un sector esencial en nuestra economía

Google's artificial intelligence manages to program code at the level of a human expert. A new system created by DeepMind exceeds in a computer code competition with results similar to those of an average participant. It could revolutionize an essential sector in our economy.

8



**Government wants to limit pregnancy to six months**

The federal government wants to significantly shorten the duration of pregnancies. After all, the system in which women are nine months pregnant - and are therefore less or even unavailable for the labor market - represents an important loss for the government, according to Minister of Work Kris Peeters (CD&V).

9

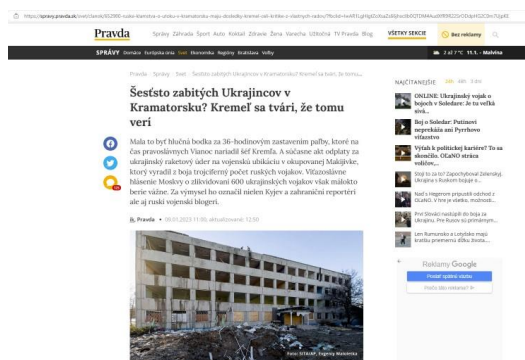


**Migrants gets more than pensioners** **Is it fair that migrants gets more than pensioners?**

Why does immigrants get more in social benefits from the day they arrive in Denmark, than state pensioners who for 50 years has contributed to building the Danish welfare state? It is not fair.

42 reactions, 47 comments, 158 shares

10



**Six hundred Ukrainians killed in Kramatorsk? The Kremlin pretends to believe it.**

It was supposed to be a noisy dot behind the 36-hour ceasefire ordered by the Kremlin chief for Orthodox Christmas. And at the same time, an act of retaliation for a Ukrainian missile strike on military ubiquity in occupied Makiyivka, which knocked out a three-digit number of Russian soldiers from battle. However, Moscow's triumphant announcement of the liquidation of 600 Ukrainian soldiers is taken seriously by few. It was described as a fabrication not only by Kiev and foreign reporters, but also by Russian military bloggers.

## 8 ANNEX 3: SESSION 3: SCENARIO GAME

Overview of which persona the citizens choose to represent the decision about the TITAN service in the scenario game.

Persona	Number of Participants	In %
Persona 1.1	123	57,2
Persona 1.2	29	13,5
Persona 1.3	63	29,3
Persona 2.1	33	16,3
Persona 2.2	34	16,7
Persona 2.3	136	67,0
Persona 3.1	84	40,8
Persona 3.2	61	29,6
Persona 3.3	61	29,6
Persona 4.1	100	47,4
Persona 4.2	111	52,6

Below the different scenarios and persona numbers are presented (text from the exercise).

### Scenario 1: Intro scenario to get the participants started.

*Your friend lets you know that you have shared disinformation on Facebook. They suggest you start using the TITAN-system, which can help you identify if what you are reading and sharing on social media is reliable information or disinformation.*

Question: Would you consider using the TITAN-system?

Let's hear from each of our different options!

(Note to main facilitator: let each persona present their pitch)

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**Text on slide:**

1.1 It sounds interesting, I would like to try a generic version of the TITAN-system.

1.2 No, I am not interested in using the TITAN-system.

1.3 It sounds interesting, I would like to try a personalized version of the TITAN-system.

### Scenario 2: An active or passive TITAN-system.

*The national government is working on new regulations to avoid further global warming. Various kinds of actors, scientists and activists are active on social media, sharing their opinion on climate change and global warming. Your friends are also sharing a lot of information in relation to climate change and the new law. You want to use the TITAN-system to help you navigate what information is reliable and what is disinformation.*

Question: In what way do you see the TITAN-system being helpful in your daily information consumption?

Let's hear from each of our different options!

(Note to main facilitator: let each persona present their pitch)

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**Text on slide:**

- 2.1. I want the TITAN-system to notify me about the information that I interact with; interactions are clicking, liking, commenting, sharing.
- 2.2. I want the TITAN-system to randomly select text and flag it with suggestion to consult the TITAN-system to further investigate whether the information is reliable or not.
- 2.3. I want to be able to ask the TITAN-system when I see a need for checking the information, e.g., if I am in doubt about if the information is reliable.

## Scenario 3: Using a Personalized Profile

*You have over the past months become increasingly interested in food waste. You have been navigating Twitter a lot but find that the TITAN-system in a generic version has provided input which is difficult to apply to information on food waste. Therefore, you decide to create a personalized profile for the TITAN-system to make the system provide input which is more easily applicable to information on food waste on Twitter.*

Question: Which of the following 3 options would you decide on, to make a profile in the TITAN-system?

Let's hear from each of our different options!

(Note to main facilitator: let each persona present their pitch)

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**Text on Slide:**

- 3.1. I will fill in a questionnaire with different data about myself when I create a profile.
- 3.2. I will fill in a questionnaire when I create my profile and once I start using the profile I will allow the system to continuously track my behavior online.
- 3.3. I will allow the system to continuously track my online behavior and build my profile based on the data it collects from my online behavior.

## Scenario 4 – Data Storage

In previous scenario you decided to use a personalized version of the TITAN-system. When you create a profile, you must decide how you want to store the data that the TITAN-system uses to guide you. Remember that your personal data in this context could be data with your name, gender, age, educational background, political views, values, internet habits and other data that is relevant for the system to help you identify disinformation.

Question: How will you prefer that the TITAN-system store your personal data?

Let's hear from each of our different options! This time you will not have three options, but only two.

(Note to main facilitator: let each persona present their pitch)

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**Text on Slide:**

- 4.1. I will allow the TITAN-system to store my data on my local device, like my computer, phone and/or tablet.
- 4.2. I will allow the TITAN-system to store my data centrally, on a database that the TITAN-system manages.