



## Net Children Go Mobile

Mobile internet access and use among European children. Initial findings of the Net Children Go Mobile project.

Giovanna Mascheroni – Kjartan Ólafsson



Initial Findings Report







Mobile internet access and use among European children. Initial findings of the Net Children Go Mobile project.

Giovanna Mascheroni – Kjartan Ólafsson

#### PLEASE CITE AS:

Mascheroni, G. & Ólafsson, K. (2013). Mobile internet access and use among European children. Initial findings of the Net Children Go Mobile project. Milano: Educatt.

#### **ACKNOWLEDGEMENTS:**

The authors would also like to thank Andrea Cuman, Thuy Dinh, Leslie Haddon, Heidi Jørgensen, Sonia Livingstone, Brian O'Neill, Cristina Ponte, Gitte Stald, Anca Velicu and Jane Vincent for their contributions in writing this report.

#### Contents

1. l	ntroduction	3
1.1	Context	3
1.2	The policy agenda	3
1.3	The project	4
1.4	Framework and methodology	5
	This report	
2. /	Access and use	7
2.1	Where children use the internet	7
2.2	How children access the internet	9
2.3	Ownership	11
2.4	Age of first use	13
2.5	Parental uses of the internet,	
	smartphones and tablets	14
3. (	Online activities	. 16
3.1	Types of online activities	16
3.2	Smartphone users	17
3.3	Tablet users	19
3.4	Social networking	
	and media sharing platforms	20
4. 9	Summary of findings	
ā	and preliminary observations	. 23
5. l	References	. 24
	The network	2.4

#### 1. Introduction

#### 1.1 Context

Both childhood and the media environment are changing and co-determining each other (Livingstone, 2009). Children grow up in a **convergent media ecology** (Ito et al., 2009) whereby significant opportunities for sociability, self-expression, learning, creativity and participation are provided by online media and, increasingly, mobile media (Hjorth & Goggin, 2009; Goggin 2010).

Although there is much current discussion of mobile media, there is scope for different definitions at this point in time as well as changing definitions over time if, like the internet itself, **mobile media are a moving target** as new technologies and applications are continuously developed. That said, any research project has to define its object of study. Certainly, we would like to differentiate between experiences of the internet when it is accessed by PCs (including via laptops and netbooks) and the online experiences when accessed by portable devices that utilise different operating systems (e.g. smartphones and tablets) since these technological affordances can enable or hinder different practices.

Hence, when we speak of the mobile internet in this project we refer to access to the internet from mobile media that is potentially different from PC-based online experience, where the mobile media we focus on are:

- portable devices connected to the internet via wifi or 3G/4G, such as smartphones, tablets, feature phones, portable games consoles and Mp3/Mp4 players (such as iPod Touch), e-book readers. Thanks to their portability, the internet can technically be accessed anywhere, anytime that there is a signal (though not exclusively used while on the move, and there will be social considerations affecting usage);
- convergent multifunctional devices, which support an ever growing repertoire of communication practices and online activities. These combine options already supported by previous generations of mobile phones (such as telephone calls, text messages, games, radio, music, photos) with activities usually performed on computers, the internet and social media (such as email, instant message services, social network sites, maps, video, television, vlogging). They also enable new activities such as

- those related to location-based services, and those performed through apps (which can shape new online experiences);
- personal devices, which are affective media (evoking emotional attachment) that have become taken for granted components of everyday lives. Note: we are interested not just in the owners of mobile devices, but also in users (e.g. of shared tablets). Being personal and portable, mobile media make practices of media consumption and online activities more flexible and personalised, and create new spaces for privacy within the domestic/school/public context. This privatisation of access and use is accompanied by the pervasiveness of the internet in children's daily lives and implies the creation of different social conventions of freedom, privacy, sociability, and not least supervision by parents and adults.

One question is whether, by potentially expanding the range of online opportunities, the mobile internet is promoting a specific repertoire of communication and entertainment activities, which are preferred by children compared to educational and other socially legitimate online activities.

Our aim is therefore to understand and distinguish the mobile internet experience from the PC-based internet experience in terms of opportunities and risks.

#### 1.2 The policy agenda

Both researchers' and policymakers' agendas attribute an increasingly crucial role for children's online safety to teachers', peers' and especially parents' mediation. As the media and communication environment becomes increasingly difficult for governments to regulate, greater parental responsibility in the domestic regulation of their children has been advocated (Oswell, 2008). Thus, activities that were hitherto seen as being private are increasingly addressed within public policy frameworks, especially those concerned with protecting children from media-related harm (EB 2008).

Parental mediation is typically developed in five main forms (Livingstone et al., 2011):

• Co-use and active mediation of internet use involves parents discussing with their children what they do online, sharing their online activities and sitting with them while they are online.

- Active mediation of internet safety entails parents promoting safer uses of the internet, giving advice on risks, and helping children when something on the internet bothers them.
- Restrictive mediation entails parents setting rules that limit children's media use (by time or activities).
- Monitoring refers to parents checking available records concerning the child's internet use.
- Technical restrictions entail the use of software to filter, restrict and monitor the child's internet use.

The EU Kids Online findings found a positive picture of parental mediation. Not only do parents express confidence in their children's ability to cope with online risks, but children also welcome parental interest and involvement. While restrictive mediation is clearly associated with lower risk, it may also reduce children's chances of benefitting from the online world, while there is also evidence that parental active mediation of internet use can reduce children's experience of harm without restricting their opportunities (Dürager & Livingstone, 2012).

The portability of smartphones and their personalised and private nature, inherited from ordinary mobile phones, poses new challenges to parents' ability and willingness to share and supervise their children's use of online media. Mobile phones can facilitate technical and monitoring mediation. Yet, mobile access may make active mediation more difficult. Thus, it becomes necessary to explore the new conditions under which parental mediation is taking place, in order to shed light on the new kinds of constraints and possibilities they consider when trying to mediate their children's internet experiences.

Teachers and educational institutions also play a crucial role in mediating the internet activities undertaken by children from their mobile media. As with parents, online access from mobile platforms deeply modifies both the preconditions for and effectiveness of mediation strategies adopted in school contexts. Thus, we need to understand whether and to what extent teachers are incorporating mobile platforms into e-safety education as well as into class activities overall; and if they need to be supported in carrying out this role, for instance increasing their awareness about specific risks or signalling priorities to address.

The new conditions of social mediation of mobile online access define a new agenda for policymaking. The new convergent media ecology requires a close collaboration between the various social agents that

are able to shape children's online experience. Selfregulatory initiatives from the mobile industry, like the "European Framework for Safer Mobile Use by Younger Teenagers and Children" or other self-regulatory initiatives endorsed by the European Commission like the "CEO coalition to make the Internet a better place for kids" and the "ICT Coalition for the Safer Use of Connected Devices and Online Services by Children and Young People in the EU"1 should be encouraged but it is essential to include them in a constructive dialogue with governments, child experts, NGOs, academics, parents, educators as well as children. In this light, the Net Children Go Mobile findings will be interpreted in order to set a list of policy priorities and to identify those critical areas where cooperation between various stakeholders is indispensable for an effective promotion of internet safety.

#### 1.3 The project

The Net Children Go Mobile project is funded by the **Safer Internet Programme** of the EC to investigate through quantitative and qualitative methods how the changing conditions of internet access and use - namely, mobile internet and mobile convergent media - bring greater, lesser or newer risks to children's online safety. Participating countries include **Denmark**, **Italy**, **Romania**, **the UK**, **Ireland** and **Portugal**, the two latter joining the project on a self-funded basis.

Clearly, these countries cannot be assumed as representative of Europe as a whole. However, the rationale for choosing the first initial countries, as well as the new two countries, represents a clear strength of the project in terms of extending the validity of the findings beyond these single countries to the pan-European area. Denmark, Ireland, Italy, Portugal, Romania and the UK, indeed, are emblematic of socio-cultural and technological differences across Europe that have to be considered when planning policy and awareness initiatives aimed at promoting children's online safety on convergent mobile media. The countries differ in many respects: in terms of their particular historical domestication of mobile phones, which may now influence the domestication of smartphones and other handheld devices; in terms of the digital cultures of their

<sup>1</sup> http://www.ictcoalition.eu/

youth; in relation to the incidence of online risks among children; and, finally, in terms of childhood and parenting cultures.

With respect to the diffusion of mobile phones during the Nineties, Denmark (as the other Northern European countries), the UK and Italy have all been characterised by a rapid and pervasive adoption of mobile phones, which have become a distinctive component of youth cultures. The popularity of the devices and the new communication practices (such as SMS) gave rise to a consistent and leading body of empirical research on the social uses of mobile telephony in these countries (Haddon & Green, 2009). Not only different processes of domestication of mobile media, but also varying technological and economic mobile communications infrastructures influence the current adoption of smartphones, by supporting or inhibiting it. By investigating access and usage of mobile phones, smartphones and other convergent media devices, the Net Children Go Mobile project will provide a portrait of the domestication of new mobile ICTs in relation to social and cultural variations, thus enabling explanations that can be extended to other countries based on their national media systems, technological infrastructures, the adoption of other ICTs, etc.

The countries are also relevant in terms of online risks, and their implications for safety awareness policies. According to the new classification provided by the EU Kids Online ((Helsper, Kalmus, Hasebrink, Sagvari & De Haan, 2013), Italy, Ireland, Portugal and the UK belong to the category of countries where children are 'protected by restrictions'; Denmark belongs to the 'supported risky explorers' category; while Romania is included in the group of countries where children are 'semi-supported risky gamers'. The EU Kids Online II verified this classification by comparing daily use of the internet by children, their exposure to risks and parental mediation strategies. Comparing the countries involved in the Net Children Go Mobile project, therefore, provides relevant data, which may support the definition of evidence-based policies that can be applied in different countries with similar patterns of internet use, online risks and mediation.

Finally, these countries are emblematic of different cultures of childhood and associated parenting styles. Although all European countries support the UN Convention on the Rights of the Child (UNCRC), approaches vary somewhat throughout Europe and sustain national constructions of childhood, ranging from

child-centred states, such as Denmark, to states where the 'child in danger' perspective dominates. Based on these differences, ad hoc awareness campaigns and policy initiatives can be planned and extended to other European countries.

## 1.4 Framework and Methodology

Drawing on the experience of network members within the EU Kids Online network, the conceptual framework is operationalised in a child-centred, critical, contextual and comparative approach (Livingstone & Haddon 2009; Livingstone et al., 2011), which understands children's online experiences as contextualised and shaped by three intersecting circles: childhood, family life, and peer cultures; media systems and technological development; the European social and policy context.

The project assumes that the voice and viewpoint of children are crucial to understanding online opportunities, risks and any harmful consequences of convergent mobile media use. The combination of quantitative and qualitative data will contribute to enhancing knowledge on children's uses of convergent mobile media by providing clear, representative and cross-nationally comparable quantitative data, combined with in-depth qualitative and comparative research on children's social awareness and perceptions of mobile media risks. Moreover, the qualitative fieldwork includes group interviews with parents, teachers and other youth workers, in order to compare children's and adults' perceptions and awareness of mobile internet risks, and to provide empirical data that can inform awareness raising initiatives and guide safety policies.

This report presents the initial findings of a survey that involved 2000 children aged 9-16 years old who are internet users and their parents<sup>2</sup> in Denmark, Italy, Romania, and the UK between May and July 2013. Key features of the survey are:

 A cognitive testing with 8 children from different age groups (9-10, 11-12, 13-14, 15-16) in each country, to check children's understandings of and reactions to the questions.

<sup>2</sup> Parents have been asked questions on the household's demographics and socio-economic background, as well as on their own use of the internet, smartphones and tablets.

- Random stratified survey sampling of some 500 children (9-16 years old) who use the internet per country.
- Survey administration at home, face-to-face, with a self-completion section for sensitive questions.

#### 1.5 This report

This report is the first of several reports to be produced by the network during 2013-2014. It includes the initial findings on access and use of mobile convergent media among children aged 9-16 years old in Denmark, Italy, Romania and the UK. At the time of writing the report, Ireland and Portugal are on the preparation process for fieldwork. A full version of this report, to be published on Safer Internet Day in February 2014, will include also evidence from Ireland and Portugal, and data on risks and mediation.

When we refer to 'European' children here we refer to the mean value across the four countries surveyed. It is not to imply that this is representative of all European children. However, it can be assumed that given the diversity of the four countries involved this number is probably not far from where an average number for children in more countries.

On several occasions we compare the findings of the Net Children Go Mobile survey with the 2010 EU Kids Online survey. When such comparisons are made we calculate an average number from the EU Kids Online survey only for the four countries included in the Net Children Go Mobile survey, thus attempting to provide as direct a comparison as possible.

#### 2. Access and Use

Prior research has shown that the social context of internet access and use shapes children's online experiences and, more specifically, the conditions under which children are taking advantage of online opportunities, or are exposed to online risks (Livingstone et al., 2011). With respect to internet access, mobile convergent media are likely to expand the spatial and temporal locations of internet use among children by providing "anywhere, anytime" accessibility, though economic or technological constraints (such as the cost of web packages or the lack of wifi connections) may actually limit the use of mobile devices when children are on the move. Nonetheless, mobile convergent media may reconfigure social conventions of freedom, privacy and surveillance.

To attempt to capture the complexity of internet use in children's everyday lives we use three indicators. Location of use: own bedroom at home; at home but not in own bedroom; at school; in other places such as libraries, cafés and relatives' or friends' homes; when out and about or on the way to school and other places. Frequency of use: several times each day, daily, at least every week, never or almost never. And devices through which they go online: desktop computers, laptop computers, mobile phones, smartphones, tablets, other handheld devices such as iPod Touch, e-book readers and games consoles.

## 2.1 Where children use the internet

The EU Kids Online findings (Livingstone et al., 2011) already showed in 2010 that the ways through and the locations from which children go online are diversifying, and this trend is continuing. Indeed, the increasing diffusion of portable devices and convergent mobile media may actually expand the range of places and social situations where children access the internet, fostering the so-called "ubiquitous internetting" and the pervasiveness of online activities in children's everyday life.

However, when asked how often they go online from the diverse locations listed above, children still indicate the home - whether their own bedroom or another room at home - as the most common location of internet use. Table 1 shows how often children use the internet at the locations asked about, bearing in mind that they generally use it in more than one location.

Tab. 1: How often children use the internet at different places

	everal times each day	Daily or almost daily	At least every week	Never or almost never
Own bedroom	38	26	9	27
At home but not in own room	26	32	19	23
At school	12	15	35	38
Other places (home of friends/relatives, libraries, cafés etc.)	9	13	33	46
When out and about, on the way to school or other places	11	13	11	65

Q1a-e: Looking at this card, please tell me how often you go online or use the internet (from a computer, a mobile phone, a smartphone, or any other device you may use to go online) at the following locations. Base: All children who use the internet.

- 2 in 3 European<sup>3</sup> children (64%) access the internet from their own bedroom on a daily basis, with 38% of the interviewees saying the do so several times per day. Only 27% of children do not have use the internet in their own bedroom.
- Only slightly less common is internet access from another room at home: 58% of children report using the internet several times a day or at least once a day in a room which is not their private room
- If we consider locations where children access the internet at least once a week, then the percentage of children using the internet in a public room at home or in a private bedroom rises up to 77% and 74% respectively.
- The third most common context of internet access and use is the school, where most of children report having access to the internet at least daily (27%) or weekly (35%).
- Nearly half of children use the internet once a week or more in other places such as at friends' or relatives' homes, or in public places such as libraries or cafés.
- Surprisingly, internet access while on the move such as on the way to school or when out and about - is still limited though on the rise: more specifically, only 11% of our sample say they access the internet

<sup>3</sup> As noted in the Introduction, when we refer to European children we mean the average number for the four countries.

several times a day when out and about; a few more children (13%) use the internet on the move at least daily, while the majority (65%) say that they do not use the internet on the move.

Table 2 shows the distribution of daily internet access in the locations asked about by gender, age and country, and helps us to understand in more detail the changing contexts of internet use.

Tab. 2: Daily internet use at different places per age, gender and country

	Own bedroom	At home but not own room	At school	Other places	When out and about
Boys	65	55	26	21	23
Girls	64	61	28	22	25
9-10 yrs	34	42	10	5	4
11-12 yrs	57	60	25	15	14
13-14 yrs	76	62	28	28	30
15-16 yrs	84	64	42	35	43
Denmark	77	76	61	38	26
Italy	58	52	8	18	30
Romania	60	40	11	9	8
UK	64	63	29	22	33
All	64	58	27	22	24

Q1a-e: Looking at this card, please tell me how often you go online or use the internet (from a computer, a mobile phone, a smartphone, or any other device you may use to go online) at the following locations Base: All children who use the internet

- In all the locations asked about daily internet access is strongly differentiated by age, with older children having more access everywhere.
- Age differences, however, are more pronounced for private or mobile internet use with teenagers aged 15-16 years old far more likely to access the internet at least in their own bedroom (84%) or when out and about (43%) than any other age group. This suggests that teenagers benefit from a better online experience in terms of flexibility, ubiquity, and privacy.
- Gender differences in access are minor, though girls are slightly more inclined to access the internet everywhere at home on a daily basis, while boys prefer their own bedroom.
- Daily use of the internet varies considerably by coun-

try. For example, while private access to the internet at least daily is the most common experience in all the countries considered, it is in general significantly higher in Denmark. Meanwhile, Romanian children are more likely to access the internet daily in the privacy of their bedroom than anywhere else at home (60% compared to 40%).

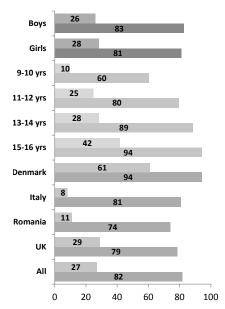
- While Danish children are more likely to access the internet on a daily basis at home, school and other places than children in other countries, daily internet access when out and about is actually higher in the UK and Italy - where one third of children use the internet on the move - and lowest in Romania.
- Country differences are also relevant when we examine school access. While the school is considered to be a strategic site for awareness raising and e-safety campaigns, 38% of children do not use the internet at school or else use the internet at school less than once a week, and this percentage rises to 73% of Italian children.
- While school access at least once a week is more common in the UK (87%), only in Denmark is the internet being significantly integrated into daily school activities (61%).

Figure 1 shows the comparison between home and school access across gender, age groups and countries.

- As we have already observed, both home (in own bedroom and or another room at home) and school access to the internet on a daily basis increase by age. However, while more than half (60%) of 9-10 year old children use the internet at home at least once a day, just 10% of the same age group and a minority, 42%, of the oldest group (teenagers aged 15-16 years old) have internet access in school on a daily basis. This suggests that the internet is mainly a domestic phenomenon and that it has not been yet integrated into school life.
- Country differences are also noteworthy: as noted, only young Danes have thoroughly incorporated the internet into both domestic and school everyday life contexts and activities. By contrast, in Italy and Romania daily internet access is almost exclusively domestic.
- Gender differences are minor, with girls who are slightly more likely to use the internet at school everyday than boys.

Fig. 1: Comparison between home and school access

- % Daily use at school
- % Daily use at home (bedroom or elswhere)



Q1a, Q1b and Q1c: Looking at this card, please tell me how often you go online or use the internet (from a computer, a mobile phone, a smartphone, or any other device you may use to go online) at the following locations.

Base: All children who use the internet.

To conclude, **home** is still the **main context of internet use**. In terms of policy recommendations, therefore, empirical evidence confirms the need to focus on promoting awareness among parents as a means to reaching wider populations of children. However, as we have seen, teenagers use the internet at home **in the privacy of their own bedroom** more than in a public room. Additionally, a further challenge to parental mediation comes from portable, personal devices through which children can create new spaces of privacy within the domestic context, shared rooms included.

## 2.2 How children

The **increasing privatisation of internet use** is even more pronounced when we look at the devices through which children access the internet in each of the locations asked about.

Table 3 shows what devices children use at least daily to access the internet in different places, suggesting a shift towards **a post-desktop media ecology.** 

- Among all the devices asked about, smartphones are the most used devices on a daily basis in all contexts. Being personal and portable, smartphones are seemingly carried around in various places and integrated into different social contexts and activities.
- The smartphone is also the device that is used most on the move (26%), followed by much lower use of tablets (9%), other handheld devices such as iPod Touch (9%), games consoles (8%) and e-book readers (7%).

Tab. 3: devices used to go online daily at different places

	Own bedroom	At home but not own room	At school	Other places	When out and about
A desktop computer (PC)	21	17	9	4	1
A laptop computer	34	29	9	6	1
A mobile phone	11	8	4	4	4
A smartphone	39	37	23	24	26
A tablet	22	21	5	11	9
E-book reader	10	9	2	6	7
Other handheld devices	16	14	5	9	9
Home games consoles <sup>4</sup>	18	15	2	9	8
Access at least once a day	64	58	27	22	24

Q2 a-h When you use the internet these days at ..., how often do you use the following devices to go online?
Base: All children who use the internet.

- However, the place where children are more likely to use their smartphones at least once a day is actually their own bedroom (39%) or another room at home (37%). This suggests that children value privacy and convenience more than mobility perhaps because the smartphone is always 'at hand' and doesn't need to be turned on.
- Laptop computers are also accessed on a daily basis by a significant number of children, though their use is mainly limited to the child's bedroom (34%), another room at home (29%), and school (9%).

<sup>4</sup> The questionnaire asked about the use of home games consoles but the fact that 8% of respondents say that they use home game consoles when 'out and about' might both reflect the ambiguous meaning of that phrase or some respondents thinking about portable versions of devices that mostly are used in the home

• For each device considered, use on a daily basis is higher in children's bedrooms. This reinforces a phenomenon known as "**bedroom culture**" (Livingstone & Bovill, 2001): children are immersed in media rich bedrooms, witch represent the main context of their leisure time and, indeed, are the spaces where practices and meanings associated with identity construction, sociality and self-expression are increasingly mediated and privatised.

Table 4 shows how daily use of different devices varies per age and gender

Tab. 4: Daily use of devices per age and gender

	9-12 y	9-12 years		13-16 years	
	Boys	Girls	Boys	Girls	All
A desktop computer (PC)	41	32	51	36	40
A laptop computer	41	34	52	65	49
A mobile phone that is not a smartphone	10	14	13	21	15
A smartphone	31	31	62	62	48
A tablet	25	20	33	36	29
E-book reader	6	5	17	18	12
Other handheld devices	9	10	27	30	20
Home games consoles	23	11	34	22	23

Q2 a-h When you use the internet these days at ..., how often do you use the following devices to go online?

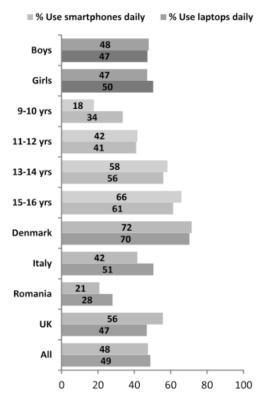
Base: All children who use the internet

- Across all age groups, laptops (49%) and smartphones (48%) are the two devices most used most to go online followed by desktop computers (40%) and tablets (20%). However, age and gender differences are noteworthy.
- **Use** of each of the devices considered generally **increases with age,** but the age divide is greater for certain devices. The use of smartphones is particularly structured by age, with only 31% of boys and girls aged 9-12 having access to a smartphone as opposed to 62% of teenage boys and girls respectively. Age differences matter less for ordinary mobile phones.
- Use of different devices also varies by gender. Indeed certain devices are seemingly highly gendered: while boys of all age groups are more likely to use desktop computer and home games consoles, teen-

age girls are more likely to use a laptop computer and a mobile phone which is not a smartphone to go online.

Fig. 2 looks at daily use of smartphones and laptop computers.

Fig. 2: Daily use of smartphones and laptops by gender, age and country



Q2b and Q2d When you use the internet these days at ..., how often do you use the following devices to go online?
Base: All children who use the internet

- The figure shows that, while gender differences in the daily use of smartphones are very low, girls are more likely than boys to use laptops on a daily basis.
- The daily use of smartphones and laptops is more differentiated by age: while younger children are more likely to use laptops everyday, teenagers use smartphones more.
- Variations across countries are also noteworthy: while children in Italy and Romania are more likely to use laptops daily, their peers in the UK use smartphones more than laptops, while young Danes use both devices interchangeably, though with a little preference for smartphones.

As anticipated, despite mobile convergent media pro-

viding in principle "anywhere, anytime" connectivity, mobile internet use may actually be constrained by the cost of the service. This may affect especially younger children, who can count on less pocket money than teenagers. The availability of wifi networks may also vary being unevenly distributed across countries, and across different regions within the same country (e.g. urban vs. rural areas).

Table 5 examines how boys and girls of different ages and in different countries access the internet from mobile phones or smartphones.

Tab. 5: Ways of connecting to the internet from mobile phones/smartphones by age, gender and country

	Mobile web package and free wifi	Mobile web package only	Free wifi only	Phone does not connect to the internet
Boys	39	17	21	23
Girls	33	22	22	23
9-10 yrs	21	13	29	36
11-12 yrs	31	19	24	25
13-14 yrs	36	23	22	19
15-16 yrs	45	19	16	21
Denmark	36	19	21	23
Italy	51	14	28	7
Romania	32	24	18	26
UK	15	24	20	41
All	41	17	18	24

Q8 a-c Are you able to connect to the internet from your smartphone / mobile phone and if so, how do you connect?

Base: All children who own or have for private use a mobile phone or a smartphone

- The ways in which children connect to the internet from their mobile phones or smartphones is strongly differentiated by age, country and, to a minor extent, by gender.
- Children aged 9-10 years old (36%) and children living in the UK (41%) are more likely to have a phone that does not connect to the internet. This is surprising given that children in the UK are more likely to use the internet when out and about (Table 2). In contrast with the UK, and consistently with a higher use of the internet on the move in Italy, just

- **7% of Italian children own** or have for private use **a phone that does not provide internet access**.
- More interviewees (41%) use both free wifi networks and internet plans to go online from their smartphones or mobile phones. If we look at gender, age and country differences, the percentage of children going online through both wifi networks and mobile web packages is higher for boys (39%), children aged 15-16 years old (45%) and Italian children (51%).
- Younger children (29% of those aged 9-10 years old and 24% of those aged 11-12) and children in Italy (28%), Denmark (22%) and the UK (20%) are more likely to use only free wifi networks than the average (18%).
- In contrast, the number of children who go online from their phones/smartphones using mobile internet plans only is higher than the average (17%) in Romania and the UK (24%), among girls (22%) and among children aged 13-14 years old (23%).

To conclude, while those who can rely both on mobile web packages and wifi networks to go online from their mobile phones and smartphones can actually benefit more from "ubiquitous internetting", those accessing the internet either through free wifi networks only or through internet plans only are likely to experience more constraints when using mobile devices to go online.

#### 2.3 Ownership

The use of a device and ownership do not necessarily coincide, with children having access to a wider range of devices than those they actually possess or have for private use. However, ownership and private use shape the quality of online experience, with children possessing a certain device being more likely to use it intensively throughout the day.

Table 6 shows which devices children possess or have for private use, and how ownership varies by age and gender.

Tab. 6: Ownership of devices by age and gender

	9-12 y	9-12 years		13-16 years	
	Boys	Girls	Boys	Girls	All
A desktop computer (PC)	29	33	41	32	34
A laptop computer	36	39	52	61	48
A mobile phone that is not a smartphone	26	30	34	33	31
A smartphone	40	37	68	64	53
A tablet	10	18	23	19	18
E-book reader	8	7	8	12	9
Other handheld devices	10	7	9	14	10
Home games consoles	44	25	50	19	34

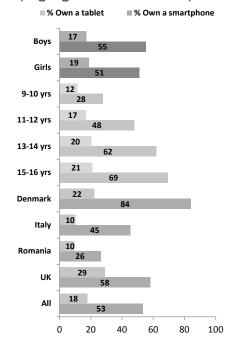
Q3 a-h Do you personally own or have for your private use any of these devices? By private use of a device we mean a device that only you use.

Base: All children who use the internet

- Smartphones are the devices children are more likely to own across all age groups and gender (53%) followed by laptop computers (48%), desktop computers (34%) and ordinary mobile phones (31%).
- Ownership of each of the devices in general increases with age, but the age divide is greater for certain devices. The possession of smartphones is particularly structured by age, with 40% of boys and 37% of girls aged 9-12 having a smartphone for private use as opposed to 68% and 64% of teenage boys and girls respectively. Age differences matter less for ordinary mobile phones.
- Ownership of different devices partially also varies by gender. Indeed certain devices are seemingly highly gendered: while boys of all age groups are more likely to own home games consoles, girls are more likely to have a laptop computer and younger girls are also more likely to have a tablet computer.

Figure 3 shows how ownership of smartphones and tablets varies by age, gender and country.

Fig. 3: Ownership of smartphones and tablets by age, gender, and country



Q3 a-h Do you personally own or have for your private use any of these devices? By private use of a device we mean a device that only you use.

Base: All children who use the internet

- Overall, age and country differences in smartphone and tablet ownership matter more than gender.
- Boys (55%) and teenagers (62% of children aged 13-14 and 69% of older teenagers), are more likely to own or have for private use a smartphone than girls (51%) and younger children (28% of children aged 9-10 and 48% of those aged 11-12)
- Also, children in **Denmark** (84%) and the **UK** (58%) are more likely to be smartphone owners than their peers in Italy (45%) and Romania (26%).
- The ownership of tablet computers follows similar patterns with respect to age tablets ownership is lowest among children aged 9-10 and higher among teenagers, though the divide between the youngest and the oldest is narrower than in the case of smartphones and country differences children in the UK and in Denmark are more likely to be given a smartphone, though, again, the gap between the country with the highest penetration (the UK with 29%) and countries with lower penetration (Italy and Romania with 10%) is narrower than in the case of smartphones.

Table 7 shows ownership of devices compared with daily use of those same devices (defined as using that device to access the internet at least daily at any of the given locations).

Tab. 7: Children who own devices and children who use devices daily by age

	9-12 y	9-12 years		years
	Own	Use daily	Own	Use daily
A desktop computer (PC)	31	36	37	43
A laptop computer	38	38	57	59
A mobile phone that is not a smartphone	28	12	33	17
A smartphone	39	31	66	62
A tablet	14	22	21	34
E-book reader	8	6	10	18
Other handheld devices	9	9	11	28
Home games consoles	34	17	34	28

Q3 a-h Do you personally own or have for your private use any of these devices? By private use of a device we mean a device that only you use.

Q2 a-h When you use the internet these days at ..., how often do you use the following devices to go online?
Base: All children who use the internet

- Slightly more children say that they use a desktop computer at least daily to access the internet than those who say that they own such a device or have it for their private use. This might indicate that desktop computers are to some extent shared devices.
- If this comparison between daily use and ownership is to be taken as an indicator of devices that are **shared** between more individuals then **tablets** would also fall into that category with a considerably higher percentage of children saying that they use such a device at least daily to access the internet than the percentage of children who say that they own such a device
- For smartphones however the percentage of children who say that they own a smartphone is higher than the percentage of children who say that they use a smartphone at least daily to access the internet.

#### 2.4 Age of first use

Prior research (Livingstone et al., 2011) showed that the average age when children start using the internet was dropping, with younger children starting to use the internet at a younger age. In the Net Children Go Mobile survey, we asked children how old they were when they started to use the internet, but also at what age they were given a mobile phone and/or a smartphone.

Table 8 compares the average age children were given access to these different devices, across age groups, gender, and countries.

Tab. 8: Age of first internet use, first mobile phone and first smartphone

	How old were you when you first					
	Used the internet	Got a mobile phone	Got a smart- phone			
Boys	8	9	12			
Girls	9	9	12			
9-10 yrs	7	8	9			
11-12 yrs	8	9	10			
13-14 yrs	9	9	12			
15-16 yrs	10	10	14			
Denmark	7	9	11			
Italy	10	10	12			
Romania	9	9	12			
UK	8	10	12			
All	8	9	12			

Q5 How old were you when you first used the internet?

Q6 How old were you when you got your first mobile phone (a phone which is not a smartphone)?

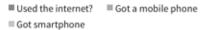
Q7 How old were you when you got your first smartphone? Base: All children who use the internet

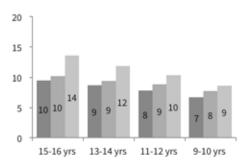
• The average age of first internet use is still dropping, being now 8 years old in the four countries. However, the age at which children start using the internet varies consistently by country, age group and, to a lesser extent, by gender. Children now aged 9-10 years old and children living in Denmark started to use the internet on average when they were 7. Teenagers now aged 15-16 years old and children in Italy or Romania were 10 or 9 when they first used the internet. On average, girls started using the internet later than boys.

- The age when children were given their first mobile phone is 9 years old on average, higher than age of first internet use. So, children across Europe start using the internet before they are given a mobile phone. The age when children first received a mobile phone varies less across countries and is not structured by gender. However, the age of getting the first mobile phone increases with age: children who are 9-10 years old were given a phone when they were 8; at the opposite end of the scale, teenagers aged 15-16 were 10 when they first got a mobile phone.
- The average age at which children receive a smart-phone is higher, 10 years old. Similarly to mobile phones, ownership of smartphones is differentiated by age more than by country and not influenced by gender. Age patterns are indeed similar to what observed regarding mobile phones: younger children are more likely to be given a smartphone when they are only 9, while older teenagers were 14 when they got their first smartphone.
- This suggests that after 2011 children of all age groups are more likely to be given a smartphone than an ordinary mobile phone. Indeed 15% of our interviewees never owned a mobile phone that is not a smartphone.

Figure 4 summarises the average age of adoption of the internet, mobile phones and smartphones across different age groups, showing that **children are using the internet and get a mobile phone or a smartphone at ever younger ages**.

Fig. 4: Age of first internet use, first mobile phone and first smartphone by age





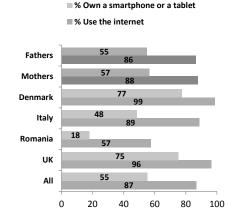
Q5 How old were you when you first used the internet? Q6 How old were you when you got your first mobile phone (a phone which is not a smartphone)?

Q7 How old were you when you got your first smartphone? Base: All children who use the internet

# 2.5 Parental uses of the internet, smartphones and tablets

Figure 5 shows the percentage of parents in the sample who say that they are internet users and the percentage of parents who say that they personally own a smartphone or a tablet PC that they use to access the internet.

Fig. 5: Parent's internet use and ownership of mobile devices



P2 Do you personally use the internet?

P3 Do you personally own a smartphone or a tablet PC that you use to connect to the internet?

Base: Parents of children who use the internet..

- On average, 87% of parents of children who are internet users in the four countries that we surveyed say that they themselves are internet users. There is no difference between fathers and mothers in this respect. There are however substantial country differences, with parents in Romania being less likely than parents in the other three countries to say that they use the internet.
- Use of mobile devices is also different by country, with Romanian parents being much less likely than parents in the other three countries to say that they own a smartphone or a tablet PC that they use to connect to the internet.

Table 9 shows the percentage of children who own or have for their own use a range of devices by their parents' internet use and ownership of mobile devices (smartphones or tablet PC's).

Tab. 9: Ownership of devices by parent's internet use and ownership of mobile devices

Child owns or has for his/her own use			Does parent own a mobile device?	
	Own	Use daily	Own	Use daily
A desktop computer (PC)	21	49	30	59
A laptop computer	56	38	50	35
A mobile phone that is not a smartphone	25	39	28	48
A smartphone	69	35	58	28
A tablet	25	9	20	6
E-book reader	12	5	10	0
Other handheld devices	15	4	11	3
Home games consoles	45	22	38	15

Q3 a-h Do you personally own or have for your private use any of these devices? By private use of a device we mean a device that only you use.

P2 Do you personally use the internet?

P3 Do you personally own a smartphone or a tablet PC that you use to connect to the internet?

Base: All children who use the internet and one of their parent.

- To some extent the differences in the ownership of devices among children whose parents are internet and/or smartphone users and those whose parents are non users can be understood as country differences, since most of the parents who don't use the internet nor own a smartphone or a tablet are located in this country.
- If a child has parents who are not internet users they are more likely to say that they use a desktop computer to go online, while a child whose parents use the internet and a smartphone is more likely to own a laptop computer and a smartphone. This finding might suggest that parents who are non users and, thus, digitally illiterate are less interested in investing in new technological equipment. But it may also point to economic inequalities, whereby non-users are more likely to belong to less advantaged social groups.

#### 3. Online activities

Previous research (Livingstone et al., 2011) has shown that the range of online activities that children take up varies by age - following a progression from basic uses such as gaming and school related searches to creative and participatory uses of the internet, such as maintaining a blog, creating and sharing their own content etc. (Livingstone & Helsper, 2007; Livingstone et al., 2011).

The EU Kids Online data have also showed that online activities are not completely beneficial or risky, and that children who take up a wider range of online activities are usually exposed to more risks, but are also better equipped to cope with those risks - thus experiencing less harm (Livingstone, Hasebrink & Görzig, 2012).

Drawing on these premises, we are mapping children's online activities for three main reasons:

- to understand whether and how the range of online activities varies with mobile convergent media and "anywhere, anytime connectivity";
- to map children's progression and any relevant changes - on the ladder of opportunities (Livingstone & Helsper, 2007);
- to assess whether and to what extent changes on the level of opportunities relate with variations in the experiences of risks and harm.

#### 3.1 Types of online activities

Table 10 shows how many children do each of a range of activities, by age and gender.

- Social networking tops the list of activities done on a daily basis (58% of the interviewees visit their profile on a social network site several times a day or at least once a day). Other popular online activities among children and teenagers include: listening to music, watching video clips and using instant messaging such as Skype or WhatsApp.
- Other activities such as schoolwork, searching for information to satisfy a curiosity, playing games (alone or in multiplayer games) and watching television or movies on the internet are part of the daily media diets of around one in three children.

Tab. 10: Daily online activities (all types of access) by age and gender

access) by age and gender						
	9-12 y	9-12 years 13-				
	Boys	Girls	Boys	Girls	All	
Visited a social networking profile	33	31	78	82	58	
Listened to music	42	39	70	73	57	
Watched video clips (e.g. on YouTube, iTunes, Vimeo, etc.)	46	36	68	72	56	
Used instant messaging	24	29	64	68	48	
Used the internet for schoolwork	23	21	41	52	35	
Checked information or satisfied your curiosity when something interested you	21	16	46	50	34	
Played games on your own or against the computer	42	24	48	18	33	
Played games with other people on the internet	36	20	52	19	32	
Watched broadcast television / movie online	21	16	37	36	28	
Downloaded music or films	16	8	29	37	23	
Downloaded free Apps	14	11	33	31	23	
Published photos, videos or music to share with others	9	12	25	37	21	
Visited a chatroom	13	7	22	25	17	
Read/watched the news on the internet	8	3	21	30	16	
Published a message on a website or a blog	7	5	19	28	16	
Registered my geographical location	7	6	15	19	12	
Used a webcam	5	6	8	18	10	
Spent time in a virtual world	9	5	12	7	9	
Used file sharing sites	3	3	13	13	8	
Looked up maps / timetables	3	6	9	8	7	
Created a character, pet or avatar	3	3	7	4	4	
Read an ebook	3	1	2	8	4	
Purchased Apps	1	0	4	4	3	
Bought things online	1	1	5	2	2	
Read QR codes/scan barcodes	1	0	1	2	1	

Q9a-d, 10a-e, 11a-e, 12a-k For each of the things I read out, please tell me how often you have done it in the past month.

Base: All children who use the internet

- Activities that are typical of, though not exclusive to, mobile convergent media such as downloading free apps (23%) or locate themselves in places (12%), purchasing apps (3%) or reading QR codes (1%) are practised on a daily basis by only a minority of children.
- All the activities asked about increase by age, except gaming, which is still a highly gendered activity: so if older boys engage more in online games and multiplayer gaming environments than younger boys, younger girls play more than teenage girls.
- The range and kind of activities taken up is also differentiated by gender: overall girls (especially teenagers) tend to engage more in communication practices than boys, while boys play more, as anticipated.
- However, gender variations combine with age differences and tend to be greater among younger children: younger boys take up more of each of the activities asked about except instant messaging (29% of younger girls do it daily vs. 24% of boys), and, to a minor extent, uploading photos, pictures or videos to share with others (12% vs. 9%) and looking up maps and timetables (6% vs. 3%).

Table 11 compares a number of activities done by respondents at least once in the past month in 2013 and 2010 (EU Kids Online survey data for the four countries).

- The table shows that social networking, sharing and entertainment activities have increased substantially from 2010 to 2013.
- More specifically, uploading photos, videos or music to share with others is the online activity that shows the higher rate of growth, followed by visiting a profile on a social networking site, playing in multi-players online environments, watching video clips on video-sharing platforms, and publishing comments on a blog.
- On the contrary, using the internet for schoolwork or playing games alone or against the computer are decreasing, while reading or watching the new is become more popular.

Tab. 11: Online activities done at least once in the past month

	2010	2013
Used the internet for schoolwork	88	82
Played games on your own or against the computer	85	67
Watched video clips (e.g. on YouTube, iTunes, Vimeo, etc.)	79	86
Used instant messaging	66	65
Visited a social networking profile	65	74
Downloaded music or films	48	49
Played games with other people on the internet	46	54
Published photos, videos or music to share with others	38	52
Used a webcam	35	31
Read/watched the news on the internet	30	36
Published a message on a website or a blog	29	35

Q9a-d, 10a-e, 11a-e, 12a-k For each of the things I read out, please tell me how often you have done it in the past month.

EU Kids Online QC102: How often have you played internet games in the past 12 months? QC306a-d, QC308a-f and QC311a-f: Which of the following things have you done in the past month on the internet?38 (Multiple responses allowed).

Base: All children who use the internet

#### 3.2. Smartphone users

In order to grasp the consequences of mobile internet devices on the mix of daily online activities, Table 12 compares smartphone and non-smartphone users, divided in two age groups.

 The percentage of children taking up an activity on a daily basis is higher among smartphone users of both age groups for each of the activities asked about. This suggests that on a daily basis smartphone users engage more in each of the online activities measured.

Tab. 12: Daily online activities by age and by whether child uses a smartphone or not

	9-12 years		13-16 years		
	Non- user	S-ph user	Non- user	S-ph user	All*
Visited a social networking profile	22	56	64	90	58
Listened to music	31	60	54	82	57
Watched video clips (e.g. on YouTube, iTunes, Vimeo, etc.)	34	56	58	77	56
Used instant messaging	19	46	41	82	48
Used the internet for schoolwork	16	34	34	54	35
Checked information or satisfied your curiosity when something interested you	14	30	35	56	34
Played games on your own or against the computer	29	42	29	36	33
Played games with other people on the internet	21	44	28	41	32
Watched broadcast television / movie online	13	30	22	46	28
Downloaded music or films	10	15	20	41	23
Downloaded free Apps	7	25	11	45	23
Published photos, videos or music to share with others	7	18	19	38	21
Visited a chatroom	6	19	18	27	17
Read/watched the news on the internet	5	8	16	32	16
Published a message on a website or a blog	4	11	12	31	16
Registered my geographical location	4	13	14	19	12
Used a webcam	3	10	11	15	10
Spent time in a virtual world	5	11	8	11	9
Used file sharing sites	1	9	4	18	8
Looked up maps / timetables	4	5	6	10	7
Created a character, pet or avatar	2	5	2	7	4
Read an ebook	1	6	1	8	4
Purchased Apps	0	1	1	6	3
Bought things online	0	3	1	5	2
Read QR codes/scan barcodes	0	1	2	2	1

Q9a-d, 10a-e, 11a-e, 12a-k For each of the things I read out, please tell me how often you have done it in the past month.

Base: All children who use the internet

The greatest differences are to be found in com-

munication practices (visiting a profile on a social network site is practised every day by 56% and 90% of smartphone users aged 9-12 and 13-16 years old respectively; instant messaging by 46% and 82% of younger and older children who use a smartphone) and, in second place, entertainment activities (listening to music and watching video clips). However, children who use a smartphone are also more likely to use the internet for schoolwork on a daily basis (48% of smartphone users vs. 35% of the whole sample).

• Not surprisingly, children who use a smartphone to go online also engage more in activities usually associated with mobile convergent media such as downloading free apps (39% of smartphone users vs. 8% of non users) or registering their position through geolocating systems (17% of smartphone users vs. 7% of non users). Nonetheless, the use of geolocation is low even among smartphone users. Purchasing apps is a minor activity also among smartphone users: just 1% of children aged 9-12 and 6% of teenagers pay for downloading apps.

However, though smartphone use is associated with higher percentages of children doing each of the activities asked about on a daily basis, we cannot assume a causal relationship between smartphone use and online activities at this stage of the analysis: it may well be that children who were already using the internet more and for a wider range of activities are more likely to be given a smartphone. Moreover, we cannot take for granted that children who are smartphone users practice these activities mostly, if not exclusively, on the smartphones they own or use.

What we can conclude so far is that children who also use a smartphone to go online are more likely to take up online activities on a daily basis, and have thus incorporated the internet more thoroughly into their everyday lives. In other words, the "anywhere, anytime" connectivity and the privacy afforded by smartphones is associated with the intensity and the quality of young people's online experiences.

<sup>\*</sup> the 'All' values here refer to the average number of children who are internet users and do a certain activity on a daily basis

#### 3.3 Tablet users

Table 13 compares the online activities of tablets users and non users, divided in two age groups.

- When looking at the use of tablets, the correlation between going online from a tablet computer and the increase in the daily rate of online activities is less straightforward, and differentiated by age.
- **Older children** who use a tablet to go online are more likely to engage more in each of the activities considered, though the gap between user and non-users is lower than the divide between users and non-users of smartphones. Overall, the activities that tablet users do more than non-users are communication and entertainment.
- The rise in communication and entertainment activities is even more pronounced among younger children: 46% of children aged 9-12 who are tablet users visit a profile on a social network site on a daily basis, vs. 28% of non-users; 43% of younger tablet users use instant messaging everyday (vs. and 22% of non-users); 58% listen to music and 52% watch video clips online (vs. 35% and 37% of non-users).
- Though many schools across Europe are experimenting the use of tablets in class, the use of tablets to go online is associated with a smaller increase in the overall use of the internet for schoolwork than the use of smartphones (see Table 12).

One possible explanation is that children, especially younger ones, are more likely to use a tablet computer that they do not personally own or have for private use (see Table 7).

Tab. 13: Daily online activities by tablet use, by age

by age	0.10		42.46		
	9-12 years		13-16 years 		
	Non- user	Tabl user	Non- user	Tabl user	AII*
Visited a social networking profile	28	46	72	95	58
Listened to music	35	58	66	82	57
Watched video clips (e.g. on YouTube, iTunes, Vimeo, etc.)	37	52	66	78	56
Used instant messaging	22	43	55	88	48
Used the internet for schoolwork	21	26	41	56	35
Checked information or satisfied your curiosity when something interested you	16	28	42	60	34
Played games on your own or against the computer	30	40	31	38	33
Played games with other people on the internet	26	34	32	43	32
Watched broadcast television / movie online	17	23	30	50	28
Downloaded music or films	12	11	26	46	23
Downloaded free Apps	9	23	22	51	23
Published photos, videos or music to share with others	9	16	19	53	21
Visited a chatroom	8	17	15	41	17
Read/watched the news on the internet	6	5	21	35	16
Published a message on a website or a blog	5	10	17	37	16
Registered my geographical location	5	11	15	22	12
Used a webcam	5	8	10	19	10
Spent time in a virtual world	5	13	9	12	9
Used file sharing sites	3	6	8	22	8
Looked up maps / timetables	4	5	7	12	7
Created a character, pet or avatar	3	4	3	10	4
Read an ebook	2	1	2	11	4
Paid for downloading apps	0	2	2	8	3
Bought things online	0	4	3	4	2
Read QR codes/scan barcodes	0	2	1	2	1
Read QR codes/scan barcodes	0	1	2	2	1
Read QR codes/scan barcodes	0	2	1	2	1

Q9a-d, 10a-e, 11a-e, 12a-k For each of the things I read out, please tell me how often you have done it in the past month.

Base: All children who use use the internet

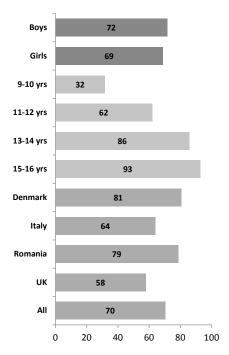
<sup>\*</sup> the 'All' values here refer to the average number of children who are internet users and do a certain activity on a daily basis.

## 3.4 Social networking and media sharing platforms

We have seen that social networking tops the activities taken up by children on a daily basis, and that children who also use a smartphone and a tablet to go online are more likely to engage in activities on social network sites everyday.

Therefore, the present paragraph examines the use of social network sites among children more closely, starting from the number of children who have one or more profile on social network sites.

Fig. 6: Children with a SNS profile by gender, age and country



Q16 a-f Do you have your own profile on a social networking site(e.g. Facebook, Twitter, etc.) that you currently use and if you have a profile/account, do you have just one or more than one?

Base: All children who use the internet

- As shown in Figure 6, 70% of children have at least one profile on a social networking site.
- The use of social network sites varies consistently by age. While just one third of children aged 9-10 have a profile on social network sites, this percentage rises to over 90% of older teenagers. The 62% of children aged 11-12 years old on social network sites is also noteworthy, since most social networking platforms have age limits which are not being followed.

- **Country differences** also matter: despite being very different in terms of both places and devices for internet access, Denmark and Romania top the list with around 80% of children who have a profile on social networking site. These services are less popular in Italy (64%) and the UK (58%).
- If we compare the data with the 2010 EU Kids Online data regarding our four countries, overall, the average use of social network sites has increased from 61% to 70%. However, the rate of this growth is uneven across countries: while social networking has been growing in Denmark, Italy and Romania and it has passed from 46% to 79% in Romania it has to decreased from 67% to 58% of children in the UK.

#### The lower diffusion of social networking in Italy and the UK is due to lower rates of underage use in

these countries (see Table 14). This finding suggests that awareness campaigns against underage use of social network sites have been more effective in these countries, and that parents are more likely to set rules on social networking. This conclusion is consistent with the new country classification by EU Kids Online (Helsper, Kalmus, Hasebrink, Sagvari & De Haan, 2013), according to which Italy and the UK belong to the category of countries where children are **protected by restrictions**.

Tab. 14: Children with a profile on SNS by country and by age

	9-10 yrs	11-12 yrs	13-14 yrs	15-16 yrs
Denmark	41	81	98	99
Italy	15	52	90	93
Romania	50	80	86	92
UK	19	35	73	88
All	32	62	86	93

Q16 a-f Do you have your own profile on a social networking site(e.g. Facebook, Twitter, etc.) that you currently use and if you have a profile/account, do you have just one or more than one?

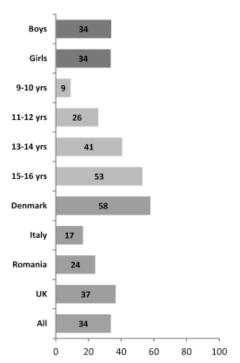
Base: All children who use the internet

Since, as we have seen, sharing photos, videos and other content is one of the most popular online activities, that has increased more from 2010, we also asked children if they have a profile on a media sharing platform such as YouTube, Instagram or Flickr.

Fig. 7 shows the number of children having an account on one of those platforms, by gender, age and country.

- While it is equally common among boys and girls, the probability of having an account on media sharing platforms varies consistently by age and across countries. Just 9% of children aged 9-10 years old report having a profile on one of those services, a number that rises to more than half of teenagers aged 15-16 years old.
- Country differences are even more striking, with more than half Danish children having their own accounts on media sharing platforms, and just 17% of Italian youth doing so.

Fig. 7: Children with a profile on a media sharing platform by gender, age and country



Q23 a-f Do you have your own profile/account on a media sharing platform (photo and video) such as YouTube, Instagram, Flicker, that you currently use and if you have a profile/account, do you have just one or more than one?

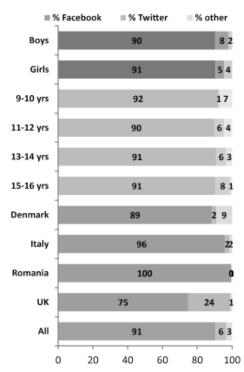
Base: All children who use the internet

Analysing which are the most popular social network sites and media sharing platforms across gender, age groups and countries is also interesting. Fig. 8 shows on which social network site is the profile children use most, by gender, age and country.

Facebook is still the social network site that children are most likely to use, with small variations by age and gender.

- Country differences are more consistent: while it is still the most popular social network site in the countries surveyed, the totality of the respondents in Romania indicated Facebook as the social network site they use most, while just 3 in 4 UK children did so. The UK is an interesting case also because 1 in 4 children said the profile they use the most is on Twitter.
- The popularity of Twitter varies by gender, age and country, and is higher among boys, teenagers, and UK children.
- If we compare these findings with the EU Kids Online 2010 survey, we can see that Facebook has grown considerably in Romania (where just 25% of children indicated it as the profile they used most), has registered a smaller increase in Denmark (from 85% to 89%) and Italy (from 94% to 96%), while it has decreased in the UK (from 87% to 75%).

Fig. 8: Which social networking profile is the one children use most by gender, age and country



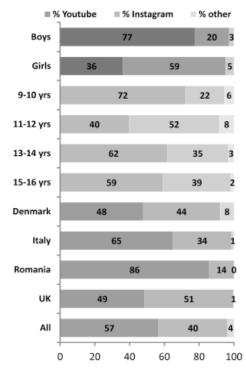
Q17 What social network is the profile/account on that you use the most?

Base: All children who use SNS.

Fig. 9 shows on which media sharing platform is the account children are most likely to use, by gender, age and country.

- Contrary to social network sites, where Facebook dominates, among media sharing platforms there's not a single platform which dominates: while 57% of the respondents who have an account on media sharing platforms indicate YouTube as the account they are most likely to use, 40% say they use Instagram most.
- Having a profile on media sharing platforms is strongly differentiated by gender: while 3 in 4 boys are more likely to use YouTube, nearly 60% of girls say they use Instagram most.
- Age differences are less linear and clear-cut: Instagram is seemingly more popular than YouTube among children aged 11-12 years old, while in the other age groups YouTube is still the platform children use most.
- With respect to country differences, the majority of Romanian children are most likely to use You-Tube; YouTube is still the most popular media sharing platform also in Italy, where, however, 1 in 3 children use Instagram most. Young Danes use Instagram nearly as much as YouTube, while in the UK Instagram is slightly more popular than YouTube.

Fig. 9: On which media sharing platform is the account children use most by gender, age and country



Q24 What media sharing platform is the profile/account on that you use the most?

Base: All children who use media sharing platforms.

# 4. Summary of findings and preliminary recommendations

- Children are going mobile: among all the devices asked about, smartphones are the devices that children are more likely to own (53%) or use to go online at least once a day in all the contexts we examined.
- Despite the fact that smartphones are the devices most likely to be used on the move, however, smartphone use is mainly domestic. More specifically, smartphones are more often used in the privacy of their own bedroom.
- These findings suggest the home is still a strategic site for raising awareness on online risks and promoting safer and responsible uses of the internet. However, as we have seen, smartphones and mobile devices in general are personal, portable media which are thoroughly and seamlessly integrated in children's and their parents' everyday life. Consequently, the increasingly privatised conditions of internet use are likely to inhibit or challenge established parental mediation strategies such as active mediation of children's online experiences.
- Therefore, it is of vital importance that industries, governments, policy makers, NGOs, researchers and other stakeholders cooperate to build a better internet for children, and reach priority goals such as content classification, age-appropriate services and privacy settings, and easy and robust reporting mechanisms on mobile devices and services.
- Though internet use in schools is unevenly distributed of across the 4 countries surveyed, we cannot underestimate the importance of schools and teachers as places to engage children in online safety education, more significantly in those countries where parents are less likely to be internet and smartphone users themselves, such as Romania. Schools also provide the chance to engage children in forms of mediation directed to their peers.
- The age of first internet use is dropping, as it is the age children are given their first smartphone.
   Moreover, since younger children are likely to borrow

- a tablet computer from their parents or older siblings, it is important to ensure age-appropriate settings and contents on all devices.
- Children are going social: if we look at activities especially if we compare activities across time (Table 11) we can observe that social networking, entertainment on media sharing platforms, and sharing content with others are on the rise. Given that these activities are far more popular among children who are also smartphones or tablets users, then we can assume a correlation though not a causal relationship between mobile convergent media and online participatory activities.
- A further noteworthy difference among children who use a smartphone or a tablet to go online is the higher rate of **download** of **apps**: 25% of children aged 9-12 who use a smartphone to go online, and 23% of those who use a tablets report downloading free apps on a daily basis. The numbers raise to 45% and 51% of teenagers who are smartphone or tablet users respectively. This finding, then, points again to the need of **age-appropriate services** across al platforms.
- Finally, data regarding the use of social network sites are encouraging as far as under age users in Italy and the UK are considered. Whether this is the outcome of awareness raising campaigns targeting parents, or of media panics is not clear at this stage. However, the findings suggest there is potential for reducing underage use of social networking sites even in countries where parents are less familiar with the internet.

### 5. References

- DÜRAGER, A. & LIVINGSTONE, S. (2012). How can parents support children's internet safety? London: EU Kids Online.
- **EB** (2008). Towards a Safer Use of the Internet for Children in the EU: A Parents' Perspective. Luxembourg: European Commission.
- **GOGGIN, G.** (2010). *Global Mobile Media*. New York: Routledge.
- HELSPER, E., KALMUS, V., HASEBRINK, U., SAGVARI, B. & DE HAAN, J. (2013). Country Classification: Opportunities, Risks, Harm and Parental Mediation. London: EU Kids Online
- HJORTH, L. & GOGGIN, G. (2009). Mobile Technologies: From Telecommunications to Media. London: Routledge.
- ITO, M. ET AL. (2009). Hanging Out, Messing Around, and Geeking Out: Kids Living and Learning with New Media. Cambridge, MA: MIT Press.
- **LIVINGSTONE, S.** (2009). Children and the Internet: Great Expectations, Challenging Realities. Cambridge: Polity.
- LIVINGSTONE, S., & BOVILL, M. (2001). Children and their Changing Media Environment A European Comparative Study. Lawrence Erlbaum Associates, Inc., New Jersey.

- LIVINGSTONE, S. & HADDON, L. (Eds) (2009). Kids Online.

  Opportunities and Risks for Children. Bristol: Policy

  Press.
- LIVINGSTONE, S., HADDON, L., GÖRZIG, A. & ÓLAFSSON, K. (2011). Risks and safety on the internet: The perspective of European children. Full findings. London: LSE, EU Kids Online.
- LIVINGSTONE, S., HASEBRINK, U., GÖRZIG, A. (2012). Towards a general model of determinants of risks and safety. In S. Livingstone, L. Haddon & A. Görzig (Eds) *Children, risk and safety on the internet*. Bristol: Policy Press
- LIVINGSTONE, S. & HELSPER, E. J. (2007). Gradations in digital inclusion: children, young people and the digital divide. *New Media & Society*, 9, 671-696.
- oswell, D. (2008). Media and communications regulation and child protection: An overview of the field. In S. Livingstone & K. Drotner (Eds), *The international handbook of children, media and culture* (pp. 475-492). London: Sage.

#### 6. The network

Country	National Contact	Team
Denmark	Gitte Stald — stald@itu.dk IT University of Copenhagen, Ruud Langgaards Vej 7, 2300 Copenhagen	Gitte Stald, Heidi Jørgensen
Ireland	Brian O'Neill — brian.oneill@dit.ie College of Arts and Tourism, Dublin Institute of Technology, Rathmines Road, Dublin 6, Ireland	Brian O'Neill, Thuy Dinh
Italy Coordinator	Giovanna Mascheroni giovanna.mascheroni@unicatt.it OssCom, Università Cattolica del S. Cuore, Largo Gemelli, 1, 20123 Milano	Giovanna Mascheroni, Barbara Scifo, Kjartan Ólafsson, Andrea Cuman, Maria Francesca Murru, Piermarco Aroldi
Portugal	José Alberto Simões — joseav.simoes@fcsh.unl.pt Departamento de Sociologia, Faculdade de Ciências Sociais e Humanas, Universidade Nova de Lisboa (UNL) Av. de Berna, 26-C, 1069-061 Lisboa, Portugal	Cristina Ponte, José Alberto Simões
Romania	Anca Velicu — anca.velicu@gmail.com Institute of Sociology Casa Academiei, Calea 13 Septembrie 13, Bucharest	Anca Velicu, Monica Barbovschi, Valentina Marinescu, Bianca Fizesan
UK	Leslie Haddon — leshaddon@aol.com Department of Media and Communications London School of Economics and Political Science Houghton Street, London WC2A 2AE, UK	Leslie Haddon, Jane Vincent

## The International Advisory Panel

#### Mizuko Ito

University of California, Irvine

#### Richard Ling

IT University of Copenhagen

#### Sonia Livingstone

The London School of Economics and Political Science

#### Cristiana De Paoli

Save the Children Italia

PRINTED BY:







#### Contacts:

Dr. Giovanna Mascheroni giovanna.mascheroni@unicatt.it

#### OssCom

Reasearch Centre on Media and Communication

#### Università Cattolica del Sacro Cuore

Largo Gemelli 1, 20123 Milano – Italy

#### Initial Findings Report, October 2013 Net Children Go Mobile Project

FUNDED BY:



Safer Internet Programme European Commission (SI-2012-KEP-411201)



ISBN 978-88-6780-028-5



PRINTED ON OCTOBER 2013