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THE LONDON SCHOOL OF ECONOMICS AND POLITICAL SCIENCE

EU Kids Online

What Do We Know about Children's Use of Online Technologies?

A Report on Data Availability and Research Gaps in Europe





European Research on Cultural, Contextual and Risk Issues in Children's Safe Use of the Internet and New Media (2006-2009)

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www.eukidsonline.net

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What Do We Know About Children's Use of Online Technologies?
A Report on Data Availability and Research Gaps in Europe

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This is a report from the EU Kids Online network.
For a complete list of participants, see Annex B

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European Research on Cultural, Contextual and Risk Issues in Children's Safe Use of the Internet and New Media

EU Kids Online is a project funded by the EC Safer Internet plus programme (http://ec.europa.eu/information_society/activities/sip/index_en.htm) from 2006-2009. It examines research carried out in 18 member states into how children and young people use the internet and new media. This three-year collaboration aims to identify comparable research findings across Europe and to evaluate the social, cultural and regulatory influences affecting both risks and children's and parents' responses to them, in order to inform policy. It will chart available data, note indicate gaps and identify factors that shape the research capability of European research institutions. Finally, it will examine methodological issues relating to cross-cultural analyses and the study of children's online experience in order to develop a best practice guide to research. For more information see www.eukidsonline.net

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1. Introduction

1.1 The importance of empirical research

Across Europe and beyond, children and young people are going online in ever greater numbers and for ever more activities: 50% of children (<18 years old) in the EU25 have used the internet, rising from just 9% of those under six to 1 in 3 6-7 year olds, 1 in 2 8-9 year olds and more than 4 in 5 teenagers aged 12-17.[1] Cross-national differences are substantial, ranging from less than a third of children in Greece and Bulgaria to over two thirds in Estonia and Denmark. Widespread use of the internet and online technologies, particularly among children and young people, affords many opportunities but also risks.

There is growing agreement that the activities of multiple and diverse stakeholders are required to promote safer use of the internet and online technologies, to protect children and young people and to empower parents and teachers with online safety tools. It is also agreed that this approach should be evidence-based. Research is needed to chart which children have access to what technologies, to understand the incidence of risky practices and of parental regulation. It can also contextualise use and risk-related findings, so that we understand how and why some children encounter certain risks and with what consequences. Last, research can target awareness-raising and other interventions towards particular age, demographic or national groups.

In a European context, research must be cross-national if it is to support understanding of how and why children have different experiences online in different countries. Comparative research can also support multiple stakeholders in working together to ensure that parents and children receive up to date, comprehensible information, tailored to the modern family (in all its diversity), appropriate to social mores (in all their cultural variation), and accessible to all (despite economic and education-based stratification).

1.2 Identifying the available research

To inform this agenda, research teams across Europe, from diverse institutions, disciplines and perspectives are conducting many kinds of research. But keeping track of this research is a demanding task. Those who are not active researchers may lack the expertise required to identify, interpret and evaluate available research. Those working in one country or language may struggle to use research conducted elsewhere. Those with the power to commission research in one country would benefit from knowing what has proved useful in another.

For these reasons, a bridge is required between the specialist domain of empirical research and the policy imperatives of safer internet initiatives. EU Kids Online is a thematic network designed to bridge research and policy contexts by examining European research (national and multi-national) on cultural, contextual and risk issues in children's safe use of the internet and online technologies (see www.eukidsonline.net).

EU Kids Online focuses on the intersection of three domains:

- Children (mainly up to 18 years old), their families, domestic users;[2]
- Online technologies - mainly but not only the internet; focussing on use and risk issues;
- European empirical research and policy, prioritising the 18 countries in the network.

1.3 This report

This report[3] asks what empirical research already exists, is ongoing, or is still needed. It does not present the findings of the research itself; there are no new empirical findings to be found here. Rather, this report identifies the available empirical research across Europe regarding children's access to and use of the internet and new online technologies. Thus, for those seeking new research, this report points out what there is and where to find it.

Specifically, the report notes patterns and biases in the kinds of research, both qualitative and quantitative, that have been conducted. It examines whether more or different kinds of research have been conducted in different countries, or for different age groups, or regarding some aspects of internet use compared with others. It offers an assessment of data comparability. Last, it pinpoints key gaps in the evidence base.

Our anticipated audience is broad, encompassing all those concerned with empirical research on children's online risk and safety, as well as the broader field of European comparative social science and policy. As we provide an efficient overview of key trends in the empirical research base, we hope this report will be read by research users – researchers themselves, those who commission and fund research, policy makers and others working towards a safer internet for the public.

While this report addresses data availability in Europe, it was compiled in part from a series of national reports. These are included in Annex F. Note that this report exists in two forms: the shorter, printed version includes summary versions of the national reports, and does not include full tables. The longer, online version includes more detailed versions of the national reports, plus all tables containing the data referred to in the body of the report text, and the collection policy for the Data Repository

1.4 Work Package 1: Data Availability

This report is the second of two deliverables for Work Package 1: Data Availability. The aims of this work package are:

- An ongoing repository of data links to inform and publicise available data.
- Identification and overview of quantitative data in 18 countries.
- Identification and overview of qualitative data in 18 countries.
- Analysis of gaps in the evidence base.
- Assessment of data comparability.

The first deliverable, launched in September 2006, is an online Data Repository (D1.2). The contents of the repository, which is described below, form the basis of the present report.

This work package is conducted in parallel with other work packages (see Annex A). Indeed, it provides the basis on which the others build, for only after identifying the available research can we contextualise the research (WP2), compare findings across countries (WP3), evaluate the methods used (WP4) and develop policy recommendations (WP5).

EU Kids Online outputs are the collective effort of the EU Kids Online network. Network members meet several times per year and work in close contact electronically in between. The editors then integrate contributions and produce the final text for each report.

1.5 The Online Data Repository

This database contains entries that identify and codify recent and ongoing empirical studies regarding children and the internet and online technologies in Europe. The aim is to provide a public resource for researchers and practitioners in which studies are identified and information about them can be readily searched and accessed. The Data Repository is online at www.eukidsonline.net.

The collection policy describes what is included and not included in this repository. In brief, these are as follows:

- The unit of analysis is an empirical research project (not a publication) conducted in Europe
- The report must be available and read by the coder, with sufficient methodological details to evaluate its quality
- Relevant research includes, as a priority, (a) empirical projects concerning children + internet/online, (b) research on risks experienced by children online, (c) research on mediation or regulatory practices (by parents, teachers, etc) for children's online activities. It also includes, with more partial coverage, (d) research on parental internet experiences and (e) research on children's use of other technologies
- Definitions: (a) Europe includes the EU25, with priority for the 18 nations of EU Kids Online, (b) children includes those under 18 years old, (c) online includes internet, online games, online mobile, e-learning, etc.

Certain quality control criteria have guided these decisions, though we cannot guarantee that all research included here is of the highest quality. Each study (or project) is described according to its main features – sample, methods, topics researched, countries studied, publication details, etc. These features, or a free text search, may be used to search the database.

The present report analyses entries in the repository entered by January 2007. These number 235 in total. While we have attempted to be as comprehensive and inclusive as practicable, the EU Kids Online network will continue to update the repository with additional and new entries at regular intervals over the next two years. The final project report (due June 2009) will thus update the tables and findings in the present report.

2. Availability of Research

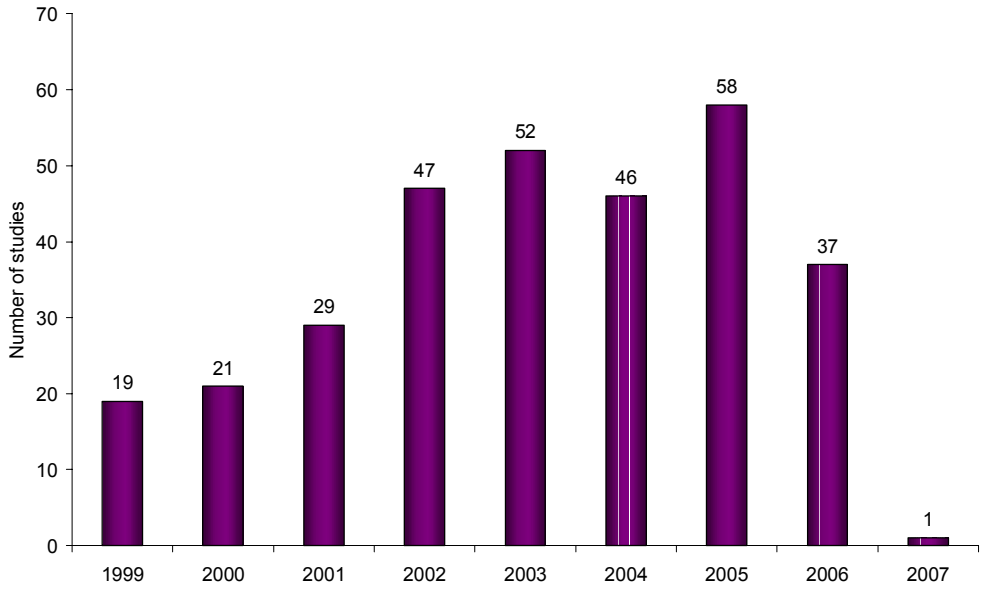
2.1 How much research is available?

The EU Kids Online network has identified 235 separate research studies and entered these into the online data repository.[4] Some studies are small, producing a single report; others are substantial, resulting in a series of publications. In many studies, the majority in our repository, children and the internet are the central focus, but in some, they are a minor part of the research.

For example, surveys of public adoption of media or technology or consumer goods include some questions about internet access and use, but may not include much detail. Surveys of 'the population' generally exclude children but may include those 14+ or 16+, thereby providing some data on older teenagers' internet use but not for younger children. Questions may have been commissioned on an omnibus survey, resulting in a few carefully targeted questions relevant to children and online technologies but providing little contextualisation.[5]

Given the rapid pace of change in the internet and online technologies and services, as well as in children's practices online, some of the research is becoming somewhat out of date, even though conducted within the last few years (see Figure 1 and Annex E, where this is noted as regards research in Austria and, in certain respects, in the UK).

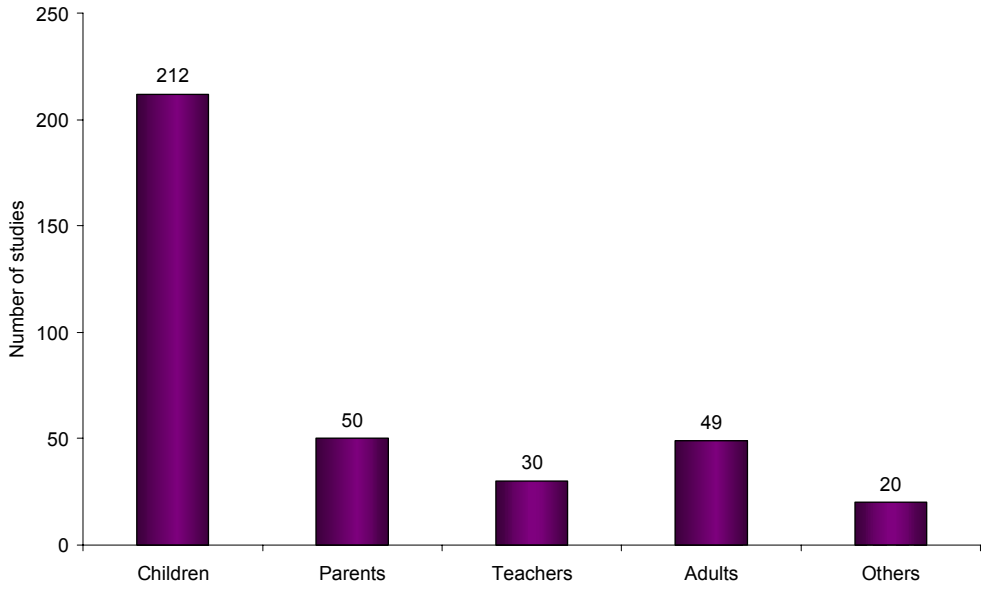
Figure 1: Number of studies per year



Date = start of fieldwork

As Figure 2 shows, the majority of the studies collected researched children directly, whether collecting information from them or observing them in some way. There are also studies of parents, teachers or other adults (which may include some parents) who act as informants about children's behaviour or else provide information that allows us insights into how they interact with children (e.g. parents' concerns about risks).

Figure 2: Group studied



2.2 In which countries is research available?

Recent empirical research on children and online technologies, mainly concerning the internet, was identified in all 18 countries in the EU Kids Online network. However, the conduct and availability of research is unevenly spread across Europe; see Figure 3.

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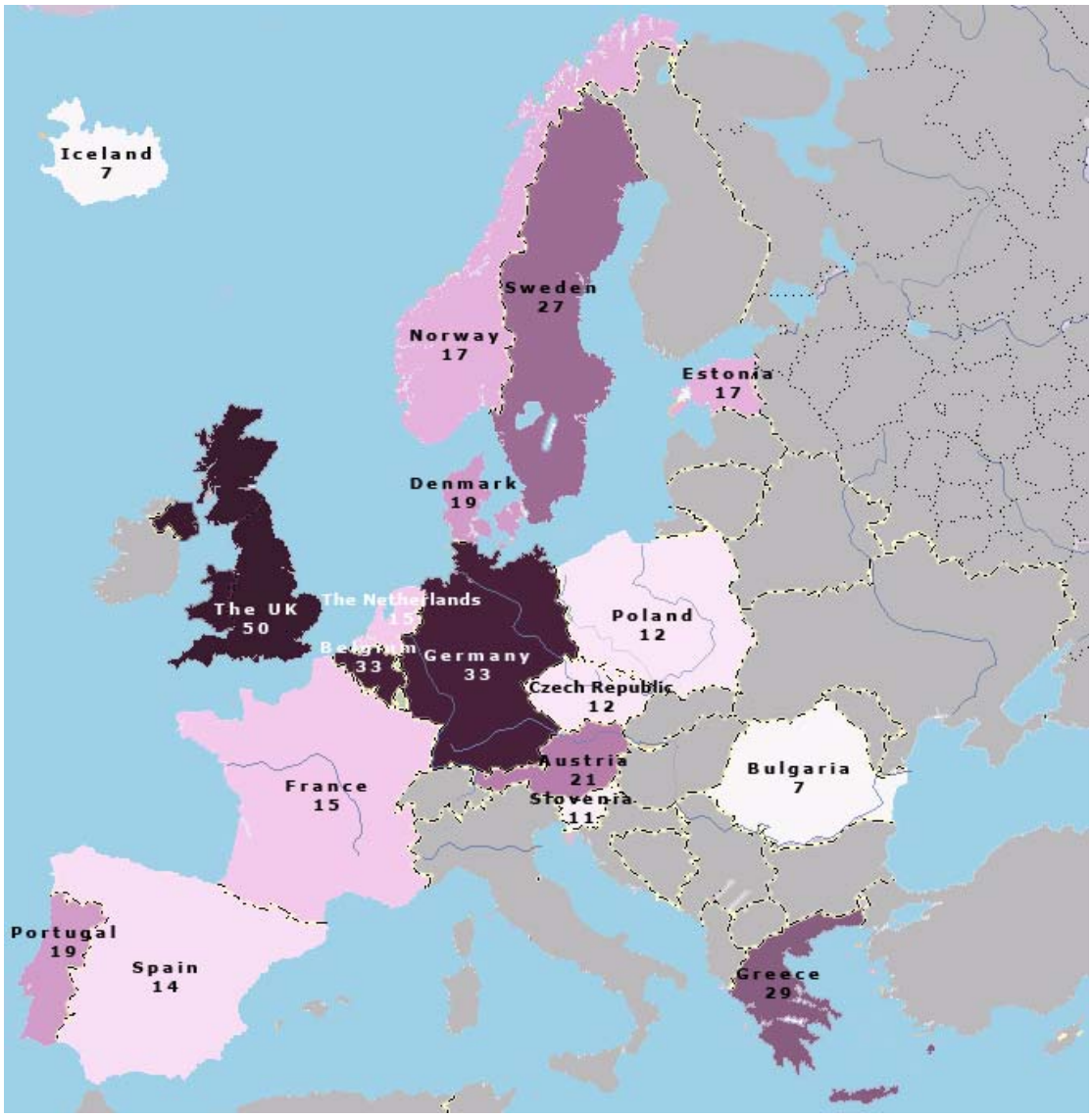
Figure 3: Number of studies in each EU Kids Online participating country[6]



The number of studies shown in Figure 3 represents the combination of both single and multi-country studies (N=235). Of these 216 are single country studies (see Table 1 for a breakdown by single and multi-country designs). Note that in countries where a substantial amount of research exists, multi-country and pan-European studies constitute the minority. But in those countries where the evidence base is thin, such studies significantly add to the available evidence base. In the tables and figures that follow, the base size (i.e. number of studies coded) is 235.

Table 1: Number of single country studies and total studies by country

	AT	BE	BG	CZ	DK	EE	FR	DE	EL	IS	NO	PL	PT	SL	ES	SE	NL	UK	N
Single country studies	13	22	3	6	10	10	4	24	22	1	8	5	10	5	6	18	8	41	216
Total studies	21	33	7	12	19	17	15	33	29	7	17	12	19	11	14	27	15	50	*[7]

There are many reasons why more research exists in some countries than others (and pursuing the reasons for such variation will be a focus for EU Kids Online's Work Package 2). These may include the fact that mass diffusion of the internet is itself more recent in some (e.g. the Czech Republic) than others (e.g. Germany). Linked to this, research activity depends on a critical mass of interested researchers able to work on the topic. Lack of funding options is another consideration (one study in Bulgaria was paid for by the British Embassy).

Although the calculations are not shown here, it should also be noted that there is a positive correlation between national population and number of studies identified, with larger countries sustaining a larger body of empirical research than smaller countries.

Several national reports noted that even if the internet and internet studies are well established, the issue of children and risk remains a relatively recent addition to the public policy agenda (see Annex E). Note too that for a few studies, research is sub-national (e.g. in Belgium, where the repository includes studies of French Wallonia or of Flemish speaking Flanders but not the smaller community of German speakers).

We considered the possibility of grouping countries by region, though it appears that no standard regional groupings are agreed within Europe (this will be one focus for Work Package 3). A tentative grouping, below, suggests that most research is conducted in Northern Europe, that the considerable volume of research in the Nordic region might reflect the extent of internet diffusion, given the relatively small population sizes, and that less research has been conducted in Central and Southern Europe, though there are exceptions:[8]

- *Southern Europe*: Greece (29), Portugal (19), Spain (14), Slovenia (11)
- *Nordic region*: Denmark (19), Iceland (7), Norway (17), Sweden (27)
- *Northern Europe*: Belgium (33), Estonia (17), France (15), Germany (33), Netherlands (15), UK (50)
- *Central Europe*: Austria (21), Bulgaria (7), Czech Republic (12), Poland (12)

In the data repository, some research was identified from 12 further European countries[9]. This can only be indicative as the aim was not to be comprehensive for countries other than the 18 included in the EU Kids Online network.

Research conducted outside Europe is sometimes influential within Europe, and it also helps to provide an 'outside' view, especially when determining what is specifically European and

what is more general to children's internet use. Thus, although not within the remit of the online data repository, references to such research are collected as part of our ongoing review of the literature (see www.eukidsonline.net). Most notable is research conducted by Pew Internet, valuable for its high quality, timely and useful surveys of youthful internet use. Their findings are widely cited in European policy debates, and their phrasing of questions is sometimes adapted for survey questionnaires within Europe.[10]

2.3 How many research studies are multi-national?

The earliest multiple-country study in the field of children and the internet is SAFT, whose questions provided a basis for the pan-European Eurobarometer study among others. Mediappro involved fewer countries but took place at roughly the same time as Eurobarometer.

Most of the other studies examined are single country studies, although 12 of the 235 empirical studies were conducted in more than one country (one EC-funded study involved most participating countries but was of the internet in general rather than children in particular[11] and one involved many EU and non-EU countries but was focused specifically on freedom of expression and online censorship). Thus the vast majority (95%) are single-nation studies, reflecting the national basis on which research commissioning and research funding is generally organised.

We note that, in practice, team members sometimes discovered that, however much we attempted to anticipate all possibilities in advance, there was more than one way to code the details of a study, especially for multinational studies.[12]

The multi-national studies identified regarding children and the internet/online technologies include the following:

- **SAFT** (Safety Awareness Facts and Tools), is an awareness project initiated in Norway and funded by the EC Safer Internet Action Plan. This study explored 9-16 year old children's activities online, using a self-completion survey in classrooms; it also surveyed (by telephone) parents' awareness of children's use and risks. It was conducted in 2003-4 in Norway, Sweden Denmark, Iceland, and Ireland. It has been partly replicated in Singapore, the Netherlands, Austria and Finland. The survey was replicated in 2006 in Norway for parents and children and in Ireland only for children. It covered use of technology, electronic games, seeking information (including for schoolwork), parental knowledge and supervision, email accounts, chatting, illegal behaviour, internet education and safety, mobile phones, offensive material, submitting personal information, face-to-face meetings and other areas. See http://www.saftonline.no/PressReleases/2881

- **Eurobarometer**. Based on some of the SAFT questions and funded by the EC, Eurobarometer surveyed parents/carers[13] in autumn 2003 in the 15 old member states[14] (EU15) and at the beginning of 2004 in the 10 new member states[15] just before they joined. A second survey of all these countries (EU25) plus the acceding and candidate countries[16] was carried out in 2005. The surveys covered use of the internet, self-assessed expertise, children's use of the internet, location of that use, children's owning a mobile phone, whether children have encountered harmful of illegal content, the use of filtering/blocking tools, whether parents sit with children during internet use, parental rules and various questions relating to awareness of information about the safer internet. See http://europa.eu.int/information_society/activities/sip/eurobarometer/index_en.htm

- **Mediappro**. This survey, also EC funded, was conducted by researchers who had worked on the previous 'Educaunet' study (Belgium, Denmark, France, Greece, Portugal and the UK) in 2005. These were joined by new members from Estonia, Poland and Italy.

The core question was: How do young people across Europe appropriate the internet and new network media? Paper questionnaires were completed in classrooms across nine countries by 7393 children. In addition, 25 qualitative interviews were conducted in each country. Equivalent research was also conducted in Montreal, Quebec. See http://www.mediappro.org/

- The **World Internet Project** (WIP) is an international, collaborative study looking at the social, political and economic impact of the internet and other new technologies. It has more than 20 partners in countries and regions all over the world, including Singapore, Italy, China, Japan, Hong Kong, Macao, South Korea, Sweden, Germany, Great Britain, Spain, Hungary, Canada, Chile, Argentina, Portugal, Australia, Bolivia, India, Iran, Estonia and the Czech Republic. This study thus includes some European countries, and while many of the surveys address adults only, some defined their sample as 14+ years and so include children (e.g. the UK study, OxIS). See http://www.worldinternetproject.net

- **Children and Their Changing Media Environment** was a 12 European nation comparison of children and young people's access to and use of old and new media in 1997-8. It included Belgium, Denmark, Finland, France, Germany, Israel, Italy, Spain, Sweden, Switzerland, The Netherlands and the UK. Combining qualitative and quantitative methods, it asked how children aged 6-17 years old engaged with their changing media environment in the context of new media diffusion, patterns of parenting, school, peer group and culture. See Livingstone and Bovill (2001).

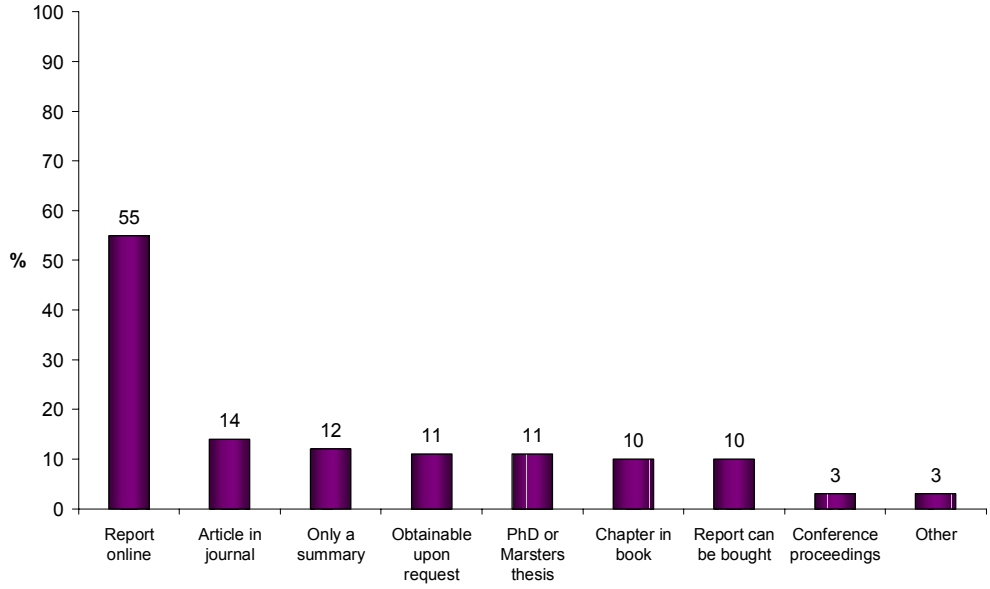
- Other examples include the **Insafe Survey** of some 21000 children and teenagers across Europe for Safer Internet Day 2007. This provides a snapshot of experiences regarding online use, privacy, risk and safety practices. See http://www.saferinternet.org.

2.4 Are research findings publicly accessible?

By far the most important means of accessing reports of empirical research studies is via the internet - over half of all studies are available online; see Figure 4.[17] One in 10 studies can be accessed through published book chapters, journal articles, reports for purchase or reports obtainable on request.[18] Studies for which only few details were available and which were only available for purchase were excluded. Since academic publication, especially in journals, generally includes a formal process of anonymous peer-review and editorial scrutiny and guidance, the high proportion of studies that do not undertake this process successfully is of concern for the quality of work in this field (though we note that some reports do benefit from a process of peer review). One problem is that many, though not all, reports are largely descriptive, valuable as a timely snapshot of online use, but lacking the theoretical framework or critical evaluation of research required for a deeper analysis or interpretation of findings.

Most problematically, 12% of the empirical studies are publicly available only in summary form, thus omitting important information needed to evaluate the research and understand its findings. For example, these included summaries in which the number of respondents or the date of fieldwork was missing. Even in some full reports, key information was missing – who funded the study, for example, or the mode of survey administration (e.g. telephone, face-to-face or other). Sometimes the report did not specify the age of the participants, but just said that they were from primary schools or secondary schools (which can mean different ages in different countries).[19]

Figure 4: Public availability of research studies (multicoded)



More encouragingly, however, 73 datasets (from the 235 studies) are publicly available (either online or on request), though more datasets are not available. This was true for each form of funding: for example, for National Government funded studies, in 10 cases the dataset was available but in 53 studies they were not; for the national research councils, the ratio is 7:29.

2.5 What language is research published in?

Research users must not only be able locate a research report, they must also be able to read it. While the norm is for reports to be published in the national language(s), in some countries there is also a growing trend towards publication in English in addition (either the full report or a summary). This is particularly the case in the Nordic countries, the Czech Republic and Greece.

2.6 A note on the limitations of the selection process

In scoping the nature and range of empirical studies to be included within this report, boundaries had to be drawn. These are outlined in Annexes C and D. As in any such exercise, these boundaries were drawn according to the EU Kids Online remit, our interpretation of that remit as reached through network deliberations, and the practicalities of defining, identifying and coding research studies and reports. Inevitably, some may disagree with our decisions; others would have preferred different solutions. Moreover, the task of identifying and coding available research continues as the research enterprise itself continues.

Hence, we urge that the exact numbers or percentages noted in this report are interpreted with some caution, and that emphasis is instead placed on the broad trends identified and on the particular patterns of findings.

3. Patterns of Research

3.1 Age of children

The EC defines children using the legal definition of 'minors' – those under 18 years old. Media provision and regulation often defines children as those younger than 12 or 15. Child protection considerations concern the vulnerable, a category which may extend into young adulthood. As noted earlier, research is often conducted on the adult population, including older teenagers because they are 'researchable' (i.e. reliable respondents, without necessitating different methods or demanding special ethical procedures). Other research targets children and young people because they are the focus of interest. Educational research (including that focused on the use of information technologies) may target primary and/or secondary school pupils.

EU Kids Online coded the 235 research studies according to the ages included (hence, a study with respondents aged 12-15 would be represented in Figure 5 both in bars 12-14 and 15-17 (hence the rubric, 'multicoded'). These are the age bands that will be used in tables elsewhere in this report.

As Figure 5 below shows, the majority of research on children's use of the internet and online technologies is conducted on teenagers. The lower number of studies on the 18+ group reflects the focus of EU Kids Online on under 18s, rather than a paucity of research on older ages, for most of these studies are those that capture both children and adults (e.g. respondents aged 12-19).

There is a rough correlation between the proportion of young people using the internet and the amount of research on them – recall that in the EU25, those who have used the internet is 9% of those under 6, 1 in 3 of 6-7 year olds, 1 in 2 of 8-9 year olds and more than 4 in 5 teenagers aged 12-17.[20] But since use among younger children is growing fast, and since vulnerability in terms of maturity, or available coping strategies, may be greater for younger children (even though incidence of risk is higher for teenagers), children younger than 12 years old must surely represent a priority for future research.

Figure 5: Number of studies per age group (multicoded)

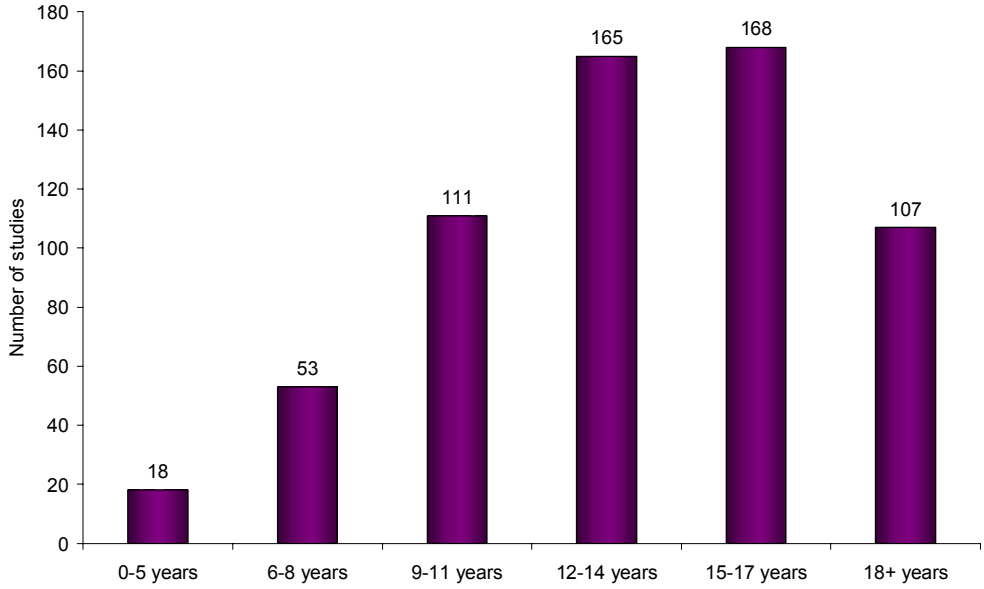
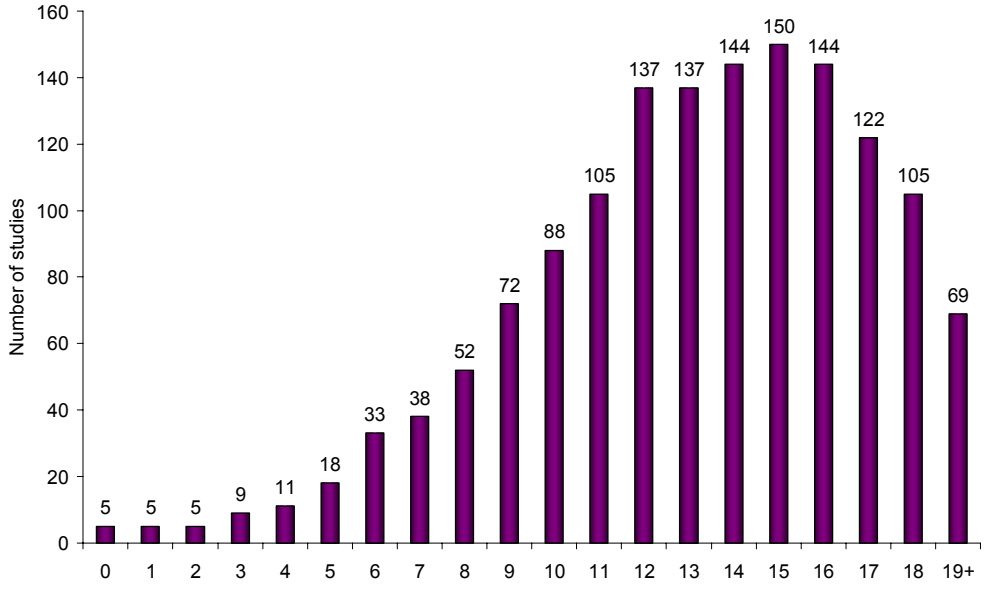


Figure 6 shows the same information in more detail by age, clearly showing the concentration of studies in the teenage years.

Figure 6: Number of studies per year group (multicoded)



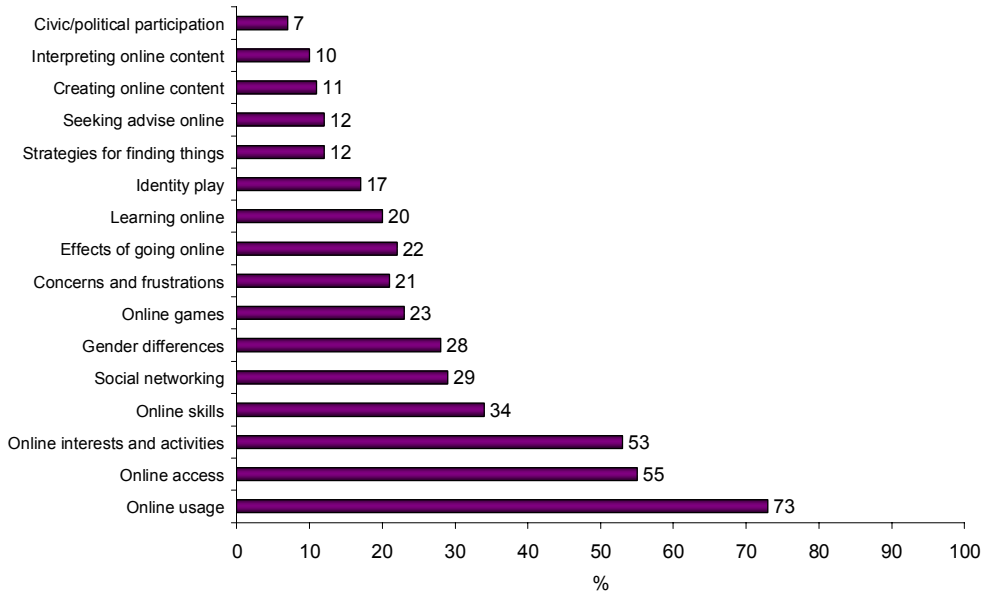
3.2 Topics researched

What topics, or questions, do these research studies address? What topics receive more attention in one country than another, or for one age group compared with another? Research questions may be theory-led, policy-led or problem-led, and all three of these sources of questions may vary by national contexts, resulting in Europe-wide variation. Each study was coded for its inclusion of a wide range of possible topics, and the overall evidence base can be characterised as follows.

Access and use: As can be see in Figure 7 below, the most researched topics were online usage, followed by access and then interest and activities. Discussions amongst the national teams suggest that most research on access concerned access via PCs, with little on mobile phone or games machines as platforms for internet access. There seemed to be little research on why some children lack access. As regards use, discussions at workshops suggested that there was less available material on the newest kinds of use, such as blogging and podcasting. In all, the research needs to catch up with the technology and with the policy agenda.

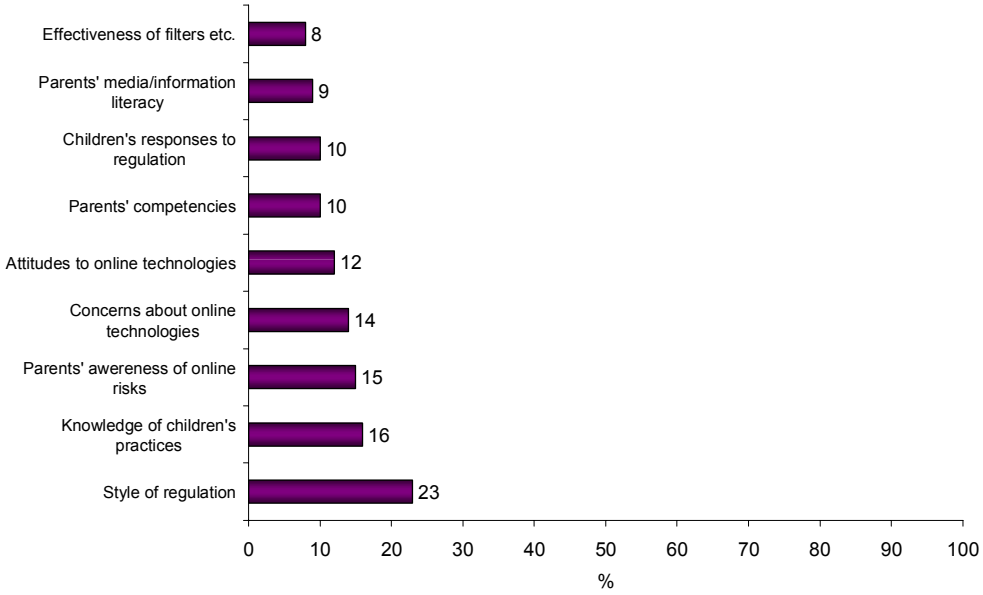
Online activities: The next band of topics that received more attention was children's online skills, children's social networking online and gender differences in relation to experiences of the internet. These were followed by children playing online games, the effects on children of going online, children's concerns and frustrations and children's identity play. The least frequent topics were civic and political participation, interpreting online content, creating online content, seeking advice online and strategies for finding things.

Figure 7: Percentage of studies per research topic relating to children (multicoded)



Parental mediation: Figure 8 shows that there is less research on parents' experiences of the internet and how they mediate their children's experiences. The most common topic here was parental styles of regulating their children's internet use (less research examines children's responses to regulation, with some notable exceptions).

Figure 8: Percentages of studies per research topic relating to parents (multicoded)



Regarding the possibility of national differences in research topic focus, Table 2 shows that all participating countries have researched the main issues of internet use (a topic in over half of the studies in all countries) and access (usually well covered in each country). Less common but still fairly well covered is research on online interests, activities and skills, the balance of interest in these last two varying a little by country.

Table 2: Percentage (number) of studies addressing topics (multicoded) by country (1)

Country	Online access	Online Usage	Online Interests and activities	Online skills
Austria	54% (11)	95% (20)	52% (11)	29% (6)
Belgium	52% (17)	70% (23)	42% (14)	33% (11)
Bulgaria	71% (5)	71% (5)	29% (2)	29% (2)
Czech Republic	67% (8)	92% (11)	42% (5)	33% (4)
Denmark	68% (13)	84% (16)	37% (7)	37% (7)
Estonia	41% (7)	82% (14)	12% (2)	24% (4)
France	60% (9)	100% (15)	33% (5)	40% (6)
Germany	85% (28)	94% (31)	49% (16)	27% (9)
Greece	38% (11)	52% (15)	14% (4)	10% (3)
Iceland	100% (7)	100% (7)	43% (3)	77% (4)
Norway	77% (13)	82% (15)	65% (11)	53% (9)
Poland	75% (9)	83% (10)	33% (4)	17% (2)
Portugal	58% (11)	95% (18)	42% (8)	47% (9)
Slovenia	64% (7)	100% (11)	9% (1)	18% (2)
Spain	86% (12)	100% (14)	57% (8)	50% (7)
Sweden	56% (15)	93% (25)	56% (15)	26% (7)
The Netherlands	40% (6)	60% (9)	27% (4)	20% (3)
The UK	50% (25)	72% (36)	50% (25)	50% (25)

Turning to interpreting online content, creating online content, children's concerns and frustrations and strategies for finding things online, we start to see (Table 3) that some countries have research gaps. For example, Bulgaria, the Czech Republic, Germany, Slovenia, the Netherlands have nothing on interpreting online content. In the case of some small countries with fewer overall studies this is perhaps understandable (e.g. Bulgaria, Czech Republic, Slovenia).

It is perhaps more surprising to see that countries with a generally stronger research tradition and quite a number of studies overall have such gaps (e.g. in the Netherlands, several key areas are not covered in studies, and to a lesser extent this is also true of Germany). In contrast, although Iceland has comparatively fewer studies overall, they are more comprehensive, covering many topics. The UK has a high percentage and the highest absolute number of studies addressing children's concerns and frustrations.

Table 3: Percentage (number) of studies addressing topics (multicoded) related to children by country (2)

Country	Interpreting online content	Creating online content	Concerns and frustrations	Strategies for finding things
Austria	5% (1)	10% (2)	9% (5)	5% (1)
Belgium	12% (4)	6% (2)	30% (10)	12% (4)
Bulgaria	0% (0)	0% (0)	0% (0)	29% (2)
Czech Republic	0% (0)	0% (0)	0% (0)	0% (0)
Denmark	32% (6)	5% (1)	26% (5)	32% (6)
Estonia	12% (2)	6% (1)	6% (1)	0% (0)
France	20% (3)	0% (0)	13% (2)	7% (1)
Germany	0% (0)	6% (2)	3% (1)	0% (0)
Greece	3% (1)	3% (1)	3% (1)	0% (0)
Iceland	29% (2)	43% (3)	29% (2)	29% (2)
Norway	35% (3)	35% (6)	35% (3)	29% (5)
Poland	25% (3)	0% (0)	42% (5)	0% (0)
Portugal	26% (5)	5% (3)	21% (4)	21% (4)
Slovenia	0% (0)	0% (0)	0% (0)	0% (0)
Spain	7% (1)	14% (2)	14% (2)	29% (4)
Sweden	11% (3)	15% (4)	22% (6)	15% (4)
The Netherlands	0% (0)	0% (0)	0% (0)	0% (0)
The UK	8% (4)	12% (6)	38% (19)	8% (4)

Table 4 shows that quite a few countries have little research on learning online (Bulgaria, Czech Republic, France, Iceland, Poland, Slovenia, the Netherlands), which is perhaps surprising given the overall importance of education as a research discipline and area of study in relation to children and the internet.

Online gaming, identity play and seeking online advice seem to have attracted more attention proportionally in the Nordic countries, although in terms of numbers of studies the UK and Belgium have also addressed the first two of these fields repeatedly.

Table 4: Percentage (number) of studies addressing topics (multicoded) related to children by country (3)

Country	Learning online	Online games	Identity play	Seeking advice online
Austria	0% (0)	10% (2)	5% (1)	0% (0)
Belgium	3% (1)	24% (8)	12% (4)	3% (1)
Bulgaria	0% (0)	14% (1)	14% (1)	14% (1)
Czech Republic	0% (0)	0% (0)	8% (1)	0% (0)
Denmark	32% (6)	32% (6)	47% (9)	26% (5)
Estonia	6% (1)	6% (1)	0% (0)	6% (1)
France	0% (0)	27% (4)	20% (3)	7% (1)
Germany	3% (1)	18% (6)	3% (1)	0% (0)
Greece	31% (9)	7% (2)	3% (1)	3% (1)
Iceland	0% (0)	43% (3)	29% (2)	43% (3)
Norway	41% (7)	47% (8)	47% (8)	29% (5)
Poland	0% (0)	0% (0)	17% (2)	17% (2)
Portugal	32% (6)	16% (3)	21% (4)	5% (1)
Slovenia	0% (0)	0% (0)	0% (0)	0% (0)
Spain	21% (3)	21% (3)	7% (1)	7% (1)
Sweden	15% (4)	44% (12)	26% (7)	30% (8)
The Netherlands	0% (0)	7% (1)	13% (2)	0% (0)
The UK	26% (13)	16% (8)	8% (4)	4% (2)

It is clear in Table 5 that the Nordic countries have also shown relatively more interest in civic/political participation and social networking online, although in terms of numbers of studies, the UK has covered social networking a good deal. It is noteworthy that civic/political participation is not covered at all or covered very little in many of the other countries.

All participating countries have paid attention to gender, although the degree to which they do so varies, Sweden, Denmark and Spain having higher percentages of studies in this field. Finally, regarding studies of the consequences of going online, it seems that most countries had some studies addressing this question (except for Poland). In terms of numbers of studies, UK, Norway and Belgium were the highest.

Table 5: Percentage (number) of studies addressing topics (multicoded) related to children by country (4)

Country	Civic/political participation	Social networking online	Gender differences	Effects of going online
Austria	5% (1)	9% (2)	19% (4)	5% (1)
Belgium	0% (0)	18% (6)	27% (9)	21% (7)
Bulgaria	14% (1)	0% (0)	29% (2)	14% (1)
Czech Republic	8% (1)	33% (4)	42% (5)	25% (3)
Denmark	21% (4)	47% (9)	53% (10)	47% (9)
Estonia	0% (0)	0% (0)	6% (1)	6% (1)
France	0% (0)	27% (4)	27% (4)	13% (2)
Germany	0% (0)	3% (1)	18% (6)	6% (2)
Greece	0% (0)	7% (2)	14% (4)	7% (2)
Iceland	29% (2)	43% (3)	43% (3)	29% (2)
Norway	29% (5)	47% (8)	29% (5)	47% (8)
Poland	0% (0)	17% (2)	42% (5)	0% (0)
Portugal	5% (1)	32% (6)	16% (3)	16% (3)
Slovenia	9% (1)	0% (0)	18% (2)	0% (0)
Spain	0% (0)	29% (4)	50% (7)	21% (3)
Sweden	15% (4)	59% (16)	48% (13)	15% (4)
The Netherlands	0% (0)	27% (4)	20% (3)	27% (4)
The UK	4% (2)	22% (11)	8% (4)	24% (12)

Table 6 shows that all countries had several studies concerned with parents' knowledge of their children's internet usage and parents' style of regulating their children's use. In general there were fewer studies in each country regarding children's response to regulation, and some countries did not cover this at all. Nor was it just the countries with few overall studies that did not cover this topic (e.g. it was not addressed in Austria, Estonia, Greece and the Netherlands). The majority of countries had some data on parents' media/information literacy.

Table 6: Percentage (number) of studies addressing topics (multicoded) related to parents (and children's response to parents) by country (1)

Country	Parents' knowledge	Parents' styles of regulation	Children's responses to regulation	Parents' Media/Information Literacy
Austria	14% (3)	24% (5)	0% (0)	0% (0)
Belgium	12% (4)	18% (6)	12% (4)	6% (2)
Bulgaria	43% (3)	29% (2)	0% (0)	29% (2)
Czech Republic	25% (3)	17% (2)	0% (0)	0% (0)
Denmark	26% (5)	26% (5)	11% (2)	16% (3)
Estonia	12% (2)	12% (2)	0% (0)	0% (0)
France	27% (4)	27% (4)	13% (2)	13% (2)
Germany	27% (9)	24% (8)	6% (2)	6% (2)
Greece	10% (3)	10% (3)	0% (0)	0% (0)
Iceland	29% (2)	29% (2)	29% (2)	29% (2)
Norway	41% (7)	47% (8)	29% (5)	41% (2)
Poland	25% (3)	42% (5)	8% (1)	0% (0)
Portugal	16% (3)	16% (3)	5% (1)	5% (1)
Slovenia	18% (2)	27% (3)	0% (0)	9% (1)
Spain	21% (3)	29% (4)	7% (1)	7% (1)
Sweden	26% (7)	30% (8)	7% (2)	7% (2)
The Netherlands	20% (3)	20% (3)	0% (0)	0% (0)
The UK	24% (12)	40% (20)	20% (10)	8% (4)

Once again, in Table 7, all participating countries had some studies of parents' awareness of online risks, with quite a few studies in the UK on this topic. There was more mixed coverage of the effectiveness of filters, with about half the countries researching this.

Table 7: Percentage (and number) of studies addressing topics (multicoded) related to parents (and children's response to parents) by country (2)

Country	Parents' awareness of online risks	Effectiveness of filters or other technical means
Austria	10% (2)	0% (0)
Belgium	15% (5)	6% (2)
Bulgaria	29% (2)	0% (0)
Czech Republic	17% (2)	0% (0)
Denmark	26% (5)	11% (2)
Estonia	6% (1)	0% (0)
France	13% (2)	0% (0)
Germany	21% (7)	12% (4)
Greece	7% (2)	3% (1)
Iceland	29% (2)	29% (2)
Norway	24% (4)	35% (6)
Poland	17% (2)	0% (0)
Portugal	5% (1)	0% (0)
Slovenia	18% (2)	0% (0)
Spain	7% (1)	0% (0)
Sweden	19% (5)	15% (4)
The Netherlands	13% (2)	7% (1)
The UK	20% (10)	8% (4)

Lastly, Table 8 shows that a majority of participating countries had studies that addressed parents' attitudes to technology and parents' concerns about online technologies, with the UK having the greatest number of studies in both cases. All countries had (usually several) studies examining parents' competencies, with the UK again having the most studies.

Table 8: Percentage (and number) of studies addressing topics (multicoded) related to parents (and children's response to parents) by country (3)

Country	Parents' attitudes to online technologies	Parents' concerns about online technologies	Parents' competencies
Austria	5% (1)	5% (1)	14% (3)
Belgium	12% (4)	12% (4)	12% (4)
Bulgaria	14% (1)	29% (2)	43% (3)
Czech Republic	0% (0)	8% (1)	17% (2)
Denmark	16% (3)	16% (3)	16% (3)
Estonia	0% (0)	0% (0)	12% (2)
France	7% (1)	7% (1)	20% (3)
Germany	15% (5)	12% (4)	9% (3)
Greece	0% (0)	3% (1)	14% (4)
Iceland	14% (1)	14% (1)	14% (1)
Norway	24% (4)	29% (5)	24% (4)
Poland	0% (0)	0% (0)	17% (2)
Portugal	11% (2)	5% (1)	16% (3)
Slovenia	0% (0)	18% (2)	18% (2)
Spain	7% (1)	0% (0)	21% (3)
Sweden	11% (3)	11% (3)	15% (4)
The Netherlands	7% (1)	7% (1)	13% (2)
The UK	16% (8)	20% (10)	20% (10)

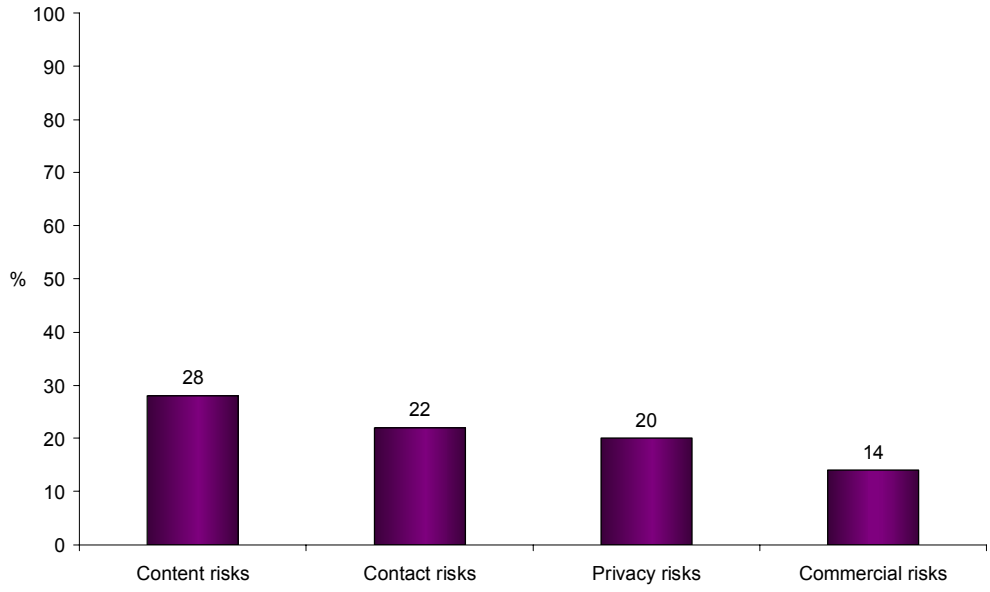
3.3 Risks encountered

EU Kids Online was specifically interested in identifying research looking at online risk in relation to children. The available research was coded for its inclusion of a range of possible risks. These risks were classified into four broad categories (frequencies of studies are in brackets):

- Content risks – exposure to illegal content (34 studies), exposure to harmful content (43), encountering sexual/violent/racist/hate material (38), misinformation (18) (problematic) user-generated content (14), challenging content (e.g. suicide, anorexia, drugs, etc.) (8)
- Contact risks – contact with strangers (44), cyberbullying (28)
- Commercial risks – advertising/commercial exploitation (21), illegal downloading (20), gambling (9)
- Privacy risks – giving out personal information (37), invasion of privacy (24) , hacking (14)

Figure 9 shows that the most researched risks are content-related and the least researched risks are commercial.

Figure 9: Percentages of studies covering different risks (multicoded)



There is some national variation in research on risks, as shown in Table 9. In the UK, approximately half of the studies identified addressed online risks, whereas there was little research on risks in some countries like Estonia. The German report noted that there was surprisingly little research on risk. Several reports (e.g. Greece, Bulgaria, Belgium) noted that the area of risks online was relatively new in their countries.

Table 9 shows that, nonetheless, content risks have been researched at least minimally in all countries, with more detailed information available in some countries (e.g. Norway and the UK). A similar pattern holds true for contact risks, although Estonia had no studies and several countries had only one. Norway and Denmark had slightly more studies of commercial risks, and many countries had only one such study (with none in the Netherlands). Finally, in the UK and Norway there were more studies of privacy risks, several countries had only one and there were none in Estonia and the Netherlands.

The Norwegian report noted that research on risks tends to be more concerned with mapping and quantifying risks than asking why children exhibit risky behaviour online. And there is little on the consequences of risk experiences online.

Table 9: Country by types of risk (multicoded) (number of studies)

Country	Content Risks	Contact Risks	Commercial Risks	Privacy Risks
Austria	5	1	1	2
Belgium	6	3	4	6
Bulgaria	4	1	1	2
Czech Republic	2	2	1	1
Denmark	7	3	5	5
Estonia	2	0	1	0
France	6	4	2	2
Germany	5	3	1	5
Greece	6	2	3	4
Iceland	3	2	3	2
Norway	12	9	7	9
Poland	6	4	1	2
Portugal	5	1	1	1
Slovenia	5	1	1	1
Spain	6	2	2	3
Sweden	7	6	4	3
The Netherlands	5	1	0	0
The UK	14	15	3	9

Do the risks researched vary by age of respondent? Table 10 shows that of the 18 studies researching very young children (0-5), few have addressed risk. For 6-8 year olds, there is more work on privacy and content risks, though less than for older children and teenagers, and there is little on contact risks. Contact risks are particularly researched for 12-17 year olds, with less attention to these risks for over 18s. For those aged 9+, privacy is a concern for research across the age range, as are content risks (which receive more attention).

Overall, given the policy attention currently being paid to questions of online risk and of both children's and parents' media literacy (or safety awareness), the scarcity of research on these issues is noteworthy. Though this report is unable to consider the nature and depth of the research conducted, it appears that in many countries, research is relatively 'thin' in terms of considering forms, contexts and consequences of online risk exposure among children in Europe.

Table 10: Percentage (numbers) of studies of types of risk by age (multicoded for risks and age)

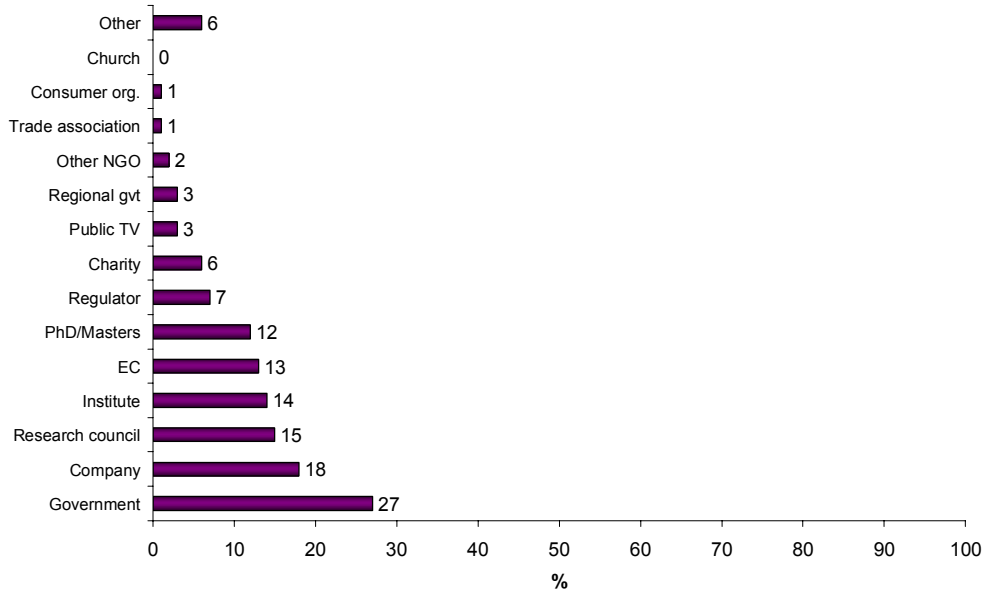
Risk	0-5	6-8	9-11	12-14	15-17	18+
Privacy	11% (2)	21% (11)	35% (23)	24% (39)	24% (40)	18% (19)
Commercialism	11% (2)	13% (7)	15% (17)	17% (28)	16% (27)	11% (12)
Contact	6% (1)	15% (8)	27% (30)	27% (44)	26% (43)	18% (19)
Content	11% (2)	25% (13)	33% (37)	32% (53)	32% (54)	24% (26)
N	18	53	111	165	168	107

3.4 Funding and origins of research

The source of funding can shape the research agenda (its relation to policy, commercial and academic concerns) and the specific questions addressed. It may also influence the nature of the research. Commercial market research often emphasises the latest figures, providing a descriptive snapshot of the current situation without a framework for understanding the phenomenon. Research council funders would expect a theoretical framework to be provided and require the research to be accountable and accessible (e.g. the researchers should supply the data, questionnaires, etc. on request). Commercial (and some other types of) research might stress what is practical on a budget whereas academic research more usually stresses what is theoretically important.

For some studies (15 studies, 6%) the funding source could not be determined. Where available, funding sources were coded as shown in Figure 10. National Government studies were the largest group, followed by those funded by commercial companies. National research councils, research institutes, the EC, and PhD/Masters theses constituted the next most important grouping of funders. Other funders included regulators, charities (e.g. youth organisations, NGOs such as Save the Children), public broadcasters, regional Government, trade associations and consumer organisations (and one church funded study).

Figure 10: Sources of funding for studies (multicoded)



When examined by country (Table 11), it seems that for all participating countries, some studies are funded by the Government directly (e.g. a ministry) or by the EC; in some countries this accounts for half of all funding. Fewer studies are funded by national research councils, and in some countries they play no role (whereas in the Netherlands they accounted for a third of studies). The regulator is mainly important in Norway and the UK, and in the majority of countries plays little role.

Table 11: Funding for research (multicoded) by percentage (and number) of studies in different countries (1)

Country	National Government/Ministry	Research Council	EC	Regulator
Austria	24% (5)	0% (0)	29% (6)	0% (0)
Belgium	15% (5)	6% (2)	27% (9)	3% (1)
Bulgaria	14% (1)	0% (0)	57% (4)	0% (0)
Czech Republic	42% (5)	8% (1)	50% (6)	0% (0)
Denmark	21% (4)	11% (2)	53% (10)	0% (0)
Estonia	18% (3)	0% (0)	36% (6)	0% (0)
France	33% (5)	13% (2)	47% (7)	7% (1)
Germany	24% (8)	15% (5)	15% (5)	9% (3)
Greece	45% (13)	0% (0)	52% (15)	0% (0)
Iceland	14% (1)	14% (1)	71% (5)	0% (0)
Norway	29% (5)	18% (3)	47% (8)	35% (6)
Poland	25% (3)	8% (1)	50% (6)	0% (0)
Portugal	11% (2)	5% (1)	37% (7)	0% (0)
Slovenia	46% (5)	0% (0)	46% (5)	0% (0)
Spain	50% (7)	0% (0)	43% (6)	0% (0)
Sweden	19% (5)	4% (1)	30% (8)	4% (1)
The Netherlands	7% (1)	33% (5)	33% (5)	7% (1)
The UK	14% (7)	26% (13)	14% (7)	14% (7)

Table 12 shows that in most countries trade associations are research funders, while commercial companies (ISPs, commercial broadcasters, etc) are more important in some countries (e.g. Germany, UK) than others. Charities play a significant role in the UK but have not funded studies in most other countries. The influence of research institutes varied, ranging from funding roughly a quarter of studies in some countries to funding no research in others.

Table 12: Funding for research (multicoded) by percentage (and number) of studies in different countries (2)

Country	Trade Association	Commercial Company	Charity	Research Institute
Austria	5% (1)	0% (0)	0% (0)	10% (2)
Belgium	3% (1)	15% (5)	3% (1)	24% (8)
Bulgaria	0% (0)	0% (0)	0% (0)	0% (0)
Czech Republic	8% (1)	0% (0)	0% (0)	8% (1)
Denmark	5% (1)	16% (3)	0% (0)	0% (0)
Estonia	6% (1)	0% (0)	0% (0)	29% (5)
France	7% (1)	13% (2)	0% (0)	7% (1)
Germany	3% (1)	46% (15)	0% (0)	6% (2)
Greece	3% (1)	3% (1)	0% (0)	0% (0)
Iceland	14% (1)	29% (2)	0% (0)	0% (0)
Norway	6% (1)	12% (2)	0% (0)	6% (1)
Poland	8% (1)	8% (1)	0% (0)	25% (3)
Portugal	0% (0)	0% (0)	0% (0)	21% (4)
Slovenia	9% (1)	0% (0)	0% (0)	0% (0)
Spain	7% (1)	14% (2)	7% (1)	14% (2)
Sweden	4% (1)	11% (3)	0% (0)	4% (1)
The Netherlands	7% (1)	13% (2)	0% (0)	7% (1)
The UK	4% (2)	34% (17)	22% (11)	10% (5)

Table 13 shows that the significance of PhD and masters' theses varies. In part, this reflects the collection policy – for example, there were so many other studies to be found in the UK that less effort was made to track down this source. But clearly this type of research was important in Portugal, then Sweden and Austria.[21] Public broadcasters only funded a few studies, notably in the UK and Belgium. Consumer organisations did not fund studies except for two in Belgium. Other NGOs funded just a few studies in some countries.

Table 13: Funding for research (multicoded) by percentage (and number) of studies in different countries (3)

Country	PhD/Masters Research	Public TV	Consumer Organisation	Other NGO/Non-profit org.
Austria	19% (4)	0% (0)	0% (0)	0% (0)
Belgium	6% (2)	9% (3)	6% (2)	3% (1)
Bulgaria	0% (0)	0% (0)	0% (0)	0% (0)
Czech Republic	0% (0)	0% (0)	0% (0)	0% (0)
Denmark	11% (2)	0% (0)	0% (0)	0% (0)
Estonia	0% (0)	0% (0)	0% (0)	0% (0)
France	7% (1)	0% (0)	0% (0)	0% (0)
Germany	0% (0)	3% (1)	0% (0)	0% (0)
Greece	0% (0)	0% (0)	0% (0)	0% (0)
Iceland	0% (0)	0% (0)	0% (0)	0% (0)
Norway	6% (1)	0% (0)	0% (0)	0% (0)
Poland	0% (0)	0% (0)	0% (0)	8% (1)
Portugal	47% (9)	0% (0)	0% (0)	0% (0)
Slovenia	0% (0)	0% (0)	0% (0)	9% (1)
Spain	0% (0)	0% (0)	0% (0)	0% (0)
Sweden	30% (8)	0% (0)	0% (0)	0% (0)
The Netherlands	7% (1)	0% (0)	0% (0)	0% (0)
The UK	0% (0)	8% (4)	0% (0)	4% (2)

Lastly, Table 14 shows that regional government funded a few studies in a few countries. The Church only funded one study (in Austria). Within government-funded studies there is also some variation, with education ministries being likely to fund educationally-oriented research such as learning online (e.g. in the Netherlands).

Table 14: Funding for research (multicoded) by percentage (and number) of studies in different countries (4)

Country	Regional Government	Church	Other
Austria	14% (3)	5% (1)	5% (1)
Belgium	3% (1)	0% (0)	3% (1)
Bulgaria	0% (0)	0% (0)	29% (2)
Czech Republic	0% (0)	0% (0)	0% (0)
Denmark	0% (0)	0% (0)	16% (3)
Estonia	0% (0)	0% (0)	0% (0)
France	0% (0)	0% (0)	0% (0)
Germany	0% (0)	0% (0)	9% (3)
Greece	0% (0)	0% (0)	3% (1)
Iceland	0% (0)	0% (0)	0% (0)
Norway	0% (0)	0% (0)	0% (0)
Poland	0% (0)	0% (0)	0% (0)
Portugal	5% (1)	0% (0)	0% (0)
Slovenia	9% (1)	0% (0)	0% (0)
Spain	0% (0)	0% (0)	7% (1)
Sweden	3% (1)	0% (0)	11% (3)
The Netherlands	0% (0)	0% (0)	0% (0)
The UK	0% (0)	0% (0)	0% (0)

Studies funded by the government, the regulator, research institutes and the national research council do consider some risks, but most are more orientated to the potentially positive aspects of the internet (e.g. for learning, creating content, social networking, etc). Similarly, academic research considers some risk but generally seeks to contextualise this within a broader focus on contexts and consequences of use. Whatever the focus, most studies generally collect basic information about internet access, usage, skills and interests.

Table 15 shows the main funders in rank order for key topics (the blank cells mean that, although there may be other funders, there is no discernable pattern in funding). It seems that governments are the main funder for most research topics. Companies are also prominent in many areas, but not in all topics (e.g. interpreting online content and identity play). PhDs and Masters theses seem to focus more on certain topics: social networking, identity play, and interpreting online content.

Specifically as regards risks, governments are the most important funders, followed by the EC, Research Councils and companies. The regulators and charities are also important, overall the latter being more focused on contact risks.[22] Several countries had studies specifically funded by participants associated with, but not always funded by, the Safer Internet Plus Programme (Czech Republic, Spain, Belgium).

Table 15: Topics (multicoded) covered by main research funders (number of studies)

Topic	Rank 1	Rank 2	Rank 3	Rank 4	Rank 5
Interpreting online content	EC (9)	Institute (6)	Govt (5) Reg (5) Student (5)		
Creating online content	Govt (9)	Council (7)	EC (6)	Reg (5) Company (5)	
Online gaming	Govt (15)	Council (10) Company (10)		EC (7)	
Identity Play	Govt (9) EC (9) Council (9) Student (9)				
Social Networking	Govt (22)	Council (18)	Student (13)	EC (9)	
Concerns/ frustrations	Govt (14)	Company (13)	EC (11) Institute (11)		
Search Strategies	Govt (9)	Company (8)	EC (11)		
Online Learning	Govt (12)	Council (11)	Institute (9)	EC (8) Company (8) Student (8)	
Content Risks	Govt (18)	EC (11) Council (11)		Company (10)	Reg (9)
Contact Risks	Govt (17)	Company (13)	Council (10)	EC (9)	Charity (8)
Commercial Risks	Govt (12)	EC (9)	Company (9)	Institute (6)	Council (5) Reg (5)
Privacy Risks	Govt (15)	Company (13)	EC (11)	Council (8) Institute (8)	

Note: EC = EC; Govt = National Government; Council = National Research Councils; Institute = Research Institutes; Reg = Regulators; Student = Student Doctorate/Masters Project; Company = Commercial Companies; Charity – Charities.

3.5 Academic disciplines

Different academic disciplines contextualise the data differently. They ask different questions and work with different frameworks of analysis. For example, psychology often focuses on attitudes, beliefs, behaviour and emotions while sociology examines the importance of contexts of family, peers, school, etc. In part, the national picture for research on children's online use and risk may vary because in different countries this field is incorporated within different disciplines – sociology, child development, pedagogy, media studies, and many others. However, with access only to the research reports, the EU Kids Online network decided it was too difficult to identify disciplinary backgrounds systematically, especially for multidisciplinary project teams.

It did appear, however, that much of the research is conducted by those in education departments, often informed by a background in information or psychology. For example, this typifies the Portuguese research; in the UK media studies is equally common, though this field is underdeveloped in the Czech Republic. The notion that different disciplines can lead to different foci was well exemplified in the case of Belgium: media and communication research tended to deal with access, use, skills and consequences; sociological studies were more interested in social inequality, stratification, social pressures relating to the internet; and pedagogy dealt mainly with risks and strategies to cope with this.

For research conducted by market research companies, typically commissioned by commercial or child welfare agencies or conducted by the market research companies themselves, there was no generally discernable research or disciplinary framework guiding the study; rather, these studies repeat tried-and-tested questions, or questions that arise from public or policy debates, resulting in a snap-shot of current trends but with less value in terms of generating a longer term understanding of children's relation to the internet.

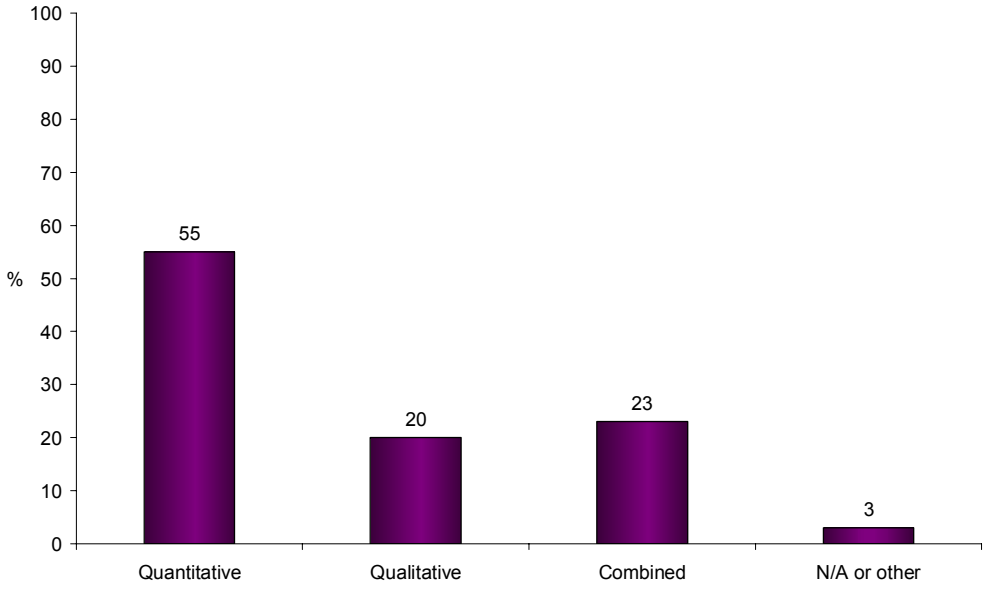
3.6 Research methodology

Quantitative and qualitative research methodologies make different assumptions, use different methods, rely on different criteria for reliability and validity, and produce different kinds of findings (as developed in Work Package 4).

Broadly, quantitative research makes a claim to be representative of the population, it asserts that it uses reliable and valid measuring tools and promises statistical analysis of relationships between variables. Qualitative research does not claim to be representative, but instead seeks to capture the diversity of a phenomenon. It does not work with numbers but works with observations and verbal data, seeking richness in the analysis and providing a voice to those being researched.

For some reports, often where only a summary is available, it was not possible to determine many details of the methods used (3%). For the most part, methods could be classified as either qualitative, quantitative or some combination thereof. Figure 11 shows that quantitative research predominates, followed by a combination of quantitative and qualitative methods and, only slightly less common, qualitative research.

Figure 11: Percentage of studies employing each research methodology



Most quantitative studies are paper-self-completion, face-to-face surveys come second and telephone interviews third. The majority (70 per cent) of quantitative studies involve representative samples although this partly reflects the fact that these include general surveys of access and basic use. However, one has to be careful as regards what 'representative' means in this context. Commercial research often uses quotas for gender and age, though they may not be representative in other ways (though they can be weighted to the national population). There are fewer random probability samples, because these are more expensive.

Sample sizes also vary, especially for PhD or Masters' theses, and they may not cover the entire nation (c.f. Belgian report). Note also that in some cases, it is schools rather than households or individuals that have been sampled (e.g. Belgium, the Netherlands).

There are only two examples of a longitudinal study currently under way (both in the Netherlands[23]), although there are examples where studies are repeated.[24]

The PhD/masters' studies tended to be qualitative, the research by institutes was fairly balanced between qualitative and quantitative, but for all other types of funder, quantitative research predominated.

Table 16 shows that of the studies collected and examined, in only the Netherlands and Iceland are there no qualitative studies at all. Usually quantitative studies count for over half of the total number of national studies, apart from Denmark, France and Portugal, where a greater proportion of studies combine qualitative and quantitative approaches.

Table 16: Research methodologies by country; percentage (numbers) of studies

Country	Qualitative	Quantitative	Combined	0ther or N/A	
Austria	19% (4)	81% (17)	0% (0)	0% (0)	100%
Belgium	21% (7)	52% (17)	27% (9)	0% (0)	100%
Bulgaria	0% (0)	57% (4)	43% (3)	0% (0)	100%
Czech Republic	8% (1)	92% (11)	0% (0)	0% (0)	100%
Denmark	11% (2)	42% (8)	47% (9)	0% (0)	100%
Estonia	18% (3)	65% (11)	18% (3)	0% (0)	101%
France	7% (1)	47% (7)	47% (7)	0% (0)	101%
Germany	9% (3)	76% (25)	18% (5)	0% (0)	100%
Greece	7% (2)	69% (2)	7% (2)	17% (5)	100%
Iceland	0% (0)	100% (7)	0% (0)	0% (0)	100%
Norway	29% (5)	65% (11)	6% (1)	0% (0)	100%
Poland	0% (0)	83% (10)	17% (2)	0% (0)	100%
Portugal	21% (4)	32% (6)	47% (9)	0% (0)	100%
Slovenia	0% (0)	91% (10)	9% (1)	0% (0)	100%
Spain	0% (0)	86% (12)	14% (2)	0% (0)	100%
Sweden	30% (8)	59% (16)	7% (2)	4% (1)	100%
The Netherlands	0% (0)	100% (15)	0% (0)	0% (0)	100%
The UK	16% (8)	60% (30)	24% (12)	0% (0)	100%

For research on younger children, qualitative work is more often used, with rather less use of qualitative methods for older teenagers (see Table 17).

Does children's age influence the choice of research method? From Table 17 below, it seems that a higher proportion of research on younger children is qualitative (typically, interview or observation-based). For older children and especially older teenagers, quantitative methods (typically survey methods) are more common. One may be puzzled by the use of quantitative methods with very young children, but recall that the studies are coded in terms of the target age group – these studies could rely on surveys of parents reporting on their child's internet use.

The consequence of the bias towards qualitative methods with younger children, understandable as it is in practical terms, is that it becomes more difficult to estimate the frequency of certain practices or uses within the child population or to draw clear comparisons between age, gender or other groupings. The consequence of the relative paucity of qualitative methods with older teenagers is that the findings may lack contextualization or interpretation in terms of the experiences and perceptions of these young people themselves.

Table 17: Research methodology by age (multicoded)

	0-5	6-8	9-11	12-14	15-17	18+	All children
Quantitative	44%	53%	63%	61%	62%	65%	55%
Qualitative	22%	26%	18%	15%	13%	9%	20%
Combined	33%	21%	18%	24%	25%	25%	23%
N/A	0%	0%	1%	0%	0%	1%	2%
Total	99%	100%	100%	100%	100%	100%	100%
N	18	54	111	165	168	107	235

We noted earlier that internet access, usage and online interests and activities are well covered as topics: this may be because they represent standard topics in surveys. This is clear from Table 18 where quantitative studies dominate in relation to these topics, as do skills and gender differences (this last, because information about gender is collected as standard in surveys).

Purely quantitative studies are fewer as regards the topics of interpreting online content and identity play, which might well reflect the fact that qualitative research lends itself to investigating the meanings involved in these two topics. These were also two of the areas where PhD and Masters theses were important, and we suspect that many of these use qualitative methods because these are less expensive than surveys.

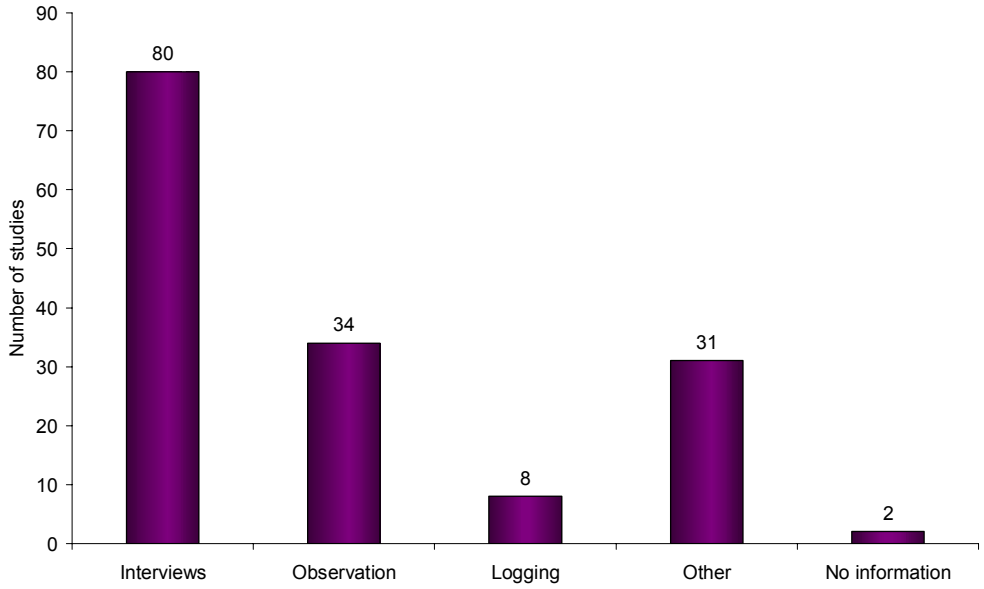
Table 18: Research methodology by topic (multicoded)

	Qualitative	Quantitative	Combined	N/A or other	Total
Online access	8%	62%	29%	2%	101%
Online usage	16%	56%	26%	1%	99%
Online Interests and activities	17%	57%	25%	1%	100%
Online Skills	20%	52%	28%	0%	100%
Interpreting online content	33%	29%	38%	0%	100%
Creating online content	23%	50%	27%	0%	100%
Concerns and frustrations	27%	47%	27%	0%	99%
Strategies for finding things	29%	39%	32%	0%	100%
Learning online	28%	35%	35%	2%	98%
Online games	19%	47%	34%	0%	100%
Identity play	32%	29%	39%	0%	100%
Seeking advice online	19%	52%	26%	4%	101%
Civic/political participation	17%	59%	24%	0%	100%
Social networking online	25%	45%	28%	2%	100%
Gender differences	11%	62%	28%	0%	101%
Effects of going online	20%	35%	45%	0%	100%

Overall, research that is solely qualitative appears to be chosen when an in-depth examination is required, when the research focus is on very young children (as noted above) and when the phenomenon is new and so requires an exploratory approach. The most popular qualitative method was in-depth interviews (rather than, say, ethnographic observations). Other methods included observation, creative experiments, high school essays, drawings, tests and discussions (see the Danish national report).

Figure 12 shows that the most important type of qualitative study was the in-depth interview, but observation, especially of younger children, is also important.

Figure 12: Types of qualitative study (number of studies)



Further observations

A number of national reports made points that may be more widely true across countries. The Portuguese noted that sometimes the research shows less reflexivity than one would have liked (e.g. children's perceptions when adult researchers want to participate in children's activities). The Czech team observed that many studies were descriptive in character (e.g. usage, access) with not as much depth as one would have liked. And the Belgian report pointed to the way that many studies focused on (self-reported) behaviour relating to the internet rather than the meanings of the online experience and how the ICT was embedded in everyday life.

4. Summary and conclusions

This report set out to identify the available empirical evidence regarding children and young people's access to and use of the internet and online technologies across Europe. It does not report on the findings or implications of that research, but our future reports will do just that.

It focused on research concerned with (a) children (up to 18 years old), as well as their parents/families and domestic users generally, (b) online technologies, focusing on issues of use and risk; and (c) the 18 countries in the EU Kids Online network (Annexes A and B).

The aim was to locate the research that exists, scope its main features and biases, identify the key trends and, especially, reveal gaps in the evidence base. This, we hope, is useful for a diversity of research users in academic, policy, funding and other organisations.

The report identified and discussed 235 separate research projects, selected and coded according to criteria of relevance and quality (see Annexes C and D). Please note that our present purpose is to identify patterns and gaps, and that the work of EU Kids Online to locate further research, increasing the comprehensiveness of the repository, is a continuing process.

4.1 Key features of the available research

Though the scale and quality of research studies varies considerable, research exists in all participating countries regarding children and young people's use of the internet and online technologies. Its key feature may be summarised as follows.

A fast-growing but uneven evidence base:

- There is much more research in some countries (especially in Northern Europe) than in others, though there are exceptions.
- The research base is steadily growing and may be expected to grow further and faster in the coming few years.
- Most of the research identified concerns children directly. The majority of this is conducted with teenagers, mirroring the greater use of the internet by teenagers (compared with younger children) across Europe.
- There is also research on parents, teachers and other adults, relevant insofar as this is informative of children's online activities.
- The evidence base largely comprises single nation studies, though some multinational and pan-European research exists.

More research on access and use than on online risk:

- The most researched topics concern children's online access and usage, followed by investigations into a range of their online interests and activities – such research exists in all participating countries.
- Following this, fairly common topics are online skills, social networking, gender, games, consequences of internet use, children's concerns and identity play online.
- Research on parents' mediation of their children's internet use is sparser, but there is some research on parental styles of domestic regulation, on their knowledge, attitudes and concerns regarding children's practices, and on their awareness of risk.

- Research on risk was categorised in terms of content, contact, commercial and privacy risks. The report revealed that such research as exists on risk focuses on content risks, especially exposure to illegal or harmful content, and violent or hateful content, though there is also some work on contact risks.

Research is mainly funded by national governments:

- The body of empirical work identified and discussed in this report has been mainly funded by national governments.
- Commercial companies (e.g. in Germany), national research councils, research institutes and the EC itself are also significant funders, as are regulators in Norway and the UK.
- Indeed, European Commission funding, especially the initiative of the Safer Internet Action plan, has generated a valuable body of multi-national studies that permit direct comparisons across countries.
- For countries where little research has yet been developed, participation in a multi-country study (e.g. funded by the EC) can provide a valuable means of raising an issue within a national research agenda.
- Further, in countries where external funding is sparse, doctoral and masters' theses can be an important source of information (e.g. Portugal, Sweden, Austria).
- The funding source varies by topic researched, with government sources funding a wide range of research topics, academic research being more concerned with the contexts and consequences of online use, commercial companies being more likely to research the negative than the positive dimensions of use, and regulators and charities (insofar as they do fund research), mainly focusing on risk.

Theories and methods:

- In terms of academic discipline, much research has been conducted by departments of education, information or psychology, though this varies considerable across countries, and is not always easy to determine from published reports.
- We suggest that multidisciplinary research teams can best generate a multidimensional picture of children's internet use in context, and we express some concern at the proportion of market-research conducted studies that are descriptive rather than analytic.
- Choice of research methodology also shapes the available findings. Overwhelmingly, most research is quantitative, thus emphasising the frequency and distribution of certain activities across a population or sub-sectors thereof.
- Much less research is qualitative or multi-method in nature, meaning that we have less understanding of children's own experiences or perceptions or of the ways in which online activities are contextualised within their everyday lives.
- Non-academic projects are especially likely to be quantitative, and in some countries little qualitative research was identified (e.g. The Netherlands, Iceland) though in a few countries, multi-method research predominates (e.g. Denmark, France, Portugal).
- Unsurprisingly perhaps, a higher proportion of the research on younger children is qualitative in nature.

Most research is readily available:

- The internet is itself the main route by which research findings are disseminated, easing the accessibility of research findings.
- However, relatively few studies are reported in high quality academic publications, and we note that typically these latter provide critical scrutiny via a process of peer review.
- In some cases, the absence of vital information makes it difficult to evaluate (or even include) a study.

4.2 Significant gaps in the evidence base

The 235 studies identified, when spread across 18 or more countries, a wide age range and many different research topics, makes for many gaps in the evidence base. In the points below, we emphasise the most important of these, and hope this provides a guide to future research commissioning and conduct.[25]

Note, however, that the absence of empirical research on a particular topic, for a particular group or in a particular country does not necessary point to a significant gap. One country may learn from the experience of another. Occasionally, there is more research than really needed on one topic, making another seem neglected by comparison.

Uneven coverage by age:

- Children of primary school age, and even younger, are increasingly gaining access to the internet, yet most research concerns teenagers.
- Increasing the body of research on children younger than 12 is now a priority, since their activities may challenge their maturity to cope with unanticipated risk.
- Notably, disproportionately little of the research on younger children addresses questions of online risk.

Overwhelming focus on the fixed internet:

- Most research regarding online technologies is focused on the fixed internet. New, interactive, online media accessed via mobile, games console, convergent devices etc raise new questions and challenges for research and policy.
- Much research also concerns the nature and use of websites rather than more interactive, peer-to-peer, multi-user applications accessed via convergent platforms and emerging technologies (i.e. most evidence is largely focused on web 1.0 rather than web 2.0).
- As children gain access to the internet and online opportunities through other platforms than the PC, it will be vital that research quickly examines their practices, addressing questions of risk and safety, parental mediation and media literacy.

Issues little covered regarding children's online activities:

- There are particular gaps in the evidence base in some countries, mainly those in which research is overall rather sparse. Certain relatively neglected online activities require further research attention, specifically questions of
  - civic participation, important for redressing the supposed political apathy of youth
  - the interpretation and evaluation of online content, important for media literacy
  - content creation, important for identity, expression and creativity
  - certain kinds of search, e.g. for advice.
- As regards media literacy for online technologies, the research is more informative regarding children's abilities to access and use online resources than it is for the important abilities to critically evaluate what they find or, indeed, to create content of their own choosing.
- There are some notable gaps in some countries:
  - research on the interpretation of, creation of, and frustrations with online content is particularly needed in Bulgaria, the Czech Republic, Slovenia and, perhaps more surprisingly, in Germany and The Netherlands, where otherwise there is a good body of research

- the Nordic countries pay more attention to civic participation, communication and gender, though there are exceptions to this; these are all, surely, priorities for research in other countries
- such research on social networking as exists appears concentrated in just a few countries (Sweden, the UK, Denmark, Norway)
- many countries lack an evidence base regarding online learning, while entertainment activities seem more researched in Northern Europe than elsewhere.

Gaps in the evidence for exposure to online risk:

- Research on content and contact risks is lacking in some countries, and it requires updating and deepening in most or all countries.
- While there is a fair body of research on content, contact and privacy risks, there is much less on commercial risks. Yet, for audiovisual and other media, exposure to advertising, product placement, sponsorship and other commercial messages has long been of concern. This expertise should now be developed for children's exposure to online commercial content.
- Certain risks have still been relatively little researched, despite their importance on the public agenda. These include exposure to challenging content (e.g. suicide, anorexia, drugs, etc.), risks associated with user-generated content and online gambling.
- There is also relatively little research on how children (or parents) cope with or respond to online risk, with effort devoted to the incidence more than the consequences, or coping strategies, or long term effects of exposure to risk.
- Some other gaps in research on risk are noted: little in Estonia, the Netherlands, the Czech Republic, Portugal or Slovenia on privacy risks; little also in many of these countries (and also in Bulgaria and Austria) on contact risks.
- It may be that research conducted elsewhere can effectively guide the promotion of safety awareness even in countries where little research exists. But in general, we suggest that reporting findings regarding risk in one's own country is an effective means of raising awareness.

Gaps regarding the role of parents and teachers:

- Research on the role of parents in mediating children's internet use is lacking in a number of countries, and research on the effectiveness of parental mediation is lacking in most.
- Too often, questions are asked regarding parental regulation only of parents, neglecting children's responses to such regulation. Yet when research addresses both parents and children, the discrepancies in their accounts highlights the importance of understanding children's own experiences.
- Where research charts parental and children's attitudes or concerns in general, it rarely explores the effectiveness of particular safety measures (e.g. use of filtering software or, even, parental media literacy).
- In the future, research should examine whether and when parents put safety guidance into practice, along with an evaluation of any benefits.
- Similar observations may be made regarding the mediating role of teachers – more research is needed on teachers' skills and literacy, their mediating practices in the classroom, and the effectiveness of their role in improving children's risk awareness and online safety.

4.3 Emerging issues and challenges

Last, we note some of the emerging issues and challenges for this new and often demanding field of research.

Time-sensitivity

- Research in this field becomes quickly out of date, as the technologies, institutions that promote and manage them, and children's own practices all continue to change. Consequently, even where substantial amounts of research exist, the findings must be regularly updated.
- It may be argued that this is a particularly transitional moment, as today's children are growing up with web 2.0 at the same time that much of adult society is still struggling with some basic issues of access and use. We greatly need multi-national research, in which one country may learn from another where appropriate, but in which the specificities of diverse economic, cultural and social contexts are also recognised.
- We found only two, current, longitudinal studies, most research being concerned simply with the short term nature and consequences of internet use. Some studies are repeated a few years apart, providing the possibility of trend analysis. But more tracking studies are required to understand the wider implications of online technologies in the long term.
- The research agenda remains also at some distance from the policy agenda: many studies identify problems and conclude that something must be done, but they often do not focus on, or evaluate the options for, particular policy solutions. While this creates a generalised sense of concern without effectively guiding the policy agenda, we note also that determining exactly what policy windows are open at any point in time is not always made easy for or accessible to the research community.

Theories, methods and standards of research

- Children's internet use, especially regarding online risks, is a complex phenomenon. Regarding research theories and methods, we advocate the importance of multiple theoretical perspectives and multiple methods, so that the various dimensions of children's internet use can be understood in the round – including both the incidence of certain practices in the population, as well as children's own perceptions, those of their parents, and how both these fit within the context of everyday internet use.
- Although multidisciplinary, multimethod, contextual, and longitudinal research is particularly demanding, it remains sorely needed if we are to understand not only what children encounter online but also why, how and with what consequences.
- Research is sometimes poorly reported, with key information missing, or it is difficult to gain access to. There is scope for improving the quality, rigour and public accessibility of research evidence in this field.
- Interpreting findings in this field commonly draws on comparisons between offline (real-world) and online activities or risks when, say, arguing that the former are migrating to the latter, or that the latter are increasing faster than the former. Yet in the vast majority of cases, research on online activities and risks pays little attention to children's lives offline (e.g. their social networks, their parenting, their attitudes to risk-taking or coping with psychological distress). This greatly impedes our ability to draw conclusions from the research that exists, and so represents a methodological, practical and theoretical challenge.

A sensitive and difficult field of research

- The risk agenda remains largely led by adult society, even by media-spread moral panics, and so focuses on pornography, stranger contact, violence, etc. It is insufficiently led by objective evidence of actual harm, whether criminal (e.g. incidence of sexual abuse or

criminal abduction) or medical (e.g. incidence of youth suicide or self harm attempts). It is also insufficiently reflective of children and young people's own agenda of concerns (in which bullying, identity abuse, spam and race hate would figure much higher than pornography or even stranger danger).

- Moreover, it is inherent to childhood and especially adolescence to take risks, push boundaries and evade adult scrutiny, this challenging both the research process and the uses of the research findings.
- It must be recognised that the need for more research on younger children raises some significant challenges regarding research funding, methodology and research ethics (e.g. regarding exposure to 'adult' content), as does research on the private nature of much online activity.
- More discrimination is needed regarding the nature of children's online activities and resources to differentiate, notably, different kinds of pornographic or violent content, and to identify the contexts within which harassing or unwelcome contact (e.g. within a chatroom, a multiplayer game, a social networking site, by email, etc) is experienced.
- We conclude that research must follow use – tracking online activities for new populations, younger users, new risks, and so forth. Much depends on the researchers' grasp of children's experiences, including their approach to risk, for in many respects, children do not draw the line between risks and opportunities in the same way that adults do.

Annex A: EU Kids Online

European Research on Children's Safe Use of the Internet and New Media, see www.eukidsonline.net

EU Kids Online is a thematic network examining European research on cultural, contextual and risk issues in children's safe use of the internet and new media between 2006 and 2009. This network is not funded to conduct new empirical research but rather to identify, compare and draw conclusions from existing and ongoing research across Europe.

It is funded by the European Commission's Safer Internet plus Programme (see http://europa.eu.int/information_society/activities/sip/index_en.htm) and coordinated by the Department of Media and Communications at the London School of Economics, guided by an International Advisory Board and liaison with national policy/NGO advisors.

EU Kids Online encompasses research teams in 18 member states, selected to span the diversity of country and of academic discipline or research specialism: Austria, Belgium, Bulgaria, Czech Republic, Denmark, Estonia, France, Germany, Greece, Iceland, Norway, Poland, Portugal, Slovenia, Spain, Sweden, The Netherlands and The United Kingdom.

The objectives, to be achieved via seven work packages, are:

- To identify and evaluate available data on children's and families' use of the internet and new online technologies, noting gaps in the evidence base (WP1)
- To understand the research in context and inform the research agenda (WP2)
- To compare findings across diverse European countries, so as to identify risks and safety concerns, their distribution, significance and consequences (WP3)
- To understand these risks in the context of the changing media environment, cultural contexts of childhood and family, and regulatory/policy contexts (WP2&3)
- To enhance the understanding of methodological issues and challenges involved in studying children, online technologies, and cross-national comparisons (WP4)
- To develop evidence-based policy recommendations for awareness-raising, media literacy and other actions to promote safer use of the internet/online technologies (WP5)
- To network researchers across Europe to share and compare data, findings, theory, disciplines, methodological approaches, etc. (WP1-7)

Main outputs are planned as follows:

- *Data Repository*: a public, searchable resource for empirical research (now online)
- Report on *Data Availability*: a mapping of what is known and not known (Sept 2007)
- Preliminary Report *Comparing Three Countries* (Sept 2007)
- *Methodological Issues Review* (Sept 2007)
- Report on *Cross-National Comparisons* over 18 Countries (Sept 2008)
- *Best Practice Research Guide* (for future research in this field; Sept 2008)
- Report: *Cross-Cultural Contexts of Research* (March 2009)
- *Final Conference* (June 2009)
- Report: *Summary and Recommendations* (June 2009)
- *Final Report* and *Book* (Sept 2009)

For further information, see www.eukidsonline.net or contact p.tsatsou@lse.ac.uk

Annex B: Network Members

Country	Institution	Researchers
Austria	**University of Salzburg**	**Ingrid Paus-Hasebrink**
		Christina Ortner
		Eva Hammerer
		Manfred Rathmoser
Belgium	**Catholic University of Leuven**	**Veerle Van Rompaey**
		Verónica Donoso
	Free University of Brussels	**Nico Carpentier**
		Katia Segers
		Joke Bauwens
Bulgaria	GERT	Jivka Marinova
		Mariya Gencheva
		Maria Dimitrova
		Ilina Dimitrova
	Internet Rights Bulgaria Foundation	Christina Haralanova
Czech Republic	Masaryk University, Brno	Jaromir Volek
		Vaclav Stetka
	Charles University, Prague	Jan Jirak
		Radim Wolak
		Vlastimil Necas
		Radka Kohuttova
Denmark	University of Copenhagen	Gitte Stald
Estonia	University of Tartu	Veronika Kalmus
		Pille Pruulmann-Vengerfeldt
		Anda Zule
		Andra Siibak
		Pille Runnel
		Kadri Ugur
France	France Telecom	Benoit LeLong
		Cédric Fluckiger
		Céline Metton
Germany	Hans Bredow Institute For Media Research	Uwe Hasebrink
		Claudia Lampert
Greece	London School of Economics	Liza Tsaliki
		John Papadimitriou
Iceland	University of Iceland	Thorbjorn Broddason
		Gudberg K. Jonsson
	University of Akureyri Research Institute	Kjartan Olafsson
Norway	Norwegian University of Science and Technology, Trondheim	Ingunn Hagen
		Thomas Wold
	Norwegian Media Authority	Elisabeth Staksrud
	SINTEF, Oslo	Petter Bae Brandtzæg
Poland	Warsaw School of Social Psychology	Wiesław Godzic
		Barbara Giza
		Lucyna Kirwil
		Tomasz Łysakowski
Portugal	New University of Lisbon	Cristina Ponte
		Cátia Candeias
		José Alberto Simões
		Nelson Viera
	Lisbon University	Tomás Patrocínio

Slovenia	University of Ljubljana	Vasja Vehovar
		Bojana Lobe
		Matej Kovacic
		Alenka Zavbi
Spain	The University of the Basque Country	Carmelo Garitaonandia
		Maialen Garmendia
Sweden	University of Gothenburg	Cecilia von Feilitzen
The Netherlands	The Netherlands Institute of Social Research	Jos de Haan
		Marion Duimel
	University of Amsterdam	Patti Valkenburg
The UK	London School of Economics and Political Science	Sonia Livingstone
		Leslie Haddon
		Panayiota Tsatsou

Annex C: Online Data Repository

Overview

The repository is pan-European, for the national teams that comprise EU Kids Online span the range of European countries, including those from the North, South, East and West of Europe, original Member States and very recent entrants, larger and smaller countries, and those varying by religion, economics, politics and culture. They also span a diverse range of relevant specialisms, including media education, digital literacy, child psychology, youth media, sexuality, media globalisation, adolescence and identity, health communication, legal and regulatory perspectives on online safety and risk, ethical/citizenship dimensions, gender, consumption, family studies, minorities, comparative childhood studies, etc. Research from all 18 countries and many disciplines is included in the Online Data Repository and thus forms the basis for the present review.

EU Kids Online aims to provide access to empirical research projects known to or discussed within academic, policy and public forums. It does not guarantee that all such projects are of a high standard. We welcome any comments or questions regarding the quality of material, or description therefore, included in the repository, and will reconsider/amend entries as appropriate.

Collection Policy for the Data Repository

Purpose: EU Kids Online aims to produce a Data Repository containing summary information about all empirical projects in this field and thereby providing a single location where they can be identified and accessed. This will make it possible for people in any one country to discover what has been researched in another. It will also represent the research base of each country in the network. Thus it will provide the basis for subsequent work packages, permitting the identification of research strengths and gaps, preferred methodologies, key findings, and policy-relevant conclusions.

Unit of analysis: The unit of analysis should be an original empirical research project. It should not be the publication, since there may be several publications associated with one project. Each entry for a project will provide space to note all publications ensuing from that project. In many case, however, the only information available about a project will be a single publication or report, in which case this should be entered as the unit. Note too that we may find more projects in some countries than in others. We suggest that in countries where there is very little relevant research, all research should be included. In countries where a large body of research has been conducted, national teams may have to be more selective, focusing on the most recent work. Last, note that a project may cover many things and make only a brief reference to children's use of the internet: if that brief reference is helpful, and includes an empirical finding (a useful statistic, for example), we should include it.

Minimum requirements: The minimum definition of an original empirical research project, to permit entry into the repository, is that a report is available (paper or electronic) that details the methodology followed (with sufficient information to code the project and to evaluate it as competent and valuable) and the data/findings obtained (with sufficient information to permit basic reporting of relevant statistics, observations or other findings). This should include all academic publications, most conference presentations, most commercial or public policy reports, some market research surveys (where often only executive summary or brief statement of findings is available) and few press releases (though some can include detailed statistics plus a note on survey methodology).

Team responsibilities: Each national team to be responsible for collecting material relevant to its own country. The UK team will also collect research under the heading of 'European research' and 'International research' (i.e. includes a European country as part of a broader

project). If any network member locates a piece of research relevant to another country, they should send the research (or reference or link) to the contact in that country. Please alert the UK team to any comparative or international reports so that they may enter them.

Quality control: All those who enter research into the repository should apply a basic quality control test, and exclude material that does not meet this test. The test should follow national or international standards in terms of data collection, analysis and reporting (i.e. if the research has been, or could have been, published in a national journal, or presented at a national conference, this meets the standard). The test should not exclude any research that might be discussed in policy or public forums, but nor should the repository include anything that the research community would consider unsatisfactory as a report of 'empirical research'.

Requirements for an entry: Where available, each entry should include the pdf/wordfile of the report, the url of the project/report, and as complete references as possible to published sources. If only a paper copy of the report is available, or if the report is expensive or protected by copyright in such a way that the report itself cannot be included within the repository, then it is imperative that the national team keeps a clean paper copy of the report, should it be required by network members when working on specific work packages. It may be that permissions are required before entering a file or copy of a report into the repository: this must be the responsibility of the person making the entry. If a copy of a paper report is requested by other network members, only a photocopy should be sent, so that an original copy is maintained at all times at a known and accountable place in the EU Kids Online network.

Note: When in doubt, err on the side of inclusion, as materials can always be weeded out at a later stage.

Other research: While the Data Repository will contain only original empirical research projects, many other kinds of research report are relevant to the work of our network. These may include press releases on surveys conducted by private organisations (for which empirical reports are unobtainable), or methodological discussions, policy reports, research on childhood or non-online media, research conducted outside Europe, or rather old but still-influential research, and so forth. Please begin noting and collecting the reference details for these (and any other content – abstract, paper copy, etc) that is accessible. These will not be included in the data repository but will be collected by the various work packages as needed.

Criteria for relevance: We should include, as a priority, empirical research projects concerning:

- Children and the internet/online world (including online gaming/mobile). This includes information about children's access and usage, their competencies, their online interests and activities, their media literacy when interpreting what they find online, their own interests, concerns and frustrations when online, their strategies for finding things, etc. Learning, games, identity play, advice, participation, social networking. Collect notable/recent studies here if many studies are available. *Ensure this area is covered for each country, though not necessarily including all such studies.*
- Risks encountered by children online (as well as research addressing opportunities open up to them), together with information on safety strategies, awareness and responses to risk. Risks should be defined broadly, to include exposure to illegal content, online friends, contact with strangers (paedophiles, grooming in chat rooms), exposure to harmful or offensive content, encountering sexual/violent/racist/hate material, advertising, commercial exploitation, misinformation, giving out personal information, invasions of privacy and unwelcome contact (spam, viruses, etc), bulling, downloading (ill/legal), user-generated content, use of challenging sites (suicide, anorexia, drugs, etc) and cyberstalking and harassment. *Coverage here should be comprehensive, with nothing left out.*
- Practices of regulation of online technologies, from the point of view of teachers, parents, children, carers libraries or others responsible for children. This should include research on adults' knowledge of children's practices online, styles of

intervention/regulation of children's use, children's practices of evading monitoring, or being able to avoid filters, find ways around restrictions etc. To include research on media/information literacy, safety/awareness of online risks, effectiveness of filters or other technical means of managing the online environment, passwords, privacy, walled gardens, etc. *Coverage here should be comprehensive, with nothing left out.*

- Parents' internet experience e.g. what are their competencies, attitudes to the internet, concerns about the internet. This should include notable recent studies of the adult population as a whole, especially where specific information on parents is lacking. *Ensure this area is covered for each country, though not necessarily including all such studies.*
- Children's use of other technologies (e.g. TV, PC, mobile) to put their online activities into context, where there is a notable recent national study, or where online access and use is compared with other media access and use. *Ensure there is something recent and of good range and quality included for each country.*

All research to be included should also concern:

Europe (defined as EU25, with focus on the 18 countries in our network)

AND Empirical (using any method, meeting acceptable quality criteria)

AND Recent (defined as conducted or reporting in 2000+)

AND Children (defined as under 18 years old, or the parents of under 18s – suggested search terms are child, youth, young, family, parent)

AND Online (mostly internet, but also online games, online mobile, e-learning, etc)

Quality Criteria for the Data Repository

Entries for the data repository have been selected by the national teams participating in the EU Kids Online project, and they refer to research published in many different languages. Certain minimum requirements have been imposed, as follows.

- A report is available (paper or electronic) that details (1) he methodology followed (with sufficient information to code the project and to evaluate it as competent and valuable) and (2) the data/findings obtained (with sufficient information to permit basic reporting of relevant statistics, observations or other findings).
- This generally includes peer-reviewed academic publications, most academic conference presentations, many but not all commercial and public policy reports, some market research surveys (though often only an executive summary or brief statement of findings is available) and a few press releases (as some may include detailed statistics plus a note on survey methodology).
- Each national team is responsible for collecting material relevant to its own country. The UK team also collects research under the heading of 'European research' and 'International research' (i.e. research that includes a European country as part of a broader project).
- All those who enter research into the repository apply a basic quality control test, and exclude material that does not meet this test. The test follows national or international standards in terms of data collection, analysis and reporting (i.e. if the research has been, or could have been, published in a national academic journal, or presented at a national academic conference, this meets the standard). The test should not exclude any research that might be discussed in policy or public forums, but nor should the repository include anything that the research community would consider unsatisfactory as a report of 'empirical research'.

- Where the contributing team has concerns regarding the quality of an entry, but considers on balance that is it worthy of inclusion, comments will be added under the headings 'comment on the quality of the methods' or 'other comments', as appropriate.

Updating the Data Repository

Our strategy for identifying entries and updating the repository is as follows. Each national team (Annex D) is charged with the task of locating and entering new research projects in their country. National teams are establishing national advisory boards to help them ensure the repository is as comprehensive as possible. The EU Kids Online International Advisory Board also informs us of new research to be included. The network coordinators and members also liaise with the wider research community and scour electronic data bases and other research sources. Last, on the EU Kids Online website and in all EU Kids Online dissemination processes, we issue an ongoing invitation to researchers, policy makers and others to inform us additional research studies that could be included. Corrections to the material in the repository are also invited.

Annex D: Coding Framework

The coding framework below was devised for use by EU Kids Online network members to code all entries in the data repository. These codes and categories there provide the pre-selected terms for searching the repository online. They also provide the basis for the description and analysis of available research presented in this report.

Code	Categories for coding	Notes on coding
Multiple countries	Yes, No	Drop-down box. Click yes if a number of countries were involved in the study.
Country or countries *		Click on countries where the study took place, add any extra ones not listed.
Project title *	Free text description……	Add English translation if necessary
Language(s) of report	Free text description……	
Date of fieldwork *	Free text description……	By year (and month if data is available)
Funder of the research	EC National Government/Ministry/ National Research Council Regional Government Media/Telecoms/Internet Regulator Commercial/Company Trade association Public TV Research institute/foundation Church Charity/Charitable foundation Consumer organisation Other NGO/Non-Profit organisation PhD/Masters Research Other	You can choose more than one NB A trade association is a body representing a number of companies in an industry (e.g. UMTS Forum, in the case of mobile phones)
Main source if multiple funding	List as above	Choose one of these
Type of Methodology	Qualitative Quantitative Qualitative and quantitative Other: specify	Choose one of these
Target group studied	Children Parents Adults Teachers	You can choose more than one
Add brief free text description of group studied	Free text description……	Add brief free text description of research respondents (e.g. gender, age range, socio-economic status)
What ages were the children in the study	0, 1, 2, 3, 4, 5, 6, 7, 8, 9, 10, 11, 12, 13, 14, 15, 16, 17, 18, 19 and older	Age of child to whom the data relate (e.g. if parents are asked about children's use, note ages of those children). Several ages can be noted.
If survey, how it was conducted	Telephone Face-to-face Paper self-completion On-line/email Other: Specify……	You can choose more than one
Size of sample	Free text description……	
If survey, scope of sample	Cross-national National Sub-national	Choose one of these – drop down box
If survey, nature of sample	Representative sample Non-representative sample	Choose one of these – drop down box
If qualitative, which methods?	Interviews Observation Logging Other: Specify……	You can choose more than one Logging includes recording or checking usage. Explain other methods
Comment on quality of methods	Free text description…..	This is optional, especially if you want to point out any problems
Main research focus	Free text description……	Brief free text description of research question/focus for the project overall.

		Note whether Children and the Internet is the main topic or a small part
Topics included Children and:	Online access Online usage Online competencies/skills Online interests and activities Interpreting online content Creating content online Their concerns and frustrations when online Their strategies for finding things online. Their learning online Online games Identity play online Seeking advice online Civic/political participation online Social networking online. Gender differences in online experiences Effects/consequences of going online (e.g. Digital divide, development of social skills, wellbeing)	You can choose more than one – these are the topics relevant for our project.
Topics included Risks and:	Exposure to illegal content Exposure to harmful or offensive content Contact with strangers (paedophile, grooming, chatroom) Encountering sexual/violent/racist/hate material Advertising, commercial exploitation Misinformation Giving out personal information Invasions of privacy (spam, viruses, etc) Cyberbullying Downloading (ill/legal) Hacking Gambling User-generated content Use of challenging sites (suicide, anorexia, drugs) Cyberstalking or harassment.	
Topics included Regulation of online technologies and:	Parents' knowledge of children's practices online Parents' styles of regulation of children's use Children's responses to regulation (avoid filters, evade rules, etc.) Parents' media/information literacy Parents' awareness of online risks Effectiveness of filters or other technical means of managing the online environment, passwords, privacy, walled gardens, etc.)	
Topics included *Parents' internet experience and:*	Parents' competencies Parents' attitudes to online technologies Parents' concerns about online technologies	
Other relevant topics	Free text description……	Add text to explain 'other'
Contact details	Free text description……	Contact address of author/organisation involved in the research, if available
Dataset publicly available?	Yes No	Drop-down box
If yes, enter link	Free text description……	Provide the URL
Report accessibility	Report is online Report is in conference proceedings Chapter appears in a book Article appears in a journal Only a summary is available The report can be bought The report can be obtained on request Non-'published' PhD/Masters thesis	You can choose more than one For PhD/Masters this means not published by a publisher
References	Free text description……	Complete references (e.g. *American Psychological Association* style)
Useful Links (URLs)	Free text description……	Relevant/useful links for the project or for any publications if applicable
Name	Free text description……	Name/ contact for person filling this in
Other comments	Free text description	This is optional

* = Required fields.

Annex E: Studies Analysed (in data repository)

STUDY ID	ENTRY (SHARE-POINT)	TITLE	COUNTRY (IES)
1.	5	Eurobarometer survey on Safer Internet	Austria, Belgium, Bulgaria, Czech Republic, Denmark, Estonia, France, Germany, Greece; Poland, Portugal, Slovenia, Spain; Sweden, The Netherlands, United Kingdom, Cyprus, Malta; Romania, Croatia, Turkey, Ireland, Finland, Hungary, Slovakia, Latvia, Lithuania, Luxembourg
2.	6	UK Children Go Online	UK
3.	7	Trends - Young People and Leisure 1983-2005	UK
4.	8	Kids Online	UK
5.	9	Safety Advice	UK
6.	10	Media Literacy Audit: Report on media literacy amongst children (Ofcom)	UK
7.	11	Putting U in the picture: Mobile bullying survey 2005	UK
8.	12	Young Peoples Use of Chat Rooms: Implications for policy strategies and programs of education	UK
9.	13	n-gen: Use of New Media by Viennese Adolescents	Austria
10.	14	Children and internet: The view of children on offers in virtual areas	Austria
11.	15	KIM-Survey 2005: Children & media, computer & internet. Base analysis of the media use of 6 until 13-year old children in Germany	Germany
12.	16	A Child and Social Environment	Estonia
13.	17	Children of Screen and Monitor	Estonia
14.	18	Youth and messenger culture	Spain
15.	19	Children talking to ChildLine about the Internet	UK
16.	20	Emerging trends amongst Primary School Children's use of the Internet	UK
17.	21	Young people and ICT 2002	UK
18.	22	MSN CYBERBULLYING REPORT	UK
19.	23	Cyberkids	UK
20.	24	Digital Beginnings: Young children's use of popular culture, media and new technologies	UK
21.	25	ScreenPlay. Followed up by InterActive Education, Pathfinder and Young People projects	UK
22.	27	"Children - their safety and habits in the Internet"	Spain
23.	29	Electronic Arts 2	France, Germany, United Kingdom
24.	30	Mediappro	Belgium, Denmark, Estonia, France, Greece, Poland, Portugal, United Kingdom, Italy
25.	31	Teens and ICT: Risks and Opportunities (TIRO)	Belgium
26.	33	Communication of adolescents in the internet environment	Czech Republic
27.	34	Identity of Czech Adolescents - Relationship of Cyberspace and Reality	Czech Republic
28.	35	World Internet Project 2005 - Czech Republic	Czech Republic
29.	36	The integration of the World Wide Web in kindergarten activities: Analysing 5 year-old children's engagement	Portugal

30.	37	A Digital Childhood	France, Norway, Portugal
31.	38	Teenagers (Youth), information and (Multi-)Media 2005 [JIM-Studie 2005]	Germany
32.	39	Students, internet and schools: strategies and contexts of use.	Portugal
33.	40	Children and the risks of Internet communications	Bulgaria
34.	41	Students and the Internet - a survey with students, parents and teachers	Bulgaria
35.	42	Using GEM to evaluate effectiveness of ICTs for campaigning among youth	Bulgaria
36.	43	Children & Media 2005: facts about children's and young people's use and experiences of media	Sweden
37.	44	Virtual space and social space: on IT in everyday life	Sweden
38.	45	Cultures lycéennes, les tyrannies de la majorité	France
39.	46	La diffusion des technologies de l'information dans la société française.	France
40.	47	Les enfants du net (1&2)	France
41.	48	Students' (11-15) uses of the Internet – Exploring social worlds from home	France
42.	49	Childhood and Internet. Interactions in the web	Portugal
43.	50	SAFT - Safety, Awareness, Facts and Tools. Norway	Norway
44.	51	Wzorce korzystania z Internetu przez dzieci w wieku 13-15 lat	Poland
45.	52	Children and television in Iceland	Iceland
46.	53	Generation Happy?	Denmark
47.	54	Childrens' and Young Peoples' uses of Online Computer Games	Denmark
48.	55	Evaluation of the impact of NTs in schools	Greece
49.	56	Impact of NTs on teaching and learning in Greece	Greece
50.	57	HBSC - Health Behaviour in School aged Children	Austria, Belgium, Czech Republic, Denmark, Estonia, France, Germany, Greece, Iceland, Norway, Poland, Slovenia, Spain, Sweden, The Netherlands, United Kingdom, Canada, Croatia, Finland, Hungary, Israel, Italy, Latvia, Lithuania, Luxembourg, TYFR Macedonia, Malta, Romania, Russia, Slovak Republic, Switzerland, Turkey, Ukraine, USA
51.	58	The usage of Information Communication Technologies	Slovenia
52.	59	RIS- Web activities	Slovenia
53.	60	Adolescents' Internet-based identity experiments and their online friendships	The Netherlands
54.	61	Internet, friendships, and well-being	The Netherlands
55.	62	The consequences of friend networking sites for adolescents' well-being and self-esteem	The Netherlands
56.	63	The effects of sexually explicit material on the Internet	The Netherlands
57.	64	The effects of IM on online self-disclosure	The Netherlands
58.	65	The future use of the Internet as a channel of communication, information and business by the big companies	Portugal
59.	66	Children and Youth: their relation with technology and media	Portugal
60.	67	We are here to play. The role of electronic games and the Internet on children's lives.	Portugal
61.	68	Informal and intercultural dialogues: The Internet at school.	Portugal
62.	69	Real Worlds, Virtual Worlds: Young People at chat rooms.	Portugal
63.	70	Civic culture of youngsters in changing environment	Estonia
64.	71	Protection and Access - To Regulate Young People`s Internet Use	Norway
65.	72	Tiger under magnifier	Estonia

66.	73	How do secondary education students use computers	Greece
67.	74	Study of the indicators of eEurope in Greece: research results from schools across Greece	Greece
68.	75	3rd Semester report on broadband penetration in Greece (first semester 2006)	Greece
69.	76	Comparison of eEurope indicators- Greece and the EU	Greece
70.	77	Identity of Internet users in Greece	Greece
71.	78	National survey on NTs and the IS: PCs use in Greece, 2004	Greece
72.	79	Online use of adolescents	Austria
73.	80	Trust and Safety in a fast, mobile network environment	Greece
74.	81	Use and attitudes of youth towards the Internet and mobile phones	Spain
75.	82	(N)Onliner Atlas 2005	Germany
76.	83	Info-communication technologies and school culture in Estonia	Estonia
77.	84	National Survey on NTs and the IS, 2002	Greece
78.	85	AGOF survey - registered association of online research	Germany
79.	86	ARD/ZDF-Online study	Germany
80.	89	Use of PCs, Internet and mobile telephony in Greece	Greece
81.	90	Research into the Effectiveness of PIN Protection Systems in the UK	UK
82.	91	Educaunet programme: 'What exactly is paedophile? Children talking about internet risk'	UK
83.	92	Just one click: Sexual abuse of children and young people through the internet and mobile telephone technology	UK
84.	93	Internet Poses Greater Danger to Kids During Summertime	UK
85.	94	COMET-NCH Parents' survey in 2004	UK
86.	95	PC World: Internet Safety Research, September 2002	UK
87.	96	Survey on the Use of ICTs	Greece
88.	97	Children users of the Internet: an easy and unprotected target	Greece
89.	98	Patterns of Internet use by young people	Greece
90.	99	Survey on the Use of ICTs	Greece
91.	100	Factors of drill program efficiency	Estonia
92.	101	Usage of instructional software in Estonian comprehensive schools	Estonia
93.	102	Awareness and info-channels of youngsters	Estonia
94.	103	Audit of internet safety practices in English schools	UK
95.	104	“Cybercentres and children safety in the Internet”	Spain
96.	105	Habits of consumption of television and new communication technologies of children and young people	Greece, Spain
97.	106	SAFT Norway Benchmark mobile phones and MMS	Norway
98.	107	The Internet in Britain. The Oxford Internet Survey (OxIS)	UK
99.	110	Emnid survey 'Security on the Internet	Germany
100.	111	ELEVEN/18 – Youth Study 05	Austria
101.	112	www.kidsville.de – Rezipientenstudie mit Volksschülern zum Umgang mit einer Kinderinternetseite	Austria
102.	113	Gender-specific aspects in use of the internet	Austria
103.	114	Youth online 2005	Austria
104.	115	Use of ICT in Austrian Households 2005	Austria
105.	116	4th report about the situation of the youth in Austria	Austria
106.	117	Computer and internet use of children	Austria

107.	119	The Periphery as a central place… Practices and social representations of young people in relation to the New Technologies of information and communication (the Internet)	Portugal
108.	121	Kids Consumer Analysis (2006)	Germany
109.	122	Kids Online (2004)	Germany
110.	123	Generation Internet (2005)	Germany
111.	124	Me. The World. The Media.	Estonia
112.	125	Overview of HIV/AIDS communication, obstacles and possibilities to regulate it better	Estonia
113.	126	Between the “real” and the “virtual”: hip-hop representations and cultural practices produced by Portuguese youth off and online	Portugal
114.	127	Sociodemographic profile of Internet users. Activities carried out on Internet	Spain
115.	128	Tingstad, Vebjørg (2003): Children's Chat on the Net. A study of social encounters in two Norwegian chat rooms	Norway
116.	129	RIS- IKT (RI-ICT)	Slovenia
117.	130	The information and participation needs of young people in Ljubljana and surroundings	Slovenia
118.	131	STOPline research project	Slovenia
119.	132	The National Bullying Survey 2006	UK
120.	133	Youth Online 2004	Belgium
121.	134	EMTEL2-project	Belgium
122.	135	Kamedi@leon: I love Media. The impact of new media on the identity- building of young people.	Belgium
123.	136	Teens and ICT, Risks and Opportunities (TIRO-project)	Belgium
124.	137	Young people and information technology.	Belgium
125.	138	Safe computer use at home and at school.	Belgium
126.	139	An asocial screen generation? An empirical research into the role of media in leisure activities	Belgium
127.	140	Young people and new technologies	Belgium
128.	141	Teach Your Children Well - ICT Security and the Younger Generation	Belgium, UK
129.	142	The End of Cybercrime?	Belgium
130.	143	Puppy's Power! The impact of internet on the social relations in the life world of young people.	Belgium
131.	144	Information Technology - A study concerning children, adolescents and their parents	Austria
132.	145	The digital divide in the playstation generation: Self-efficacy, locus of control and ICT adoption among adolescents	Belgium
133.	146	Adolescents' motives to use the internet	Austria
134.	147	Youth study 2006	Austria
135.	148	Evaluating games with children	Belgium
136.	149	Gender differences in children's creative game play	Belgium
137.	150	The digital divide in the computer generation: ICT exclusion among adolescents	Belgium
138.	153	“Cyberpesten bij Jongeren in Vlanderen”	Belgium
139.	154	Children’s influence on internet access at home. Adoption and use in the family context.	Belgium
140.	155	Gender differences in children's creative game play	Belgium
141.	156	Benchmarking the cultivation approach to video game effects: a comparison of the correlates of TV viewing and game play	Belgium
142.	157	Children's positive and negative experiences with the Internet	The Netherlands
143.	158	In love on the web	The Netherlands
144.	159	Youngsters and the Internet	Belgium, France, Portugal, Italy, Quebec, Switzerland

145.	160	SAFT parent survey 2006	Norway
146.	161	SAFT Children Survey 2006	Norway
147.	162	SAFT Public Opinion Tracker	Norway
148.	163	Cyberethics	Austria, Norway
149.	164	ICT use by household and by individuals/CITIZEN MEDIA	Austria; Germany; Norway; Spain
150.	165	ICT and School (ICTS)	The Netherlands
151.	166	Children & Media 2006: facts about children's and young people's use and experiences of media	Sweden
152.	167	The bible on my own terms: a study of mediated contacts with the bible with special reference to youth and the Internet	Sweden
153.	168	Performing the self in cyberspace: a study of young players styles of self-presentation and identity performances in the online game world TIBIA	Sweden
154.	169	Children's digital rooms: stories about e-mail, chat & Internet	Sweden
155.	170	How children describe the internet	Sweden
156.	171	The online kids: children's participation on the Internet	Sweden
157.	172	The virtual mobility of young people: the use of computers, the internet, and mobile phones from a geographical perspective	Sweden
158.	173	Wzorce korzystania z Internetu przez dzieci w wieku 13-15 lat	Poland
159.	174	Social Diagnosis. Objective and Subjective Quality of Life in Poland	Poland
160.	175	Research on risky behaviours of Polish children on the Internet	Poland
161.	176	Pedophilia and Pornography on the Internet: Threats to Children. POLAND 2003	Poland
162.	177	Nordicom-Sweden's Media Barometer 2005	Sweden
163.	178	Nordicom-Sweden's Internet Barometer 2005	Sweden
164.	179	Everywhere present knowledge. On websites as informative support	Sweden
165.	180	Screen rites: A study of Swedish young people's use and meaning-making of screen-based media in everyday life	Sweden
166.	181	SAFT - Safety Awareness, Facts and Tools (The Swedish part)	Sweden
167.	182	World Internet Project 2006 - Czech Republic	Czech Republic
168.	183	MML-TGI children 2004	Czech Republic
169.	184	Survey of young people's game and computer habits in Örebro, Spring 2006	Sweden
170.	185	Internet use among Stockholm youth	Sweden
171.	196	Creating a sense of community. Experiences from a Swedish web chat	Sweden
172.	187	An on-going doctoral thesis, from which two articles are published: 1) The Digital Native as a Student. Implications for Teacher Education 2) Net cultures - what do children and young people do o	Sweden
173.	189	JIM-survey 2006 (Youth, information, multimedia)	Germany
174.	190	(N)onliner Atlas 2006	Germany
175.	191	Understanding Online Social Network Services and Risks to Youth. Stakeholder Perspectives	UK
176.	192	Children consumer analysis	Germany
177.	193	Trend Tracking Kids 2005	Germany
178.	194	KIC-survey (children, Internet & Computer) by the institute of youth research	Germany

179.	195	Oscar eContent Studie	Belgium; Germany; Sweden; The Netherlands
180.	196	Children and media - a survey of the ARD/ZDF media commission	Germany
181.	197	Freedom of Expression and Online Censorship - Political regulation and commercial content filtering	ASEAN, EU, US
182.	198	BSI Study federal office for security in the information technology	Germany
183.	200	Information technologies in enterprises and private households in 2004	Germany
184.	201	Internet usage of individuals and enterprises in 2005	Austria; Belgium; Bulgaria; Czech Republic; Denmark; Estonia; France; Germany; Greece; Iceland; Norway; Poland; Portugal; Slovenia; Spain; Sweden; The Netherlands; United Kingdom; EU 25; EU 15
185.	202	Internet usage in Europe: Security and Trust	Austria; Belgium; Bulgaria; Czech Republic; Denmark; Estonia; France; Germany; Greece; Iceland; Norway; Poland; Portugal; Slovenia; Spain; Sweden; The Netherlands; United Kingdom
186.	203	Get I.T Safe: Children, Parents and Technology. Survey 2006	UK
187.	204	The Role of Mobile Phones in Family Communication	UK
188.	205	EUROBAROMETER EB60.2 – CC-EB 2004.1 ILLEGAL AND HARMFUL CONTENT ON THE INTERNET EU-25 COMPARATIVE HIGHLIGHTS	Austria; Belgium; Czech Republic; Denmark; Estonia; France; Germany; Greece; Poland; Portugal; Slovenia; Spain; Sweden; The Netherlands; United Kingdom; Finland, Cyprus, Hungary, Ireland, Italy, Latvia, Lithuania, Luxembourg, Malta, Slovakia
189.	206	The Internet in Britain: the Oxford Internet Survey 2003	UK
190.	207	The digital divide in the computer generation: ICT-exclusion among adolescents	Belgium
191.	208	Internet use in schools: an investigation into the experiences, abilities and attitudes of teachers and pupils in junior schools	UK
192.	209	An investigation into cyberbullying, its forms, awareness and impact, and the relationship between age and gender in cyberbullying	UK, Iceland
193.	210	ChildWise Monitor-Winter 2006-2007	UK
194.	211	Striking a balance: the control of children's media consumption	UK
195.	212	ImpaCT2: The Impact of Information and Communication Technologies on Pupil Learning and Attainment	UK
196.	213	Young People, Media and Personal Relationships	UK
197.	214	Nasties in the Net: children and censorship on the web	UK
198.	215	Information literacy of teachers and pupils in secondary schools	UK
199.	216	Interplay: Play, Learning and ICT in Pre-school Education Already at a disadvantage? ICT in the home and children's preparation for primary school	UK
200.	217	Children, play, and computers in pre-school education & Technologies and Learning in Pre-school Education	UK
201.	218	Trend Tracking Kids 2006	Germany
202.	219	Young people and the internet. Perceptions, uses and appropriations	Belgium; France; Portugal; Spain; Canada, Italy and Switzerland
203.	220	AOL - TNS Emnid survey "Security on the Internet	Germany
204.	221	Conversations in the dark: how young people manage chatroom relationships'	Greece
205.	222	Kids worlds 2004 games and media in the childlike experience world	Germany
206.	223	ARD/ZDF Online Study 2006	Germany
207.	224	Young people are spending their time in a space which adults find difficult to supervise or understand...	UK

208.	225	The NSPCC/Sugar reader survey	UK
209.	228	Internet and young people	Belgium
210.	229	The influence of social-demographic determinants on secondary school children's computer use, experience, beliefs and competence	Belgium
211.	230	The home computer in children's everyday life: the case of Greece	Greece
212.	231	Early Childhood Teachers' Attitudes towards Computer and Information Technology: the case of Greece	Greece
213.	232	The prospect of integrating ICT into the education of young children: the views of Greek early childhood teachers	Greece
214.	233	SAFT 2006 Children's Survey Ireland	Ireland
215.	234	SAFT 2003 Parent survey	Denmark; Iceland; Norway; Sweden
216.	235	Policies for content filtering in educational networks: the case of Greece	Greece
217.	236	SAFT 2003 Children survey	Denmark; Iceland; Norway; Sweden, Ireland
218.	237	Controversial content on world wide web	Norway
219.	238	The culture of the Internet: virtual reality and child pornography	Greece
220.	239	Informational literacy of schoolchildren between 10-12 years of age	Greece
221.	240	Children safety on the Internet: Final report for Czech Republic	Czech Republic
222.	241	Social disparity in the virtual space: How does the youth use the Internet?	Germany
223.	242	Computer in the family	Germany
224.	243	How do children discover the Internet? Observations of children between the age of 5 to 12	Germany
225.	270	Internet usage of enterprises and individual persons in 2004	EU18
226.	245	Mobile medier, mobile unge I	Denmark
227.	246	Mobile medier, mobile unge II	Denmark
228.	247	SAFT - Safety, Awareness, Facts and Tools. Danish part	Denmark
229.	268	Children's growing up with interactive media – in a future perspective	Denmark
230.	249	Global media, Local Youth	Denmark
231.	250	Kids.net Wave 5	UK
232.	251	Families, Schools and the Internet	UK
233.	252	Media teaching in the school – with focus on the development of media competence of the teachers	Denmark
234.	253	Media Education in the Danish Folkeskole	Denmark
235.	254	Mobile Learning (working title)	Denmark

Annex F: National reports

Available as a separate document

Endnotes

[1] Source: Eurobarometer Survey (May 2006) Safer Internet, Special Eurobarometer 250 / Wave 64.4, Brussels.

[2] Terminology is difficult here. We refer in this report either to 'children and young people' (the preferred term for many) or just to 'children'. Where research applies only or mainly to teenagers, we make a distinction between (younger) children (0-12) and teenagers (13-18). Our focus, to be precise, is on those under 18 – legal minors in both EC and UN frameworks. Terminology for the technology at issue is equally problematic. The EC Safer Internet Programme centres on 'the internet and online technologies'. This category intersects with the broader terms 'digital media', 'ICTs' and 'new media', but is restricted to that which is online, a restriction we follow here. In practice, most research concerns 'the internet', generally the 'fixed internet', for research on children's use of online technologies via mobile phone, games console, etc., remains limited or non-existent in most countries.

[3] We would like to thank all the contributors to this work within EU Kids Online, with particular thanks to Angeline Khoo and Mizuko Ito, from our International Advisory Board, for their helpful comments on an earlier draft of this report.

[4] The ease of search varied cross-nationally. In some countries, information on research is centralised (e.g. the national data archive in The Netherlands called DANS: Data Archiving and Networked Services). In other countries, it is scattered. In some countries, a history of research funding resulted in a consistent body of research collated in a single place (e.g. the Economic and Social Science Research Council in the UK). In some countries, participants held direct communication with researchers in the field, identifying studies by snowballing. In some (e.g. Denmark, Poland) the research community is sufficiently small that all the likely research teams could be readily identified. In other countries, EU Kids Online members contacted relevant research institutions to ask if research existed (e.g. the Czech Republic – although following an unsuccessful approach to the Ministry of Informatics, the Czech national team described the field as 'chaotic'). In Belgium, the research is divided by language groups, but we were fortunate in this respect in terms of having both Flemish- and French-speaking participants in EU Kids Online who could cover their respective research communities. Yet other national teams used search engines to identify research, alongside other strategies. Hence, although the EU Kids Online team members are well placed to locate material in their respective countries, there is some scope for different material being found because of variations in the research process. Despite our best efforts, the online repository may not yet include all research available in each country, and the aim of being as comprehensive and inclusive as possible continues.

[5] For example, as some studies cover the internet as one ICT or one example of media/new media/multimedia amongst others (e.g. in the UK, the Netherlands, Norway, Germany), or else focus on another technology but include data on internet use. Some studies focus on children and youth in general, or youth and media, where once again use of the internet is one activity amongst other (e.g. Germany, Estonia). Many studies of the internet or ICTs cover the population in general, but also some children, although the lower age of these studies vary (e.g. starting with 14 year olds, 15 year olds). Occasionally we have research looking at time use data which also includes internet (e.g. the Netherlands) or studies of particular groups such as ethnic minorities, that picks up children's experience of the internet amongst other facets of their life (the Netherlands). Some studies have a very specific such perspective, such as usability studies (Belgium), addiction research (Belgium), police issues (Greece) or a topic such as HIV/AIDS communication (Estonia).

[6] In the map showing studies by country, the figures include single and multi-country studies.

[7] Although 358 approximates the 'cumulative number of studies' (i.e. the row total), this is to double count certain studies and so should not be calculated (for example, the 'total studies' cells for Austria and Bulgaria will contain some of the same studies).

[8] For example, the Greek figure is legitimate but potentially misleading. We know that this covered mainly general studies of the Internet, which also included children. Other countries have such studies, but they usually have studies specifically on the Internet and children as well.

[9] Croatia, Finland, Hungary, Ireland, Italy, Luxembourg, Latvia, Lithuania, Macedonia, Malta, Romania, Slovakia.

[10] The Pew Internet and American Life Project can be found at www.pewinternet.org. Its remit is to explore the impact of the internet on families, communities, work and home, daily life, education, health care and civic and political life. They do this through telephone surveys, online surveys and in-depth qualitative interviews.

[11] Internet usage of individuals and enterprises in 2005. For a German version, see http://epp.eurostat.cec.eu.int/cache/ITY_OFFPUB/KS-NP-06-012/DE/KS-NP-06-012-DE.PDF

[12] This is an example of a choice that was even more complex. In some studies identical research is carried out in several countries, in other studies, the national teams add on extra national research questions. To do justice to this, we coded multinational studies once, but them coded them in addition under the country heading if national researchers conducted extra research or added extra analysis at the same time as conducting the agreed international research and levels of analysis.

[13] Care is needed regarding exactly who was interviewed. In some countries, it was the 'General European public over 15 years old'; sometimes it was 'caretakers' with children aged 17 or under; sometimes it was a sub-sample of caretakers claiming that the children used the Internet (since there were only 3000 of this last group in the European sample we cannot do national comparisons – but we do!). Unfortunately, the survey did not ask caretakers if they were parents of the child asked about, leaving open the possibility that respondents were other relatives or household members.

[14] Austria, Belgium, Denmark, Finland, France, Germany, Greece, Ireland, Italy, Luxembourg, Portugal, Spain, Sweden, the Netherlands and the UK.

[15] Cyprus, Czech Republic, Estonia, Hungary, Latvia, Lithuania, Malta, Poland, Slovakia, Slovenia.

[16] Bulgaria, Romania, Croatia and Turkey.

[17] In part this might reflect the research process where national teams used search engines to find studies. However, this was one of several strategies so in part that fact that online accessibility is so important reflects a reality.

[18] Work conducted as part of a PhD or Masters' thesis was mainly included in countries where research was otherwise scarce, though we also note variation in the weight accorded to student research cross-nationally.

[19]Attempts were made to track down missing information by *EU Kids Online* team members (e.g. sending emails to the relevant researchers asking for details) but this was sometimes not successful, or else took time – a scarce resource in the project.

[20] Source: Eurobarometer Survey (May 2006) Safer Internet, Special Eurobarometer 250 / Wave 64.4, Brussels.

[21] In relation to the category 'students', the Portuguese team noted the phenomenon of researchers who are also teachers working at schools. This reflects the fact that until recently taking graduate courses was crucial to a teacher's career progression. But one result is a heavy focus on schools and a lack of research on internet experience in more informal spaces.

[22] In some countries, especially the UK, the role of NGOs/charities has been more substantial. The establishment of the Home Office Task Force for Child Protection on the Internet, a unique body in Europe, has been useful in linking agencies giving NGOs a stronger lobbying power than in some countries. The resulting visibility of risk issues in particular has contributed to the number of studies that has taken place in this field.

[23] The first report from these are 'The effects of sexually explicit material on the net' (2005) and 'The effects of IM on online self-disclosure' (2005).

[24] For example, the SAFT survey was repeated in Norway and partly in Ireland.

[25] Much of what is reported here is not specific to European research. Professor Angeline Khoo, of the National Institute of Education in Singapore and a member of the EU Kids Online International Advisory Board, observes that in Singapore also, most research focuses on internet uses by children rather than on risks. Research in Singapore tends to be multidisciplinary, conducted by communication or education departments, to be descriptive in nature and to be quantitative in its methodology. There are few studies with children younger than nine. Other key gaps include research on parental awareness or mediation, media literacy, the role of teachers, the risk of exposure to challenging content, and online gaming by children. Further areas of concern including blogging, cyberbullying and excessive gaming. For further information, see http://www.mda.gov.sg/wms.www/actualTransferrer.aspx?c=2.2.14.&sid=753&eid=-1&fid=-1. See also http://www.zdnetasia.com/news/business/0,39044229,61980354,00.htm and http://www.ntu.edu.sg/sci/research/internet_overview.html

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