BEITRÄGE ZUR SOZIALEN SICHERHEIT

Entwicklungs- und Nutzungstrends im Bereich der digitalen Medien und damit verbundene Herausforderungen für den Jugendmedienschutz

Das Programm «Jugend und Medien»

Das Nationale Programm zur Förderung von Medien-kompetenzen wurde vom Bundesrat im Juni 2010 für die Jahre 2011 – 2015 beschlossen. Ziel des Programms ist es, gemeinsam mit den Medienbranchen einen wirksamen Jugendmedienschutz zu fördern und die verschiedenen Akteure in diesem Bereich zu vernetzen. Tragende Programmpartner sind die Swisscom AG, welche sich seit vielen Jahren im Jugendmedienschutz engagiert, der Verband der Computerspielbranche SIEA (Swiss Interactive Entertainment Association), der die Umsetzung des europaweiten Altersklassifikations-systems PEGI in der Schweiz gewährleistet sowie die Jacobs Foundation, die langjährige Fördererfahrung im Bereich der Kinder- und Jugendentwicklung hat.

Weitere Informationen unter www.jugendundmedien.ch

Die präsentierten Folgerungen und Empfehlungen geben nicht notwendigerweise die Meinung des Bundesamtes für Sozialversicherungen wieder.

Preface by the Youth and Media Steering Group

On 11 June 2010 the Federal Council decided that, as part of the Youth and Media programme, it requires an overall evaluation to be carried out by 2015 concerning the organization of measures to protect minors against harmful media in Switzerland, and the regulations necessary in this regard.

In order to carry out these tasks the Federal Social Insurance Office, in the lead role, appointed an advisory group consisting of representatives from the Confederation, the cantons and the media industry, and assigned four scientific mandates. The findings of the first mandate, "Development and usage trends in the area of digital media and associated challenges in protecting young people from the media" are now available.

This part of the report drawn up by Zurich University of Applied Sciences focuses on the technological development and usage trends related to digital media. Key technical developments include the increasing availability of mobile devices with Internet access, the multi-functional nature of these devices, and device-independent data storage. The main usage trends include time and location-independent media usage, the sharp increase in communication via digital media, and intense media usage from an early age.

The part of the report written by the Hans Bredow Institute systematically identifies the resulting risks for children and young people. Here it is important to remember that minors assume different roles when using the media, such as receivers, market participants, communicators and producers of media content. The authors conclude that the dynamics of digital media in terms of offers and usage, and the resulting risks for children and young people, are complex issues. The efficient protection of minors against harmful media therefore requires regulatory intervention as well as the promotion of media literacy. When identifying the need for regulatory measures, it is important to consider the probability of a risk occurring, the associated level of damage, and the controlling effect of the regulatory intervention.

The full report therefore provides an important basis for the direction of further investigations [1] and the formulation of proposals for the future organization of youth media protection in Switzerland.

On behalf of the steering group of the national Youth and Media programme

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[1] See www.jugendundmedien.ch > Nationales Programm (National Programme) > Regulierung (Regulation)

Summary

The advent of a digitalised and globalised media landscape has compromised the effectiveness of traditional youth protection regulations. Measures like restrictions on sales, transmission and television schedules that are designed to regulate film and gaming media that may impair children's development have been rendered practically redundant by the internet. The ready availability of mobile devices and access to online media any time anywhere have greatly changed how we can protect minors from potentially harmful media content.

On 11 June 2010 the Swiss government (Federal Council) launched the national Youth and Media programme with a view to clarifying how Switzerland should design media-related youth protection in the future. The present report, which was submitted to the commissioning agency, the Federal Social Insurance Office, delivers findings that could make it easier to ascertain where regulation is needed as regards digital media and youth protection. It also details recent developments in the field of information and communication technology, and identifies media usage trends. The authors conducted a thorough literature search and analysed interviews that they conducted with experts from the ICT industry (Swisscom, Google and Microsoft) specifically for the purpose of this study.

Based on the findings of the literature search and expert interviews, the authors were able to identify two central trends in relation to information and communication technology and media use: "mobile" and "cloud". Mobile refers on the one hand to the rapidly rising importance of mobile devices and on the other hand to mobile internet access which makes it possible to access data anytime, anywhere. Cloud refers to data storage in external data processing centres. This means that data, and increasingly software programmes, are not dependent on specific devices but are stored in external data processing centres.

Below is a summary of the main technological developments and usage trends, as well as explanations of their relevance for media-related youth protection:

Technological trends	Usage trends	Relevance for media-related youth protection
Exponential rise in mobile devices and data More smartphones are bought than computers, data volume has grown massively and data are increasingly stored in a "cloud".	Use of the multitude of (mobile) devices by ever younger children	More difficult for parents to exercise control over multiple web-enabled devices; ever young children could be exposed to age-inappropriate content or sexually harassed online.
	Rise in internet use	Online content can be accessed anytime, anywhere.
	Use of larger volumes of data	Some data are stored for several years and can be located using search machines. Risk of no longer being able to protect minors fully from data that have been carelessly posted online.
	Growing use of data stored in a "cloud"	Providers can aggregate data and use them to create character profiles or identify individuals. Risks for the protection of privacy and data
	Devices are used in parallel (media multitasking)	With media multitasking there is an inherent risk of information overload.
Growing convergence of devices and content Different stand-alone devices have now con-	Multifunctional use, e.g. smart-phones	Media-related youth protection that focuses on support media is now obsolete.
	Media content and communication channels co-exist and are universally accessible.	Risk of minors' media use interfering with their education

verged (e.g. smartphone); text-based and audiovisual media content converge online.	Smartphones come with in-built photo and video cameras.	Images and films that have been created in a range of contexts can be misused.
	Falling use of soft and hardware supplied by IT firms based in the US.	US firms dominate the IT market. Not only do they view privacy and data protection differently from Switzerland, but they are also not subject to Swiss legislation.
More intuitive human-machine interfaces Touchscreens, as well as voice and motion control has made the interaction between humans and machines more intuitive.	Children and adolescents start using simple-to-operate devices at an earlier age.	Children are exposed to age-inappropriate content at an ever younger age.
	Ease of use fosters creative media use, as well as the download and production of content.	Young people tend to publish somewhat personal data when using media or can contravene copyright law when producing and posting content online.
	Use of products with information overlays or inconspicuous filming.	Risk of information overload and invasion of privacy.
Virtually invisible machine-machine interfaces Increasing use of sensors and microchips.	Use of wireless devices and data transfer via sensors. Microchips incorporated in many everyday objects	Data trails unwittingly left behind. Risks in terms of data security due to unencrypted data connections, data transfer and unseen data storage.
Apps as central platform for mobile internet use Exponential growth of app market.	Rising use of apps. Even very young children use apps for entertainment purposes.	Many apps record users' personal data, location and tracking profile. Risks to the protection of privacy and data.
Geodata shape the future development of the mobile internet Localisation data can generate a multitude of new applications for mobile devices.	Apps use the localisation function on smartphones and tablets, e.g. journey planning or restaurant ideas.	Risks to the protection of privacy and data due to the localisation of users to the nearest ten metres.
Personalisation trend continues Devices, media products and services as well as online searchers are increasingly personalised.	Personally configured devices are used in a variety of contexts.	Data security in devices which are connected to a variety of networks in schools and businesses.
	More personalised media use thanks to a diversified supply structure.	Diverse and internationally accessible media products and services make it difficult to restrict access to age-inappropriate content.
	Use of personalised online information in search machine results, in social networks or in other online services.	The filtering criteria for online content tend to lack transparency.

The following main challenges were identified from the findings of the comprehensive literature search and expert interviews. All relate to technological advances and the resulting media usage trends. These problem areas fall into one of two categories: **risks to minors from digital media use** and (structural) **challenges for media-related youth protection**.

Risks to minors from digital media use

−   **Threat to privacy:** every time users of digital media use social networks or the internet in general, they leave behind trails. Even mobile phone use generates tracking data. These trails can be viewed by online services, mobile phone providers, app providers and, in some cases, by unauthorised third parties. In addition, a person may also be assigned an anonymised tracking profile. However, children and adolescents themselves disclose a considerable volume of personal data. It is becoming increasingly difficult to safe-

guard both digital identities and personal data due to the growing use of both web-enabled devices and digital media. Experts agree that the internet has rendered the "right to be forgotten" principle practically unenforceable, which hampers efforts to combat the problem of unpleasant personal information appearing online.

– The advent of intuitive devices and touchscreens has led to a rising number of minors, including very young children, being able to access digital media. As a result, there is a risk that they could be unwittingly exposed to **inappropriate content** such as violence or pornography, which they will have difficulty processing and managing. Mobile web-enabled devices also make it much more difficult for parents and guardians to act effectively as gatekeepers of their children's media use.

– The emergence of social networks, chat rooms and app services has led to a huge increase in communication channels. This heightens the risk of **unsolicited and unwelcome contact for sexual purposes** (cybergrooming) or other forms of sexual harassment via digital channels. Girls are proven to be at higher risk of such contact.

– The smartphone boom of recent years means that children and adolescents have a photo and video camera constantly at their fingertips. With a minimum of effort, or in the heat of the moment, minors can post their photos or recordings on online platforms. The trend of sending images and texts of a sexual nature (sexting) via digital channels raises the risk of images and videos falling into the wrong hands, e.g. after the breakdown of a relationship, and being used for the purposes of **cybermobbing**.

– Greater media proliferation means easier access and thus a rising incidence of **media addictions**. Young people are especially at risk because they have yet to reach the stage of development where they are not always able to police their own emotions, and regulate their impulses and actions. There are other **health risks** associated with digital media use, including electrosmog and radiation exposure. It is important that children and adolescents should be protected from these as far as possible.

– The multitude of digital communication channels available on mobile devices anywhere and at anytime presents a major challenge for many users, who may have difficulties regulating the frequency with which they access constantly available opportunities to obtain information and communicate. When coupled with a still underdeveloped impulse control, children and adolescents may find themselves suffering from **information overload**, which could negatively affect their ability to learn and their performance at school. By simply sharing and publishing content online, minors can find themselves inadvertently contravening **copyright law**.

Challenges for media-related youth protection

– **Legal-regulatory obstacles**

The globalised nature of communication infrastructure makes it impossible to fully enforce national regulations. The US not only heavily influences the regulatory framework governing the internet, but it is also at the source of many technological advances and innovations due to the fact that global leaders in the field are headquartered there (e.g. Google, Microsoft, Facebook, Apple, Amazon). US regulations and data protection approaches differ from those adopted in Europe, and in Switzerland especially. State regulation is constantly playing catch-up with technology, which evolves and changes at a lightning pace. In this regard, Switzerland has the added obstacle of its federalist structure which makes it more difficult to devise rapid responses to internet crime.

– **Inadequately informed parents, guardians and decision makers**

Decision makers, whether in politics or industry, who are responsible for drafting regulations on digital media tend to be older and, in some instances, are not up to speed on the latest information and communication technologies. Calls have grown among experts for judges, legal advisors, police and lawyers, as well as parents and teachers to improve their knowledge of digital media. Parents and guardians play a vital role when it comes to the use of media by minors. Research has shown that children whose main guardian watches a considerable amount of TV tend to have above-average screen time. The same also applies to computer and internet use. Problems with new media are often symptomatic of wider communication difficulties and even inadequate family bonding, rather than arising from the addictive nature of these media.

– **Promoting positive media behaviour**

Media-related youth protection still faces the major challenge of moving away from an exclusive focus on the negatives of digital media that are routinely cited by politicians and mass media towards an approach that incorporates the promotion of the positives, such as the potential use of digital media as educational and creative resources. The internet coupled with a plethora of communication channels renders bans (e.g. the proposed ban by parliament of "killer games") practically unenforceable. A key building block to positive digital media behaviour which fosters the personal development of the user is "media literacy"[4], i.e. the ability to make an informed choice about personal media use, to reflect critically on one's media use and to deploy media creatively. Positive media behaviour requires not only technical know-how but also social and personal skills. For example, users have to be capable of identifying the conditions under which they can still enjoy media without developing an addiction. They should also have the ability of adopting a moral code that enables them to ward off the negative influence of violent, pornographic or advertising media content. Media education and child guidance professionals have a very important role to play here.

– **Clear allocation of roles within the protection system**

There are a great many stakeholders involved in protecting young people and promoting media literacy (parents, guardians, education system, the authorities, the policy, industry, data and consumer protection agencies and research). In the interests of maximum effectiveness, a high level of cooperation and coordination will be needed. A central challenge in the societal approach to digital media and youth protection is deciding on the roles that each set of stakeholders should play and clarifying the issue of multi-level regulation. The regulatory authorities play an important coordinating role here. Parents and education providers will have to shoulder an even greater burden as many of the challenges presented here concern them directly (e.g. raising awareness of personal data processing, and issues like sexuality, violence and mobbing). Given the technological advances which this report highlights, data protection is a priority issue and is extremely pertinent for media-related youth protection. As such, it is important that youth protection in the future is harmonised with data protection.

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[4]   There are countless definitions of "media literacy" and the term is widely used in many different contexts (cf. Jarren/Wassmer 2009). As a general rule, "media literacy" refers not only to the technical skills involved in media use but also to a form of "media maturity", i.e. the ability to use media responsibly and critically without incurring the negative side-effects. Depending on the definition, media literacy can also include active organisational skills, social skills and communication skills. (cf. Süss/Lampert/Wijnen 2010)