



## SHARENTING ON SOCIAL NETWORKS AS AN ECOLOGICAL FORM OF PRESENTATION OF THE VISUAL CONTENT EXPOSED TO THE INFLUENCE OF GROUNDSWELL

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### Abstract

The digital environment as a special kind of media space brought almost unlimited possibilities of sustainable dissemination of visual and auditory material and text and their combinations – digital form. However, the digital environment gave rise to several phenomena that can pose a potential danger to Internet users, in particular with regard to the growing number of activities under the concept of so-called groundswell. The paper deals with the issue of selected forms of social behaviour of social media users and their preferences with regard to the type of minors-related content they share. The authors emphasize the risks and negative consequences such content (and communication about it) may entail for participants. The aim of the research is to examine the phenomenon of sharenting, to point out the related risk and to identify possible impacts on the quality of life and safety of children and young people on the Internet based on a critical analysis of the theoretical framework and comparison of research results with those from abroad. The results are presented verbally and visually, as they are set in context and compared with the results of previous research of a similar nature. In the conclusion, the authors emphasize the importance of interdisciplinary research into the topic and emphasize the importance of media education and media literacy of children and parents alike, as media education and media literacy are considered to be the primary predictors of safe use of the Internet and social media.

### Keywords

Sharenting, Groundswell, Sustainability, Social Media, Visual Content and Personal Data Protection

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## **I. Introduction**

The Internet and cyberspace represent a specific type of media thanks to which it is easy to virally disseminate information of various kind and degrees of confidentiality and store it for a very long period of time without the possibility to reconsider it or even delete it. This information may be collected and distributed by other entities or published by users themselves. It is social media that is currently the most common way information, achievements, opinions and attitudes of individuals and specific groups are shared (Hurajová et al., 2022). In addition to sharing information and data, cyberspace makes it possible to comment on everything that is presented to the user (most often on social media). Sharing, commenting, liking or other forms of reactions to or interaction with multimedia content and its further dissemination creates the so-called groundswell effect. Groundswell is the term most often associated with marketing, for example in the context of improving the products offered based on feedback from customers in the online world (for example directly on social media). This trend came into existence thanks to the social media and their meteoric rise around the turn of the new millennium. In general, groundswell is a social trend in which people connect with and draw strength from each other, rather than depending on institutions like corporations (Li, Bernoff, 2010). Social media escalate groundswell mainly given their multifunctionality – users can, in addition to commenting and reviewing, exchange views and experiences, e.g. in groups where people can leave comments (different social media sentiment), post product and service reviews and share different types of multimedia content.

In recent years, digitization have caused significant changes in society, affecting not only the economic and social sphere and the administrative agenda, but also the environmental issues and products and services. The current era is labelled “Fourth Industrial Revolution”, which experts also refer to as the Digital Revolution. This Fourth Industrial Revolution blurs the boundaries between the physical, digital and biological spheres mainly thanks to the wide-spread use of technology. Given the research topic, the transition from analogue to digital photography serves as a perfect example of digitization. A huge number of digital photos and videos is being added to social media every day. According to statistics from April 2021, more than 1,000 photos are being added to the social network Instagram every second, in the case of the social network Facebook it is even more than 4,050 photos per second (Instagram Marketing Statistics, n.d.). The environmental impact is obvious – products needed to develop a film are an environmental burden, especially cameras, batteries, accessories and, above all, film development process itself. The advantage of digital photos is that they do not require film development. Digital images can be pre-sorted and only preferred images can be sent to the photo lab for developing. This minimizes the amount of (hazardous) waste and saves materials. Several companies in the photographic industry are aware of the importance of climate neutrality and the environmental impact of their production (e.g. Kodak, Cewe and others) and are taking initiatives to compensate for plastic waste, energy consumption, chemical use, carbon emissions or paper consumption (photo printing). These include projects aimed at recycling, promoting forest and air protection, educational programs and targeted afforestation, as these contribute to sustainability, reduce emissions and

protect global biodiversity. Industry 4.0 has the potential to innovate global manufacturing practices without harming the environment and reduce the environmental burden and boost sustainability by improving production and non-production processes. It can therefore be stated that digital photography is a clear benefit for the environment as it diminishes environmental burden and paves the way towards digitization. This is particularly the case in terms of visual content sharing on social media. The practice of sharing content about children and young people (minors, for shot) on social media is called “sharenting”.

## II. Objective and Methodology

The aim of the paper is to point out the risks associated with the presentation of minors by their family members on the Internet and to identify the effects such actions have on the lives of the minors on the basis of a critical analysis and results of empirical surveys conducted in Slovakia and abroad. The authors made use of several research methods which by their nature helped the authors define the theoretical framework and further elaborate on the topic (to protect the rights and legally protected interests of minors who are unknowingly exposed to groundswell as a result of digital content sharing in the cyberspace). In addition to analytical-synthetic methods, induction, deduction and comparative research methods were also employed. The aim of scientific abstraction was to emphasize the interdisciplinary nature of the selected issue on the basis of available scientific literature, especially monographic works and peer-reviewed journal articles from different fields, in particular sociology, psychology, law, cultural anthropology, management and marketing. In addition to the interpretation of the results of surveys conducted by researchers from abroad, an important part of the paper is the findings obtained on the basis of a quantitative electronic questionnaire survey conducted on a sample of respondents – parents. The questionnaire contained closed as well as open-end questions the aim of which was to find out the respondent’s opinion on the issue of sharing minors-related visual content with the public on social media. The questionnaire items are based on findings presented in studies by Kopecký and Szotkowski (2018), Cino et al. (2020), Rose (2017) and Donovan (2020), which were conducted in the past in the Czech Republic, the United Kingdom and the United States. During the months of October and November 2021, a total of 308 respondents – active users of the social network platforms Facebook and Instagram, took part in the survey. Using statistical research methods, results were processed in the form of tables and figures and also commented on. The elements of the statistical set (statistical units) were examined and then categorized by time (year 2021), territory (Slovak Republic) and general research group (parents, children below the age of 18). Frequency distribution tables were compiled to present the research results in the most clear-cut way. The research also made use of the Pearson’s chi square test (goodness of fit) to test the normal distribution dispersion hypothesis. The observed frequencies were put in the table alongside the expected frequencies. The differences between the observed frequencies and the expected frequencies were compared. Under the hypothesis tested, a match between the observed frequencies and the expected frequencies was expected. A chi-square  $\chi^2$  statistics was used as a test criterion. At the same time, it should be noted that the presented paper contains only partial outputs of the survey conducted on

a selected sample of respondents. Thanks to the logical conclusions drawn on the basis of the analysed data it was possible to interconnect individual parts of the text. The presented information complements opinions of the authors, who have several years' experience in research related to digital marketing communication, including experience in social media management and virtual community building.

### **III. Results and Discussion**

#### **Social behaviour behind sharenting and its causes**

One of the basic rules for the safe use of the Internet and digital media is liberalism in acceptance and conservatism in information sharing. It is recommended that only personal and sensitive data that does not (and will not) pose a threat to users (e.g. reputational damage) be shared. The problem arises when personal information is shared by others. Although social media as a communication channel is most often associated with the generation of digital natives, social media are increasingly being used by other age categories of users as well, especially people of productive age – parents and grandparents. Parents and grandparents engage in a variety of online activities that allow them to make and maintain friendships, archive and share information, and create their identity in cyberspace (this identity is often projected through sharing data about their families, children, grandchildren) (Lehaff, 2021). They share the joys and challenges of parenthood and publicly document and present the lives of their descendants. As a result, the digital footprint of many children is extremely large even before they learn to walk (Brosch, 2016). At present, the term sharenting has gained a momentum among professional and laymen alike. The term sharenting covers behaviour and actions of parents and legal guardians of minors on social media. It is obvious that today's parents (or people with parental rights and responsibilities, e.g. legal guardians) raise their children in the so-called "digital culture". Every piece of information or data shared on the Internet is publicly available and traceable (Haley, 2020; Kupec, Písař, 2019; Ambrožová et al., 2021). Thus, the negative consequences of over-digitization include pushing the boundaries of privacy and losing control over who has access to the content shared (Macháčková, 2014; Švec et al., 2015; Silva et al., 2021; Gonçalves et al., 2021).

The phenomenon of publishing and sharing private information about children and minors by their parents through social media is growing exponentially. Siibak and Traks (2019) have noted that sharing the joys and challenges of parenthood and documenting children's lives publicly has become a social norm in the social media era. It can be stated that regular use of the Internet, building one's image in cyberspace and sharing preferred data suggest that parents currently perceive social media (and thus sharenting) as a common practice and part of their parenting experience. This fact is confirmed by Instagram usage statistics, where more than 114 million posts included the hashtag #kids, more than 413 million included the hashtag #family (compared to 2019, when 301 million posts were tagged with the #family hashtag (Lazard et al., 2019). Sharenting is a phenomenon of modern parenting, a term used to describe the ways many parents share details about their children's lives online (texts, posts, photos and videos which contain personal and

sensitive information about their children). Terminologically, sharenting can be defined as overuse of social media by parents that affects their children, in particular sharing personal information or audio-visual recordings, which are usually disseminated without the consent or knowledge of minors (Choi, Lewallen, 2017). Sharenting is thus *“any means by which parents, grandparents or other adults engage in digital activities related to the personal information of children in their family or care”* (Haley, 2020, p. 460). Kopecký et al. (2020) defined the five most frequent forms of sharenting:

- \* excessive sharing of photos and videos of children (usually without their consent);
- \* creating profiles for children on various social media (without their consent);
- \* sharing so-called online diaries in which the child’s life is closely monitored;
- \* using a child to create extremist or hateful content;
- \* using a child as a business or marketing tool.

The most common form of sharenting is excessive sharing of photos or videos of children or written information about the child’s life. When it comes to photographic material, four types of photographs are most often subject to sharing. These are photographs that capture important events and milestones in children’s lives, photographs with family, friends, and photographs which parents consider cute or humorous (Kumar, Schoenebeck, 2015). Many of today’s children have a digital identity way before they connect to the online world, some even before birth (especially children of influencers). Sharenting also includes the so-called “pregnancy ritual”, where expectant parents share photos of their children from the prenatal period (e.g. sonographic images) and create profiles for their unborn children on social networks (Brosch, 2016; Leaver, Highfield, 2018).

By sharing such data, in addition to creating their own online identity, parents (sometimes unconsciously) create digital footprints and build cyber identity for their children, too. Sharenting in this context represents the intersection between a child’s right to privacy and his or her parents’ right to privacy and respect for family under human rights instruments. Parents post images of their children online with little comprehension or regard for the fact that they are crafting their children’s online footprint and compromising their private identity along with interfering with the child’s right to digital self-actualisation. It is the responsibility of adults and parents to carefully consider what content could be potentially harmful for the child and what content the child might later find inappropriate. Parents thus face extremely significant and time-consuming challenge as they have to think about how to balance their desire to publish content about their children and the consequences that might bring in terms of the child’s future digital identity. Children form their own (online) identity during adolescence and should therefore be allowed to be defined however they wish, not how their parents wish. In this context, E. Aboujaoude (2011) came up with the term digital abduction (the term is further used in cases where minor-related digital content is published by people who are not their parents and have “stolen” this data from original profiles, similar to, for example, identity theft as one of the forms of cyberbullying). At the same time, cyberspace is known for its high level of disinhibition of users – tendency to share content that would never be communicated offline. Sharenting is, therefore, widely-discussed phenomenon which needs to be addressed not only from a psychological, social, but also legal and axiological point of view.

Motivations behind sharenting are different. Some parents share photographs and data out of a certain obligation they feel towards other family members and friends, so that these people can “build” a relationship with the child (Donovan, 2020). In addition to information sharing, some parents share photos and data in order to “archive” them (out of fear of data damage or data loss). Another motivation behind sharenting is the need to present a certain self-image that others will see, the so-called impression management (Goffman, 2018). In addition, digital technologies and cyberspace enable even more accurate and comprehensive impression management and elaborated presentation of social roles through a variety of photo and video editing tools and a wide range of stimuli (verbal and non-verbal, e.g. emoticons). The more pronounced and massive the support of the community, e.g. “likes” (“online gifts”), the better the boost to the parents’ self-esteem (Cino et al., 2020). In this context, it is important to point out the so-called abusive motivations of sharenting. These are situations where parents share information about their children for all the wrong purposes, for example a compelling content which can include elements of contempt, ridicule, criticism and, in extreme cases, violence. Kopecký (2019, p. 15) draws attention to the content in which children are used to promote political opinions and ideologies of parents and holders of parental rights, for example videos made at protests or political rallies where parents present their views and opinions, accompanied by children, who “thus become part of the political agenda and active participants in politically motivated activities”. Such content may in the future seriously discredit the child and cause them many problems in their personal and professional life.

At present, children are brought up in a world that is being increasingly monitored, analysed and manipulated by technological processes, and early childhood has become a turning point for so-called datafication, i.e. procedures that focus on data collection (Van Dijck, 2014). Although sharenting is a relatively new threat, it can also have several positive aspects, e.g. strengthening ties and relationships among family members and friends or creating new friendships with parents who share common interests. Steinberg (2017) emphasizes the key role of sharing in cases where parents raise a child with a disability – these parents seek support and understanding and wish to exchange experiences with families that are going through the same experience.

A major drawback of sharing is the fact that many parents do not have enough (or no) information about risk and dangers of sharenting. Insufficient media literacy and the ignorance of the risks and negative consequences of sharenting should be discussed more given the fast digitalisation of society, technofence and datafication and their impact on minors. The associated risks are classified into several categories, e.g. in this respect, Plunkett (2019) defines three categories: criminal, legal and socio-psychological risks and threats. Misuse or uncontrolled viral dissemination of personal data and sensitive information can lead to cyberstalking, cybergrooming, paedophilia, extortion and other dangerous threats in the online environment. A very common undesirable consequence is (cyber) bullying and its various forms and manifestations, misuse of data for marketing purposes, illegal data trading. Sharenting can have significant negative effects on the self-esteem and mental well-being of minors.

With regard to the prevention and elimination of undesirable consequences of data sharing, it can be stated that the predictors of safe online behaviour (for parents, holders of parental rights as well as minors) are primarily good digital and media literacy and adherence to the principles of digital ethics. The loss of control over sensitive content and personal data and the lack of knowledge of final recipient pose direct risk not only for individuals but also entire families. Various social initiatives, projects, but also self-regulation and self-education of parents in this area are effective ways to protect children's privacy and rights and, ultimately, their future.

### **Sharenting in Slovakia and abroad – risks and opportunities**

Although it is not possible to restrict parents from creating digital footprints for their children online, it is important to educate them about security and privacy on the Internet. Research carried out in this field point to the negative consequences that arise in connection with public content sharing (intentional and unintentional). Therefore, a closer examination of the type of information that parents share about their children on social media and an analysis of the causes of such behaviour is desired in order to meet the stated aim of the research. The attention will be paid to an extensive set of data (visual and audio files, posts and a combination of all of the above) concerning the family life of users of chosen social media. The information which create the image of the social media user and tell about their character include (given the frequency of published posts on social media) the date the social media account was created, the privacy conditions, the number of friends and acquaintances, the total number of added posts, the time they were shared, including the comments below posts, as these comments may influence the future direction of information sharing and interaction with other social media users (Bezáková et al., 2021). The output of the analysis is an overview of the individual's activity – the parent (activities including minors). For this reason, it should be emphasized that any content shared online about minors may have an adverse effect on their future and social and professional status. It is thus necessary to create a responsible online environment in order to avoid any social harm that could be caused by sharenting. In connection with the recording, archiving and sustainability of personal data, parents nowadays face different problems than previous generations, as digital sharing of personal data has become a norm (Pacalajová, Kubinec, 2021). At the same time, however, the number of friends on social media significantly affects the nature of information shared (not excluding that pertaining minors). One of the reasons is the need to compare one's life with the life of the others – a natural thing people do in the “offline world”, too. However, social media offer a much more straightforward way to do that (in some cases borderline voyeurism). By default, this is accompanied by the need to control and continuously monitor the behaviour of others on social media (Štrbová, Boldišová, 2021). On the other hand, sharenting helps parents satisfy the needs related to self-realization and social recognition, especially in times of strong social isolation, e.g. during maternity or parental leave, or other periods of social exclusion. Parents like to present and boast with the success of their offspring. Experts believe that mothers in particular may be more prone to share photos of their children on

social media because a visual presentation can convey the experience much faster than a written or oral description of the story (Bartholomew et al., 2012; Fox, Hoy, 2019). Slovak Internet users also have experience with sharing private details of lives of their children on social media. According to a quantitative survey conducted by the PR agency GETLIKE under the auspices of the software company ESET in 2019, in a sample of more than 500 respondents, up to 62% of parents aged 25–45 admitted to regular sharing of private details of their lives on social media. Photographs of children make up 81% of information shared from the family environment. 99% of respondents also stated that the face of their child is recognizable in the photo (Lajčák, 2019). More representative results were brought by the research conducted in the Czech Republic, which was carried out in 2018 by the Center for the Prevention of Risk Virtual Communication in cooperation with the telecommunications services provider O2 Czech Republic. 1,093 parents took part in the research and filled in an anonymous electronic questionnaire concerning the issue of the child's personal data handling by the parent on the Internet. Once again, it was confirmed that more than half of the respondents share photos of their children in the virtual space. However, parents in the research preferred to share photos of their children via e-mail sent to a specific person or via messaging applications<sup>3</sup> to the detriment of social networks (approximately 60% of respondents), which is a very positive thing. Thus, majority of parents share photographs primarily with their close relatives, e.g. with grandparents or the other parent (80%). Almost 42% of parents shared a photo of their child with friends on social media (Kopecký, Szotkowski, 2018).

A survey in Britain running for several years addressed a large group of respondents – more than 2,000 parents of children under the age of 13 were interviewed. The survey revealed that parents publish an average of 1,500 photos on social media by the time their child reaches the age of five (almost 300 photos per year). As many as 53% of respondents stated that they had uploaded a photo of an other person's child to the Internet in the past. The finding that 39% of respondents think that they exclusively own the rights to photographs published on social networks certainly raises eyebrows (Cino et al., 2020; Rose, 2017). In practice, however, many digital platforms reserve the right to use shared files to further promote the services offered without the prior need to seek consent from the person who originally posted the material.

Research from the Republic of Poland provided a detailed analysis of profiles of parents created on a specific social network platform. The aim of the research was to identify the habits of parents in a digital environment with regard to the presentation of children under 8 years. The survey was conducted on the social networking platform Facebook over the period of 4 months, included 168 user profiles (parents) who uploaded a total of 19,431 photographs (representing more than 75% of the total number of photos posted) depicting a minor. Almost 40% of parents voluntarily shared more than 100 photos of their children during the period under review. Based on the thorough analysis of the accounts included in the study, most of which had at least 200 friends on Facebook<sup>4</sup>, the researcher Anna Brosch of the University of Katowice concluded that most children had “digital

<sup>3</sup> E.g. WhatsApp, Messenger, Skype and others.

<sup>4</sup> Only 2.4% of respondents had less than 100 Facebook friends.



identity” within the first months of their lives. In addition, the published photographs contain various additional information enabling unambiguous identification of the person depicted. This is most often the child’s first name (90%) and their date of birth published in the first weeks after birth or later on the occasion of their birthday (84%). Almost a third of the parent accounts on Facebook also featured a photo of various official documents of children, including birth certificates, record of enrolment in kindergarten or primary school, various certificates and more. It is striking that only 8% of parents changed their social media privacy setting from the default standard to improve the level of privacy protection (and thus that of shared information). It should also be emphasized that in most cases it was only a matter of keeping the friends list secret from others, which has no effect on limiting the audience to which digital content is made available (Brosch, 2016). Parents in the UK face a similar problem when it comes to social media privacy settings. According to the available results of the above-mentioned survey, up to 24% of parents don’t know where they can change privacy settings on the social network they regularly use. Approximately 40% of respondents admitted that they had no idea how to properly set up their privacy settings (Rose, 2017). The most concerning fact is that 85% of parents have not checked the privacy setting on the social network for more than a year (if they have ever done so) (Ranzini et al., 2020).

According to the international non-profit organization Family Online Safety Institute based in the United States, 20% of parents share information about their children on the Internet which could theoretically have negative consequences for their future career or social life (Donovan, 2020). Studies show the tendency of adult Internet users to mostly share happy moments of their lives, like birthday parties and family celebrations, first day of school and the like. Activities such as playing with toys, peers, eating out, sleeping or a trip in nature are usually included in the category of everyday situations (showing spontaneous moments of the everyday life; mostly amateur photos). Statistics show that photos done by professional photographers shared on social media make up only a very small group (about 2%) of shared content (Udenze, Bode, 2020).

Some parents do not even realize that a photograph of a minor freely made available on social media can, under certain circumstances, jeopardize minor’s mental development and ridicule them. A survey conducted in the Republic of Poland revealed an alarming fact. 67% of parents shared a photo on their Facebook profile which can be considered inappropriate given the age of the child or activity performed (Brosch, 2016). In an anonymous survey that took place in the Czech Republic, a fifth of parents (20.22%) admitted that they had shared photos in which a child was partially naked and at the same time it was possible to determine the child’s identity. Photographs featuring half-naked children under the age of 3 during activities such as swimming or beach fun dominated (Kopecký et al., 2020). Such freely available material could become the object of interest of sexual predators or shared on porn websites. Another type of material that might attract unwanted attention over time is a picture of a dirty or crying child sitting on a potty, a sleeping child, a child undergoing medical examination, a hospital stay, etc.

At the same time, several studies have confirmed that parents do not normally take into account the views and feelings of minor family members when sharing content on social

media. As many as 69% of parents in the Slovak Republic have no problem sharing a photograph of the child on the Internet. They admitted that they do so without discussing it with the child depicted first. The child thus has no opportunity to express their opinion in this regard (Lajčák, 2019). Similar results were presented by McAfee, a cybersecurity company, that found that 58% of parents in the United States were acting in the same manner. More than 22% of them believe that their child is too young to be able to grant such a consent, or to be able to rationally assess the consequences. According to the respondents, it is the parents who are fully responsible for the presentation of the child online and therefore have the right to decide for them in this regard (Hinojo-Lucena et al., 2020). Following the above-described activities of parents on social media, another serious paradox should be pointed out – 71% of American parents claim that they are aware of the threat of misuse of photos and personal data shared on the Internet (Hall, 2018). In the case of the Slovak Republic, up to 93% of the addressed parents are aware of the issue (Lajčák, 2019). Almost half of adults are concerned about the paedophiles on the Internet, stalking and digital kidnapping. Other risk factors affecting minors include cyberbullying (Steinberg, 2017). The problems in this regard require an immediate solution as only about 10% of parents actually know all their virtual friends in the offline world. According to a British survey, 20% of parents also allow their Facebook friends' friends to view content they post and 8% of respondents have their posts accessible to all users of the social network platform (Marnoch, Knock, 2016).

International research involving minors has sought to provide a different view of the issue of online content sharing depicting minors. However, it is important to note that these findings may not reflect the real situation, as not every child is able to objectively and truthfully assess the situation at an adequate level, and minors may not be aware of their parents' social media activities. It is therefore more a matter of identifying a framework for the behaviour of children and young people under the influence of modern information and communication technologies used by their immediate family members. According to a 2019 survey by Microsoft entitled "Civility, Safety and Interaction Online", which involved more than 12,500 respondents aged 13–17 from 25 countries, a total of 42% of teenagers say they have a problem with their parents posting about them on social media (Hernandez, 2019). In 2020, more than 25,000 children aged 9–17 from 19 European countries including the Slovak and Czech Republics, as well as Germany, France and Italy were presented with results on the digital behaviour of children and adolescents thanks to the international project on safe internet use EU Kids Online. In most countries, about a third of children reported that their parents had posted information about them on the Internet in the past year without asking them first. While this was reported by only 8% of Slovak respondents, in Norway up to 36% of minors agreed with the statement. The number of children who asked their parents to remove a post that was about them from social media is also worth noting – on average, this was reported by 14% of minors (Smahel et al., 2020). Parents using social media to boast with their children to their acquaintances in the virtual space entails a great risk in the form of loss of privacy of the persons concerned, especially given the secondary (uncontrolled) dissemination of content in terms of groundswell.

### Results of the empirical survey on sharenting carried out in 2021

The empirical survey conducted by the authors in 2021 on a sample of 308 respondents in the position of a parent of a minor brought many interesting sharenting-related findings. At the first stages of the research, the primary subject of our interest was the age of the parent and the age of the child. Some respondents gave the age of all their children. Therefore, the total number of responses is greater than the total number of respondents.

**Table 1: Age of a parent**

Age of parent	Absolute number	Relative number
18–24	11	4 %
25–30	42	14 %
31–35	52	17 %
36–40	66	21 %
41–45	77	25 %
46–50	31	10 %
>50	29	9 %
	308	100 %

*Source: Personal collection (2021)*

**Table 2: Age of a child**

Age of child	Absolute number	Relative number
0–1	41	12 %
2–4	90	26 %
5–7	69	20 %
8–10	48	14 %
11–13	55	16 %
14–16	48	14 %
	351	100 %

*Source: Personal collection (2021)*

In the first step, the research identified the type of data that parents share on social media and whether this data are related to the issue of portraying a minor. Attention was also paid to the frequency of sharing such posts in a virtual environment. It was found that up to 66% of respondents share minors-related content, the remaining 34% did not state whether they share this content. The frequency of content sharing is given in Table 3. 58% of respondents stated that they share this type of content occasionally (individual situations were given in the survey).

**Table 3: Sharing of content and frequency of sharing**

Sharing	Frequency of sharing	Absolute number	Relative number
yes	Every day	2	1 %
	Several times a week	11	4 %
	Occasionally	178	58 %
	Other	13	4 %
no	I do not share	105	34 %
		308	100 %

*Source: Personal collection (2021)*

An important factor influencing this issue is the motive for sharing content. Motives for sharing content have a lot to do with the parent's personality and satisfaction of their own needs, while the interests and well-being of the minor are pushed to the background. Some of the motives for doing so may include the feeling of joy that an adult wants to share with a certain audience, a problem they might want to discuss or they wish to simply inform the other about activities the minor does. Given the above assumption (several motives), the given item in the questionnaire was created as the multiple-answer item. 103 respondents stated that they share content to preserve memories. Here we see a parallel with the classic (analogue) photo albums – a very popular way of preserving memories in the past. With digital photo albums, however, the owner of the photo album has no control over the audience that sees the content. Other motives, such as the feeling of pride and sharing joys of everyday life with friends also ranked high (the former was chosen by 92 respondents while the latter was chosen by 86 respondents). The answer “other” indicates the need to boast, to share a nice moment in life, to repeatedly share previously shared content (a “memory” – special functionality on the social network Facebook), or keep acquaintances living abroad informed (4 respondents). The online environment offers many ways of sharing content, whether its text, image, audio or video content. Given the findings, up to 146 respondents share mainly photos depicting specific moments. The questionnaire item was designed as an open-ended item, with many respondents choosing answers of similar nature. Based on the analysis of the answers, it could be stated that respondents primarily shared photographs showing walks in nature, concerts, as well as various leisure activities, such as sports or creative activities, or family holidays.

In order to draw attention to parents who do not share content on their children, the aim of one of the items was to examine the reasons for (not) doing so. The secondary aim of the item was to find out the parents' media literacy, potential awareness of the dangers and threats associated with such actions, and motives for not sharing the content. The most prominent motives were as follows: “I want to protect my child's privacy”, “I do not share any information about my child / children”, “I am afraid of possible cyber-threats”, “Children certainly wouldn't want me to do it” or “Children don't want it”. With regard to the issue of nudity of minors in content shared by their parents, the respondents were given the opportunity to express their opinions in open ended items. As far as negative opinions

are concerned, respondents expressed disagreement, condemnation of such conduct, or stated that sharing such content is absolutely inappropriate. Respondents with positive attitude to the issue expressed a considerable degree of tolerance and agreed that each user is entitled to share whatever they see fit. Privacy settings on social networks allow users to specify groups or individuals who are allowed to view content they share. However, each user is different and so are their privacy settings (whether they are strict or not, regularity of updates, individual security elements). In order to work with privacy settings, users must be aware of them and have certain skills and motivation to use them efficiently. As many as 211 respondents reported changing their privacy settings. 49 respondents stated that even though they know what privacy settings are, they did not change them, 48 respondents stated they did not know privacy settings could be changed.

Given the information on the preference of the social network among the respondents, the aim was to find out whether there is a significant correlation between the preference of the social network (Facebook, Instagram or Tik Tok) and the type of content parents share about their children. To do so, Pearson's chi-square test was used. For this purpose, the null hypothesis and the alternative hypothesis were established:

- ◊ Null Hypothesis –  $H_0$ : There is no correlation between the type of social network and the type of content parents share about their children (variables  $A$  and  $B$  are independent).
- ◊ Alternative Hypothesis –  $H_A$ : There is a correlation between the type of social network and the type of content parents share about their children (there is a correlation between variables  $A$  and  $B$ ).

The research followed two qualitative features:

- A – type of content (private photos, everyday activities, photos capturing the life of the whole family).
- B – social network on which the content is shared (Facebook, Instagram, Tik Tok).

The results of the research were entered into a contingency table, and then the values of the expected frequencies were calculated. When testing the Hypothesis  $H_0$ , the variables  $A$  and  $B$  were considered independent (their independence was tested). Pearson's chi-square test was used. The selected level of significance  $\alpha = 0.01$ . The values are given in Table 4.

**Table 4: Observed frequencies**

	<b>FB</b>	<b>Instagram / Tik Tok</b>
Private photos	144	19
Everyday activities	66	28
Photos capturing the life of the whole family	24	15

*Source: Personal collection (2021)*

**Table 5: Expected frequencies**

	FB	Instagram / Tik Tok
Private photos	128,86	34,14
Everyday activities	74,31	19,69
Photos capturing the life of the whole family	30,83	8,17

Source: *Personal collection (2021)*

The value of the Pearson's chi-square test is  $\chi^2 = 20.158$ . The critical value was determined at the significance level  $\alpha = 0.01$  and at the value  $r = (k - 1) \cdot (m - 1) = (3 - 1) \cdot (2 - 1) = 2$ ;  $\chi^2_{\alpha} = 9, 210$ .

It follows that  $\chi^2 > \chi^2_{\alpha}$ , i.e.  $20, 158 > 9, 210$ . Therefore, the Hypothesis  $H_0$  is rejected at the significance level  $\alpha$  while the Hypothesis  $H_A$  is accepted:

There is a correlation between the type of social network and the type of content parents share about their children.

Subsequently,  $p\text{-value} = 0.000042$ .

If  $p < 0.01$  ( $0.000042 < 0.01$ ), then Hypothesis  $H_0$  is rejected at the significance level  $\alpha = 0.01$ .

Therefore, the validity of the Hypothesis  $H_A$  was confirmed with a 99.9% probability.

Our findings suggest that there is a dependency between the content shared and the type of social network used by the parent to share that content. The research showed that the most popular social media platform is Facebook, where the highest number of posts was recorded. The results confirm statements of Brosch (2016), who claims that not only digital natives, but also parents (respondents, especially in the productive age), who, according to our research, do not belong to this "digital natives" generation, engage in various online activities. By engaging in various online activities, parents create not only their own digital identity, but also the digital identity of their child. The empirical research showed that the most shared content relates to information about one's family, children included, everyday activities, detailed description of specific activities and family photos. The digital footprint of many children is extremely large even before they learn to walk. There is also a large digital footprint of whole families, as families (parents) give other people a detailed insight into their privacy. This entails far-reaching security consequences and risks.

#### IV. Conclusion

Due to digitization, many processes have taken up an electronic form. This paper addresses the issue of sharing content by adults (parents) in an online environment. However, the attention should be paid to the principles of proper but above all safe use of the Internet and digital media in order to prevent potential risks (present or future). Based on the theoretical framework and the results of our own empirical research, we have arrived at conclusions that point to important facts and associated risks. According to several authors, as well as statistical data, the content sharing is gaining in popularity, and is even becoming a kind of norm (Siibak, Traks, 2019). A survey conducted in 2019 in Slovakia on a sample of more

than 500 respondents showed that 62% of parents aged 25–45 regularly share details of their privacy on social media. The results of our research show that 66% of parents share content related to their children. The research also confirmed the statement of Kumar and Schoenebeck (2015) who state that the most frequently shared content is photos of private lives, daily activities of a child or family. Sharenting often becomes a means of satisfying certain needs of parents, for example the need for recognition or fulfilment of their own needs through their children. The motives given by the respondents were mostly not related to satisfying their own needs (these were represented in the research to a lesser extent, in particular in answers detailing the feeling of pride and the need to brag). The primary reason for sharing such content is the need to preserve memories (this was put into a parallel with classic (analogue) photo albums).

Another issue the research on sharenting should address is social networks and influencers. Some influencers use their own children to promote products. This issue should be addressed in the context of the companies that hire influencers to promote their products, as well as the motivations and decision-making processes of influencers in relation to sharing minor-related content for promotional purposes. Legal aspects of such behaviour are also important, as are the security risks associated with the disclosure of sensitive information, images of minors, as well as other information of a private nature for profit.

Sharenting is undoubtedly an issue to be discussed and researched in the 21st century. In this regard, the need to protect privacy and personality in digital culture should be pointed out. At the same time, the phenomenon of sharenting brings new challenges and obstacles that previous generations of parents and children did not have to deal with. We consider it extremely important that Internet users be made aware of the potential risks in this context and, in particular, taught how to prevent and eliminate them. The emphasis on prevention is crucial, as dealing with the negative consequences of sharing is extremely difficult, sometimes impossible. In this regard, the role and importance of media education and literacy, which are important predictors for safe Internet use and data sharing, should be highlighted.

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