

## **Adoption of Parental Mediation Strategies for Teenagers' Internet Use**

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**Abstract:** Increased internet use and access to digital devices have made parents to worry about their children being exposed to risks associated with virtual world. Parents being their primary care-taker may impact the digital life of a child. The present study investigated the mediation strategies adopted by parents of teenagers aged between 13 to 17 years. Four mediation strategies namely active mediation, restrictive mediation, technical and monitoring were derived from a wide range of internally consistent mediation practices by using principal factor analysis. The parental mediation was mainly predicted by child's age. Overall parents deployed lesser mediation as the child grows. The impact of the child's gender proved significant for adoption of restrictive and technical parental mediation practices only. Significant variations in technical mediation were also observed between mothers and fathers.

**Key Words:** Online risks, Parental Mediation, Teenagers, Internet use, Cyber-safety

### **I. INTRODUCTION**

The diffusion and proliferation of technology and smart phones among teenagers have increased across the globe (Ktoridou et al., 2012; Mascheroni and Olafsson, 2014; Madden et al., 2013; Marsh et al., 2018; Pew Research Centre, 2016; Pew Internet, 2013; Zaman et al., 2016). Internet use among teenagers has taken a momentum leap and almost got doubled in the last 10 years (Smahel et al., 2020).

India has the second largest internet user base (approximately 700 million users) after China which is further estimated to reach the figure of 974 million users by 2025 (Statista,2020). In terms of digital adoption rate, India holds second position all over the world for key dimensions such as digital reach, data consumption and digital foundation (Mc Kinsey Global Institute, 2019). An Indian internet user spends 17 hours per week on internet which more than China and United States. More than 66 million internet users are in the age group of 5 to 11 years (Internet and Mobile Association of India, 2019) and 32 % of Indian internet users are in the age group of 12 to 19 years (Statista, 2020). 70% of the Indian youth spends 5 hours on internet on a weekly basis and 93% of the teenagers have profile on social network sites (McAfee, 2014).

With such trends of increasing internet usage among teenagers across the globe, the issue of cyber-safety of

teenagers have become pertinent to look into. Apart from numerous benefits, internet poses certain threats for these young minds. Though it is a powerful tool for educational learning, identity formation and self-expression (Lee, 2009; Valkenburg and Peter, 2009) yet it can also produce undesirable consequences in the form of content related risks such as getting young people exposed to in-appropriate content (Vandoninck et al, 2010), privacy related risks involving personal and commercial misuse of their sensitive personal information (Barnes, 2006), contact related risks including communication from people with malicious intentions resulting in the form of cyber-bullying and sexual solicitation (Kowalski and Liber, 2013; Patchin and Hinduja, 2006). The list is quite exhaustive covering a range of other virtual risks associated with internet addiction such as risk of getting socially isolated and poor social relationship (Sanders et al., 2000), negative impact on academic achievement (Kowalski and Limber, 2013; Kirschner and Karpinski, 2010), and several physical and psychological issues such as depression, anxiety and poor health (Kowalski and Limber, 2013).

Teenagers in India are also getting exposed to various kinds of virtual risks. Cyber mum India (2015) surveyed Indian teenagers and found that 44 % of them admitted that they would like to meet or have met someone they first met online. Many of them have bullied someone online and shared their contact details on social media. A substantial percentage of teenagers have done something risky online such as watching in-appropriate content, bullying others, purchasing unsafe things and gambling.

The increasing risk exposure in teenagers has raised concerns among several stakeholders including parents, educators, government and the policy makers. The reason for such concern is attributed to the fact that this is the age where the cognitive ability of the child has not yet been fully developed (Lerner, 2002) thus making them more vulnerable for the potential virtual risks. This has stimulated the research inquiring the role of parents in safeguarding their teenager children from virtual risks. Parental intervention has been proved influential in dealing with online risks (Khurana et al., 2015; Livingstone and Helsper, 2008). It has also been proved beneficial in the area of cyber-bullying in stopping it and providing emotional support to the victims (Fridh et al., 2015; Mesch, 2009).

Parental mediation has been defined as any behaviour adopted by parents in endeavour of reducing the negative effects of media upon children (Clark, 2011). It is the way how parents manage the relation between the children and media (Livingstone and Helsper, 2008, p.81) by means of controlling, supervising and interpreting the media content with the children (Warren, 2001).

The theory of parental mediation of the internet use has been derived from the field of television viewing. The similar mediation styles are also applicable into the area of internet use as well (Kirwil, 2009; Lwin et al., 2008). However, literature on parental mediation of internet use has not been reached on common consensus about the conceptualisation of the strategies and its effectiveness in dealing with the online risks. Considering the increased internet use in the current scenario, it is quite possible that parents may have adopted new mediation practices to deal with online risks so a new research is warranted into the area of parental mediation strategies for internet use.

Thus the present study helps in understanding the practices followed by Indian parents to safeguard their children against the risks emerging out of virtual interactions. The study also makes an effort to identify the role of parents and children demographic factors such as child's age, child's gender and parents own gender on the choice of parental mediation strategy.

## **II. THEORETICAL BACKGROUND OF PARENTAL MEDIATION STRATEGIES**

The conceptualization of parental mediation strategies are based on the parental mediation practises used for television viewing. Valkenburg et al. (1999) identified three major mediation strategies in area of television namely active mediation, restrictive mediation and co-view. Parents critically discuss, evaluate and interpret the media content with the child in active mediation where as in restrictive mediation, parents set rules and regulations about what, when and how much media content can be accessed by the child. The third strategy is co-view where the parents use the media together with the child. This three- dimensional approach of parental mediation styles have been widely accepted in the area of mediation of children television viewing behaviour (Warren, 2001, Nathanson, 2001 b; Gentile et al., 2012) and video games (Nikken and Jansz, 2006) and internet use as well(Nikken and Jansz,2013). However Livingstone and Helsper (2008) argued that mediation of internet requires different strategies as internet use is a less shared activity than watching television (Livingstone et al., 2011). It is challenging to monitor the online activities of child as most of them are now using internet from their mobile phones (Duerager and Livingstone, 2012) within their private space limiting the application of co-using strategy. In addition, the interactive nature of internet makes it more risky (Livingstone et al., 2017) as compared to the one way traditional media like television. Thus, considering the unique nature of internet, it is clear that mediation of internet use requires some different strategies that are internet specific. Being a solitary activity, the scope of implementing the restrictive and active mediation is also limited. The restrictive mediation in the area of internet use was conceptualised and defined as interaction restrictions (Livingstone and Helsper, 2008; Symons et al., 2017) including parents setting rules and regulations regarding child's communication over social networks such as using instant messaging, e-mail etc. Another form of restrictive mediation was coined and divided into two subtypes namely access restrictions (how much and when a particular media can be used and the content restrictions (which content can be downloaded or seen (Nikken and Jansz, 2013; Sonck, Nikken and de Haan, 2013).Thus, restrictive mediation in context of internet use has been accepted differently from television viewing.

Another internet specific strategy that emerged is technical mediation(Eastin, Greenberg and Hofschire, 2006) which includes a group of practices involving the installation of filters and software such as blocking and filtering software to limit the child's exposure to specific content (Chang et al., 2015; Lenhart and Madden, 2007; Livingstone et al.,2011;Mitchell, Finkehor and Wolak, 2005) and use of software to track the online activities of the child (N Nikken and Jansz, 2013; Sonck, Nikken and de Haan, 2013). Monitoring as an internet specific strategy is also included in the parental mediation research wherein parents track the online activities of a child after the usage such as checking the history of the web pages visited by the child and checking the e-mail messages that have been sent by the child (Chang et al.,2015; Liau, Khoo and Ang, 2008; Livingstone and Helsper, 2008; Sonck et al., 2013).Supervision as an internet specific mediation strategy means to keep an eye or being around the child when the child is using the internet (Nikken and Jansz, 2013).

The literature on parental mediation in context of internet further divulges that variations exist in how these strategies have been defined along with overlapping of certain mediation practices. Differences have been observed with respect to the type of strategies used and the way of measuring them. Just to highlight, active mediation and co-use did not emerge as different parental mediation strategy for internet (Livingstone and Helsper, 2008) as it was argued it is not possible to co-use the media without any communication or discussion thus blurring the boundary between the active and co-use as a strategy. Thus active mediation and co-use were termed as active co-use (Livingstone and Helsper, 2008). Contrary to this, Sonck, Nikken and de Haan (2013) did not recognise active co-use as a separate strategy. Also active mediation was divided as active mediation of

internet safety and active mediation of internet use (Livingstone et al., 2011; Sonck et al., 2013) because it includes parent's discussion with the child about being safe online. It can be abridged from the above discussion so far that the three dimensional approach of mediation of television viewing is inaccurate for internet use. In addition, there is un-ambiguity with respect to the mediation styles of internet use. Technical mediation can be proposed as a distinctive strategy. The related literature support active and restrictive mediation as important strategies with minor variations. Monitoring as a strategy seems relevant for the older age group while supervision and co-use is particularly relevant in the younger age group.

Apart from the overlapping and un-ambiguity about the mediation strategies, role of demographic factors such as child's age, child's gender, parent's own gender, parent's education and occupation on the choice of parental mediation strategy has also been observed. For example, age of the child has been identified as an important influential factor in the research. Overall literature suggests that parents use more mediation for the younger ones than the older (Fleming et al., 2006; Gentile et al., 2012; Lee, 2012; Nathanson et al., 2012). Similar results were echoed in the studies by Eastin et al. (2006) and Lee (2013) where more restrictions were imposed on the younger teens than the older ones. The amount of mediation in terms of monitoring and restrictions decreased as the child grows (Padilla-Walker et al., 2012; Sonck et al., 2013). Symons et al. (2017) also confirmed that the amount of mediation decreased with age of the child specifically when it comes to interaction and access restrictions.

Child's gender as a predictor of parental mediation strategy has produced inconsistent results. Many studies have confirmed that it was the girls who were subjected to more mediation than boys (Gentile et al., 2012; Livingstone et al., 2017; Nikken and Jansz, 2006; Symons et al., 2017). On the contrary, some parents have been observed directing their mediation more towards boys (Eastin et al., 2006; Liao et al., 2008). Few researchers established a non significant relationship between gender and parental mediation (Livingstone and Helsper, 2008; Lee, 2012).

Another aspect i.e. parent's own gender has been proved as an important predictor of degree and type of parental mediation strategy adopted by them. The researches indicate that mothers apply all types of mediation more than the fathers (Nikken and Jansz, 2006; Nikken and Jansz, 2014). Mothers use more of restrictions than the fathers (Livingstone et al., 2017). Parallel to the results, mothers were found to be implementing more parental control than fathers (Valcke et al., 2010). So, it can be stated that demographic factors do have an impact on the choice of parental mediation strategies. The present study also explored these factors and their eventual impact.

### III. RESEARCH METHODOLOGY

The study includes the reports derived from any of the parent whose child is of the age from 13 to 17 years. For filling up of the questionnaire, the researcher considered either of the parent who has better knowledge about their child's online activities. The sample is collected through convenience and snowball-sampling methods (Baltar, Fabiola & Brunet, 2012; Zhou, 2011) where 570 respondents were contacted and after scrutinizing the responses, finally 480 responses (84%) were considered for final data collection purpose. The teenagers were divided into two groups. One group consisted of the teenagers aged between 13, 14 and 15 years and the other group consisted of teenagers of age 16 and 17 years.

The items were majorly derived and adapted from the studies by Livingstone and Helsper (2008) and Sonck et al. (2013) a questionnaire is formed. The final questionnaire consists of two parts. The first part of the

questionnaire had 3 questions pertaining to collect the demographic information such as respondent's age, gender, and the child's age. The second part of the questionnaire had 25 statements to measure the frequency of adoption of the parental strategy on a five point likert scale ranging from never

(1) to (5) always. The reliability of the data collection tool was established after deletion of two items having lowest item to total correlation (0.125), maximum correlation (0.196) and lower value of anti image matrix (0.269). These items were not found fit for applying factor analysis as these were not significantly loaded to any construct. Before implementing the final questionnaire, a pilot survey of 120 respondents was administered. The overall value of cronbach alpha for the scale is found to be 0.903, which indicates sound reliability of the scale and there is significant internal consistency among the items (Malhotra and Dash, 2011).

#### IV. DATA ANALYSIS:

The data analysis for the present studies was done in multiple steps. In the first step, descriptive analysis was done. To achieve the first goal of the present study (identifying the parental mediation strategies), exploratory factor analysis was applied on parental mediation practices. Finally t test was applied to measure the impact of gender of the parent and age of the child on the choice of parental mediation strategies.

**Table 1 Profiling of dimensions associated with items related to online risk handling strategies adopted by parents for their children to handle different type of online risks**

<b>Rotated component Matrix and Factor loadings of items</b>					
<b>Restrictive Risk Handling (Cronbach Alpha = 0.931 )</b>					
R1	0.865	R4	0.784	R7	0.771
R2	0.860	R5	0.783	R8	0.728
R3	0.789	R6	0.773	R9	0.702
<b>Active Risk Handling (Cronbach Alpha = 0.906)</b>					
A1	0.863	A4	0.822	A7	0.725
A2	0.827	A5	0.814	A8	<b>0.705</b>
A3	0.825	A6	0.780		
<b>Monitoring Risk Handling (Cronbach Alpha =0 .805)</b>					
M1	0.858	M3	0.834	M5	<b>0.736</b>
M2	0.848	M4	0.829		
<b>Technical Risk Handling (Cronbach Alpha = 0.829)</b>					
T1	0.850	T2	0.799	T3	0.773

Source: Primary Data

Table 1 depicts the results of factor solution of 25 statements measuring the dimensions of strategies adopted by parents for their children to handle different type of online risks. The four extracted factors collectively explain 67.59 percent of total variance is considered as significant variance (Malhotra & Dash, 2011; Hair et. al., 2009). First factor named as restrictive risk handling consist of 9 statements indicating variables such as setting rules and restrictions on using social networking sites, for surfing online and online activities (Warren, 2001, Nathanson, 2001 b). Second factor is named as active risk handling strategy having eight items. This dimension consist of the items about how children should deal with online strangers, behave online and if bullied or

harassed then how to respond to those threats. Parents also advise their children about the potential online risks and how to find resolution for these risks (Nikken and Jansz, 2013). The next factor monitoring risk handling has five items explaining the parent's action like checking children's email or messages and online activities (Livingstone and Helsper, 2008; Nikken and Jansz, 2013). Parents also keep an eye on children's friend circle and online history (Duerager and Livingstone, 2012). Last extracted factor is technical risk handling where parents install different type of software to prevent spam mails and viruses, to filter the internet surfing activities and restrict the time of online surfing (Livingstone and Helsper 2008; Mitchell, Finkehor and Wolak, 2005). The value of factor loading of all the items is found satisfactory and they are significantly loaded on their respective factors. The value of cronbach alpha for all the factors is found more than 0.7, depicting good reliability of the scale and items in respective factors have sound internal consistency.

**Table 2: Mean score comparison of strategies adopted by parents on the basis of gender of parent, age of parent and gender of child for handling different type of online risks (N=480)**

Gender of respondents	Gender		Mean Difference	Std. Error Difference	T	DF	Sig. (2-tailed)
	Male (280)	Female (200)					
Active Risk Handling	3.6978	3.7056	0.0078	.0609	-.190	478	0.897
Monitoring Risk Handling	3.3857	3.4160	0.0303	.0475	-.638	478	0.540
Restrictive Risk Handling	3.7877	3.8183	0.0306	.0598	-.510	478	0.609
Technical Risk Handling	3.9170	3.7750	0.1420	.0589	-.490	478	0.013*
Child Age	Group 1 (299)	Group 2 (181)	Mean Difference	Std. Error Difference	T	DF	Sig. (2-tailed)
Active Risk Handling	3.7508	3.6188	0.1320	.0617	2.141	478	0.033
Monitoring Risk Handling	3.4134	3.3735	0.0390	.0485	0.826	478	0.409
Restrictive Risk Handling	3.8766	3.6746	0.2010	.0602	3.355	478	0.001**
Technical Risk Handling	3.8395	3.8306	0.0090	.0603	0.147	478	0.883
Gender of Child	Male (251)	Female (229)	Mean Difference	Std. Error Difference	T	DF	Sig. (2-tailed)
Active Risk Handling	3.6648	3.7407	0.0759	.0600	-1.640	478	0.070
Monitoring Risk Handling	3.3665	3.4330	0.0665	.0468	-1.440	478	0.155
Restrictive Risk Handling	3.7010	3.9083	0.2073	.0583	-3.535	478	0.000***
Technical Risk Handling	3.7384	3.9430	0.2046	.0577	-3.547	478	0.000***

Source: Primary data

\* $p < .05$ , \*\*  $p < .01$ , \*\*\*  $p < .001$ 

Table 2 highlights the mean comparison and results of T test for strategies adopted by the parents for their children based on their age, gender, and parent's gender for handling the different type of online risks. As far as the gender of the parents is concerned, the t test statistics provide significant values for technical risk handling strategy and insignificant values for active, monitoring and restrictive strategy which means that mothers and fathers have diverse opinions to adopt technical strategy to safeguard their children from cyber world where as mothers and fathers have similar responses for adopting active, monitoring and restrictive risk handling strategy to shield their children from online risks.

The values in Table 2 also depicts that the parents establish rules and regulations for their children about internet usage, limits their internet surfing time and online gaming time based on the age of the children. In case of group 1 teenagers, parents restrict their children to shop online, make online friends and sharing their personal information with strangers and to third party websites (Lorentzen, Fielder & Jonson, 2013). Along with this,

parents install potential antivirus in the devices used by their children to protect them from threats of cyberspace and cyber attacks (Vandoninck and D'Haenens, 2014). In case of group 2 teenagers that are teenagers nearing adulthood, parents change their strategies accordingly, now they rather than putting up restrictions on their children, they educate them about the various pros and cons of the internet activities. Parents teach their children about incidents of cyber bullying on social media, cyber attack, ill effect of internet on health and mind, how to deal with strangers through online and to keep an eye on any type of potential threat (Vandoninck, Haenens and Smahel, 2014). The table explains that t test statistics provide significant results ( $p < .05$ ,  $p = .001$  at 1 percent significant rate) for restrictive risk handling strategy, highlights that parents have diverse opinions to adopt this strategy to



safeguard their children from cyber world. T test provided insignificant results ( $p > 0.05$ ) for other dimensions depicting that parents have similar responses for adopting active, monitoring and technical risk handling strategy to shield their children from online risks. It shows that variance in parents' perceptions for this dimension based on their children's age, is homogeneous. T test statistics for homogeneity of variance provided insignificant results ( $p > 0.05$ ) for dimensions active risk handling, monitoring risk handling and technical risk handling, which indicates that parents of all the teenagers have same thought process, experienced similar things for this factor, and possess homogenous response for installing antivirus to safeguard their children from ill effects of internet (Salazar et.al., 2013).

The study also took into account the impact of child's gender on the choice of mediation strategy by their parents. The t test statistic from table 2 highlights that the parents of male child would like to protect their children from cyber attack through personal counselling and establishing internet usage rules. These male teenagers are advised not to share personal details to unknown through online platform, not to become addict of online games and buying products online without examining the authenticity of the products (Starsrud, Livingstone & Haddon, 2007). The parents of female teenagers believe that they will protect their teenagers from cyber world threats through monitoring and installing software's in their devices, which will protect them from outer threats and viruses. Parents keep an eye on their female teenagers; check their social accounts and online history so that they can warn them of future cyber bullying or harassment or financial frauds. The results of t test statistics were found to be significant ( $p < 0.05$ , i.e.  $p = 0.000$ , significant at 1 percent significant level) for restrictive and technical risk handling indicating that parents of male and female teenagers have different thought process for implementation of these strategies. whereas for other dimensions, the results are insignificant ( $p > 0.05$ ), which means that parents have similar opinions for adopting active and monitoring risk handling strategy for their children irrespective of their gender.

#### **V. DISCUSSION AND FUTURE DIRECTIONS:**

The ever increasing usage of internet among teenagers have driven researchers to inquire about what parents can do in order to minimize the online risks while optimizing the online opportunities. The present study investigated the parental mediation practices adopted for safeguarding teenager's internet use considering the perspectives of parents of children aged between 13 to 17 years. Contrary to previous studies, the present study consists of more male respondents than females. This may be attributed to the fact that fathers are more involved in the child rearing process now a day as compared to the past and the gap between the mother's and father's child parenting process has been reduced (Amato, Meyers, & Emery, 2009; Ponnet et al., 2015). It may also be due to the gender specific differences with respect to the technology use. Males make more use of the computer technology than the females (Punter et al., 2017) and have more positive attitude towards computer use (OECD, 2011).

Based on former studies, mediation practices were included and further divided into 4 distinct strategies by applying factor analysis namely discussion mediation, restrictive mediation, monitoring and technical mediation which were coincide with the strategies found in former studies (Livingstone and Helsper, 2008; Nikken and Jansz, 2013; Sonck et al., 2013). The co-use and supervision as a mediation strategy did not emerge in the present study. This may be due to the increased privatized use of internet by the teenagers through mobile

phones which has made it practically impossible for parents to co-use the internet. The same reason goes with the non emergence of supervision as a mediation strategy.

Overall the results of the study revealed that technical mediation is the most adopted and monitoring is the least adopted mediation strategy by parents across all age groups. Many parents admitted that their children had more knowledge of social media than their own thus making the monitoring of the internet a challenging thing to do (Cybermum India, 2015). Also, a lot of teenagers claimed that they know how to hide their online presence from parents and they don't want their parents to follow their online behaviour (Mcafee, 2015).

The study also took into account the role of demographics such as child's age, gender and parent's own gender on parental mediation practices implemented. The gender of the child had significant impact on restrictive and technical mediation only where parents imposed more restrictions and technical mediation on female teenagers than males. These results are also in contradiction with other studies where it was found that parents implement more restrictions for boys than the girls (Eastin et al., 2006; Nikken and Jansz, 2011) however results coincide to a few studies where parents targeted more amount of mediation towards the girls than the boys (Gentile et al., 2012; Livingstone et al., 2017; Nikken and Jansz, 2006; Symons et al., 2017). The possible explanation of this could be linked up with the parent's anxieties related to the girl's exposure with the contact risks such as cyber-grooming (Pederson, 2013) as girls spend more time over social networks than boys (Tsitsika et al., 2014). Thus they may be perceived to be more in need of restrictive parental mediation than the boys.

Also, parent's own gender did not emerge as an influential factor in explaining parental mediation except for technical mediation where fathers were found to be implementing more technical mediation than the mothers. These results are contrary to few studies where mothers used more of all types of mediation than the fathers (Symons et al., 2016; Nikken and Jansz, 2014). The difference in parental mediation strategies based on parent's gender could be explained by gender specific internet experiences. The adoption of different mediation practices by mothers and fathers could also be justified by considering the perceptual gaps with respect to the occurrence of online risks with teenagers. Related literature confirms that mothers and fathers have different risk perception for boys and girls. Mothers have better assessment of the child's online activities (Liau et al., 2008) where as fathers had more accurate knowledge of the child's online experiences (Symons et al., 2016). Thus these perceptual gaps regarding the occurrence of online risks as explained by parent's gender may lead to the adoption of different mediation practices. In present study, fathers were found to implement more technical mediation than mothers. The reason for this could be the difference between the level of digital literacy among mothers and fathers as level of digital literacy and social media literacy have found to be influencing the level of parental mediation (Daneels and Vanwynsberghe, 2017; Livingstone et al., 2017). This can be further explored taking into account the mediating impact of level of digital literacy and gender together.

The child's age has been proved as the largest predictor with respect to the parental mediation. As expected, it was found that all types of mediation reduced mediation as the age of the child grows. This is in line with many other studies where parents directed more mediation for the younger ones (Livingstone and Helsper, 2008; Lee, 2012; Shin and Lwin, 2016; Fleming et al., 2006; Gentile et al., 2012; Nikken and Jansz, 2014). The implementation of more mediation for the younger ones could be attributed to the increased parents' concern and risk perception for them as compared to the older ones. Parents were found to be of more concerned for

their younger teenagers (Ktoridou et al., 2012). The similar results were echoed in previous studies where it was confirmed that parents become permissive and provide more freedom to child in using the internet as they grow older (Ozgun,2016).However, it is not that parents completely become uninvolved with their child's internet behaviour. It is possible that there may be that the parents might be adopting some other ways such as deference strategy in order to safeguard their children wherein parents willingly choose not to intervene in the child's internet behaviour (Padilla-Walker, 2012). Also, it is argued that mediation is more social in nature than simply putting restrictions on the children (Kirwil, 2009; Livingstone and Helsper, 2008) thus the role of parental modelling and sibling modelling in mediating children's internet use (Sonck et al., 2013) could be explored in future studies.

Another reason for lesser mediation targeted towards the older teenagers could be that as the age of the child increases, parental influence starts decreasing and the influence of peers grows (Brown, 2001; John, 1999; Kalmus et al., 2009; Shin and Lwin,2016). It is age when the children start spending their maximum time at schools and with peers. Adolescents mostly seek advice from their peers than parents and teachers when bothered by some online risks (Livingstone et al., 2011). So the role of peer and teacher mediation can be looked into in future studies. The role of schools as an institution can also be studied as in many studies parents believed that the educational institutions must play an active role in safeguarding children against online risks by imparting suitable training programs (Norton Online Family Report, 2012).

Also due to the current situation of pandemic across the globe, children's technology usage has been significantly changed. Due to which it is expected that the technology use has been reached up to teen and pre-teens. Thus issues related to the mediation related with that age group will be relevant now. Thus future studies can inquire into the mediation styles related with the younger age groups as well.

In general, our study implicates that parents are adopting good enough mediation to minimize the online risks. We suggest more use of active mediation based on support, discussion and personal warmth between parent and child. As suggested by Duerager and Livingstone(2012), we recommend and encourage parents to implement social strategies rather than restrictive thus helping in enhancement of online opportunities of children while minimizing the online risks. Policy initiatives should focus on awareness-building campaigns and training courses for comprehensive approach to deal with the online risks for children.

The study provided meaningful insights into the use of mediation practices by parents for dealing with the virtual risks for their children thus making important contributions to the study. However our study considered only the parent's reporting of the mediation strategy adopted. Research indicates discrepancies among the responses when reports from both the child and parents were considered (Symons et al., 2017). Children reported lesser mediation as compared to their parents (Gentile et al., 2012; Liao et al., 2008; Sonck et al., 2013; Wang, Binachi and Raley, 2005).The reason for children reporting lesser mediation could be because they might not be aware of their parent's mediation practices. Sometimes parents may also exaggerate their responses so as to achieve social desirability (Gentile et al., 2012). Thus future research is suggested using a multi-factor approach considering responses from both parents and children.

Also the impact of other variables such as socio-economic status, family size, family communication patterns, parenting styles has been ignored and missed out in the present study as no special attention was given to the economic background while choosing parents respondents and mostly those respondents were selected having the resources needed to implement the mediation and from a privileged sections So future studies can shed light upon the role of those factors in parent's decision of choosing a particular strategy over other.

Our study mainly focused on the adoption of the parental mediation strategies without considering the

effectiveness of these strategies in bringing desired outcome. Although studies highlights the effectiveness of active mediation over restrictive mediation in prevention of online risks (Ang, 2015) yet restrictive mediation has also been proved beneficial in reducing the online time spent (Kalmus, Blinka and Olafsson, 2015; Lee, 2012), resulted in decreased risk of cyber-bullying (Kalmus, Blinka and Olafsson, 2015) and helps in reducing online information disclosure (Lwin et al., 2008). Thus a comprehensive study is advisable to measure the effectiveness of the parental strategies in future.

The digital media has become an inseparable part of young people's life. There is no doubt about the fact that the despite several benefits online platforms are potentially risky and harmful for children of various ages. Although parents are adopting adequate mediation strategies to deal with the online risks towards their children yet a need is felt to change the approach of their mediation matching developmental stages of the child such as pre-teens, teens and adults. Also, parents need to enhance their digital literacy level. Training programs should be designed to educate parents about the possible ways to mediate their children's internet usage.

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