The Influence of Media as a Mediator between Parenting Styles and Early Maladaptive Schemas among Children Aged 8-11

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Abstract

This study aimed to determine the moderating role of media use in the relationship between parenting styles and early maladaptive schemas (EMSs) among children aged 8-11 years. The research is quantitative. In this study, a sample of 208 children was recruited, which 151 parents of these children have also participated in this study. The data collection method used in this study was convenient sampling. The measurements were used in this study includes the parenting styles (permissive, authoritative, and authoritarian), Dusseldorf Illustrated Schema Questionnaire for Children (DISC), and media usage (TV, Internet, and computer games). The findings of this study indicate that media usage as a moderating factor between parenting styles and maladaptive schemas of children was not significant. However, the relationship between the three parenting styles with subjugation and emotional deprivation was significant. Also, the findings showed a significant relationship between the authoritarian parenting style and social isolation schema. Moreover, all three forms of media usage together (TV, internet and computer games) showed a significant predictive relationship with eighteen schemas; however, only the hours-per-day usage of TV showed a significant predictive relationship with four schemas of mistrust/abuse; failure; vulnerability to harm or illness and entitlement. The discussion and implications of the findings are discussed.

Keywords: Parenting styles • Early maladaptive schemes • Schemas therapy • Media • Mediation testing • Quantitative study

Introduction

A growing number of psychologists and psychotherapists use schema therapy as their primary psychological approach in Iran. However, as schema therapy is a new form of psychological intervention, research on this approach is still emerging. Jeffrey Young founded schema therapy to treat patients with chronic behavioural problems, it is an integrated approach that is mainly based on developing concepts and methods of classical cognitive-behavioural therapy and attachment theory [1]. Research has shown the effectiveness of this approach for several psychological problems such as personality disorders, depression, aggressive behaviour, eating disorders, drug abuse and adolescents with distributive behaviour and personality disorders traits [2-5].

Early Maladaptive Schemas (EMS) is defined by Young as "broad, pervasive themes regarding oneself and one's relationship with others, developed during childhood and elaborated throughout one's lifetime, and dysfunctional to a significant degree". These schemas are formed in response to unmet needs such as basic safety, connection to others, autonomy, self-esteem, self-expression, and realistic limits [1]. For example, Young believes a child who has not experienced stability, understanding, and love in the family develops a schema of abandonment and emotional deprivation [1]. Two main factors contribute to the development of EMSs. The first factor is "temperament", which is inborn, and it is essentially the way a child is wired to respond to events and, the second factor is the environment, for instance, Young points out that family and the dynamic in the family are the most critical early environmental factors that influence on the development of EMSs [1]. Young believed that in most cases, the influence of family is strongest at birth and progressively declines as the child grows up; hence, he emphasis on other influential environmental factors such as peers and school [1]. As Young

believed other environmental factors need to be examined, the current authors hypothesise that parenting styles and excessive use of media as significant environmental factors potentially contribute to the development of EMSs. In the following section, how potentially these two factors can contribute to the development of EMSs will be answered [6].

Parenting styles and EMSs

Baumrind divides parenting styles into three groups: authoritative, authoritarian, and permissive. Parents with a permissive parent style attempt to behave in a nonpunitive, acceptant and affirmative manner towards the child's impulses, desires, and actions. Parents with authoritarian parenting styles aim to control and evaluate the behaviour and attitudes of the child under a set of absolute standards of conduct. The authoritative parent attempts to direct the child's activities but in a rational, issue-oriented manner [7]. Although there is no research has been done on the influence of Baumrind's parenting styles on EMSs, in the existing resources, there is a noticeable theoretical relationship between these two variables; however, it requires further investigation, which is one of the aims of the current study [8]. The current authors believe that authoritative parenting has a reverse effect on EMSs and prevent them from developing, whereas the permissive and authoritarian parenting style can positively influence the development of EMSs. For instance, Young believe that the schema of abandonment can develop in a child where parents are cold, unfeeling, irritable, and unpredictable. Accordingly, it can be argued that authoritarian parents, due to their lack of intimacy, empathy, love, and harsh behaviour towards their child, can potentially contribute to the development of the schema of abandonment in the child [9].

Young explained that the schema of mistrust-abuse could be formed when a child is humiliated, punished, threatened, and abused by his parents. Accordingly, it can be thought that if authoritarian parents severely punish their child for their mistakes or force the child by threatening and punishing to do something that he/she does not want to do, this parental abuse potentially can create the schema of mistrust-abuse and punitiveness believing that people should be harshly punished for their mistake [10]. Young also argue that in the schema of enmeshment/undeveloped self, the child is immersed in the personality of significant people in his/her life to the extent that he/she becomes trapped in the identity of the parents. Consequently, the authoritarian parenting style harms the child's sense of identity and social development by dominating him/her. As a result, the child does not learn to function

independently without parental support, leading to developing the schema of enmeshment/undeveloped self in the child [11].

Also, it can be hypothetically predicted that parents with permissive parenting styles due to their unavailability and extreme negligence cannot satisfy the need for a secure attachment in their child potentially can create a schema of defectiveness and shame, mistrust/abuse, abandonment, social isolation, and emotional deprivation in the child. Lewis and Lewis argue that permissive parents, due to their negligence and unavailability, fail to teach the child to respect reasonable restrictions and the necessary discipline and responsibility in work [12]. Accordingly, the unavailability of permissive parents and their negligence towards the realistic limitations and boundaries that they should set for the child makes the child not learn to comply with the real restriction and discipline, which potentially can contribute to the development of the schema of insufficient self-control or self-discipline in the child [13]. In contrast, authoritarian parents force the child to adhere to traditional values and make the child succumb to the strictures of their parents and accept and obey the parents' restrictions, which theoretically can contribute to the subjugation schema. Young also argue that the schema of subjugation is usually the result of living with dominant and controlling parents [13].

Use of media and EMSs

Media is a plural form of medium and refers to communication that reaches many people, such as television, newspapers, and radio. However, in the current research, we are also focusing on "new media" [14]. New media or Contemporary communication media facilitate communication and data exchange among many individuals across long distances via broadcasting (e.g. Domestic Satellites), Internet (e.g. social media, online gaming) and many other forms of communication. In this research, the excessive daily usage of media will be measured, not the content [15]. It is due to a simple reason that measuring the influence of the media's content on EMSs is too complex and according to Napoli, measuring the influence of the media's content on any other factors requires comprehensive and multiple methodological approaches, which is beyond the scope of the current research. A limited study is done regarding the average usage of new media among children and young adults in Iran.

Bearing in mind that using new media always has been a complicated subject after the Iran Islamic revolution in 1979, unjustified censorship, control over the content, banning domestic use of satellites, limitation accessing the Internet, and lack of clear copyrights have been argued critiques for many years [16]. However, people, especially young adults who make up the largest group of the current population in Iran, use new media and find their way to overcome the limitations. According to a report published by Iran's Planning and Budget Organization, on average, children and young adults use new media for 20 hours a week. However, in another study done in Iran by Sepasgar Shahri in 2008, children and young adults on average watch TV for almost 4 hours a day, 1 hour a day video game, and half an hour Internet [17]. During the last twenty years, the online world has changed drastically. It was reported in 2020 that over 60% of the world population was connected to the Internet [18].

A study done in the US by Anderson and Jiang in 2018 showed that about 95% of participating adolescents had access to a smartphone, and half of them reported that they were constantly online; in addition, about 97% of them reported that they had at least one media device, including video game consoles, TV, computers, and music players in their bedrooms. So, what does make media so important? Due to the media's interactivity, hypersexuality, virtuality, networking, simulated accessibility, ease of use, and audio-visual appeal, media can be used in various forms at anytime and anywhere [19]. It is believed that new media technology such as the Internet in its all format has made viewing significantly more accessible, which can causes challenges for individuals in order to observe clear distinctions between the human and the artificial, body and technological prostheses, the real and the virtual world. Consequently, it creates new experiences of living and the way individuals experience themselves and their place in the world.

Children born in today's modern society are exposed to the new media from a very early age so a child's use of the media can play a significant role in their beliefs, values and behaviours [20]. For instance, many parents place their infants while feeding them in front of the television to draw their attention and possibly silence them. Evidence shows that new media is more accessible in many societies now, so the potential of excessive use of new media, such as the Internet, increases as children grow older. For example, at many schools, there are dedicated hours for children to use the Internet to study, research, watch educational videos, and use computerised games, highlighting the significance of the new media and the extent of its use which implies that the new media represent a model through which a child can learn cognitive skills such as thinking and knowledge of social relationships also stated that a child could acquire essential information and values through television before entering school and communicating with peers.

Bandura states that in many cases, media such as television can lead to intellectual and cognitive errors due to incorrect processing of information and insufficient evidence [21-23]. These cognitive errors lead to misconceptions and maladaptive thinking, leading to maladaptive behaviours in a child. Libert and Sprafkin also stated that television plays a vital role in the socialisation of children from the very beginning of their lives and that they interact with television before the child interacts with school and peers, through which they acquire information and values. Barr and Heine in their study of developmental changes in imitation from Television during Infancy, concluded that "the ability to learn from television is undoubtedly constrained by both perceptual factors unique to television and by general cognitive development as well" [24].

Therefore, the current authors hypothesise that the new media such as television, the Internet, and computerised game (online and offline) can also be considered significant environmental factors that contribute to the development of EMSs. Nevertheless, what are the evidence supporting the hypothesis? Unfortunately, no research has been done regarding the relationship between the usage of new media and EMSs [25]. However, as in some respects, there are similarities between personality and EMSs, research that shows the relationship between personality and use of media among children and young adults seems to be relevant to the hypothesis. For example, recent studies have shown that the duration of using social media adversely affects young people's self-image by developing an ideal self which is in incongruence with their authentic self, which potentially can cause them anxiety and depression [26]. Accordingly, excessive media use can prevent children from spending time with their parents. As a result, instead of feeling responsible for any assigned tasks, the child potentially lean towards negligence and high expectations from others for their day to day needs which can be thought consequently lead them to develop inadequate self-control/self-discipline and entitlement schemas. In addition, Young explains that the need for identity and autonomy (acting independently and not being dependent on others) is one of the child's basic emotional needs, which get fulfilled by loving, caring parents and emotional support from parents [27,28].

So if a child spends much time using new media and not spending time with their parents, s/he is more likely to develop dependency-incompetence and undeveloped self, as the media cannot satisfy his/her needs for identity and autonomy. Similarly, Khaliran has shown that the new media subconsciously develop a dependency on adolescents and young people and extend that some researchers describe it as an addiction. For instance, in the eleventh revision of the International Classification of Diseases (ICD-11), "internet gaming disorder" has been added to describe the psychological damage caused by the uncontrolled use of digital/online video games [29].

Moreover, increased use of new media can hinder beneficial activities such as exercise and face-to-face interaction with friends and family, which consequently can lead to social isolation, or in Schema therapy terminology, it can lead to the development of the schema of social isolation. In addition, children's mental health may be impaired due to direct exposure to online harassment [30]. So excessive and unrestricted use of the Internet can jeopardise a child's sense of security such that as the Internet per se cannot provide the child security, support, acceptance, and respect predictably, the child's trust in the media will be lost. Potentially s/he can develop the schema of mistrust-abuse. Children who constantly and for a long time have been

exposed to media may learn that the world is not a safe place (Buckingham et al.; Millwood Hargrave and Livingstone), potentially leading them to develop the schema of vulnerability to harm or illness [14,31-43].

Use of media as a mediator

In addition to the previous hypothesis, the current authors hypothesise that parenting styles can play an indirect role in developing EMSs when media use is a mediator. In other words, the use of media as an influential significant environmental factor can potentially explain the mechanism of the predictive relationship between parenting styles and EMSs. This hypothesis is based on four assumptions; firstly, the current authors are assuming that in Iran, almost all children from an early age are exposed to new media. Secondly, as explained, there is a direct relationship between parenting styles and EMSs. Thirdly, there is a relationship between parenting styles and the use of media; finally, there is a relationship between media and EMSs [32]. Previous studies have shown that an authoritative parenting style is associated with less excessive media use and risky online behaviours. Whereas permissive and authoritarian parenting style is associated with excessive use of the Internet and risky online behaviour among adolescents. An example for this the sequential mediating effect (Parenting styles → media usage → EMSs) is that parents with permissive parenting styles are reported to be less likely to monitor their children media usage, which can lead the children to use media excessively, which consequently can contribute to the development of EMSs such entitlement and inadequate self-control and self-discipline [33]. Also, according to Williams, watching TV can potentially replace family interaction, participating less in group and outdoor activities such as exercise, which consequently can lead them to develop the schema of social isolation [34].

The research questions (RQs) investigated in the present study include the following:

RQ1: Is there an indirect predictive relationship between parenting styles and EMSs when the use of media is a mediator?

RQ2: Is there a direct predictive relationship between the use of media and EMSs?

Method

Participants

The sample in this study consisted of 416 respondents, of whom 208 were parents, and 208 were their children. From each family, only one parent and one child participated in the study. Of the child participants, 47% (n=99) were boys and 53% (n=109) were girls. The children's ages ranged from 8 years to 11 years, with 16.7% (n=35) being 8 years old, 23.4% (n=49) being 9 years old, 33.5% (n=70) being 10 years old, and 25.8% (n=54) being 11 years old [35].

Procedure

The current research is a quantitative research study that is based on survey questionnaires. For the purposes of the study, two questionnaires were prepared, one for the parents and a separate one for the children. All the questionnaires were in the participants' native Farsi language. In order to explain the nature and purpose of the questionnaires, cover letters were provided for both sets of participants. The sampling method used for this research was convenience sampling [36]. The questionnaires were distributed in primary and secondary schools in different geographic areas in the two provinces of Hormozgan and Fars in Iran. The students were asked to take a sealed envelope home to give to their parents in order to gather the data from the parents. The envelopes contained a request for informed consent, questions on personal information, and a copy of the Parenting Style Questionnaire. In addition, a request for informed consent regarding their children's participation was included. The students who received informed consent from their parents were then asked to complete the questionnaire [37].

Ethical considerations

The ethics application for the current study was approved by the Research

Ethics Committee at Islamic Azad University, Shiraz Branch. Strictly adhering to the code of human research ethic, the researchers also ensured that all data were handled in accordance with the code of ethics and conduct [38]. All participants in the study were given assurances regarding their anonymity and the confidentiality of their personal information. The participants were also provided with a chance to talk to the researchers about their shared professional capacity and were informed of their right to discontinue their participation in the study at any time if they so wished with no penalty or disadvantage to themselves. All identifying details were removed from the questionnaires in order to ensure the participants' confidentiality and anonymity [39].

Measures

Children's questionnaire: Part 1: Personal information: A researcher-constructed set of questions was drafted to gather data on the demographic variables of age and gender.

Part 2: EMSs for children: In order to measure EMSs among the children, a Farsi version of the Dusseldorf Illustrated Schema Questionnaire for Children (DISC) was used. DISC was created by Loose et al. in 2018 and then tested and standardised in Iran by Askari and his colleagues. This questionnaire was constructed to facilitate a deeper understanding of early maladaptive schemas in children based on Young's 18 schemas. In their research, Loose concluded that children of around 8 to 13 years of age exhibit the same schemas as were identified for adults and that DISC is a reliable measure with a good Cronbach's alpha of .87 and with predictive validity for behavioural problems among children [34,40].

Part 3: The use of media. Because no specific measure exists to assess children's media usage, items were developed specifically for this study. These items aimed to measure the hours-per-day usage of TV (local, national and satellite programs), Internet (searching, using social media, watching videos and listing to music) and playing computerised games (offline and online). The questionnaire consists of twelve items with four questions related to TV usage. A sample item from this section reads: "How many hours a day do you watch TV?" Two questions were related to Internet usage [41]. A sample item from this section reads: "How many hours a day do you use the internet (searching, using social media, listening to music, etc.)?" Finally, two questions were related to the playing of computerised games. A sample item from this section reads: "How many hours a day do you play video games (online and offline)?" The response options were on a 5-point Likert scale (0=Not at all, 1=1 to 2 hours, 2=3 to 4hours, 3=5 to 6 hours, 4=more than 6 hours). The initial reliability test showed good internal consistency with a fairly good Cronbach's alpha of 0.60.

Parents' questionnaire: Parenting Style Questionnaire, Baumrind's parenting style questionnaire was used in order to assess parenting practices. The questionnaire measures three parenting styles: permissive (1-6-10-13-14-17-19-21-24-28), authoritarian (2-3-7-9-12-16-18-25-26-29) and authoritative (4-5-8-11-15-20-22-23-27-30). The questionnaire was translated into Farsi by Esfandiari in 1995. The questionnaire has excellent reliability with alphas of .80 and greater for all three subscales: the permissive style was 0.81, the authoritarian style was 0.85, and the authoritative style was 0.92. The Farsi version of the questionnaire has been tested and researched by Esfandiari and was found to show fairly good reliability with alphas of 0.60 and greater: the permissive style was 0.69, the authoritarian style was 0.77, and authoritative style was 0.73 [42-44].

Findings: All of the scale items that were negatively worded were reverse-scored in order to ensure consistency of interpretation. Thus, after reverse-scoring, high scores on the scale items reflected a dominant parenting style among the participating parents (permissive, authoritarian, authoritative), dominant EMSs among the participating children (abandonment/instability; mistrust/abuse; emotional deprivation; defectiveness/shame; social isolation/alienation; dependence/incompetence; vulnerability to harm or illness; enmeshment/underdeveloped self; failure; entitlement/grandiosity; insufficient self-control/self-discipline; subjugation; self- sacrifice; approval-seeking/

recognition-seeking; negativity/pessimism; emotional inhibition unrelenting standards/hypocriticalness; and punitiveness), a high level of Internet usage, a high level of TV usage and a high level of computerised game usage [45].

Reliability analysis was then conducted on these three scales and their subscales, the purpose of which was to maximise the internal consistency of the three scales by identifying those items that are internally consistent (i.e., reliable) and discarding those items that are not. As can be seen in Table 1, the internal consistency was very good. Therefore, there is no need to remove any items from the measures. Presents the Cronbach's alphas [46].

Hypothesis I

In order to test the first hypothesis, the Barron and Kenny (1986) approach to mediation testing was used. This approach requires the researcher to estimate each of the paths in the model and then ascertain whether a variable function as a mediator by observing whether certain statistical criteria are met. For example, if both d paths in a model such as Figure are statistically significant and closer to zero than a, then hyper activation is deemed a mediator of the relationship between the IVs and EMSs (Figures 1A and 1B). The researchers assess whether the data meet these criteria only if there is evidence of a total effect of the IVs (i.e., if c is statistically significant), which is one of the requirements of mediation outlined by Baron and Kenny [7,47]. The analysis has four steps. The first step (path a) involved regressing the dependent variables of parenting styles on the predictor variables. The second step (path b) involved regressing the mediator of media usage (Internet, TV and computerised games) on the predictor variables. The third step (path c) involved regressing the dependant variables of the EMSs on the mediator of media usage. Finally, the last step involved regressing the dependant variables

of the EMSs on the predictor variables and the mediator. If all steps become significant, then a Sobel test will be used to evaluate the statistical significance of a partial mediation effect, and finally, for the serial analysis, SPSS macro PROCESS will be used use in order to test the sequential mediating effect (Parenting styles → media usage → EMSs) [48].

In order to conduct the mediation testing, GLM-MANOVA was conducted. In step 1 (path c), the 'permissive parenting style' predicted the schema of subjugation and emotional inhibition; 'authoritarian parenting style' predicted the schema of subjugation, social isolation/alienation and emotional inhibition; and 'authoritative parenting style' predicted the schema of subjugation and emotional inhibition (Table 2). Therefore, all the parenting style subcategories were carried over to the next step. In step 2 (path a), the results showed that there was no significant relationship between media usage and parenting styles. Therefore, the mediation testing was stopped at this step [49].

Hypothesis II

In order to test the second hypothesis, GLM-MANOVA was conducted. Because here the quantitative variables of TV usage in terms of hours per day, Internet usage in terms of hours per day, and computer game usage in terms of hours per day are all dimensions of a basic structure called media consumption, there is no choice but to use multivariate analysis of variance (MANOVA). Thus, the relationships between the three independent variables

Table 1. Cronbach's alphas.

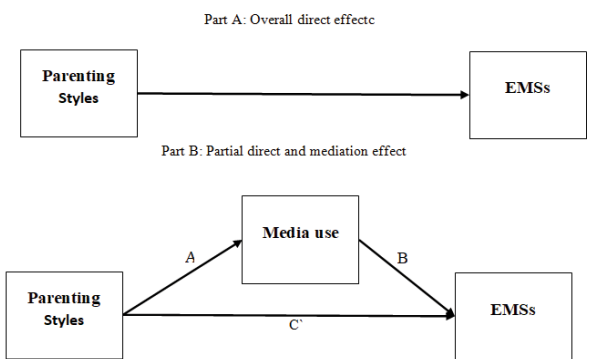| Name	Number	Cronbach's
The Dusseldorf illustrated schema questionnaire for children	36	0.82
Permissive parenting style	7	0.61
Authoritarian parenting style	7	0.6
Authoritative parenting style	7	0.71
The hours-per-day usage of TV	4	0.6
The hours-per-day usage of Internet	4	0.61
The hours-per-day usage of computerised games	4	0.6

Figure 1. Simplified mediation testing model based on Barron and Kenny approach. Part A: Overall direct effectc. Part B: Partial direct and mediation effect.

Table 2. Barron and Kenny [7] approach to mediation testing for hypothesis 1.

	DV	IV	p value	Outcome
Step 1/Path c	Permissive parenting style	subjugation	.027*	Assumption met
		emotional inhibition	.049*	Assumption met
	Authoritarian parenting style	subjugation	.045*	Assumption met
		social isolation/ alienation	.047*	Assumption met
		emotional inhibition	.034*	Assumption met
	Authoritative parenting style	subjugation	.030*	Assumption met
		Schema of	.033*	Assumption met
Step 2/ Path a	Permissive parenting style	The hours-per-day usage of TV	0.992	Assumption not met
		The hours-per-day usage of Internet	0.082	Assumption not met
		The hours-per-day usage of computerised games	0.785	Assumption not met
	Authoritarian parenting style	The hours-per-day usage of TV	0.994	Assumption not met
		The hours-per-day usage of Internet	0.106	Assumption not met
		The hours-per-day usage of computerised games	0.898	Assumption not met
	Authoritative parenting style	The hours-per-day usage of TV	0.926	Assumption not met
		The hours-per-day usage of Internet	0.139	Assumption not met
		The hours-per-day usage of computerised games	0.997	Assumption not met
Step 3/ Path b	------------------	------------------	-------	was not conducted
Step 4/ Path c`	------------------	------------------	-------	was not conducted
Note:*Assumption met				

Table 3. Significant F-tests for univariate follow up tests.

IV	DV	MS	F	df	P value
The hours-per-day usage of TV	schema of mistrust/abuse	5.478	2.552	8	0.014
	schema of failure	5.589	2.649	8	0.011
	schema of vulnerability to harm or illness	9.378	3.065	8	0.004
	schema of entitlement	4.262	2.317	8	0.025
The hours-per-day usage of TV × Internet × computer games	schema of emotional inhibition	12.3	4.729	5	0.001

(television usage, Internet usage and computer game usage in terms of hours per day) and 18 dependent variables (EMSs) were measured. Table shows the mean and standard deviation of each variable (Table 3).

At this stage, the results of Wilk's Lambda's test showed that when the alpha level is considered 0.05, the difference in the schemas is significant only when the child uses all three media variables together. This indicates that the differences in the means between the interaction of all three media variables, i.e. TV * Internet * computer games, is F (96 456)=1.37, p<0.05. In other words, the effect of media usage on the schemas was significant only in children who reported high usage of all three media variables. The results also show that children's schemas are affected by about 21% from media consumption $\eta 2$= 0.206. Looking at the table of results from Levene's Test, it is clear that the value of sig for all eighteen schemas is less than 0.05, which means that the variances of their errors are not equal. Therefore, the results of this test should be interpreted more carefully. Welch's t-test was performed to ensure the accuracy of the results [50-52].

Follow-up testing revealed the significant effect of TV alone based on hours per day of usage on the schema of mistrust/abuse F (8,110)=2.6, p <.05, $\eta 2$=.15; the schema of failure F (8,110)=2.7, p <.05, $\eta 2$=.16; the schema of vulnerability to harm or illness F (8,110)=3.0, p <.01, $\eta 2$=.18; and the schema of entitlement F (8,110)=4.27, p <.05, $\eta 2$=.14 . Computer games alone based on hours per day of usage did not show any significant effect on the schemas. Also, the Internet alone on the basis of hours per day of usage was not found to have a significant effect on the EMSs. In addition, when two variables were paired, i.e. the use of TV and computer games together; the use of TV and the Internet together, as well as the use of the Internet and computer games together, the findings did not show any significant effect on the EMSs. However, when all three variables of media (TV, Internet, and computer games) were used together, it showed a significant effect but only on the schema of emotional inhibition F (5,110)=4.8. p <.001, $\eta 2$=.18 [53-56].

Discussion

The first hypothesis was rejected. The results showed that there was no indirect relationship between Baumrind's parenting styles and EMSs when media use was the mediator. However, the results also showed a direct relationship between all three parenting styles and the schema of subjugation and emotional inhibition [57]. Although there is no research on the influence of parenting styles on EMSs in children, Baumrind suggested that authoritarian parents are very controlling and exercise power over their children by forcing them to adhere to traditional values, such as respect for authority and maintaining order and tradition. Yang stated that children with the schema of subjugation experience a great deal of fear of punishment and rejection by significant people in their lives, such as parents. For this reason, these children submit to their parents and obey them. In addition, such children's extreme fear of being punished and rejected by their parents causes them not to express their feelings and emotions but rather to restrain them [58]. However, the current findings show that regardless of parenting styles, the participating children reported subjugation and emotional inhibition as their dominant schemas, which leads the researchers to speculate that there might be other possible important factors at play here, such as the media, which are measured as part of the second hypothesis. Nevertheless, it should be noted that the obedience of parents is promoted and valued by both Islamic and Iranian traditions and cultures. This may require children from a very early age to suppress their own needs, desires, feelings, opinions or decisions to some

extent, which in the long term might consequently cause them to develop the schema of subjugation and emotional inhibition [59-64]. Therefore, it seems that the culture and traditional values are stronger factors than parenting styles in contributing to the development of the schema of subjugation and emotional inhabitation; however, this requires further investigation.

In addition, the results showed that children whose parents had an 'authoritarian parenting style' reported social isolation/alienation as their dominant EMSs. Yang stated that children with the social isolation schema behave according to their parents' expectations and, in the long term, discard their own interests. As a result, they begin to feel different compared to others and that they do not belong to any group, which exacerbates the isolation by pushing them to distance themselves from other people and to retreat into isolation [65].

As part of the first hypothesis testing, it was found that parenting styles had no impact on media usage among the participating children. Previous research has shown mixed results in the association between parenting practices and the media usage of children. Some findings indicated that children whose parents have strict rules on media usage are less likely to have media-related problems, such as internet addiction symptoms, while other research showed that children with parents with more controlling parenting styles regarding their media usage are more likely to have media-related behaviour problems [66]. For example, in the study by Jung, it was found that adolescents with authoritarian and permissive parents were at the greatest risk of exposure through media and higher internet usage. It should be noted that parenting style is only one factor that influences a child's behaviour as both Baumrind and Young explained that a child's temperament is also an influential factor. For instance, Baumrind observed that an authoritative parenting style might not work for a child with a difficult temperament (a very active, sensitive, aroused, somewhat restless, or impatient temperament) [67]. Also, the vast amount of information available through the media can help the millennial generation to advance their knowledge and understanding of themselves and of the world, which might then contribute to the fact they do not easily accept the values of their parents and are less inclined to comply with their rules, or in the context of this study, their media usage rules [68].

The second hypothesis was supported by the results, such that the influence of media usage on the schemas was significant in children who reported high usage of all three media variables. This finding is unique in this field and adds to the current knowledge of EMSs and their contributing factors. Follow-up testing also revealed the significant effect of TV alone in terms of hours per day of usage on the schema of mistrust/abuse, failure, vulnerability to harm or illness, and entitlement. In other words, children with higher usage of TV reported these schemas as their dominant EMSs. For the participating children, none of these schemes was predicted by the parenting style of their parents. Although this result cannot be generalised, it simply emphasises the significant role of TV, specifically the amount of time a child spends watching it, on children's development from a very early age. Brazelton explained that when children spend more time with media than with their parents, it seems that the media become the biggest influence on the children's mental development, implying that the media contribute more to the children's mental development than their parents do [69-72].

Steyer went to the extent of calling media "the other parents", emphasising the control that media can have as a strong influential factor on the children's development. It is difficult to interpret this finding and understand why only these particular four EMSs were found to be predicted by TV usage as, in this research, only the amount of usage in terms of hours per day was

age, are regularly exposed to TV and spend less time with their parents will potentially develop these four schemas as the excessive use of TV cannot satisfy their needs for security, empathy, love, respect, and emotional support. These findings also raise a very important question about the content of the TV programmes and their influences on EMSs. However, this question goes beyond the scope of this current research and requires further investigation [73].

In addition, the current findings showed that computer games and the Internet alone, based on hours per day of usage, did not show any significant effect on the schemas. Also, when each media variable was paired with another media variable (e.g. TV and the Internet), the results did not show any significant effect on the EMSs. However, when all three media variables (TV, Internet, and computer games) were used together, there was a significant effect but only on the schema of emotional inhibition. According to Yang, the emotional inhibition schema is formed when there is an overemphasis on the control and suppression of emotions such as anger and aggression and where there is inhibition of expressions of happiness, love, play, vulnerability and personal needs [74,75].

As a result, the child makes himself look calm and cool and avoids expressing his feelings, emotions, and needs. With this in mind, it can be suggested that the use of three media together (TV, Internet, and computer games) causes the child to spend a long time with the media, thus spending less time interacting with family, friends and community members, because of which, he might not experience intimate and close relationships. The lack of an intimate and emotional relationship with the family forces the child to suppress or control his emotions which consequently leads him to develop the schema of emotional inhibition [76].

Limitations

A number of limitations are associated with the present study, which should be viewed as an exploratory study in a little-charted field. First of all, this research was conducted among a small and limited sample size; hence the results cannot be generalised in any shape or form. Secondly, parents' perceptions of their parenting behaviours might not necessarily be an accurate evaluation of their parenting styles, especially if they have few children. Also, parents of multiple children might have different parenting styles with their different children, so their report of their parenting style in this study might not necessarily be a true reflection of the parenting style that they use with the child participating in this study. Also, as the results were based on self-reported data, social desirability bias might have affected the reports of both the participating parents and the children, as among many Iranians, showing a good side of oneself in the presence of others (the researchers) is valued and promoted in the dominant culture. Therefore, the results should be interpreted with caution [77-79].

Finally, Baumrind's three parenting style model might not have been the best measurement for the parents' parenting styles participating in this study. Although there is sufficient research to support Baumrind's ideas, many parenting experts, such as Kohn, have questioned the three parenting styles model. Power explained that as Baumrind based her ideas on the "parenting styles associated with child behaviour in only about a third of her sample of preschool children, it is possible that other parenting styles may exist". In 1983, researchers Eleanor Maccoby and John Martin speculated that Baumrind's theory was incomplete when introducing a fourth parenting style-the uninvolved parent -which was not measured in this study [80,81].

Conclusion

The current study expanded our knowledge about the relationships between parenting style, media usage, and EMSs. Although the study's findings only supported the second hypothesis and more research needs to be done in this field, it was shown that the tested media are a significant predictive factor for EMSs. The results could be seen as a testimony to the importance and gravity of the effects of the tested media on child development; therefore, media literacy educating children about risk is highly recommended, which requires a broader strategy involving government, parents, teachers and the media themselves. As TV usage was the only factor found to be significant on four EMSs, it is recommended that future research adopt an exploratory design to find the influence of Iran's TV programmes on EMSs. In addition, while the present study employed a purely quantitative methodology to investigate the impact of the study's predictor variables on EMSs, future research could employ a mixed- design approach that incorporates both in-depth interviews and the survey/questionnaire method to target both parents and children.

Declaration

Each of the authors confirms that this manuscript has not been previously published and is not currently considered by any other journal. Additionally, all of the authors have approved the contents of this paper and have agreed to the Current Psychology submission policies. The authors did not receive support from any organisation for the submitted work. The authors have no relevant financial or non-financial interests to disclose. Each named author has substantially contributed to conducting the underlying research and drafting this manuscript. Additionally, to the best of our knowledge, the named authors have no conflict of interest, financial or otherwise. The datasets generated during and/or analysed during the current study are available from the corresponding author on reasonable request.

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