Psicothema

Reduction of sexist attitudes, romantic myths, and aggressive behaviors in adolescents: Efficacy of the DARSI program

Laura Carrascosa[1], María-Jesús Cava[1], Sofía Buelga[1], and Saúl-Neves de Jesus[2]
[1] Universidad de Valencia and [2] Universidade do Algarve

Abstract

Background: The DARSI program (Developing Healthy and Egalitarian Adolescent Relationships) aims to prevent peer aggressive behaviors inside and outside social networks and educate adolescents on gender equality. The objective of this study was to evaluate the effects of the program on the reduction of sexist attitudes, myths of romantic love and aggressive behaviors in adolescents. **Method:** 191 adolescents, aged 12 to 17 years (53.93% girls), assigned to an experimental group (3 classrooms) and two control groups (6 classrooms in two educational centers) participated in this study. A quasi-experimental design with control group was used and the effectiveness of the program was evaluated using a repeated measures factorial design. **Results:** Findings showed a significant decrease in the experimental group in hostile sexism, benevolent sexism, myths of romantic love, direct aggression, relational aggression, and cyber-aggression. **Conclusions:** The effectiveness of the evaluated program and the viability of joint interventions in the prevention of peer violence and teen dating violence are observed.

Keywords: Prevention, adolescents, sexist attitudes, romantic myths, aggressive behaviors.

Resumen

Disminución de actitudes sexistas, mitos románticos y conductas agresivas en adolescentes: eficacia del programa DARSI. **Antecedentes:** el programa DARSI (Desarrollando en Adolescentes Relaciones Saludables e Igualitarias) tiene como finalidad prevenir conductas agresivas entre iguales dentro y fuera de las redes sociales y formar a los adolescentes en igualdad de género. El objetivo de este estudio fue evaluar los efectos del programa en la disminución de actitudes sexistas, mitos del amor romántico y conductas agresivas en adolescentes. **Método:** en este estudio participaron 191 adolescentes, de 12 a 17 años (53,93% chicas), asignados a un grupo experimental (3 aulas) y dos grupos control (6 aulas de dos centros educativos). Se utilizó un diseño cuasi-experimental con grupo control y se evaluó la efectividad del programa mediante diseño factorial de medidas repetidas. **Resultados:** los resultados mostraron una disminución significativa en el grupo experimental en sexismo hostil, sexismo benevolente, mitos del amor romántico, agresión directa, agresión relacional y ciberagresión. **Conclusiones:** se constata la efectividad del programa evaluado y la viabilidad de intervenir conjuntamente en la prevención de la violencia entre iguales y la violencia de pareja en adolescentes.

Palabras clave: prevención, adolescentes, actitudes sexistas, mitos románticos, conductas agresivas.

Peer aggression prevention is a social priority due to the serious consequences that peer violence, both direct (beatings, insults, threats) and indirect (rejection, social exclusion, spread of malicious rumors), has for the victim. This violence is related to psychosomatic disorders, depression, low self-esteem, feelings of loneliness, low life satisfaction, and suicidal ideation (Barzilay et al., 2017; Estévez, Jiménez, & Moreno, 2018; Garandeau, Lee, & Salmivalli, 2018; Hellfeldt, Gill, & Johansson, 2018). In addition, the current use of new information and communication technologies has caused these peer aggressions to move frequently to the virtual world (Buelga, Martínez-Ferrer, & Cava, 2017; Garaigordobil, 2017; Ortega-Barón, Buelga, Cava, & Torralba,

2017). This increase in on-line aggressions has meant that most peer violence prevention programs also include the prevention of peer cyber-aggressions (Farrington, Gaffney, Lösel, & Ttofi, 2017; Garaigordobil & Martínez-Valderrey, 2014; Nocentini, Zambuto, & Menesini, 2015). However, other variables also linked to peer violence, such as sexist attitudes (Malonda, Tur-Porcar, & Llorca, 2017; Ovejero, Yubero, Larrañaga, & Navarro, 2013), are not normally included in peer violence prevention programs.

Sexist attitudes are frequent in Spanish adolescents (Abellán, 2017; Martínez, Navarro, & Yubero, 2009) and reducing them could encourage adolescents to develop relationships that are more positive with their peers, as well as with their first romantic partners. Sexist attitudes include a stereotyped view of women that, according to the ambivalent sexism theory (Glick & Fiske, 1996), would include two types of sexism, hostile and benevolent. Hostile sexism maintains a negative affective view of women whereas benevolent sexism is associated with the need to protect women and has a more positive affective tone (Hammond, Milojev, Huang, & Sibley, 2017; Ramiro-Sánchez, Ramiro, Bermúdez, &

Buela-Casal, 2018). In adolescents, both forms of sexism have been related with their justification for peer violence, domestic violence and violence against minorities (Garaigordobil & Aliri, 2013), and also with a greater perpetration of dating violence (Pazos, Oliva, & Hernando, 2014). Hostile sexism in young males is related to cyber-aggression in dating relationships (Martínez-Pecino & Durán, 2016), and both forms of sexism are linked to the dominance-submission model that underlines bullying (Carrera-Fernández, Lameiras-Fernández, Rodríguez-Castro, & Vallejo-Medina, 2013).

Sexist attitudes in adolescents are also associated with myths of romantic love, such as considering jealousy a sign of love, love as suffering, or the existence of our soul mate (Rodríguez-Castro, Lameiras-Fernández, Carrera-Fernández, & Vallejo-Medina, 2013). These myths can lead adolescents to overlook violent situations in their first romantic relationships (Malonda et al., 2017). Recent studies warn about the high prevalence of teen dating violence (Foshee et al., 2013; Wincentak, Connolly, & Card, 2017) and the need for prevention intervention (Leen et al., 2013; Muñoz, Ortega-Rivera, & Sánchez, 2013). Therefore, the implementation of activities aimed at reducing adolescents' sexist attitudes and myths of romantic love in peer violence prevention programs can contribute to the prevention of teen dating violence.

Certainly, several studies have linked peer violence and teen dating violence (Cava, Buelga, & Carrascosa, 2015; Cava, Buelga, & Tomas, 2018; Debnam, Johnson, & Bradshaw, 2014), and there have been some interventions aimed at their joint prevention in school contexts (Ball, Tharp, Noonan, Valle, Hamburger, & Rosenbluth, 2012; Foshee et al., 2014). The inclusion in the same intervention program of activities to reduce sexist attitudes and romantic myths in adolescents, in addition to activities to raise awareness of all forms of violence, may imply a more efficient use of intervention resources. Similarly, the DARSI program –*Developing Healthy and Egalitarian Relationships in Adolescents*– (Carrascosa, Cava, & Buelga, 2018) aims to prevent peer and teen dating violence, by raising adolescents' awareness of the consequences of violence, their critical thinking on sexist attitudes and myths of romantic love, and their personal and social resources. This program is implemented in school contexts and consists of 12 one-hour sessions, in which role-playing, paper and pencil activities, case studies and guided discussion are carried out. In these activities, audiovisual materials, songs, drawings and stories about adolescents are used. This program was designed for Secondary Education students (from 11 to 16 years old). At this stage of development, there is a high prevalence of peer violence in school contexts, and adolescents initiate their first romantic relationships. Thus, it is a particularly relevant moment to develop intervention programs aimed at preventing peer violence and teen dating violence.

The objective of this study was to evaluate the effects of the DARSI Program on sexist attitudes (hostile sexism and benevolent sexism), beliefs in myths of romantic love, and aggressive behaviors (overt, relational, and online) of adolescent participants. The possible relationships among these variables were previously analyzed. In our initial hypothesis, we anticipated a significant decrease in scores of hostile sexism, benevolent sexism, beliefs in myths of romantic love, and peer aggression (overt, relational, and online) in adolescents of the experimental group (EG) compared to adolescents not participating in the program: control group 1 (CG1) and control group 2 (CG2).

Method

Participants

The study involved 191 adolescents (88 boys, 103 girls), aged 12 to 17 years (M = 14.13, SD = 1.05), studying Compulsory Secondary Education at two schools (one public and another semi-private) in the Valencian region (Spain). The sample was obtained by convenience sampling (Creswell, 2003). Three classrooms (each of them in a different grade of Secondary Education: 2nd, 3rd and 4th) in the participating public school (n = 57) were assigned to the experimental group (EG) and two contrast groups were established: three other classrooms (2nd, 3rd and 4th of Secondary Education) in the same public school (n = 62) constituted control group 1 (CG1) and three classrooms (2nd, 3rd and 4th of Secondary Education) of the semi-private school (n = 72) were assigned to control group 2 (CG2). Both secondary schools are located in the same city and are similar in sociodemographic characteristics of the students. Although control group 1 (CG1) did not implement the program, it did share some classes and facilities with the experimental group, whereas control group 2 (CG2) had no contact with the experimental group. Both schools were informed that the classrooms participating in the program as control and intervention groups could not participate in other intervention programs during the implementation of the DARSI program. Moreover, possible initial differences between the three groups (EG, CG1, and CG2) in age and gender were analyzed. The results showed no statistically significant differences according to age (F = 2.979, p = .053) or gender (χ^2 = .019, p = .991) in these three groups.

Instruments

Ambivalent Sexism Inventory for adolescents (ISA-A, Glick & Fiske, 1996; Spanish adaptation, Lemus, Castillo, Moya, Padilla, & Ryan, 2008). This scale consists of 20 items, and two factors: Hostile Sexism, 10 items reflecting traditional sexist behaviors with a negative emotional tone towards women (e.g., "Girls often interpret innocent comments as sexist") and Benevolent Sexism, 10 items with a positive affective tone that show women unable to perform some activities and roles, and in need of protection (e.g., "Girls should be cherished and protected by boys"). Adolescents respond to these items on a scale, ranging, from 1 (*strongly disagree*) to 6 (*strongly agree*). In this study both factors presented acceptable reliability: Hostile Sexism (pretest: α = .87, Ω =.90, CR = .92, AVE =85.26%; posttest: α = .92, Ω = .94, CR = .95, AVE = 87.72%) and Benevolent Sexism (pretest: α = .85, Ω = .88, CR = .91, AVE = 84.43%; posttest: α = .91, Ω = .94, CR = .95, AVE = 87.14%).

Romantic Love Myth Scale (adaptation from the scale of Rodríguez-Castro et al., 2013). This adaptation consists of 7 items that evaluate adolescents' beliefs about some myths of romantic love: soul mate (item 7: "We all have only one ideal partner, our "soul mate"), jealousy as an expression of love (item 1: "Jealousy is a sign of love", item 2: "When my partner controls me, he/she shows me his/her love"), the omnipotence of love (item 4: "If I show him/her that I love him/her, he/she will change and make me happy"), the need to have a partner (item 5: "Separating from the dating partner is a failure"), and the love-violence compatibility (item 6: "You can mistreat someone you love", item 3: "If he/she

loves me, he/she will make me cry"). These items are answered with five options, from 1 (*strongly disagree*) to 5 (*strongly agree*). The exploratory factor analysis showed only one factor that explained 32.03% of variance in the pretest (KMO = .786; Bartlett's test of sphericity: χ^2 = 273.94, gl = 21, p < .001) and 42.33% of variance in the posttest (KMO = .808; Bartlett's test of sphericity: χ^2 = 440.32, gl = 21, p < .001). This factor showed an adequate reliability in the present study (pretest: α = .73, Ω = .82, CR = .86, AVE = 78.87%; posttest: α = .83, Ω = .94, CR = .92, AVE = 81.95%).

School Aggression Scale (Little, Henrich, Jones, & Hawley, 2003). The 25 items in this scale evaluate peer aggressive behaviors at school and are integrated in two factors: Overt Aggression, with 13 items that measure direct aggressive behaviors towards the victim (e.g., "I'm the kind of person who often fights with others"); and Relational Aggression, with 12 items that evaluate indirect aggressions with behaviors that harm the victim through his/her circle of friends or through social exclusion (e.g., "I'm the kind of person who tells my friends to stop liking someone"). In the pretest, adolescents indicated the frequency of these behaviors in the past 12 months with a response range from 1 (*never*) to 5 (*always*). In the posttest, they reported how often they had performed these behaviors during the past 6 months. Both factors showed adequate reliability in this study: Overt Aggression (pretest: α = .89, Ω = .95, CR =.95, AVE = 89.09%; posttest: α = .94, Ω = .97, CR = .98, AVE = 90.98%); Relational Aggression (pretest: α = .84, Ω = .92, CR = .91, AVE = 86.62%; posttest: α = .90, Ω = .95, CR = .95, AVE = 88.81%).

Scale of Cyber-aggressions among peers -CybAG-R (Buelga, Ortega-Barón, & Torralba, 2016). This scale, consisting of 24 items, evaluates aggressive behaviors, intimidation, identity theft, insults or threats towards peers using new technologies (e.g., "I have sent or modified photos or videos of someone without his/ her permission"). Adolescents indicated in the pretest how often they had performed these behaviors during the past 12 months, with a response range from 1 (*never*) to 5 (*many times -more than 10 times)*, and they were asked in the posttest to indicate how often they had performed these behaviors during the past 6 months. These items were integrated in only one factor, whose reliability was appropriate in this study (pretest: α = .93, Ω = .98, CR = .97, AVE = 93.23%; posttest: α = .96, Ω = .98, CR = .99, AVE = 94.76%).

Procedure

To evaluate program effectiveness, a quasi-experimental design of repeated measures (pretest and posttest) was used. The intervention program was the independent variable, and the dependent variables were hostile sexism, benevolent sexism, romantic myths, overt aggression, relational aggression, and cyber-aggression.

To select the participants, first, several secondary schools were contacted by telephone to briefly explain the research objectives and request an informative meeting. Subsequently, a teachers´ meeting with two interested schools was arranged to describe the project in detail and the intervention program characteristics. In addition, they were told that the program would be implemented in some classrooms by research staff and that they would be informed about the main results obtained. Also agreed was to hold an informative talk for teachers and families, once the intervention was concluded. Both schools agreed to participate, and an informative letter was given to families explaining the

main project objectives and requesting consent for their children's participation.

Once the necessary authorizations were obtained, all adolescents (experimental group and control groups) completed the instruments (pretest). These instruments were administered during school hours by research team members. The participants had been previously informed that their participation was voluntary and anonymous, and that they could leave the program at any time. Before implementing the program in the experimental group classrooms, the adolescents were informed about the topic content and they were again told that they could opt out. No adolescent refused to answer the instruments or participate in the intervention program. After concluding the program, all adolescents (control and experimental groups) completed the instruments again (posttest). The DARSI program was implemented from January to May 2017. The pretest was carried out in December 2016 and the posttest in June 2017. Throughout the study, the fundamental principles of the Declaration of Helsinki for research with human beings and the Universal Declaration of Human Rights were followed.

Data analysis

First, correlation analyzes (Pearson) were performed among the variables included in this research in Time 1. Prior to evaluating program effectiveness, possible differences between the experimental group and control groups in the measured variables were explored using a MANOVA with pretest scores (Time 1). Later, an analysis of repeated measures with inter-group factor (EG, CG1, and CG2) and intra-subject factor (pretest and posttest: Time 1 and Time 2) was conducted to measure changes in these groups before and after intervention, and evaluate possible differential effects in the experimental group. This statistical test is recommended when the selected groups are natural groups, and are not the same in the initial situation (Weinfurt, 2000). All analyzes were performed with the SPSS-24 statistical package.

Results

Table 1 shows significant correlations among most variables, with higher correlations between different aggressive behaviors (overt, relational, and online) and between hostile sexism, benevolent sexism, and myths of romantic love. Hostile sexism shows significant correlations with overt aggression, relational aggression and cyber-aggression, whereas benevolent sexism only correlates significantly with relational aggression. Myths of romantic love correlate significantly with overt aggression and cyber-aggression.

Table 1 Bivariate correlations among variables					
Variables	**1**	**2**	**3**	**4**	**5**
1. Benevolent sexism			.		
2. Hostile sexism	.54**				
3. Romantic myths	.53**	.48**			
4. Overt Aggression	.09	.36**	.19**		
5. Relational Aggression	.16*	.24**	.13	.59**	
6. Cyber-aggression	.05	.30**	.24**	.62**	.50**

** p < .01; * p < .05

Regarding possible differences between the three groups (EG, CG1, and CG2) prior to intervention, Table 2 shows the findings of the variance analysis performed to compare group scores before intervention. In this table, we observe that in the pretest there are no significant differences between these three groups in the variables of hostile sexism, overt aggression, relational aggression, and cyber-aggression. However, there are significant differences between these these groups in benevolent sexism, $F(2,185) = 11.73$, $p < .001$, $\eta^2 = .113$, and myths of romantic love, $F(2,185) = 3.94$, $p = .021$, $\eta^2 = .041$. Post hoc test (Bonferroni) results indicated significant differences between EG and CG2 in both variables, with higher scores in benevolent sexism and myths of romantic love in CG2; however, EG and CG1 differences in these variables were not significant. Therefore, EG and CG1 have no significant differences in any of the measured variables in pretest.

With regard to program effectiveness, the results of repeated measures analysis indicated significant interaction effects (Time × Group): Wilks's lambda = .656, $F(12, 338) = 6.608$, $p < .001$, with a large effect size, $\eta^2 = .190$. The interaction effect was significant in all variables, which indicates that the time (T1-pretest vs T2-posttest) had a different influence on these variables depending on the group (EG, CG1, CG2). The interaction effect results in the measured variables can be observed in Table 2, as well as the post hoc test results, performed to analyze significant differences between groups in the posttest. In Table 2, we note a significant interaction effect in benevolent sexism, $F(2,174) = 16.189$, $p < .001$, $\eta^2 = .157$, with a lower mean score after the intervention in this variable in EG ($M = 12.76$), compared to CG1 ($M = 26.53$) and CG2 ($M = 29.89$). The interaction effect is also significant in hostile sexism, $F(2,174) = 25.672$, $p < .001$, $\eta^2 = .228$, with a lower mean score in posttest in EG ($M = 13.03$), compared to CG1 ($M = 25.37$) and CG2 ($M = 27.20$). In myths of romantic love, there is a significant interaction effect, $F(2,174) = 11.136$, $p < .001$, $\eta^2 = .113$,

with a lower mean score in this variable in EG adolescents ($M = 7.98$) compared to the other two groups (CG1: $M = 12.24$; CG2: $M = 14.26$).

In peer aggressive behaviors, significant interaction effects are observed in overt aggression, $F(2,174) = 10.915$, $p < .001$, $\eta^2 = .111$, relational aggression, $F(2,174) = 9.960$, $p < .001$, $\eta^2 = .103$, and cyber-aggression, $F(2,174) = 8.874$, $p < .001$, $\eta^2 = .093$. In posttest (after program implementation), mean scores in variables of overt aggression, relational aggression, and cyber-aggression of EG participants are significantly lower than mean scores of CG1 and CG2 adolescents. The findings obtained show that, whereas CG1 and CG2 participants did not report significant variations in their aggressive behaviors in posttest, EG adolescents reported a significant decrease in the frequency of their aggressive behaviors (overt aggression, relational aggression, and cyber-aggression) after the program implementation.

Discussion

The purpose of this study was to evaluate the effects of the DARSI Program on sexist attitudes, beliefs in myths of romantic love, and aggressive behaviors (overt, relational and cyber-aggression) of the participants in the program, in addition to exploring the relationships among these variables. The results obtained are consistent with the positive effect of the DARSI program, since the participating adolescents reported a decrease in frequency of peer aggressive behaviors (overt aggression, relational aggression, and cyber-aggression), as well as a decrease in sexist attitudes (hostile and benevolent) and beliefs in romantic myths, after the program implementation.

Previous studies have highlighted the connections between peer violence and teen dating violence (Cava et al., 2015, 2018; Debnam et al., 2014) and some interventions have been developed

Table 2
Means and standard deviations (SD) of the variables in experimental group (EG), control group-1 (CG1) and control group-2 (CG2) in pretest and posttest, analysis of differences between groups in pretest, and analysis of differences between pretest and posttest

	Pretest					
Variables	**EG** Means (SD)	**CG1** Means (SD)	**CG2** Means (SD)	**F**	**p**	η^2
Benevolent sexism	26.03 (10.51) [b]	28.40 (10.66) [b]	34.60 (10.16) [a]	11.738	<.001	.113
Hostile sexism	26.43 (10.96)	27.01 (11.91)	28.83 (11.00)	.800	.451	.009
Romantic myths	12.22 (4.35) [b]	13.48 (5.54)	14.63 (4.51) [a]	3.940	.021	.041
Overt Aggression	17.03 (4.82)	17.38 (7.23)	18.09 (5.76)	.525	.593	.006
Relational Aggression	17.17 (4.87)	17.00 (5.68)	17.69 (4.58)	.535	.716	.004
Cyber-aggression	28.15 (7.12)	28.68 (10.10)	29.21 (7.02)	.261	.771	.003
	Posttest					
Variables	**EG** Means (SD)	**CG1** Means (SD)	**CG2** Means (SD)	**F** (Time × Group)	**p**	η^2
Benevolent sexism	12.76 (5.12) [b]	26.53 (11.00) [a]	29.89 (11.57) [a]	16.189	<.001	.157
Hostile sexism	13.03 (5.19) [b]	25.37 (10.91) [a]	27.20 (11.31) [a]	25.672	<.001	.228
Romantic myths	7.98 (1.98) [c]	12.24 (4.64) [b]	14.26 (4.95) [a]	11.136	<.001	.113
Overt Aggression	13.53 (1.57) [b]	18.74 (8.28) [a]	17.68 (5.43) [a]	10.915	<.001	.111
Relational Aggression	14.17 (2.39) [b]	18.64 (6.95) [a]	18.14 (5.55) [a]	9.960	<.001	.103
Cyber-aggression	24.01 (.133) [b]	30.35 (13.48) [a]	28.40 (7.10) [a]	8.874	<.001	.093

Note: a > b >c, $p < .05$; post hoc test: Bonferroni

for their joint prevention in school contexts (Ball et al., 2012; Foshee et al., 2014). The DARSI program's approach is to prevent aggressive behaviors in adolescents, while favoring the development of healthy and more egalitarian relationships with peers and first romantic partners. This program aims to prevent both peer violence and teen dating violence. Thus, the DARSI program not only works on raising awareness of all forms of violence and its consequences, but also works directly on the reduction of sexist attitudes and myths about romantic love in adolescents. Sexist attitudes, especially hostile sexism, are linked to peer violence and intimate partner violence (Carrera-Fernández et al., 2013; Garaigordobil & Aliri, 2013; Malonda et al., 2017; Martínez-Pecino & Durán, 2016; Ovejero et al., 2013; Pazos et al., 2014). Therefore, intervention programs to reduce sexist attitudes in adolescents might be beneficial to foster relationships that are more positive with their peers, as well as with their first dating partners.

The findings of this study have confirmed the connections between sexist attitudes, romantic myths and peer aggressive behaviors, in similar way to previous studies (Carrera-Fernández et al., 2013; Malonda et al., 2017; Martínez-Pecino & Durán, 2016; Ramiro-Sánchez et al., 2018). Moreover, these links have been observed not only in traditional types of aggression (overt aggression and relational aggression), but also in peer cyber-aggression. Certainly, there are currently numerous negative consequences associated with the increasing use of new information and communication technologies by adolescents (Arnaiz, Cerezo, Giménez, & Maquilón, 2016; Borrajo, Gámez-Guadix, & Calvete, 2015; Buelga et al., 2017; Giumetti & Kowalski, 2016; Navarro, Yubero, & Larrañaga, 2018; Ortega-Barón et al., 2017). Peer cyber-aggression is one of these problems. In this study, we have only focused on some aspects of peer cyber-aggression (measuring behaviors such as intimidation, identity theft, insults or threats towards peers); other problems also related to the use of new technologies, such as sexting, homophobic cyberbullying, or grooming, have not been analyzed. Such issues may also be related to sexist attitudes and romantic myths; future studies exploring these possible relationships would be beneficial and relevant.

The results of the present study have not only confirmed the relationships between sexist attitudes, romantic myths, and peer aggressive behaviors (offline and online), but also the findings regarding the effectiveness of the DARSI program support the usefulness of joint interventions of these variables in the same program. Consequently, a more effective use of intervention resources is possible through the joint prevention of peer and teen dating violence. This possibility of joint intervention in peer and teen dating violence has also been developed in previous programs (Ball et al., 2012; Foshee et al., 2014).

Nevertheless, this study also presents some limitations that must be mentioned. The sample is small, which limits the generalization of the results. In future studies, sample size should be expanded by implementing the program in a greater number of classrooms and schools. A larger sample is needed to analyze possible gender differences in program effectiveness, to explore possible gender differences in the variables measured and to integrate gender perspective in the analysis of the program effectiveness. Program implementation in larger samples would also allow analyzing the differences on its effectiveness in adolescents with different degrees of involvement in peer aggressive behavior, sexist attitudes and beliefs in romantic myths. Furthermore, it would be advisable to complement the use of self-reports, which can lead to biases, with observational techniques and other instruments completed by teachers. Although during the program implementation the participating students indicated that the activities made them aware of sexism, romantic myths, and negative consequences of violence, it should be noted that this information was obtained informally. In future studies it would be worthwhile to obtain qualitative information about the program in a more systematic way, using in-depth interviews and adolescent focus groups. In addition, it would be advisable to train teachers to apply this program in their classrooms and evaluate its effectiveness. Teacher training to improve gender equality in classrooms is also a fundamental aspect worth promoting (Pinero, Arroyo, & Berzosa, 2018).

However, despite the aforementioned limitations, the findings obtained are consistent with the effectiveness of the DARSI program in the decrease in frequency of aggressive behaviors reported by adolescents, inside and outside social networks, and in the reduction of sexist attitudes and beliefs in myths of romantic love. These programs are essential to prevent peer aggressive behaviors, and to promote values of tolerance and gender equality in adolescents.

Acknowledgments

References

Abellán, C. M. A. (2017). Actitudes hacia la igualdad de género en una muestra de estudiantes de Murcia [Attitudes towards gender equality in a sample of students from Murcia]. *Revista Complutense de Educación*, *28*(1), 45-60. doi:10.5209/rev_RCED.2017.v28.n1.48715

Arnaiz, P., Cerezo, F., Giménez, A. M., & Maquilón, J. J. (2016). Conductas de ciberadicción y experiencias de cyberbullying entre adolescentes [Online addiction behaviors and cyberbullying among adolescents]. *Anales de Psicología, 32*(3), 761-769. doi:10.6018/analesps.32.3.217461

Ball, B., Tharp, A. T., Noonan, R. K., Valle, L. A., Hamburger, M. E., & Rosenbluth, B. (2012). Expect respect support groups: Preliminary evaluation of a dating violence prevention program for at-risk youth. *Violence Against Women*, *18*(7), 746-762. doi:10.1177/1077801212455188

Barzilay, S., Klomek, A. B., Apter, A., Carli, V., Wasserman, C., Hadlaczky, G., ..., & Brunner, R. (2017). Bullying victimization and suicide ideation and behavior among adolescents in Europe: A 10-country study. *Journal of Adolescent Health*, *61*(2), 179-186. doi:10.1016/j.jadohealth.2017.02.002

Borrajo, E., Gámez-Guadix, M., & Calvete, E. (2015). Justification beliefs of violence, myths about love and cyber dating abuse. *Psicothema, 27*(4), 327-333. doi:10.7334/psicothema2015.59

Buelga, S., Martínez-Ferrer, B., & Cava, M. J. (2017). Differences in family climate and family communication among cyberbullies,

cybervictims, and cyber bully-victims in adolescents. *Computers in Human Behavior, 76,* 164-173. doi:10.1016/j.chb.2017.07.017

Buelga, S., Ortega-Barón, J., & Torralba, E. (2016, October). *Psychometric properties of the revised cyberbullying scales: CybVic_R. CybAG_R.* Poster session presented at International Congress of the Spanish Scientific Society of Social Psychology, Elche, España.

Carrascosa, L., Cava, M. J., & Buelga, S. (2018). *Programa DARSI: Desarrollando en Adolescentes Relaciones Saludables e Igualitarias* [The DARSI program: Developing Healthy and Egalitarian Relationships in Adolescents]. Valencia: Palmero.

Carrera-Fernández, M., Lameiras-Fernández, M., Rodríguez-Castro, Y., & Vallejo-Medina, P. (2013). Bullying among Spanish secondary education students: The role of gender traits, sexism, and homophobia. *Journal of Interpersonal Violence, 28*(14), 2915-2940. doi:10.1177/0886260513488695

Cava, M. J., Buelga, S., & Carrascosa, L. (2015). Violencia física y psicológica ejercida en parejas adolescentes: relación con el autoconcepto y la violencia entre iguales [Physical and psychological violence exercised in adolescent couples: Relationship with self-concept and bullying]. *Psicología Conductual, 23*(3), 429-446.

Cava, M. J., Buelga, S., & Tomás, I. (2018). Peer victimization and dating violence victimization: The mediating role of loneliness, depressed mood, and life satisfaction. *Journal of Interpersonal Violence.* Advance online publication. doi: 10.1177/0886260518760013

Creswell, J. W. (2003). *Research Design. Qualitative, Quantitative and Mixed Methods Approaches*. Thousand Oaks, California: Sage.

Debnam, K. J., Johnson, S. L., & Bradshaw, C. P. (2014). Examining the association between bullying and adolescent concerns about teen dating violence. *Journal of School Health, 84*(7), 421-428. doi:10.1111/josh.12170

Estévez, E., Jiménez, T. I., & Moreno, D. (2018). Aggressive behavior in adolescence as a predictor of personal, family, and school adjustment problems. *Psicothema, 30*(1), 66-73. doi:10.7334/psicothema2016.294

Farrington, D. P., Gaffney, H., Lösel, F., & Ttofi, M. M. (2017). Systematic reviews of the effectiveness of developmental prevention programs in reducing delinquency, aggression, and bullying. *Aggression and Violent Behavior, 33*, 91-106. doi:10.1016/j.avb.2016.11.003

Foshee, V. A., Benefield, T. S., Reyes, H. L. M., Ennett, S. T., Faris, R., Chang, L. …, & Suchindran, C. M. (2013). The peer context and the development of the perpetration of adolescent dating violence. *Journal of Youth and Adolescence, 42,* 471-486. doi:10.1007/s10964-013-9915-7

Foshee, V. A., Reyes, L. M., Agnew-Brune, C. B., Simon, T. R., Vagi, K. J., Lee, R. D., & Suchindran, C. (2014). The effects of the evidence-based Safe Dates dating abuse prevention program on other youth violence outcomes. *Prevention Science*, *15*(6), 907-916. doi:10.1007/s11121-014-0472-4

Garaigordobil, M., & Aliri, J. (2013). Relaciones del sexismo con justificación de la violencia y con otras formas de prejuicio como la dominancia social y el autoritarismo [Sexism relations with justification of violence and with other forms of prejudice such as social dominance and authoritarianism]. *Estudios de Psicología, 34*(2), 127-139. doi:10.1174/021093913806751384

Garaigordobil, M. (2017). Conducta antisocial: conexión con bullying/cyberbullying y estrategias de resolución de conflictos [Antisocial behavior: Connection with bullying/cyberbullying and conflict resolution]. *Psychosocial Intervention*, *26*(1), 47-54. doi:10.1016/j.psi.2015.12.002

Garaigordobil, M., & Martínez-Valderrey, V. (2014). Effect of Cyberprogram 2.0 on reducing victimization and improving social competence in adolescence. *Revista de Psicodidáctica, 19*(2), 289-305. doi:10.1387/RevPsicodidact.10239

Garandeau, C. F., Lee, I. A., & Salmivalli, C. (2018). Decreases in the proportion of bullying victims in the classroom: Effects on the adjustment of remaining victims. *International Journal of Behavioral Development*, *42*(1), 64-72. doi: 10.1177/0165025416667492

Giumetti, G. W., & Kowalski, R. M. (2016). Cyberbullying matters: Examining the incremental impact of cyberbullying on outcomes over and above traditional bullying in North America. In Navarro, R., Yubero, S., & Larrañaga, E. (Eds.), *Cyberbullying across the globe* (pp. 117-130). New York: Springer International Publishing. doi:10.1007/978-3-319-25552-1_6

Glick, P., & Fiske, S. T. (1996). The Ambivalent Sexism Inventory: Differentiating hostile and benevolent sexism. *Journal of Personality and Social Psychology, 70*, 491-512.

Hammond, M. D., Milojev, P., Huang, Y., & Sibley, C. G. (2017). Benevolent sexism and hostile sexism across the ages. *Social Psychological and Personality Science, 9*(7), 863-874. doi:10.1177/1948550617727588

Hellfeldt, K., Gill, P. E., & Johansson, B. (2018). Longitudinal analysis of links between bullying victimization and psychosomatic maladjustment in Swedish schoolchildren. *Journal of School Violence, 17*(1), 86-98. doi:10.1080/15388220.2016.1222498

Leen, E., Sorbring, E., Mawer, M., Holdsworth, E., Helsing, B., & Bowen, E. (2013). Prevalence, dynamic risk factors and the efficacy of primary interventions for adolescent dating violence: An international review. *Aggression and Violent Behavior, 18*(1), 159-174. doi:10.1016/j.avb.2012.11.015

Lemus, S., Castillo, M., Moya, M., Padilla, J. L., & Ryan, E. (2008). Elaboración y validación de Inventario de Sexismo ambivalente para Adolescentes [Elaboration and validation of Ambivalent Sexism Inventory for Adolescents]. *International Journal of Clinical and Health Psychology, 8*, 537-562.

Little, T. D., Henrich, C. C., Jones, S. M., & Hawley, P. H. (2003). Disentangling the "whys" from the "whats" of aggressive behaviour. *International Journal of Behavioral Development, 27*, 122-133. doi:10.1080/01650250244000128

Malonda, E., Tur-Porcar, A., & Llorca, A. (2017). Sexismo en la adolescencia: estilos de crianza, división de tareas domésticas, conducta prosocial y agresividad [Sexism in adolescence: Parenting styles, division of housework, prosocial behaviour and aggressive behaviour]. *Revista de Psicología Social*, *32*(2), 333-361. doi:10.1080/02134748.2017.1291745

Martínez, I., Navarro, R., & Yubero, S. (2009). Estereotipos de género entre los adolescentes españoles: imagen prototípica de hombres y mujeres e imagen de uno mismo [Gender stereotypes among Spanish adolescents: Prototypical image of men and women and self-image]. *Información Psicológica, 95*, 77-86.

Martínez-Pecino, R., & Durán, M. (2016). I love you but I cyberbully you: The role of hostile sexism. *Journal of Interpersonal Violence,* 1-14. doi:10.1177/0886260516645817

Muñoz, B., Ortega-Rivera, F. J., & Sánchez-Jiménez, V. (2013). El DaViPoP: un programa de prevención de violencia en el cortejo y las parejas adolescentes [The DaViPoP: a violence prevention program in courtship and adolescent couples]. *Apuntes de Psicología*, *31*, 215-224.

Navarro, R., Yubero, S., & Larrañaga, E. (2018). Cyberbullying victimization and fatalism in adolescence: Resilience as a moderator. *Children and Youth Services Review, 84*, 215-221. doi:10.1016/j.childyouth.2017.12.011

Nocentini, A., Zambuto, V., & Menesini, E. (2015). Anti-bullying programs and Information and Communication Technologies (ICTs): A systematic review. *Aggression and Violent Behavior, 23,* 52-60. doi:10.1016/j.avb.2015.05.012

Ortega-Barón, J., Buelga, S., Cava, M. J., & Torralba, E. (2017). School violence and attitude toward authority of students perpetrators of cyberbullying. *Revista de Psicodidáctica, 22*(1), 23-28. doi:10.1016/S1136-1034(17)30040-0

Ovejero, A., Yubero, S., Larrañaga, E., & Navarro, R. (2013). Sexismo y comportamiento de acoso escolar en adolescentes [Sexism and bullying behavior in adolescents]. *Psicología Conductual, 21*(1), 157-171.

Pazos, M., Oliva, A., & Hernando, A. (2014). Violencia en relaciones de pareja de jóvenes y adolescentes [Violence in young and adolescent relationships]. *Revista Latinoamericana de Psicología, 46*(3), 148-159. doi:10.1016/S0120-0534(14)70018-4

Pinedo, R., Arroyo, M. J., & Berzosa, I. (2018). Género y educación: detección de situaciones de desigualdad de género en contextos educativos [Gender and education: detection of situations of gender inequality in educational contexts]. *Contextos Educativos, 21*, 33-51. doi:10.18172/con.3306

Ramiro-Sánchez, T., Ramiro, M. T., Bermúdez, M. P., & Buela-Casal, G. (2018). Sexism in adolescent relationships: A systematic review. *Psychosocial Intervention, 27,* 123-132. doi:10.5093/pi2018a19

Rodríguez-Castro, Y., Lameiras-Fernández, M., Carrera-Fernández, M. V., & Vallejo-Medina, P. (2013). La fiabilidad y validez de la escala de mitos hacia el amor: las creencias de los y las adolescentes

[The reliability and validity of the Myths Scale toward Love: Adolescents' beliefs]. *Revista de Psicología Social, 28*(2), 157-168. doi:10.1174/021347413806196708

Weinfurt, K. P. (2000). Repeated measures analysis: ANOVA, MANOVA, and HLM. In L. G. Grimm & P. R. Yarnold (Eds.), *Reading and understanding MORE multivariate statistics* (pp. 317-361). Washington, DC, US: American Psychological Association.

Wincentak, K., Connolly, J., & Card, N. (2017). Teen dating violence: A meta-analytic review of prevalence rates. *Psychology of Violence, 7*(2), 224-241. doi:10.1037/a0040194