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Associations between Online Hate Victimization and Perpetration

The Buffering Effects of Technical and Assertive Coping

Sebastian Wachs and Michelle F. Wright

Abstract

It is well known that victims of violence are more likely than non-victims to be perpetrators, and that perpetrators are more likely than non-perpetrators to be victims. However, the overlap between being the victim of violence and the perpetrator of violence is not well understood when it comes to online hate. An explanatory mechanism in this relationship could potentially be the use of specific coping strategies. We sought to develop a better understanding of the relationship between the victims and the perpetrators of online hate to inform effective intervention and prevention initiatives in the field of media education. Self-report questionnaires on receiving and committing online hate and on technical and assertive coping were completed by 1,480 young people between 12 and 17 years old (M = 14.21 years; SD = 1.68). Results showed that increases in being the recipient of online hate were positively related to being a perpetrator of online hate. Technical and assertive coping strategies were negatively related to perpetrating online hate. Furthermore, victims of online hate reported less instances of perpetrating online hate when they reported higher levels of technical and assertive coping strategies, and more frequent instances of perpetrating online hate when they reported lower levels of technical and assertive coping

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strategies. In conclusion, our findings suggest that, if they are to be effective, prevention and intervention programs that target online hate should consider educating young people in problem-focused coping strategies.

Über den Zusammenhang zwischen Online Hate-Viktimisierung und -Täterschaft: Abmildernde Effekte durch technische und selbstbehauptende Bewältigungsstrategien

Zusammenfassung

Es ist bekannt, dass Opfer von Gewalt ein höheres Risiko als Nicht-Opfer aufweisen, Täterinnen oder Täter von Gewalt zu sein. Die Überlappung zwischen Viktimisierung und Täterschaft ist jedoch für Online-Hate bisher kaum untersucht worden. Ein möglicher Erklärungsmechanismus für diesen Zusammenhang ist der Einsatz spezifischer Bewältigungsstrategien. Die vorliegende Studie verfolgt das Ziel, ein besseres Verständnis der Beziehung von Online-Hate-Opfern und -Täterinnen oder -Tätern zu entwickeln, um Grundlagen für wirksame Interventions- und Präventionsinitiativen im Bereich der Medienerziehung zu schaffen. Selbstberichtsfragebögen über Online-Hate-Viktimisierung und -Täterschaft sowie zu technischen und selbstbehauptenden Bewältigungsstrategien wurden von 1.480 Jugendlichen zwischen 12 und 17 Jahren (M = 14,21 Jahre; SD = 1,68) ausgefüllt. Die Ergebnisse zeigten, dass Online-Hate-Viktimisierung positiv mit der Online-Hate-Täterschaft korreliert. Technisches und selbstbehauptendes Coping zeigen einen negativen Zusammenhang mit Online-Hate-Täterschaft. Darüber hinaus berichteten Opfer von Online-Hate weniger Online-Hate-Täterschaft, wenn sie ein höheres Mass an technischen und selbstbehauptenden Bewältigungsstrategien einsetzen und häufiger Online-Hate-Täterschaft, wenn sie über ein niedrigeres Mass an technischen und selbstbehauptenden Bewältigungsstrategien verfügten. Zusammenfassend legen unsere Ergebnisse nahe, dass effektive Präventions- und Interventionsprogramme in Bezug auf Online-Hate die Vermittlung problem-fokussierter Bewältigungsstrategien berücksichtigen sollten.

1. Introduction

The Standing Conference of the Ministers of Education and Cultural Affairs concluded that Online hate represents a risk for self-determination as well as peaceful coexistence (KMK 2018). Online hate is defined as perpetrating or advocating negative actions through information and communication technologies (ICT) targeted directly at a group or person, or generally shared Online, against someone based on gender, sexual orientation, disability, race, ethnicity, nationality, or religion. Online hate is perceived as offensive, mean, or threatening, and can be expressed through degrading texts or speech Online, such as posts, comments, text messages, videos, and pictures (Hawdon, Oksanen, and Räsänen 2017; Räsänen et al. 2016; Sponholz 2018; UK Safer Internet Centre 2016; Wachs et al. 2021).

Although hatred directed at certain groups is nothing new, it has certainly reached a new dimension as an everyday phenomenon in the Online world. In a study with Finnish adolescents between 15 and 18 years of age, 53.9 % reported exposure to Online hate material, 23.4 % felt targeted by Online hate material, and 6.7 % reported posting or forwarding Online hate material (Räsänen et al. 2016). There is also some evidence that exposure to Online hate increases during adolescence. In 2010, 13 % of young people in seven European countries reported exposure to Online hate and this number had increased to 20 % by 2013 (Livingstone et al. 2014). Online hate represents a worrying trend, because there is some empirical evidence that exposure to Online hate material can impact adolescents' well-being and psychological functioning (Tynes et al. 2008; Sinclair et al. 2012).

Initial research has revealed an overlap between being the victim and being the perpetrator of Online hate (Wachs and Wright 2018, 2019). It is also well established that problem-focused coping strategies mitigate the detrimental effects of (cyber-) victimization on adolescents' mental health (Gaméz-Guadix, Wachs, and Wright 2020; Hyland et al. 2016; Kochenderfer-Ladd and Skinner 2002; Machmutow et al. 2012). The way victims manage stress and the negative emotions associated with Online hate might influence whether adolescents are more or less likely to react aggressively, thereby becoming perpetrators themselves. Thus, the present study investigates what, if any, mitigating effect technical and assertive coping strategies have on the relationship between being the victim

and being the perpetrator of Online hate. The results of this study might help us understand how adolescents could be better supported in dealing with the emerging issue of Online hate, thus mitigating potential negative effects. In addition, the findings may help to inform the development of intervention and prevention programs aimed at reducing Online hate among adolescents.

2. Victim-Perpetrator Overlap and the Moderating Role of Coping Strategies

Being a victim of online hate does not exclude one also being a perpetrator of online hate. Indeed, for decades the association between being a victim and being a perpetrator has been well documented in the criminological, psychological, and educational literature (Jennings, Piquero, and Reingle 2012; Hess and Scheithauer 2015; Wright and Li 2013; Wachs, Junger, and Sittichai 2015). In one of the first examinations of the victim-perpetrator overlap in Online hate, Wachs and Wright (2019) refer to the Social Learning Theory as a possible theoretical framework for understanding this relationship. Wachs and Wright argue that Online hate victims might become more aggressive and in turn go on to perpetrate Online hate because they learned these behaviors as a result of their victimization. The overlap between being the victim or the perpetrator of Online hate should be understood as a complex phenomenon that is influenced by various factors, ranging from individual-level constructs to larger environmental effects. A potential explanatory mechanism includes the use of specific coping strategies.

When adolescents experience a stressful event, they will attempt to mitigate, reduce, or eliminate the negative effects of this event. This process is referred to as coping, which is defined as the effort exerted to manage environmental stress and the subsequent emotions triggered by such stress (Lazarus 2006). Generally, adaptive and maladaptive coping styles are differentiated. Adaptive coping styles include problem-focused coping (i.e., using technology to address the stressor, assertiveness, seeking support) and emotion-focused coping (i.e., minimization, distraction), whereas maladaptive coping styles are characterized by passive avoidance, rumination, resignation, and aggression (Hampel, Manhal, and Hayer 2009).

Until now, little attention has been given to adolescents' strategies to cope with Online hate. In one study, 20 % of adolescents indicated that they were unsure of what to do when they encountered Online hate (UK Safer Internet Centre 2016). If these adolescents were exposed to Online hate, 43 % ignored it, 25 % reported it to the social networking website, app, game, or website in question, 21 % spoke to a friend, 18 % blocked the perpetrator, 13 % indicated that they told a parent or another adult, 13 % replied publicly to the perpetrator, 4 % informed a teacher or other professional, and 2 % reported the behavior to the police. In another study, Wachs et al. (2020) found that technical and assertive coping strategies are the most oft used strategies by German adolescents when dealing with online hate victimization. More recently, Gámez-Guadix and colleagues (2020) found in a sample of Spanish adolescents that the three most frequently endorsed coping strategies were technical coping, close support, and assertiveness.

Technical coping includes actions such as deleting Online hate material, reporting or blocking the person who is forwarding or posting Online hate material, and saving posts, messages, and pictures as evidence (e.g., copies and screenshots). In cyberbullying research, technical coping has been found to be a strategy that is often used (Price and Dalgleish 2010; Sticca et al. 2015; Šléglová and Cerna 2011).

Assertive coping, on the other hand, is a coping strategy that can also be considered as counter speech. Assertive coping refers to actions carried out to defend oneself without causing harm to others. Assertive coping might include actions such as confronting the person who spread Online hate, letting the person know that it is an unacceptable behavior, asking the person to stop, or asking the person to name the reasons that they are spreading hatred. It is commonly seen as a constructive and helpful way of dealing with (cyber-) victimization (Camodeca and Goossens 2005; Sticca et al. 2015).

Both technical and assertive coping strategies are often recommended in educational literature targeted at adolescents and can be considered to be an example of problem-focused coping strategies. When Online hate victimization is seen as a stressor affecting psychological functioning, the question arises as to whether specific coping strategies can assuage negative outcomes (i.e., the externalization of problem behaviors, such as aggression) of this association. It is well known that problem-focused coping

strategies allow victims to adjust better to threatening situations (Lazarus and Folkman 1987). More specifically, research has shown that problem-focused coping strategies mitigate the negative consequences of (cyber-) victimization on psychological functioning and wellbeing, but that they were exacerbated by emotion-focused coping strategies (Hampel, Manhal, and Hayer 2009; Völlink et al. 2013; Hyland et al. 2016; Kochenderfer-Ladd and Skinner 2002). We, therefore, expect that problem-focused coping (i.e., technical and assertive coping) will also reduce the likelihood that victims become perpetrators.

3. Aims of the Study

To summarize, preliminary evidence suggests a link between being a victim and being a perpetrator of Online hate, which may be mitigated by problem-focused coping strategies, such as technical and assertive coping. There is, however, a lack of empirical evidence on the role of coping strategies on the association between being a victim and being a perpetrator of Online hate. The present study fills this gap by providing evidence of the mitigating effects of technical and assertive coping strategies in the intersection between being a victim and a perpetrator of Online hate. Findings from our current study could a) help to provide novel insights into which role specific coping strategies play in the relationship between victims and perpetrators of Online hate and b) help to develop effective intervention and prevention programs to tackle Online hate among adolescents. Based on earlier studies, we hypothesized that:

- Hypothesis 1 (H1). Higher levels of technical coping weaken the association between being a victim and being a perpetrator of Online hate.
- Hypothesis 2 (H2). Higher levels of assertive coping weaken the association between being a victim and being a perpetrator of Online hate.

4. Methods

4.1 Participants

Participants were 1,480 students aged 12–17 years (*M*age = 14.21; SD = 1.22), attending seven middle schools from the German federal states of Bremen, Berlin, and Brandenburg.[1] Gender was equally distributed across the group, with 50.3 % (*n* = 744) being girls. Only a minority had a "migration background"[2] 9.7 % (*n* = 144). Around 33.6 % (*n* = 483) of students reported living in low-income families, 33 % (*n* = 474) in middle-income families, and 33.4 % (*n* = 479) in high-income families. Table 1 illustrates in detail the demographic characteristics of the participants.

FAS	Sex	Grade									
		7th		8th		9th		10th		Total	
		n	%	*n*	%	*n*	%	*n*	%	*n*	%
High SES	Girls	77	28.9	85	32	62	23.3	42	15.8	266	100
	Boys	62	28.6	81	37.3	49	22.6	25	11.5	217	100
Avg. SES	Girls	77	33.6	55	24	53	23.1	44	19.2	229	100
	Boys	63	25.7	74	30.2	63	25.7	45	18.4	245	100
Low SES	Girls	63	27.6	53	23.2	70	30.7	42	18.4	228	100
	Boys	82	32.7	63	25.1	67	26.7	39	15.5	251	100
Total		424	29.5	411	28.6	364	25.3	237	16.5	1436	100

Tab. 1.: Frequencies of demographic variables by grade, sex, and socioeconomic status. Note: Discrepancy between total and sample size is due to missing data (n = 44) for SES. SES = Socioeconomic status.

1 This sample has been used in three studies before. In the first study, it was investigated whether toxic online disinhibition moderates the association between online hate bystanders and perpetrators (Wachs and Wright 2018), in the second study, it was investigated whether toxic online disinhibition and sex moderate the relationship between online hate victimization and perpetration (Wachs and Wright 2019). In the third study, the psychometric properties and socio-demographic differences of the coping with cyberhate scale was investigated (Wachs et al. 2020)

2 The term "migration background" is the German equivalent of "ethnicity" and is the standard measure of ethnicity in academic and governmental research in Germany. See below for a description of how it is measured.

4.2 Measures

4.2.1 Involvement in Online Hate

To measure involvement in Online hate, two items were adopted from research by Hawdon et al. (2017). To measure whether participants had perpetrated Online hate, they were asked: "How often in the past 12 months have you posted hateful or degrading content Online, which inappropriately attacks certain groups of people or individuals based on their sex, religious affiliation, race, or sexual orientation?." To measure whether participants had been victims of Online hate, participants were asked: "How often in the past 12 months have you personally been the target of hateful or degrading content Online because of your sex, religious affiliation, race, or sexual orientation?." Participants rated each item on a scale of 0 (never) to 4 (very frequently).

4.2.2 Coping Strategies

Coping strategies for online hate were assessed by using an adaption of the Coping with Cyberbullying Questionnaire developed by Sticca et al. (2015). First, we gave the following scenario to the participants to read:

> "A person has expressed hateful or degrading opinions online through posts, comments, text messages, videos, or pictures, which inappropriately attacked you because of your race, gender, ethnic group, sexual orientation, or religion via chats or social networks (e.g. Facebook, Instagram, WhatsApp)."

Then participants were asked how they would cope with this Online hate incident. In the analysis, we used two subscales of coping strategies, namely technical coping (3 items; e.g., "*...block that person so that he/she cannot contact me anymore*") and assertive coping (4 items; "*...let the person know that his/her behavior is not acceptable at all*"). Participants rated each item on a scale of 0 (*definitely not*) to 2 (*definitely*). Cronbach's alphas were .83 for technical coping and .84 for assertive coping.

4.2.3 *Control Variables*

Participants were asked for their age and sex to determine demographic characteristics. Migration background was assessed by asking which language is mainly spoken at home. Family socioeconomic status was measured using the Family Affluence Scale (FAS) (Boyce et al. 2006). The FAS was trichotomized into low, medium, and high socioeconomic status.

4.3 *Procedures*

Approval for the study and all informed consent procedures were obtained from the data protection officer and educational authority of the federal state of Bremen, Germany. Twenty schools were randomly selected from a list of 167 schools. From these 20 schools, nine principals did not reply to the recruitment email, four expressed interest, but had existing commitments that prevented them from participating, and seven agreed to participate. There were 1,788 parental permission slips passed out to students. Of these, 1,480 parents/guardians agreed to allow their child to participate. Reasons for not participating in the study included: missing written parental consent, sick notes, absence because of other projects, internships, refusal to participate, unexcused absence at school, being new to the class and therefore not informed about the survey, or having "early refugee status" (meaning that German language skills were not advanced enough to participate).

An Online survey was conducted over one hour in the school's computer lab during a regular school day. All participants received instruction and were informed that their participation was optional, that they could choose not to answer any of the questions, and that participation could be stopped at any time without having to give a reason and without any further consequences. In order to prevent distress and further harm by participating in the study, oral, and written information was given about where participants could access counseling, both Online and Offline. Less than 3 % of the data was incomplete and the missing data were handled with mean imputation (Little and Rubin 2002).

4.4 *Data Analyses*

Firstly, we computed descriptive statistics and calculated Pearson's correlations (two-tailed) between the study's main variables, namely being a perpetrator of Online hate, being a victim of Online hate, technical coping, and assertive coping. We then examined a regression-based moderated model with being a victim of Online hate as the independent variable, technical coping and assertive coping as moderators, and being a perpetrator of Online hate as the dependent variable, while controlling for participants' age, sex, migration background, and socioeconomic background. Standard procedures were followed, with 5,000 bias-corrected bootstrap samples and 95 % confidence intervals. The SPSS PROCESS macro was used to conduct moderation analyses (Hayes 2013). Cohen's $f2$ was used as an effect size. According to Cohen (1988), $f2 \geq 0.10$, $f2 \geq 0.25$, and $f2 \geq 0.40$ represent small, medium, and large effect sizes respectively. Multicollinearity diagnostics were assessed and revealed correlations within an acceptable range (see Table 1).

5. Results

5.1 *Descriptive Statistics*

For the perpetrator of Online hate item, 88.7 % of adolescents answered with *never*; 7.3 % of adolescents reported this behavior *very rarely*, 1.8 % *occasionally*, 0.9 % *frequently*, and 1.2 % *very frequently*. For the victim of Online hate item, 83.1 % of adolescents reported that they have *never* been targeted by Online hate, 9.6 % reported experiencing Online hate victimization *very rarely*, 4.3 % *occasionally*, 1.6 % *frequently*, and 1.4 % *very frequently* (Figure 1).

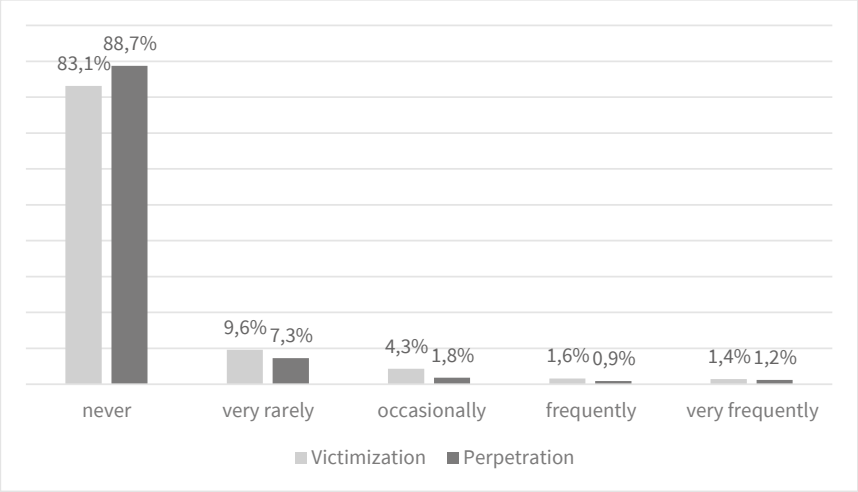

Fig. 1.: Frequency of being the victim or perpetrator of Online hate. Note. The percentage indicates the frequency of answers ranging from never to very frequently to an item for being the victim and being the perpetrator of Online hate.

Bivariate correlations between the main variables and descriptive statistics are summarized in Table 2.

Variable	1	2	3	4
1. Perpetrator of online hate	1	.31**	-.13**	-.15**
2. Victim of online hate			-.02	-.10**
3. Technical coping				.58**
4. Assertive coping				1
M	0.19	0.29	1.92	0.76
SD	0.62	0.74	01.08	0.94

Tab. 2.: Means, standard deviations, and correlations between being the perpetrator and being the victim of Online hate, technical coping, and assertive coping. Note. * $p < 0.05$; ** $p < 0.01$.

5.2 *Moderation Analyses*

The overall model was significant, F (8, 1335) = 37.07, p < .001, $R2$ = .18, indicating a large effect (Cohen's $f2$ = 0.51). As Table 2 illustrates, increases in being a victim of online hate were positively associated with being a perpetrator of online hate (β = .22, SE = 0.021 p < .001). Technical coping was negatively related with being a perpetrator of online hate (β = -.08, SE = 0.01, p < .001). Assertive coping was also negatively associated with being a perpetrator of online hate (β = -.06, SE = 0.02, p = .013).

Predictor	β (*)	SE	t	p
Victim of online hate	.22 (0.182 – 0.266)	0.021	10.45	<.001
Technical coping	-.08 (-0.112 – -0.051)	0.015	-5.27	<.001
Assertive coping	-.06 (-0.076 – -0.008)	0.017	-2.47	.013
OHV x Technical coping	-.16 (-0.198 – -0.116)	0.020	-7.53	<.001
OHV x Assertive coping	-.08 (-0.123 – -0.042)	0.021	-4.01	<.001
Control Variables				
Age	.03 (0.006 – 0.055)	0.012	2.45	.014
Sex (male)	.09 (0.026 – 0.153)	0.032	2.79	.005
Migration background	.01 (−0.095 – 0.111)	0.053	0.137	.890
SES	.01 (−0.008 – 0.009)	0.004	0.043	.965

Tab. 3.: Standardized coefficients of the model predicting being a perpetrator of Online hate. Note: OHV = being a victim of Online hate; SES = socioeconomic status; * 95 % BCa = bootstrap confidence intervals based on 5,000 samples.

A significant moderation effect was found between being a victim of Online hate and technical coping when predicting being a perpetrator of Online hate (β = -.16, p < .001). As shown in Figure 2, the relationship between being a victim of Online hate and a perpetrator of Online hate weakened as technical coping increased. In other words, victims of Online hate more often reported being perpetrators of Online hate when they reported lower levels of technical coping (β = .37, p < .001 at -1 SD) and reported being perpetrators of Online hate less frequently when they reported higher levels of technical coping (β = .15, p < .001 at + 1 SD) (see Figure 2). To add to this, assertive coping mitigated the relationship between being a victim

of Online hate and being a perpetrator of Online hate (β = -.08, $p < .001$). The mitigating effect of assertive coping is further elaborated in Figure 2. Probing the interaction further revealed that victims of Online hate more often reported that they perpetrated Online hate when they reported lower levels of assertive coping (β = .35, $p < .001$ at -1 *SD*) and less frequently reported perpetrating Online hate when they reported higher levels of assertive coping (β = .11, $p < .001$ at + 1 *SD*) (see Figure 3).

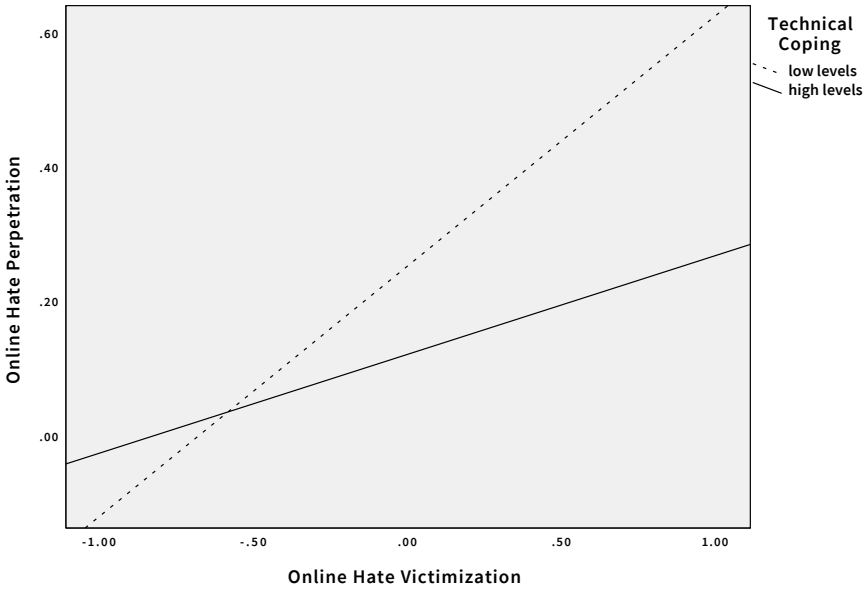

Fig. 2.: Graphical representation of the moderation of technical coping on the association between being a victim and being a perpetrator of Online hate.

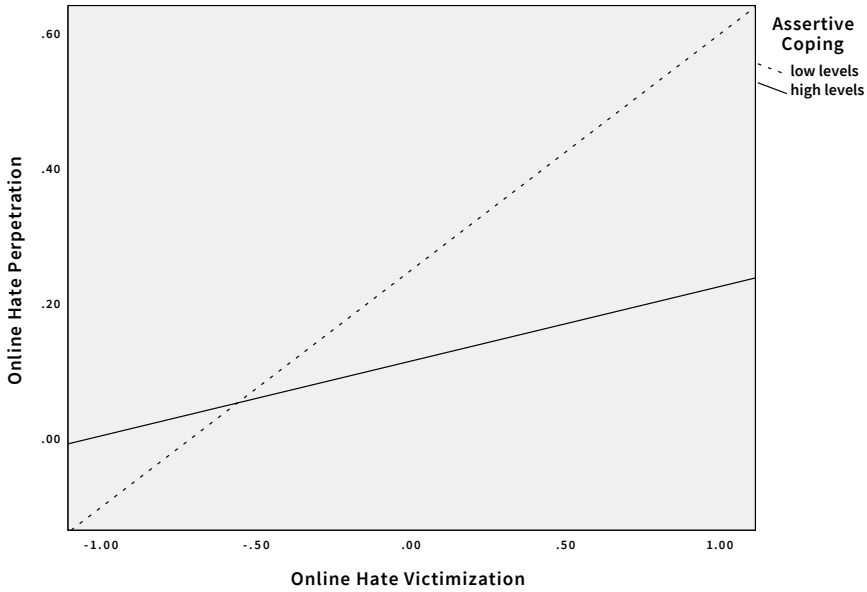

Fig. 3.: Graphical representation of the moderation of assertive coping on the association between being a victim and being a perpetrator of Online hate.

6. Discussion

The aim of the present study was to investigate the mitigating effect of technical and assertive coping strategies on the relationship between being a victim and being a perpetrator of Online hate. Several interesting findings emerged.

Technical and assertive coping strategies were negatively associated with being a perpetrator of Online hate. Aggressors typically have a positive attitude to violence and tend to be impulsive and dominant in their interaction with peers (Wachs et al. 2016). Thus, it can be hypothesized that aggressors might tend to use more maladaptive coping strategies, such as revenge, and less often use adaptive and problem-focused strategies, such as technical and assertive coping. This finding is also consistent with research on bullying in schools that revealed that bullies consider maladaptive coping (i.e., retaliation) as effective and problem-focused coping (i.e., assertiveness) as ineffective when dealing with bullying (Camodeca and Goossens 2005). In addition, being a victim of Online hate was also

negatively associated with assertive coping. A possible explanation for this finding might be that some victims of Online hate feel socially insecure as a result of the victimization and less self-confident in their assertive skills than non-victims.

We found support for our prediction that technical coping weakened the relationship between being a victim and being a perpetrator of Online hate (Hypothesis 1). This result suggests that technical measures to respond to being a victim of Online hate might reduce negative emotions and thus help adolescents deal with Online hate in a functional way. The evidence also showed that, as expected, assertive coping mitigated the associations between being a victim and being a perpetrator of Online hate (Hypothesis 2). This finding indicates that dealing assertively with being a victim of Online hate might reduce the likelihood of an aggressive response. Taken together, the findings are in line with previous research on (cyber-)bullying victimization that showed the mitigating effects of problem-focused coping strategies on the association between (cyber-)bullying victimization and psychological problems (Hampel et al. 2009; Völlink et al. 2013; Hyland et al. 2016; Kochenderfer-Ladd and Skinner 2002).

Our results indicate that media-skills training and assertiveness training should be included in intervention and prevention programs that aim to tackle involvement in Online hate among adolescents. Media skills training should aim to teach adolescents to pay more attention to who is allowed access to their data, how to block people who are sharing Online hate material, how to save messages/pictures as evidence (e.g., copies or screenshots), and how to report Online hate material to social networking websites. Ethical media literacy might also be beneficial for reducing Online hate. Adolescents with a strong ethical media competence are better able to assess their behavior and the resulting consequences (Sitzer et al. 2012). Furthermore, adolescents with strong ethical media literacy are less vulnerable to cyber-victimization due to their reflected use of digital media (e.g., with regard to Online disclosure of private information) (Sitzer et al. 2012). According to the Standing Conference of the Ministers of Education and Cultural Affairs, teachers and schools play an important role in educating adolescents in media competence and supporting them in dealing with the emerging issue of Online hate (KMK 2018).

Furthermore, the results of this study stress the importance of educating adolescents in how to stand up for themselves and how to employ effective coping strategies to deal with being a victim of Online hate. Assertiveness training programs could aim to empower adolescents to resist group pressure, not join in in Online hate, and how to defend oneself without being offensive to others. In this way, this kind of training could also increase adolescents' self-efficacy when it comes to intervening in Online hate. To increase the positive effects of such programs, another option could be the introduction of peer-mentoring training groups, in which peers are used as trainers and role models.

6.1 Limitations and Outlook for Future Research

This study contributes valuable knowledge to the literature on the mitigating effects of different coping strategies on the associations between victims and perpetrators of Online hate. However, there are a few limitations of this research that should be addressed in future research. The most important limitation of the study is the cross-sectional nature of the data. Future research should investigate these variables at several points in time. This improvement will make it possible to determine the temporal ordering of the variables and the moderation effects examined in this study. Despite the large sample size used, the sample cannot be considered representative of German adolescents, given that only a small number of schools were recruited in just three of Germany's 16 federal states. Consequently, it would be important for researchers to conduct studies that included representatives to increase the generalizability of this research. It is also necessary for researchers to conduct studies based on diverse samples, including ones that vary by, for example, national origin, educational level, sexual identity, religious affiliation, or racial/ethnic group. These samples might also allow one to investigate different forms of Online hate in more detail (i.e., homophobic, xenophobic, Islamophobic). In the same vein, cross-cultural studies are needed to understand whether adolescents from different cultures use different coping strategies to deal with Online hate. This research might be especially important in regard to the development of prevention and intervention programs as well as the inter-cultural

validity of such programs. Finally, we only included two problem-focused coping strategies, namely technical and assertive coping. Follow-up research should include a wider range of coping strategies in order to understand whether maladaptive coping strategies increase the association between being a victim and being a perpetrator of Online hate.

6.2 Conclusions

Our study is among the first to elucidate the moderating effects of problem-focused coping strategies on the relationship between being a victim and being a perpetrator of Online hate. The present study further advances our understanding of the involvement of young people in Online hate. We found that technical and assertive coping strategies are negatively related to being a perpetrator of Online hate. Additionally, the results highlight the importance of problem-focused coping strategies in the relationship between being a victim and being a perpetrator of Online hate. Future studies should focus on developing a better understanding of how different coping strategies (i.e., emotion-focused or maladaptive coping strategies) differently impact this relationship. The current findings indicate a need for media pedagogues to educate adolescents to cope with Online hate by using technical and assertive strategies. In addition, greater attention should be given to developing intervention programs that focus on coping strategies in helping to mitigate the likelihood that adolescents become involved in Online hate.

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