

# Dangerous Words? An Experimental Investigation of the Impact of Detailed Reporting About Suicide on Subsequent Risk

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**Objective:** Media reporting guidelines exist for suicide-related content; however, no experimental studies have examined the impact of guideline violations. As such, we utilized an experimental design to determine whether reading an article about suicide that violated guidelines would impact mood and suicidality relative to the same article without violations and to an article detailing death by cancer, both immediately and during 1-month follow-up. **Method:** 273 students were randomly assigned to read one of three articles (1) an article that violated suicide reporting guidelines, (2) the same article with violations removed, or (3) an article that details death by cancer. **Results:** Individuals assigned to read the original suicide article were no more upset immediately afterwards or during 1-month follow-up. Amongst participants with prior ideation, those who read the original article reported a lower likelihood of future attempt relative to either other condition. **Conclusion:** Results indicate some reporting guidelines may be unnecessary. Amongst individuals at risk for suicide, some guideline violations may be associated with a decreased likelihood of future attempt and result in a decrease in negative affect. Clinically, these results highlight the potential utility of exposing clients to in depth educational materials about suicide while mitigating concerns regarding certain aspects of the content. © 2015 Wiley Periodicals, Inc. *J. Clin. Psychol.* 00:1–11, 2015.

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Preventing suicide is a vital international health goal, as approximately 800,000 individuals worldwide die by suicide each year (World Health Organization [WHO], 2014). Responsible media reporting on suicide is considered an important component of suicide prevention and is included as part of the United States National Strategy for Suicide Prevention (U.S. Department of Health and Human Services and National Action Alliance for Suicide Prevention, 2012). There has been a particular fear of “contagion” impact among vulnerable groups, such as youths and individuals who have been contemplating suicide (Sisak & Varnik, 2012). Such concerns about the possible iatrogenic effects of media reporting of suicide have spurred organizations such as the American Foundation for Suicide Prevention (AFSP, 2002), the Centers for Disease Control and Prevention (O’Carroll & Potter, 1994), and WHO (2014) to produce recommendations and guidelines for responsible media reporting of suicide (see Table 1 and below for detailed information on the guidelines). However, to date, studies have largely failed to evaluate the efficacy or impact of these guidelines (Mann et al., 2005).

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Table 1  
*Media Guidelines for Reporting on Suicide*

U.S.-specific guidelines	World Health Organization guidelines
<ul style="list-style-type: none"> <li>● Avoid big or sensationalistic headlines, or prominent placement</li> <li>● Avoid including photos/videos of the location or method of death, grieving family, friends, memorials, or funerals</li> <li>● Avoid describing recent suicides as an “epidemic,” “skyrocketing,” or other strong terms</li> <li>● Avoid describing a suicide as inexplicable or “without warning”</li> <li>● Avoid description of content of suicide notes</li> </ul>	<ul style="list-style-type: none"> <li>● Take the opportunity to educate the public about suicide</li> <li>● Avoid language that sensationalizes or normalizes suicide, or presents it as a solution to problems</li> </ul>
<ul style="list-style-type: none"> <li>● Avoid investigating and reporting on suicide in a manner similar to reporting on crimes</li> <li>● Avoid quoting/interviewing police or first responders about the causes of suicide</li> <li>● Avoid referring to suicide as “successful,” unsuccessful,” or a “failed attempt”</li> </ul>	<ul style="list-style-type: none"> <li>● Avoid prominent placement and undue repetition of stories about suicide</li> <li>● Avoid explicit description of the method used in a completed or attempted suicide</li> <li>● Avoid providing detailed information about the site of a completed or attempted suicide</li> <li>● Word headlines carefully</li> <li>● Exercise caution in using photographs or video footage</li> <li>● Take particular care in reporting celebrity suicides</li> <li>● Show due consideration for people bereaved by suicide</li> <li>● Provide information about where to seek help</li> <li>● Recognize that media professionals themselves may be affected by stories about suicide</li> </ul>

*Note.* U.S.-specific guidelines were developed through a collaboration across multiple agencies, including the American Association for Suicidology and the Centers for Disease Control and Prevention.

Concerns about iatrogenic effects of media reporting have been examined in more than 50 observational and naturalistic studies across nations and cultures, some of which suggest that media coverage of suicide and subsequent population suicide rates are correlated (Sisak & Varnik, 2012). Results of a meta-analysis of 10 international, population-based studies further suggest that suicide rates increased by .26 per 100,000 during the month immediately following a celebrity suicide, with larger increases being associated with the national prominence of the celebrity (Lee, Lee, Hwang, & Stack, 2014; Niederkrotenthaler et al., 2012). That being said, according to reviews considering the findings across studies, support for a “copycat” effect is infrequent and limited to specific contexts (e.g., Stack, 2003, 2005). Although the weight of evidence drawn from these naturalistic studies favors an association of media reporting of suicide with short-term increases in suicidal ideation, suicide attempts, and suicide deaths, these studies are not without fundamental limitations.

Nonexperimental studies cannot control for several potential confounds. For example, many—although not all—studies do not control for factors such as seasonal variation in suicide rates (Woo, Okusaga, & Postolache, 2012). Media coverage of suicides during the months immediately preceding annual peaks in suicide rates could result in an illusory correlation between media reporting and an increase in suicide. Another limitation of observational population studies is their inability to determine which individuals were exposed to media reporting of suicide or the intensity of this exposure.

A dose-response effect between media reporting and suicide has been proposed (Phillips & Paight, 1987), but few studies have investigated this experimentally. A small nonexperimental literature finds that most individuals who attempt suicide immediately after media coverage were not exposed to the coverage, and those attempters who were exposed to the coverage did not believe the media influenced them (e.g., Simkin, Hawton, Whitehead, Fagg, & Eagle, 1995). Additionally, some studies find that media reports can have a preventative effect, perhaps by

reducing stigma or highlighting resources (Niederkrötenhaler et al., 2010). Untested media guidelines may restrain dissemination of important information about suicide that could be helpful, rather than harmful, to those at risk. However, there are currently no experimental studies testing the effect of media reporting of suicide on subsequent increases or decreases in suicidality to inform these well-intentioned guidelines.

Given the importance of suicide prevention and the absence of any prospective experimental studies examining the effects of exposure to media reporting about suicide on subsequent suicide-related outcomes, we conducted a single-blind, randomized controlled study to determine whether reading a suicide-focused article published in *Newsweek* (Dokoupfil, 2013), an American weekly news magazine, that violated several media reporting guidelines contributed to increased emotional distress, suicide ideation, and suicide attempts immediately or during a 1-month follow-up period, compared to two parallel conditions: (a) the same suicide-focused magazine article adapted to conform to media reporting guidelines and (b) a magazine article that vividly described the process of dying by cancer.

We opted to include an article on cancer as a third condition for several reasons. First, cancer was previously stigmatized in a manner similar to how suicide is today, but now it is spoken about openly. In this sense, we think the decrease in stigma around cancer mirrors the trajectory that many in the field of suicidology would like to see for suicide. Relatedly, to our knowledge, no guidelines or controversies regarding the reporting of cancer exist, and thus the comparison allows us to consider the impact of reporting on suicide alongside the impact of reporting on another cause of death and then put the need for such guidelines into a wider context.

Given prior work demonstrating that exposure to suicide-related material does not increase immediate or long-term suicide risk (Cukrowicz, Smith, & Poindexter, 2010; Jacomb et al., 1999), we hypothesized that individuals assigned to the article that violated reporting guidelines would experience no greater increases in negative affect or self-reported likelihood of a future suicide attempt, immediately after reading their article, compared to individuals in the two control conditions. Similarly, we hypothesized that individuals assigned to the article that violated reporting guidelines would experience no more negative affect, suicidal ideation, resolved plans and preparations for suicide, suicide gestures, or suicide attempts during the month immediately after the article compared to individuals in the two control conditions.

Last, we anticipated that, in the two conditions that involved articles about suicide, individuals currently experiencing suicidal ideation and individuals with a prior suicide attempt would experience less negative affect, suicidal ideation, resolved plans and preparations for suicide, suicide gestures, or suicide attempts during the 1-month follow-up compared to individuals assigned to the article about dying by cancer. Results consistent with our hypotheses would indicate that at least some media reporting guidelines for suicide are unnecessary and, in fact, may be counterproductive.

## Method

### *Participants*

Participants were 273 adults (mean  $[M]_{\text{age}} = 20.40$ , standard deviation  $[SD] = 3.68$ ) recruited from four universities located across North America. A total of 201 (73.6%) participants identified as female and 67 (24.5%) identified as male. In terms of race/ethnicity, 150 (54.9%) identified as White, 59 (21.6%) as Asian/Pacific Islander, 24 (12.5%) as African American, 15 (5.5%) as Hispanic/Latino(a), and 7 (2.5%) as other. With respect to data collection sites, 82 participants were recruited from the University of British Columbia, 82 from the University of Utah, 69 from the University of Southern Mississippi, and 40 from Florida State University. All participants received course credit for their participation and provided informed consent before participation. Participants were not screened out of the study for any reason, including elevated suicide risk or psychopathology.

### *Procedure*

Participants first attended a baseline assessment in a laboratory setting. After completing self-report questionnaires, participants were randomly assigned to one of three conditions (described

below). Participants rated their current affective state and subsequently read the article assigned to their condition. Immediately after reading the article, participants again rated their current affective state and answered questions regarding the article. Before leaving the lab, participants were provided with contact information for support resources and were assisted in developing a safety plan. Although research suggests that participating in suicide-related research does not increase suicide risk (e.g., Cukrowicz et al., 2010), these resources were provided to participants should they need them in the future. Approximately 1-month later (25 to 35 days), participants returned to the lab and completed questionnaires on their experiences between the assessments. The procedures were approved by all relevant institutional review boards.

### *Conditions*

*Original suicide article.* Participants assigned to this condition read an article published online by Newsweek magazine on May 22, 2013. The article, entitled “Why Suicide Has Become an Epidemic—And What We Can Do to Help,” (Dokoupfil, 2013) described an interview with Dr. Thomas Joiner and involved detailed descriptions of his father’s death by suicide, shifting trends in suicide rates, and Dr. Joiner’s theory of suicide. The story violated several components of the guidelines for media reporting on suicide, developed by groups including the Centers for Disease Control and Prevention (CDC) and the American Association of Suicidology (AAS; see Table 1 for a full list of the media guidelines). The suicide-reporting violations were as follows: detailed description of the method of suicide used by a suicide decedent; discussion of methods used by celebrities who died by suicide; inclusion of potentially sensationalistic language in the title and text (e.g., “epidemic”); prominent placement of the story (e.g., primary headline on the cover of the magazine issue); descriptions of specific suicide deaths as lacking explanation; description of the content of a suicide note; description of the location of a specific suicide death; and the use of language that normalized suicide. The full article can be found at <http://www.newsweek.com/2013/05/22/why-suicide-has-become-epidemic-and-what-we-can-do-help-237434.html> and the full reporting guidelines can be found at <http://reportingonsuicide.org/Recommendations2012.pdf> and [http://whqlibdoc.who.int/publications/2008/9789241597074\\_eng.pdf?ua=1](http://whqlibdoc.who.int/publications/2008/9789241597074_eng.pdf?ua=1)

*Revised suicide article.* Participants assigned to this condition read the same article used in the original suicide article condition except all reporting violations were removed. The first and second author developed the revised version of the article and all study personnel reviewed it before the onset of data collection. The changes were as follows: revised title (from “Why Suicide Has Become an Epidemic and What We Can Do to Help” to “The Suicide Problem”); deletion of the description of methods used in specific attempts; deletion of the description of the content of suicide notes; and deletion of the description of suicide deaths by celebrities. We also removed the following text: all sensationalized language (“We’ve reached the end of one order of human history and are at the beginning of a new order entirely, one beset by a whole lot of self-inflicted bloodshed, and a whole lot more to come”); text that normalized suicide (“On the contrary, suicide’s Venn diagram is composed of circles we all routinely step in, or near, never realizing we are in the deadly center until it’s too late”); and text that implied a lack of ability to prevent suicide. Full text of this revision is available through the corresponding author.

*Cancer article.* Participants assigned to this condition read an article that details what happens to an individual’s body as they die from cancer (Burling, 2011). We chose this article for several reasons. First, the article provides a detailed description of the process of death, a close parallel to the detailed discussion of a death by suicide. Second, the topic could be upsetting, thereby controlling for the overall impact of distressing material relative to the specific impact of suicide-relevant content. Third, cancer was once stigmatized in a manner similar to suicide but is now widely discussed. Last, this article—although distressing—did not appear to violate any media reporting guidelines. Therefore, the primary comparison is not between two theoretically dangerous articles that violate accepted practices, but rather a comparison between a theoretically dangerous article and one entirely noncontroversial article. The full

article can be accessed at [http://articles.philly.com/2011-04-04/news/29380454\\_1\\_cancer-cells-cancer-patients-medical-director](http://articles.philly.com/2011-04-04/news/29380454_1_cancer-cells-cancer-patients-medical-director).

### Measures

*Resolved plans and preparations for suicide.* Current resolved plans and preparations for suicide were assessed at baseline and 1-month follow-up using the four-item Depressive Symptom Index-Suicidality Subscale (DSI-SS; Metalsky & Joiner, 1997). The DSI-SS has demonstrated good internal consistency (Metalsky & Joiner, 1997) and convergent validity in undergraduate samples (Joiner & Rudd, 1995). The DSI-SS demonstrated good internal consistency ( $\alpha = .90$ ) in the present sample.

*Negative affect.* State negative affect immediately prior to and after reading the assigned article was assessed at baseline using the Positive Affect Negative Affect Schedule (PANAS; Watson, Clark, & Tellegen, 1988). Participants provided their ratings on 10 positive and 10 negative mood items. Affective states during the 1-month between baseline and follow-up were also assessed using the PANAS. The PANAS has shown good test-retest reliability and convergent validity among student samples (Watson et al., 1988; MacKinnon et al., 1999). In the current study, across both time points, the positive ( $\alpha = .89-.91$ ) and negative ( $\alpha = .83-.87$ ) affect scales of the PANAS demonstrated good internal consistency.

*Suicide risk.* At baseline, the self-report version of the Self-Injurious Thoughts and Behaviors Interview (SITBI; Nock, Holmberg, Photos, & Michel, 2007) was used to assess lifetime incidence of suicidal ideation ("Have you ever had thoughts of killing yourself?"), lifetime suicide plan ("Have you ever actually made a plan to kill yourself?"), suicide gesture ("Have you ever made a suicide gesture, that is, done something to lead someone to believe that you wanted to kill yourself when you really had no intention of doing so?"), and suicide attempt ("Have you ever made an actual attempt to kill yourself in which you had at least some intent to die?"). At follow-up, this same scale was used to assess the occurrence of these outcomes during the month between assessments by modifying item stems from "Have you ever . . ." to "In the past month . . ." In past studies, the SITBI has demonstrated strong concurrent and convergent validity (Nock et al., 2007).

*Responses to the article.* Immediately after reading the assigned article, participants responded to a series of questions regarding the subjective impact of its contents. To assess the impact of the article on future responses to distress, participants were asked, "To what extent do you believe reading this article will impact your response to distress in the future?" Responses ranged from 0 (*much less likely to attempt suicide*) to 4 (*much more likely to attempt suicide*).

### Data Analytic Procedure

To examine between group differences across the three conditions on our continuous outcome variables, we conducted a series of analyses of covariance. In each case, condition served as the independent variable. Immediate impact of the article (changes in negative affect, response to future distress) and resolved plans and preparations and negative affect during the 1-month follow-up period served as the outcomes in these analyses. When applicable, baseline levels of those variables served as covariates. To examine between group differences across the three conditions on our categorical outcome variables (suicidal ideation, suicide plan, suicide gesture, and suicide attempt during the 1-month follow-up period), we conducted a series of chi-square analyses. No participants attempted suicide during the follow-up period. Each of these analyses was conducted on the full sample and subsamples of individuals with prior ideation and with prior attempts.

Table 2

Results in Full Sample, Subsample of Individuals With Prior Suicidal Ideation, and Subsample of Individuals With A Prior Suicide Attempt<sup>a</sup>

	Original article	Revised article	Cancer article			
<b>Immediately after article</b>				<i>F</i>	<i>p</i>	$\mu^2_p$
Change in NA	.69 <sup>a,b</sup>	-0.43 <sup>a</sup>	1.54 <sup>b</sup>	3.54	.030	.03
<i>Ideation</i>	-.07 <sup>a</sup>	-.90 <sup>a</sup>	1.64 <sup>a</sup>	1.98	.143	.04
<i>Attempt</i>	-1.49 <sup>a</sup>	-.89 <sup>a</sup>	2.16 <sup>a</sup>	1.01	.403	.18
Future attempt	.98 <sup>a</sup>	1.17 <sup>a,b</sup>	1.28 <sup>b</sup>	2.66	.072	.02
<i>Ideation</i>	.87 <sup>a</sup>	1.44 <sup>b</sup>	1.33 <sup>b</sup>	4.06	.020	.08
<i>Attempt</i>	1.33 <sup>a</sup>	1.29 <sup>a</sup>	1.19 <sup>a</sup>	.03	.973	.01
<b>1-month follow-up period</b>				<i>F</i>	<i>p</i>	$\mu^2_p$
Plans and preparations	.40 <sup>a</sup>	.28 <sup>a</sup>	.25 <sup>a</sup>	.63	.536	.01
<i>Ideation</i>	.75 <sup>a</sup>	.61 <sup>a</sup>	.60 <sup>a</sup>	.12	.885	.00
<i>Attempt</i>	.66 <sup>a</sup>	.21 <sup>a</sup>	1.99 <sup>a</sup>	1.28	.336	.27
Negative affect	18.19 <sup>a</sup>	16.88 <sup>a</sup>	18.94 <sup>a</sup>	1.79	.169	.02
<i>Ideation</i>	19.32 <sup>a</sup>	15.51 <sup>b</sup>	20.01 <sup>a</sup>	4.06	.021	.09
<i>Attempt</i>	23.03 <sup>a,b</sup>	16.81 <sup>a</sup>	22.72 <sup>b</sup>	3.68	.073	.48
				$\chi^2$	<i>p</i>	
Suicidal ideation	8 (10.0%)	4 (5.8%)	3 (3.8%)	2.53	.282	
<i>Ideation</i>	6 (21.4%)	4 (16.0%)	3 (9.7%)	1.56	.458	
<i>Attempt</i>	0 (0.0%)	1 (20.0%)	1 (25.0%)	.84	.657	
Plan	1 (1.3%)	0 (0.0%)	0 (0.0%)	1.85	.397	
<i>Ideation</i>	-	-	-	-	-	
<i>Attempt</i>	-	-	-	-	-	
Gesture	1 (1.3%)	1 (1.4%)	2 (2.6%)	.45	.799	
<i>Ideation</i>	0 (0.0%)	0 (0.0%)	1 (3.2%)	1.73	.421	
<i>Attempt</i>	-	-	-	-	-	
Suicide attempt	-	-	-	-	-	
<i>Ideation</i>	-	-	-	-	-	
<i>Attempt</i>	-	-	-	-	-	

Note. NA = negative affect; future attempt = self-reported likelihood of a future suicide attempt after reading assigned article. Values within rows that do not share superscripts significantly differ at the  $p < .05$  level.

## Results

Of the overall sample, 37.0% had thought about suicide in their lifetime, 8.9% had previously made a plan for suicide, 9.6% had previously made a suicide gesture, and 5.6% had attempted suicide. In terms of recent suicide risk, 5.2% reported suicidal ideation in the past week. Before the experimental manipulation, there were no between-group differences across conditions on any variable used in our analyses.

A total of 45 (16.5%) participants did not return for the 1-month follow-up appointment. There were no between-group differences (completers vs. noncompleters) on any variable used in our analyses.

Between the initial session and follow-up, 6.6% of the sample experienced suicidal ideation, 0.4% made a plan for suicide, 1.8% made a suicide gesture, and no participants made a suicide attempt.

### Primary Analyses

All results from the experimental manipulation can be found in Table 2.

#### Immediate Impact of Article

*Change in negative affect.* Accounting for baseline levels of negative affect and site differences, we found a significant main effect of condition on changes in negative affect from

baseline to 1-month follow-up,  $F(2, 261) = 3.55, p = .030, \eta_p^2 = .03$ . Specifically, pairwise comparisons showed that participants who read the cancer article ( $M = 1.54, 95\%$  confidence interval [CI] [.53, 2.56]) reported significantly greater increases in negative affect compared with their counterparts who read the revised article ( $M = -.43, 95\%$  CI [-1.47, .62],  $p = .025, d = .41$ ). Those who read the original article ( $M = .69, 95\%$  CI [-.34, 1.72]) did not differ from the other conditions ( $ps = .137-.249$ ). We found no significant main effect of condition on changes in negative affect in a subsample of participants who have thought about suicide,  $F(2, 93) = 1.98, p = .143$ , or in a subsample of participants who have attempted suicide,  $F(2, 9) = 1.01, p = .403$ . However, in each case, participants assigned to the suicide articles experienced a mean decrease in negative affect, whereas participants assigned to the cancer condition experienced a mean increase in negative affect.

*Likelihood of Future Suicide Attempt.* Accounting for site differences, we found no significant overall differences between the three conditions on the impact of the article on forecasting the likelihood of a future suicide attempt,  $F(2, 267) = 2.66, p = .072$ . Nonetheless, pairwise comparisons showed that individuals in the original article condition reported a greater decrease in the likelihood of a future attempt ( $M = .98; 95\%$  CI [.79, 1.16]) than did individuals who read the cancer article ( $M = 1.28; 95\%$  CI [1.10, 1.46];  $p = .024$ ). In the subsample of participants who have thought about suicide, we found a significant main effect of condition on the likelihood of a future suicide attempt,  $F(2, 95) = 4.06, p = .020, \eta_p^2 = .08$ . Specifically, pairwise comparisons showed that that individuals who read the original article reported a greater decrease in the likelihood of a future attempt ( $M = .87$ ) compared with the revised article ( $M = 1.44, p = .009$ ) and the cancer article ( $M = 1.33, p = .029$ ). In the subsample of participants who had attempted suicide in the past, we found no significant differences between conditions on the likelihood of a future suicide attempt,  $F(2, 11) = .028, p = .973$ .

### *Impact of Article at Follow-Up*

Accounting for site differences and baseline scores, there were no significant differences between the three conditions on resolved plans and preparations or negative affect at follow-up,  $F_s < 1.79, ps > .17$ . When examining the subsample of individuals with prior ideation, we found a significant effect of condition on negative affect at follow-up,  $F(2, 80) = 4.06, p = .021, \eta_p^2 = .09$ . Pairwise comparisons showed that participants who read the revised article ( $M = 15.20, SD = 5.57$ ) had significantly less negative affect compared with those who read the cancer article ( $M = 20.26, SD = 6.97, p = .026, d = .80$ ), but not the original article ( $M = 19.32, SD = 7.46, p = .084$ ). In the subsample of participants with past suicide attempts, there were no significant differences between the three conditions on resolved plans and preparations or negative affect at follow-up ( $F_s < 4.31, ps > .069$ ). There were no differences across conditions (full sample, past ideation, past attempt) on suicidal ideation, plans, or gestures during the follow-up period. No individual attempted suicide during the follow-up period.<sup>1,2</sup>

## Discussion

The primary aim of this study was to experimentally test the utility of media reporting guidelines on suicide in an effort to determine whether any iatrogenic effects may result from reading detailed information about suicide. Our data indicated that reading about death by cancer induced (a) similar levels of negative affect relative to the original about suicide and (b) more negative affect than the revised article with all reporting violations removed. In some ways, that

<sup>1</sup>We examined the effects of sex and race, as well as their respective interactions with Condition and found the results to be consistent with the results of the analyses reported in this document. Specific results are available upon request from the first author.

<sup>2</sup>To ensure that differences across sites did not spuriously influence results, we repeated each analysis accounting for location of data collection. All results remained the same across all analyses after accounting for the effects of site.

finding is supportive of the utility of the guidelines; however, it should be noted that the article that violated the guidelines was no more immediately distressing than was the article about cancer and the mean increase in negative affect was quite small.

Furthermore, in higher risk individuals (e.g., prior ideation and/or attempt), reading suicide-related content resulted in a mean decrease in negative affect, whereas reading cancer-related content was associated with a mean increase in negative affect. Across the full sample, reading the original article that violated the reporting guidelines was associated with a greater mean decrease in self-reported likelihood of a future suicide attempt relative to individuals who read the cancer article. Among individuals with prior suicidal ideation, the original article resulted in a lower self-reported likelihood of a future suicide attempt relative to not only the cancer article but also the revised article, indicating that the detailed information may have been experienced as beneficial to higher risk readers. Across all conditions and all levels of risk, there were no between group differences on any suicide-related outcomes. Such results do not support the notion that the reporting guidelines, as currently stated, serve to prevent contagion effects.

It should be noted that our study did not test the efficacy of all reporting guidelines. The Newsweek piece violated a specific set of guidelines centered on content and placement (description of the details of a specific death and suicide note; description of specific deaths as lacking explanation; use of sensationalistic language; discussion of celebrity suicide deaths; prominent placement of the article in the publication). These violations varied in intensity and frequency and we were unable to include conditions in which each individual violation and combination of violations were manipulated. Therefore, although our findings speak clearly to the notion that the reporting guidelines, as currently written, may require revision, we cannot speak with confidence regarding which guidelines could be eliminated or how best to revise specific guidelines that should remain. Rather, the conclusion more safely drawn from our data is that concerns regarding the content of suicide-related articles may frequently exceed the actual danger of the article and that focusing primarily on such violations may ultimately result in missed opportunities to increase education and decrease stigma.

The present study had several key strengths with regard to design when compared with previous studies on media reporting and suicide. This study is the first experimental investigation on this topic, thus representing a novel contribution to the body of existing correlational literature (Sisak & Varnik, 2012). Our use of two compelling control groups provides a more rigorous test of published media reporting guidelines than would have been accomplished by a single control group. Our use of four diverse sites located across North America reduces concerns related to geographic-specific effects (Jashinsky, 2014). The relatively large sample size also mitigated concerns regarding statistical power, thereby enhancing confidence in the validity of the lack of significant between-group differences reported in our results. Additionally, the longitudinal nature of our study allowed for an examination of possible postexposure effects that could not have been ruled out with a cross-sectional design.

### *Limitations*

Despite these strengths, there were some limitations. Generalizability was limited given that our sampling strategy was restricted to undergraduate participants. More research is needed to address similar questions in vulnerable populations, such as clinical samples of individuals diagnosed with a mental illness. That being said, it should be noted that the reporting guidelines are not necessarily specifically designed to address at-risk individuals, but rather the population-based associations between reporting and suicide rates reported in prior correlational research. In addition, the proportion of individuals who reported a previous suicide attempt in our sample was low. Replicating the study with a larger sample of participants with a history of suicide attempts would allow for better determination of whether exposure to media reporting may be beneficial or harmful to such individuals.

There may also have been potential limitations to the suicide article used, which discussed suicide, in part, with a mental health expert. Previous literature has suggested that media

reporting effects may be partially mediated by whether or not a celebrity is the focus of the article (Niederkröthenthaler et al., 2012), but we did not assess for this effect. Future work that replicates our experimental design but focuses on the death of a celebrity would help increase the generalizability of our findings. That being said, because the original version of the Newsweek article mentioned several celebrities who died by suicide, including reference to the method they used, they were a significant presence of the article.

It is also worth noting that it is not possible to measure the strength of reporting violations, and it is possible that other articles exist that violate guidelines in more robust and potent ways and that could theoretically impact subsequent suicide risk differently than the article we examined in our protocol. We were unable to control for participants' experiences with losing individuals to suicide and/or cancer, which could theoretically have influenced the impact of the articles on subsequent affect and suicidality. By randomizing participants across conditions, we likely indirectly controlled for this variable; however, future work that directly considers its impact would be valuable. Ethical concerns and review board requirements dictated that we develop a brief safety plan with each participant after their exposure to the materials at Time 1. It should be noted, however, that safety planning occurred for all participants across all conditions and therefore should not have disproportionately impacted any single condition.

Last, we would note that although both cancer and suicidality can emerge in a manner beyond the control of the afflicted individual, aspects of suicidality (e.g., planning, rehearsing) involve a level of intentionality that differs from cancer. In this sense, some aspects of the aims of the reporting guidelines cannot be tested in a cancer article. That being said, the goal of the article was not to test whether reading a cancer article inspired cancer-related behaviors, but rather whether reading an article about a topic unrelated to suicide would inspire suicide-related outcomes in an equal or more substantial manner relative to an article regarding suicide that violated reporting guidelines.

## Conclusion

The present study is the first experimental protocol to provide empirical evidence suggesting that exposure to media reports of suicide does not increase risk for future suicide risk and is consistent with qualitative work that contradicts the notion of a copycat effect (Stack, 2003, 2005). This finding has important clinical implications for reducing risk for suicide. Stigma and fear of talking about suicide may be combatted through the promotion of compassionate awareness and treatment availability for individuals endorsing suicidal ideation. It should be noted that we are not proposing that it is impossible for any form of coverage of suicide-relevant content to have iatrogenic effects. Instead, we believe our findings suggest the importance of reconsidering at least certain aspects of the media reporting guidelines (e.g., sensationalistic language, prominent placement of the article, detailed description of a specific death) and highlight the potential benefits (e.g., increased awareness and education, decreased stigmatization, increased knowledge of available resources) of articles that violate those guidelines.

Furthermore, several reporting guidelines (e.g., showing consideration for those bereaved by suicide) were designed to maintain the privacy and decrease the distress of those directly connected to the death rather than counteract copycat effects. We are not proposing that such guidelines be removed simply because they do not appear to increase suicide risk. Ultimately, our findings indicate that honestly and clearly reporting on suicide in an engaging way appears to carry limited iatrogenic risk and may be an important part of population-based suicide prevention efforts.

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