“She was asking for it”: An experimental investigation of mental contamination, perceived responsibility, and workplace harassment

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ABSTRACT

"She was asking for it": An experimental investigation of mental contamination, perceived responsibility and workplace harassment

Sandra Krause

Background and Objectives: Mental contamination (i.e., contamination concerns that arise in the absence of direct contact with a contaminant) is a common symptom in obsessive-compulsive disorder (OCD). Cognitive theories suggest that it results from individuals' misinterpretations of perceived violations. Cognitive theories of OCD also highlight the importance of appraisals of inflated responsibility in the maintenance of other OCD symptoms. However, the role of responsibility in mental contamination has not yet been examined experimentally. The present study examined the role of perceived responsibility on the relationship between workplace sexual harassment imagery and subsequent mental contamination.

Methods: One hundred and forty-nine participants listened to a workplace sexual harassment imagery task, wherein responsibility was manipulated. Participants were randomly assigned to one of three conditions (high responsibility (HR), low responsibility (LR), no responsibility (NR)). Participants completed questionnaires assessing mental contamination and completed a hand washing task.

Results: Those in the NR condition reported significantly lower levels of responsibility than those in the LR or HR conditions. Accordingly, those in the NR condition also reported significantly lower levels of anxiety and dirtiness than in the LR condition. There were no significant differences between the LR and HR condition on variables of interest.

Limitations: The nature of the victim blaming used for the responsibility induction may have elicited compensatory responses from participants.

Conclusions: Findings may highlight the central role of perceptions of violation in the understanding and treatment of mental contamination.

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Introduction

Obsessive-compulsive disorder (OCD) is a mental illness that affects approximately 2% of the population (Ruscio, Stein, Chiu, & Kessler, 2010). Rachman and Hodgson (1980) describe obsessions as "intrusive, repetitive thoughts, images, or impulses that are unacceptable and/or unwanted and give rise to subjective resistance" (p. 10). Compulsions can be either overt or covert repetitive behaviour, often aimed at reducing the distress or discomfort associated with these thoughts (Clark & Purdon, 1993), and/or preventing some dreaded event from occurring. The World Health Organization has listed anxiety disorders (including OCD) as one of the top contributors to non-fatal health loss globally (Murray, Lopez, & World Health Organization, 1996).

Although the nature of OCD symptoms vary, approximately half of individuals with OCD report contamination-related symptomatology (e.g., cleaning, washing; Rachman & Hodgson, 1980). Research has traditionally focused on contact contamination (i.e., concerns about contamination that are triggered by physical contact with a perceived contaminant). More recently, researchers have acknowledged a distinct form of contamination, termed 'mental contamination', that arises in the absence of direct contact with a contaminant (Coughtrey, Shafran, Knibbs, & Rachman, 2012; Rachman, 2004). In mental contamination, the source and site of contamination are diffuse; therefore, people tend to continue feeling dirty even after washing (Rachman, 2004). Approximately 46% of those with OCD report experiencing clinically-significant levels of mental contamination (Coughtrey et al., 2012).

The cognitive theory of mental contamination suggests that such feelings are triggered when an individual negatively misinterprets a perceived violation (Rachman, Coughtrey, Shafran, & Radomsky, 2015). Distinct from contact contamination, the source of violation is a person (Rachman et al., 2015). These feelings can be triggered by thoughts, memories, or images that are perceived as inappropriate or immoral (Elliott & Radomsky, 2009), such as insults and sexual assault (Rachman et al., 2015). When individuals misinterpret these events as cues that others perceive them as worthless, weak and/or insignificant, it undermines self-confidence and results in mental contamination (Rachman et al., 2015).

Unsurprisingly then, researchers have found close associations between mental contamination and post-traumatic stress disorder (PTSD), particularly for those who have

experienced sexual trauma (Badour, Ojserkis, McKay, & Feldner, 2014). For those with PTSD, OCD symptoms of mental contamination and washing behaviour may act as protection against trauma-related thoughts (de Silva & Marks, 1999; Gershuny, Baer, Radomsky, Wilson, & Jenike, 2003). While most closely associated with OCD, mental contamination has also been linked with several transdiagnostic variables relevant to trauma and anxiety disorders more broadly (Coughtrey, Shafran, Bennett, Kothari, & Wade, 2018).

In testing the proposed relation between mental contamination and feelings of violation (Rachman et al., 2015), researchers have successfully provoked feelings of mental contamination and elicited washing behaviour in victims of sexual trauma by having them recall their assault (Fairbrother & Rachman, 2004). However, this effect can also be induced in healthy controls by having them listen to recordings of sexually violating scenarios (e.g., Fairbrother, Newth, & Rachman, 2005; Herba & Rachman, 2007; Rachman, Radomsky, Elliot, & Zysk, 2012; Radomsky & Elliott, 2009), including scenarios where participants imagine themselves as the victim (Elliott & Radomsky, 2009, 2012, 2013; Fairbrother et al., 2005) or perpetrator (Rachman et al., 2012) of a non-consensual kiss (i.e., the "dirty kiss" paradigm).

These studies clarified situational variables that elicit mental contamination, and provided further evidence for the cognitive model of mental contamination (Rachman et al., 2015). That said, less is known about the role of individual differences in people's responses to these situational variables. Using the "dirty kiss" paradigm, Radomsky and Elliott (2009) examined individual differences in the severity of mental contamination and found a link between the degree of reported mental contamination and cognitive factors, including one's perceptions of personal responsibility for the kiss and one's perception of the kiss as a violation (Radomsky & Elliott, 2009). While perceptions of responsibility and personal violation have been linked to mental contamination, they have not been examined experimentally.

Individuals' appraisals of cognitions are integral to the maintenance of OCD (Rachman, 1997, 1998). Specifically, Salkovskis (1985) emphasized the key role of inflated perceptions of responsibility in his cognitive model of OCD. Salkovskis suggested that contamination-related obsessions are rooted more in the perception of responsibility for potential negative consequences of contamination than in the fear of contamination itself (Salkovskis, 1985). Indeed, manipulating individuals' perceived levels of responsibility results in heightened OCD

symptomatology, including checking behaviour (Lopatka & Rachman, 1995) and reassurance seeking (Leonhart & Radomsky, 2019). Although researchers have demonstrated that this belief domain is central to understanding many OCD symptoms, experimental research on the role of responsibility in mental contamination is lacking. Indeed, the only experimental research of this nature focused on the perpetrator effect, and used a limited sample (Kennedy & Simonds, 2017).

The nature of the sexual violation used in the "dirty kiss" studies (e.g., Fairbrother et al., 2005; Herba & Rachman, 2007; Rachman et al., 2012) represents a relatively extreme form of sexual violation. However, unwanted sexual contact is far less common than instances of sexual harassment (International Society for Traumatic Stress Studies Sexual Violence Working Group, 2018). Sexual harassment is defined as, "any deliberate or repeated sexual behavior that is unwelcome to the recipient, as well as other sex-related behaviors that create an environment that is hostile, offensive, or degrading" (International Society for Traumatic Stress Studies Sexual Violence Working Group, 2018), and has been linked with a variety of negative employment and health-related outcomes in victims. Experiencing sexual harassment in the workplace leads to greater financial stress on victims and significantly impedes on victims' career attainment (McLaughlin, Uggen, & Blackstone, 2017). Further, victims of sexual harassment tend to have diminished self-confidence and are at higher risk of self-harm, disordered eating, and substance use (Chiodo, Wolfe, Crooks, Hughes, & Jaffe, 2009; Pryor, 2010). Given these serious and varied physical, psychological, and economic impacts, it is important to understand the relationship between these more common, less extreme forms of sexual violation and mental contamination. Finally, the recordings used in past studies describe a vivid description of a kiss, including an exchange of saliva. Some have argued that the resulting feelings of contamination, then, may be due to contact contamination concerns, rather than purely due to the perceived violation (Millar, Salkovskis, & Brown, 2016). For this reason, it is important to isolate the impact of violation, in the absence of germs, on feelings of contamination.

The proposed study sought to identify whether a manipulation of responsibility plays a causal role in inducing heightened levels of mental contamination after exposure to a sexual harassment imagery task.

Hypotheses

Manipulation Check.

a. Participants in the high responsibility (HR) condition will report higher levels of perceived responsibility for the sexual harassment than those in the low responsibility (LR) condition.
b. Participants in both the HR and LR conditions will report higher levels of perceived responsibility for the sexual harassment than those in the no responsibility (NR) condition.

Hypothesis 1: Time.

There will be a main effect of time, such that across conditions, people will report higher levels of dirtiness, disgust, and anxiety after listening to the recording compared to baseline.

Hypothesis 2: Mental Contamination.

Following the manipulation, individuals in the HR condition will report significantly higher levels of dirtiness, disgust, and anxiety, than those in the LR and NR conditions. Furthermore, following the manipulation, those in the LR condition will report significantly higher levels of dirtiness, disgust, and anxiety than those in the NR condition.

Hypothesis 3: Urge to Wash & Washing.

Following the manipulation, individuals in the HR condition will report significantly greater urges to wash and will wash their hands for significantly longer post-manipulation than those in the LR and NR conditions. Furthermore, following the manipulation, those in the LR condition will report significantly greater urges to wash and will wash their hands for significantly longer than those in the NR condition.

Method

Participants

A sample of 149 female undergraduate students from Concordia University were recruited for the study. Participants received either course credit or an entry ballot into a cash draw as compensation for participation. Eligible participants were women over 18 years old who could communicate fluently in English.

Measures

Manipulation Check. To assess whether the responsibility manipulation was effective, participants rated their responsibility for the boss's behaviour on a Visual Analogue Scale (VAS; ranging from 0-100). Several distractor questions were included to mask this manipulation check, including identifying the victim of the harassment.

Demographics and Baseline Rating Questionnaire (DBRQ). The DBRQ questionnaire included basic demographic information (e.g. age, ethnicity, education level), as well as a Kinsey-type scale question regarding sexual orientation (Kinsey, Pomeroy, & Martin, 1948). Participants also reported their baseline levels of 11 different emotions on a 0 ("Not at all") to 100 ("Completely") VAS (Elliott & Radomsky, 2009). Among these 11 emotions were three variables of interest – anxiety, disgust and dirtiness.

Post-Manipulation Rating Questionnaire (PMRQ). The PMRQ was adapted from the Positive and Negative Affect Scale (Crawford & Henry, 2004). Participants were asked to report the extent to which they were currently experiencing 23 different feelings and emotions (e.g., dirty, disgusted, happy, anxious). Participants reported their answers using a 0 ("Not at all") to 100 ("Completely") VAS.

Obsessive Beliefs Questionnaire (OBQ-44; Obsessive Compulsive Cognitions Working Group, 2005). The OBQ-44 is a 44-item measure of maladaptive thoughts and beliefs common in OCD. Items are rated on a seven-point Likert scale, ranging from 1 ("Disagree very much") to 7 ("Agree very much"). The measure is made up of three subscales: responsibility/threat estimation (RT), perfectionism/certainty (PC), and importance/control over thoughts (ICT). The questionnaire has good-to-excellent internal consistency in non-clinical samples (α = .90 for RT and PC, α = .84 for ICT, and α = .95 for the total scale; Obsessive Compulsive Cognitions Working Group, 2005), and had excellent internal consistency in the current sample (α = .92 for RT, α = .93 for PC, α = .91 for ICT, and α = .96 for the total scale).

Vancouver Obsessional Compulsive Inventory – Mental Contamination Scale (VOCI-MC; Radomsky, Rachman, Shafran, Coughtrey, & Barber, 2014). The VOCI-MC is a 20-item measure of mental contamination. All items are rated on a five-point Likert-type scale, ranging from 0 ("Not at all") to 4 ("Very much"). The VOCI-MC has excellent internal consistency (α =

.93), and good convergent (r = .70 to .74), divergent and discriminant validity (Radomsky et al., 2014). In the current sample, the measure had excellent internal consistency (α = .94).

Vancouver Obsessional Compulsive Inventory (VOCI; Thordarson et al., 2004). The VOCI is a 55-item measure of OCD symptoms divided into six subscales assessing different clusters of symptoms (contamination, checking, obsessions, hoarding, indecisiveness, and just right). Items are rated on a five-point Likert-type scale ranging from 0 ("Not at all") to 4 ("Very much"). The VOCI has excellent internal consistency in both OCD (α = .94), clinical control (α = .98), and student (α = .96) populations, as well as excellent convergent and divergent validity (Radomsky, Gilchrist, & Dussault, 2006; Thordarson et al., 2004). In the current sample, the measure had excellent internal consistency (α = .97).

Depression Anxiety and Stress Scale (DASS; Henry & Crawford, 2005). The DASS is a 42-item measure of symptoms of depression, anxiety, and stress experienced over the past week. Items are rated on a four-point Likert-type scale ranging from 0 ("Did not apply to me at all") to 3 ("Applied to me very much, or most of the time"). The DASS has good internal consistency (α = .91), retest reliability (r = .71 to .81), and discriminant validity (r = -.45 to .40; Coughtrey et al., 2018). In the current sample, the measure had excellent internal consistency (α = .94).

Sexual Harassment Inventory (SHI; Murdoch & McGovern, 1998). The SHI is a 20-item measure of severity and occurrence of sexual harassment. The SHI is made up of three subscales – hostile environment, *quid pro quo*, and criminal sexual misconduct. Each item is rated as either "True" or "False". Total scale and subscale scores are obtained by adding the Severity Weights of all endorsed items. The SHI has shown excellent internal consistency in previous research (α = .92; Murdoch & McGovern, 1998), and good internal consistency in the current sample (α = .82).

Behavioural Measure of Mental Contamination. Participants were left alone in the laboratory kitchen and were asked to wash their hands. They were video recorded during this time. Two coders who were unaware of hypotheses and condition assignment watched participant videos and timed how long each spent washing in seconds. The coders had excellent inter-rater reliability ICC = .94, p < .001.

Procedure

The study was conducted in the Anxiety and Obsessive-Compulsive Disorders Laboratory at Concordia University in Montreal, Quebec. First, participants were asked to provide informed consent. They were told that the study was examining individual differences in people's emotional responses to workplace-related stimuli. They were then asked to complete the DBRQ. Following completion of the DBRQ, they were told that they would be listening to an audio recording of a workplace interaction, and to listen closely to the recording, because afterward they would be quizzed on it. Participants were asked to relax and imagine themselves as vividly as possible as the main character described in the recording.

Participants were randomly assigned to one of three conditions (HR, LR, NR) and listened to the audio recording corresponding to their condition (see Appendix A for scripts). For all conditions, the audio recording described an instance of workplace sexual harassment, followed by disclosure of this harassment to a friend. For the HR and LR conditions, participants were told to imagine themselves as the victim of the sexual harassment. In the HR condition, after disclosing the event to the friend, the friend suggests that the victim's behaviours contributed to the harassment. In contrast, in the LR condition, the friend suggests that the victim did nothing to contribute to the harassment. Finally, those in the NR condition were told to imagine themselves watching a television show wherein a female character is the victim of the sexual harassment.

After listening to the recording, participants completed the manipulation check measure, followed by the PMRQ. The researcher then asked participants to wash their hands in the laboratory kitchen. They were left alone during this and were told to come out when they were finished. Participants then completed the rest of the questionnaire battery (OBQ-44, VOCI-MC, VOCI, DASS, SHI, and a second PMRQ measure; see Appendix B for measures).

Finally, participants were debriefed, informed of the deception involved in the study, and provided with a comprehensive debriefing form. Because participants were not given complete information about the purpose of the study when initially providing consent, they were asked to provide informed consent again after the debriefing. Participants were sent a follow-up email after participation to ask if they had any lingering concerns or discomfort, and were provided with a list of mental health resources.

Results

Data Screening

The data were screened for univariate and multivariate outliers and tested for MANOVA assumptions. There were no univariate outliers that reflected impossible values, so all data were retained for subsequent analyses. To check for multivariate outliers, Mahalanobis distances were calculated for all of the outcome variables of interest, all of which fell within an acceptable range (Kline, 2015). All outcome variables of interest were normally distributed (i.e., kurtosis < |10|, skewness < |3|; Kline, 2015), aside from pre-manipulation disgust ratings (skewness = 4.84, kurtosis = 23.13), and pre-manipulation dirtiness ratings (skewness = 3.80, kurtosis = 14.85). As such, subsequent results should be interpreted with caution. Data from fifteen participants were excluded from subsequent analyses because they incorrectly identified the victim of the harassment during the manipulation check, suggesting they had not carefully listened to the recording. Finally, there were no systematic demographic or baseline differences between conditions, as measured by a series of one-way ANOVAs (see Table 1 for demographic information).

Manipulation Check

A one-way ANOVA was conducted to test the manipulation, examining the effect of condition (HR, LR, NR) on participants' self-reported ratings of perceived responsibility for the harassment (see Figure 1). The effect of condition on perceived responsibility was significant, $F(2, 146) = 7.95$, $p = .001$. Planned contrasts revealed a significant difference in responsibility ratings between those in the NR condition ($M = 3.28$, $SD = 11.03$), and LR condition ($M = 11.92$, $SD = 17.03$), $t(96) = -2.66$, $p = .004$, as well as between those in the NR condition and those in the HR condition ($M = 16.51$, $SD = 20.10$), $t(96) = -3.99$, $p < .001$. There was no significant difference in responsibility ratings between the LR and HR conditions, $t(100) = -1.24$, $p = .22$ (see Figure 1).

Hypothesis 1: Time

A 3 (perceived responsibility: NR, LR, HR) by 2 (time: baseline, post-manipulation) mixed factorial MANOVA was conducted to examine the impact of condition on ratings of mental contamination (i.e., disgust, dirtiness, anxiety) before and after exposure to the recording

(see Table 2). There was a significant main effect of time, $F(3, 144) = 558.43$, $p < .001$, $\eta_p^2 = .92$, on ratings of mental contamination, such that participants reported significantly higher ratings of disgust, dirtiness, and anxiety after listening to the recording than they did at baseline.

Hypothesis 2: Mental Contamination

The 3 (perceived responsibility: NR, LR, HR) by 2 (time: baseline, post-manipulation) MANOVA also revealed a significant main effect of responsibility condition, $F(6, 290) = 2.15$, $p = .05$, $\eta_p^2 = .04$, as well as a significant interaction between condition and time, $F(6, 290) = 2.67$, $p = .02$, $\eta_p^2 = .05$. To test Hypothesis 2, the interaction was followed up with two MANOVAs (baseline and post-manipulation) to examine the impact of condition on ratings of disgust, dirtiness, and anxiety (see Figures 2-4). The baseline MANOVA did not reveal a significant omnibus effect, $F(6, 290) = 1.08$, $p = .31$, $\eta_p^2 = .02$, indicating there was no significant difference between conditions for ratings of disgust, dirtiness, and anxiety before listening to the recording. However, the post-manipulation MANOVA omnibus effect was significant, $F(6, 290) = 3.39$, $p = .03$, $\eta_p^2 = .07$, indicating an effect of condition after listening to the recordings. To examine the nature of this omnibus effect, the MANOVA was followed up with three one-way ANOVAs. There was no significant effect of condition on post-manipulation ratings of disgust, $F(2, 146) = 1.80$, $p = .17$, $\eta_p^2 = .02$. However, there was a trend toward a significant omnibus effect of condition on post-manipulation ratings of dirtiness, $F(2, 146) = 2.35$, $p = .08$, $\eta_p^2 = .03$, and a significant omnibus effect of condition on post-manipulation ratings of anxiety, $F(2, 146) = 8.34$, $p < .001$, $\eta_p^2 = .10$.

Finally, planned contrasts were conducted to test the hypotheses relating to the effect of condition on post-manipulation ratings of disgust (see Figure 2), dirtiness (see Figure 3), and anxiety (see Figure 4). Means and standard deviations by condition are reported in Table 3. Planned contrasts revealed no significant differences between the HR and LR conditions on ratings of disgust, $t(100) = 1.78$, p .09, ratings of anxiety, $t(100) = .05$, $p = .96$, or ratings of dirtiness, $t(100) = 1.20$, $p = .23$. While there were no significant differences between LR and NR on post-manipulation ratings of disgust $t(96) = -1.62$, p =.11, there were significant differences between the LR and NR conditions on ratings of anxiety, $t(96) = -3.62$, $p < .001$, and dirtiness,

$t(96) = -2.01$, $p = .04$, such that those in the NR condition reported feeling significantly less anxious and dirty after listening to the recording than those in the LR condition.

Hypothesis 3: Urge to Wash and Washing

A second MANOVA was conducted to examine the impact of condition on urge to wash and on actual washing time after listening to the recording. The MANOVA did not reveal any significant effect of condition, $F(4, 262) = 1.40$, $p = .24$, $\eta_p^2 = .02$ (see Table 3).

Discussion

This experiment examined the possible causal relationship between individuals' perceptions of responsibility for a sexual violation and subsequent feelings of mental contamination and washing behaviour. It also sought to replicate and extend previous research on mental contamination that utilized the "dirty kiss" paradigm (Elliott & Radomsky, 2009, 2012, 2013; Fairbrother et al., 2005; Herba & Rachman, 2007; Radomsky & Elliott, 2009) using a sexual violation stimulus that was less extreme in nature, and that controlled for the confound of possible contact contamination concerns (i.e., the exchange of saliva). Across all conditions, participants reported higher levels of disgust, dirtiness, and anxiety after listening to the recording than at baseline. As hypothesized, those in the NR condition – who were told to imagine seeing an instance of sexual harassment on a television show – reported feeling less responsible for the incident of harassment than those in either the LR or HR conditions. However, there were no significant differences in ratings of perception of responsibility between the LR and HR conditions – wherein participants were told to imagine being the victim of sexual harassment and were subsequently told that their behaviour either did (HR) or did not (LR) invite the harassment. Accordingly, those in the NR condition reported significantly lower levels of dirtiness and anxiety than those in the LR condition after listening to the recording. However, these differences were not seen between the LR and HR conditions. Finally, there was no relationship between condition and participants' self-reported urges to wash or on the amount of time they spent washing after listening to the recording.

Though conclusions about the impact of responsibility on mental contamination should be tempered given that the manipulation did not work as expected, the main effect of time on ratings of mental contamination demonstrated that a sexual harassment imagery paradigm was sufficient to provoke feelings of mental contamination. Previous mental contamination research has traditionally utilized an imagery task involving a non-consensual kiss. The significant increase in ratings of disgust, dirtiness, and anxiety after listening to the new imagery task demonstrates that less extreme forms of violation can be sufficient to produce feelings of mental contamination. Further, some have suggested that feelings of contamination triggered through the "dirty kiss" paradigm may result from imagining the physical exchange of saliva, rather than as a result of perceived violation or betrayal (Millar et al., 2016). The present study, however, indicated that a sexually and/or morally violating situation was sufficient to provoke feelings of mental contamination in the absence of the confound of contact contamination concerns, reinforcing similar non-experimental findings (Ishikawa, Kobori, & Shimizu, 2015).

Based on cognitive models of OCD, one would expect that as one's perceived responsibility increases, so too would OCD symptomatology (Salkovskis, 1985). Past experimental research has provided support for this (Leonhart & Radomsky, 2019; Lopatka & Rachman, 1995; Shafran, 1997). However, the present study did not find such an increase in symptoms. Instead, while there were significantly lower ratings of responsibility, dirtiness, and anxiety in the NR condition than the LR condition, this same pattern was not consistently seen between the LR and HR conditions or the NR and HR conditions. The main distinction between the recordings in the NR and LR condition was the victim of the harassment (i.e., a character on a television show in the NR condition versus oneself in the LR condition), and not the responsibility induction (i.e., victim blaming was only present in the HR condition). The distinction between the harassment happening to oneself versus a character on a television show not only manipulates one's perception of responsibility for the harassment, but also one's level of perceived violation for the harassment. In other words, while all participants listened to a recording that was violating, it was only personally violating for those in the LR and HR conditions. As such, this could suggest that in mental contamination – unlike other OCD symptoms – one's level of perceived violation may play a greater role than one's level of perceived responsibility. Though this same pattern did not hold for ratings of disgust, this may

have either been due to a ceiling effect, as all participants across conditions provided high disgust ratings on the PMRQ, or an issue with the effectiveness of the manipulation in the HR condition.

These findings align with theoretical models and empirical research highlighting the central role of perceptions of violation in the onset and maintenance of mental contamination (Ishikawa et al., 2015; Rachman, 2004; Rachman et al., 2015; Radomsky & Elliott, 2009). However, they differ from results reported by Kennedy and Simonds (2017), wherein manipulations of perceptions of responsibility significantly moderated the relationship between exposure to sexually violating stimuli and subsequent feelings of mental contamination. One possible explanation for this disparity may be the difference in the mental contamination-inducing stimuli. Unlike the present study, Kennedy and Simonds manipulated responsibility in a recording where participants imagined themselves as the *perpetrator*, rather than the victim, of a non-consensual kiss, either choosing to do so out of their own volition (high responsibility) or as a result of social pressure (low responsibility). In addition to perceived responsibility for the violation, this manipulation may have provoked other OCD-relevant beliefs, such as feared self-perceptions (e.g., being "mad, bad, or dangerous"; Rachman, 1997, 1998). Due to the social progress that has been made in recent years around the unacceptability of victim blaming, particularly amongst university students, imagined sexual victimization in the present study may not have effectively activated perceptions of responsibility and other OCD-relevant beliefs to the same extent.

In the wake of recent social movements, such as #MeToo, individuals may have been unlikely to endorse or internalize high levels of perceived responsibility for any instance of sexual violation, regardless of the nature of the events in question. The insinuation of responsibility in the HR condition may have actually elicited a backlash in responding on outcome variables, as the credibility of the manipulation may have been compromised. Further, all Concordia University students had to complete a mandatory sexual violence training program immediately prior to the start of data collection for the present study. Therefore, students may have been further primed to reject the notion of placing responsibility on a victim of sexual violence. According to self-verification theory (Swann & Read, 1981), feedback that contrasts with an individuals' self-views and values will trigger compensatory efforts to demonstrate and

reaffirm these qualities. Therefore, providing those in the HR condition with explicit feedback in the form of victim blaming may have triggered compensatory behaviour and responding. In other words, rather than internalizing this blame, participants may have, instead, rejected the notion of responsibility altogether, therefore explaining the absence of effects on ratings of dirtiness and disgust between the NR and HR conditions. Though unintended, greater levels of ambiguity with regard to responsibility in the LR condition may have more closely mirrored the nature of OCD symptomatology (e.g., "I *could* be responsible"; Coughtrey et al., 2018; Ferrier & Brewin, 2005). Consequently, this ambiguity may have, paradoxically, resulted in more distressing perceptions of one's possible responsibility, leading to higher levels of mental contamination.

Finally, the null findings with regard to the impact of condition on urge to wash and washing behaviour are discrepant with past studies that have found provocations like the "dirty kiss" paradigm to significantly increase urges to engage in, and actual engagement in various washing behaviours (Coughtrey et al., 2012; Elliott & Radomsky, 2012, 2013; Zhong & Liljenquist, 2006). This may be due to a possible floor effect with regard to the intensity of the provocation in the current study. The present study employed a less extreme sexual violation provocation than past research, which may not have been sufficient to elicit the washing behaviour seen in past studies.

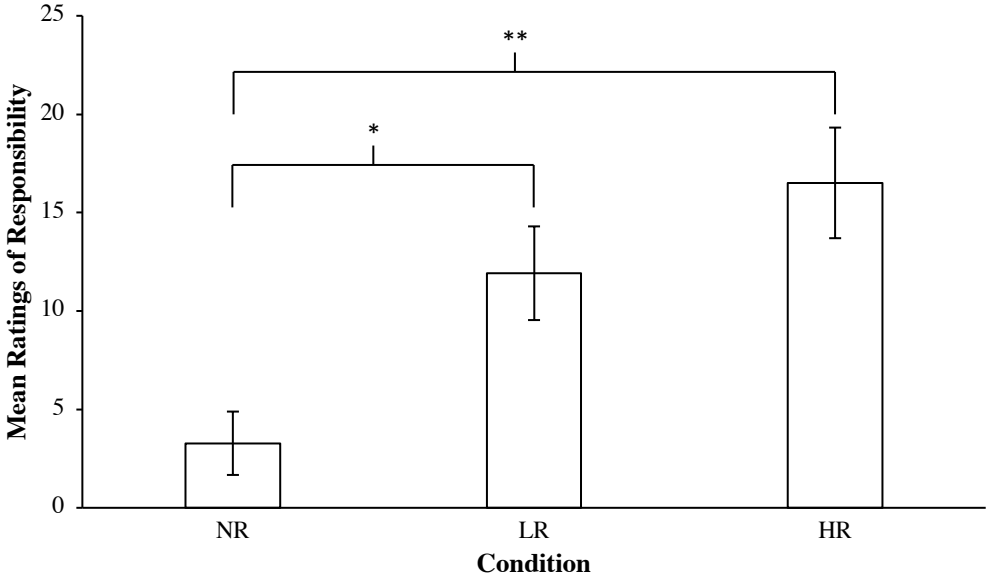
Despite some methodological limitations, this study attempted to examine a possible moderator of mental contamination using a novel mental contamination induction task. Though the manipulation did not effectively differentiate between the LR and HR conditions, future research could address this limitation in several ways. The demographic makeup of the present sample was skewed, in that participants were undergraduate students living in a large urban centre, all of whom had recently taken part in a sexual violence training program. Replicating this study in different populations where issues of victim blaming are less immediately salient (e.g., older adults, individuals in rural communities), would provide interesting insights. Further, future studies should attempt to manipulate perceptions of responsibility in a less explicit and more ecologically valid manner to increase credibility and avoid triggering compensatory responding from participants. Additionally, an experimental design wherein perceptions of violation and responsibility could be manipulated independently of one another would allow an estimation of the relative contributions of each of these independent cognitive domains. Finally,

the current study used a sample of non-clinical analogue participants. While such samples have been shown to be effective for studying OCD symptomatology (Abramowitz et al., 2014; De Putter, Van Yper, & Koster, 2017; Gagné, Kelly-Turner, & Radomsky, 2018), future research should replicate this study in clinical populations.

Cognitive models of OCD and mental contamination highlight the importance of appraisals and beliefs in the onset and maintenance of the disorder (Rachman, 1997, 1998, 2004; Rachman et al., 2015; Salkovskis, 1985). Though the present study failed to demonstrate the decisive relevance of perceptions of responsibility in mental contamination, it may still have implications for treatment as it provides insights into the factors that may contribute to and exacerbate symptoms of mental contamination in individuals with OCD, PTSD, and/or victims of sexual trauma. Understanding that mental contamination can be induced through a sexual harassment imagery task underscores the importance of taking all forms of sexual violation seriously. As clinicians, it is critical to assess for histories of and/or obsessions about even relatively "minor" sexual traumas or violations, as the present findings suggest that these, too, can have an impact on symptomatology. Further, the findings from the present study reinforce the key role of perceptions of violation in symptoms of mental contamination. In other words, the closer one personally feels to the violation, the greater negative symptomatology (i.e., anxiety and dirtiness) they seem to experience. This provides further support for directly targeting such perceptions in therapy through strategies like psychoeducation and behavioural experiments.

Figure 1

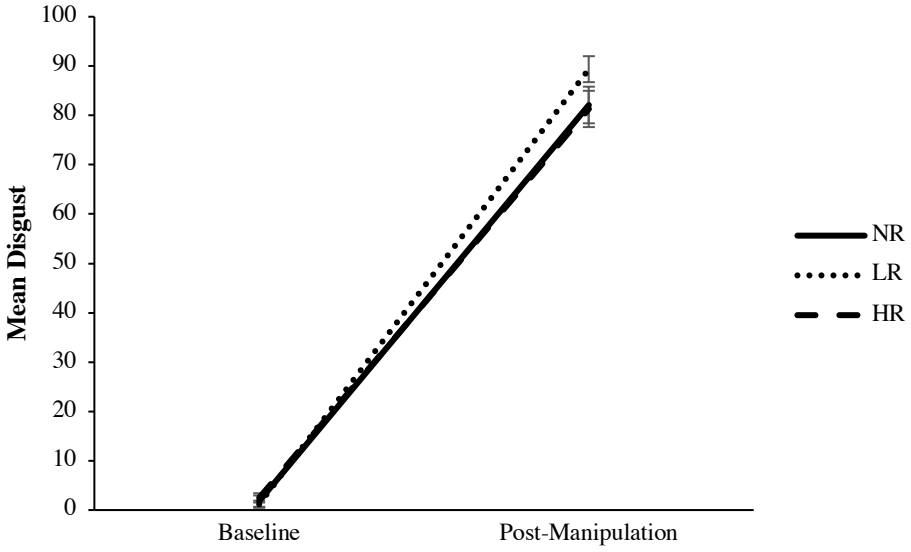
Average Manipulation Check Ratings of Perceived Responsibility



Note. NR = No Responsibility, LR = Low Responsibility, HR = High Responsibility, * = $p < .05$, ,** = $p < .001$

Figure 2

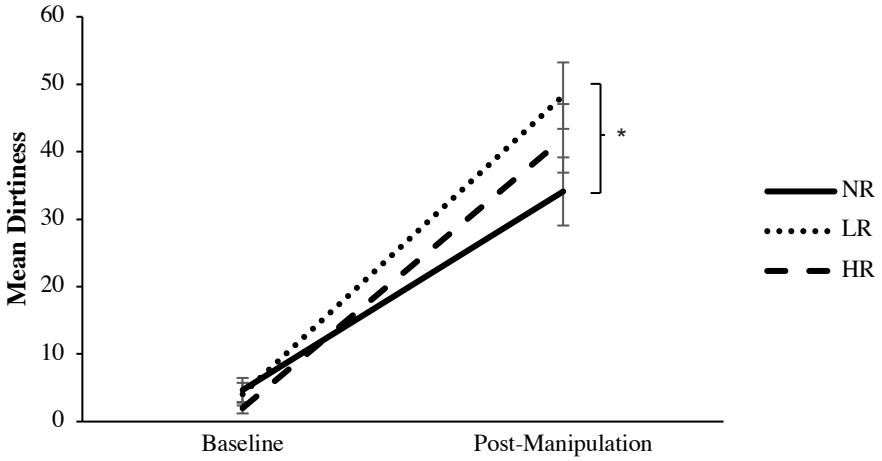
Average Disgust Ratings Before and After Manipulation



Note. NR = No Responsibility, LR = Low Responsibility, HR = High Responsibility, * = $p < .05$, ,** = $p < .001$

Figure 3

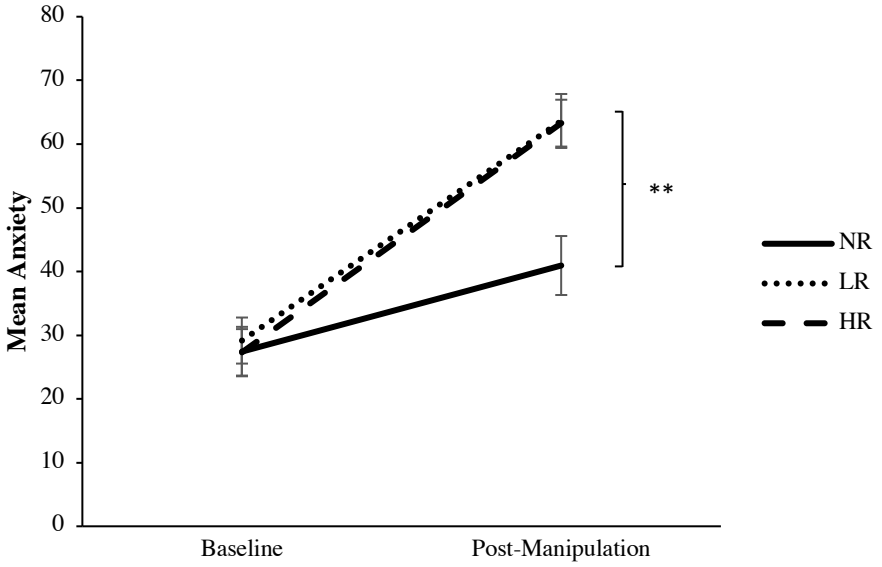
Average Dirtiness Ratings Before and After Manipulation



Note. There was a significant difference between the NR and LR conditions, but not between the NR and HR condition, or the HR and LR condition. NR = No Responsibility, LR = Low Responsibility, HR = High Responsibility, * = $p < .05$, ,** = $p < .001$

Figure 4

Average Anxiety Ratings Before and After Manipulation



Note. NR = No Responsibility, LR = Low Responsibility, HR = High Responsibility, * = $p < .05$, ,** = $p < .001$

Table 1

Demographics and Descriptive Statistics for Self-Report Measures (*N* = 149)

Sample demographics		Self-report measures *M* (*SD*)	
Age	22.86 (4.90)	OBQ-44	138.99 (45.99)
Sexual Orientation (Kinsey Scale)	1.88 (1.29)	VOCI-MCS	37.06 (13.67)
Primary Language	English 69.1% (*N* = 103)	VOCI	95.85 (34.51)
	French 17.4% (*N* = 26)	DASS	36.11 (11.80)
	Other 13.4% (*N* = 20)	SHI	3.82 (4.65)
Marital Status	Married/Common Law 8.7% (*N* = 13)		
	Non-Married Relationship 43.62% (*N* = 65)		
	Single 46.7% (*N* = 70)		
	Widowed .01% (*N* = 1)		
Ethnicity	Caucasian 59.1% (*N* = 88)		
	South Asian 7.4% (*N* = 11)		
	East Asian 5.4% (*N* = 8)		
	Black 2.0% (*N* = 3)		
	Other 26.2% (*N* = 39)		

Note. OBQ-44 = Obsessive Beliefs Questionnaire – 44 Item Version. VOCI-MC = Vancouver Obsessional Compulsive Inventory – Mental Contamination Scale, VOCI = Vancouver Obsessional Compulsive Inventory, DASS = Depression Anxiety and Stress Scale, DSFI-SAS = Derogatis Sexual Functioning Inventory – Sexual Attitudes Scale, SHI = Sexual Harassment Inventory.

Table 2

Descriptive Statistics for Ratings of Disgust, Dirtiness, and Anxiety Pre- and Post-Manipulation (N = 149)

	Baseline *M(SD)*	Post-Manipulation *M(SD)*
Disgust	1.82 (6.631)	84.32 (23.822)
Dirtiness	3.55 (10.37)	41.66 (35.63)
Anxiety	27.35 (26.01)	56.36 (32.80)

Note. All ratings were reported using Subjective Units of Distress, ranging from 0-100,

Table 3

Post-Manipulation Descriptive Statistics for Outcome Variables by Condition (N = 149)

	No Responsibility *M(SD)*	Low Responsibility *M(SD)*	High Responsibility *M(SD)*
Disgust	82.11 (25.46)	89.37 (18.80)	81.31 (26.26)
Dirtiness	34.11 (34.64)	48.31 (35.17)	41.98 (36.31)
Anxiety	40.94 (31.74)	63.63 (30.26)	63.29 (31.86)
Urge to Wash	22.35 (25.85)	30.06 (31.07)	22.29 (26.37)
Time Spent Washing (sec.)	18.30 (7.36)	19.66 (9.86)	16.41 (8.39)

Note. Ratings of Disgust, Dirtiness, Anxiety, and Urge to Wash were reported using Subjective Units of Distress, ranging from 0-100, Time Spent Washing was measured in seconds.

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Appendix A

Recording Scripts

Script for High & Low Responsibility Conditions

Script for No Responsibility Condition

High and Low Responsibility Conditions Script

You are an employee at a relatively small company where you have worked for a couple years now. Your boss is significantly older than you and is married with children.

One evening he texts you to ask you a question about a complicated project that you are involved in at work. You respond to his question and he asks if you would be available to discuss the matter with him further over dinner the following day. You agree to meet with him to further explain the project. The plans for the dinner meeting are finalized. After this, the conversation shifts, and you ask him about his plans for the upcoming weekend. He tells you about his plans and you tell him about yours. The conversation is pleasant, but you view him in a purely professional manner. You are not attracted to him at all.

The following day, you attend a meeting with a group of colleagues. You sit at the back of the room next to a close and trusted work friend.

The meeting concludes and people begin filtering out of the meeting space. You and your friend are at the back of the group of people. You see that your boss is waiting by the exit. As you pass by him, you feel his hand slowly slide down your back, then caress and squeeze your bottom. He then leans in close to you and whispers in your ear, "All I could think about during that meeting was the thought of what I'm going to do to you after dinner". You can feel the warmth of his breath on your neck as the words come out. You do not respond and continue to pass by him and exit the room. As you look back, you see him staring at your bottom and licking his lips.

You immediately find your friend, Lisa, and explain to her what happened. She responds:

High Responsibility Condition: "You should have seen that coming. You've been leading him on with all your texting. It's your fault he got the wrong idea and acted the way he did.

Low Responsibility Condition: "There is no way you could have expected this. Nothing you did should have given him the impression he could have acted that way. This was not your fault – you did nothing wrong.

No Responsibility Condition Script

You are at your house and sit down on your couch to watch some TV. You are flipping through the channels to try to find something that you like. A show that is playing on one of the channels catches your eye, so you stop to watch it. After watching for a minute, you understand that this is a show about a woman named Sharon.

Sharon is an employee at a relatively small company where she has worked for a couple of years now. Her boss is significantly older than her and is married with children.

You see that in this episode, Sharon's boss texts her to ask her a question about a complicated project that she was involved in at work one evening. She responds to his questions and he asks her if she would be available to discuss the matter with him further over dinner the following day. She agrees to meet with him to further explain the project. The plans for the dinner meeting are finalized. After this, the conversation shifts, and Sharon asks him about his plans for the upcoming weekend. He tells her about his plans and Sharon tells him about hers. The conversation was pleasant, but you can tell that Sharon views him in a purely professional manner. She does not appear to you to be attracted to him at all.

The following day in the episode, Sharon attends a meeting with a group of colleagues. She sits at the back of the room.

The meeting concludes and people begin filtering out of the meeting space. Sharon is at the back of the group of people making their way out. You see that she notices her boss is waiting by the exit.

As Sharon passes by him, he slides his hand slowly down her back, then caresses and squeezes her bottom. He then leans in close to her and whispers in her ear:
"All I could focus on during that meeting was the thought of what I'm going to do to you after dinner"

You can see that Sharon is able to feel the warmth of his breath on her neck as the words come out. She does not respond and continues to pass by him and exit the room. As she looks back, you see a camera shot of her boss staring at her bottom and licking his lips.

Sharon finds one of her friends and tells them what happens. Her friend responds: "There is no way you could have expected this. Nothing you did should have given him the idea that he could act in that way. This was not your fault – you did nothing wrong."

Appendix B

Questionnaires

Demographics and Baseline Rating Questionnaire (DBRQ)

Manipulation Check

Post-Manipulation Rating Questionnaire (PMRQ)

Vancouver Obsessional Compulsive Inventory – Mental Contamination Scale (VOCI-MC)

Obsessive Beliefs Questionnaire – 44 (OBQ-44)

Vancouver Obsessional Compulsive Inventory (VOCI)

Depression Anxiety and Stress Scale (DASS)

Sexual Harassment Inventory (SHI)

DBRQ

Please provide the following information about yourself in the space provided

Age _____

Gender _____

What is your highest level of education completed?

a. High School Diploma (secondary school)
b. Diploma of College Studies (CEGEP)
c. First-year undergraduate student
d. Second-year undergraduate student
e. Third-year undergraduate student
f. Fourth-year undergraduate student
g. Bachelor's degree
h. Master's degree
i. Doctorate (e.g., PhD, MD, PharmD, etc.)
j. Post-doctorate

Languages spoken at home _____

Years speaking English _____

Ethnicity _____

Are you currently working? (You can circle more than one option)

a. Full-time
b. Part-time
c. Unemployed
d. Student
e. Home maker
f. Other

What is your current occupation? _____

Are you currently involved in a romantic relationship? Yes No

If yes, how long have you been involved in this relationship? _____

Sexual orientation:

Exclusively heterosexual			Equally hetero- and homosexual			Exclusively homosexual
0	1	2	3	4	5	6

Please report your current levels of the following feelings:
0 – Not at all 100 – Completely

Happy	_____	Disgusted	_____
Surprised	_____	Angry	_____
Anxious	_____	Excited	_____
Sad	_____	Scared	_____
Dirty	_____	Active	_____

Manipulation Check

1. **The victim of the sexual harassment was:**
    a. You
    b. Sharon
    c. Your close friend
    d. A family member

2. **The scenario took place at:**
    a. An amusement park
    b. An office
    c. A school
    d. Someone's home

3. **How responsible do you feel for the bosses behaviour? (0 – Not at all responsible, 100 – Completely responsible)**

    _____

4. **The man in the scenario was the victim's:**
    a. Boss
    b. Friend
    c. Father
    d. Teacher

PMRQ

This scale consists of a number of words that describe different feelings and emotions. Read each item and mark the appropriate answer in the space next to that word. Indicate to what extent you are currently experiencing the following emotions about the recording you just listened to.

Use the following scale to record your answers.

0 – I do not feel this at all 100 – I feel this completely

1.	interested	_____	13.	irritable	_____
2.	distressed	_____	14.	alert	_____
3.	excited	_____	15.	ashamed	_____
4.	upset	_____	16.	inspired	_____
5.	strong	_____	17.	nervous	_____
6.	guilty	_____	18.	determined	_____
7.	scared	_____	19.	attentive	_____
8.	dirty	_____	20.	anxious	_____
9.	hostile	_____	21.	jittery	_____
10.	enthusiastic	_____	22.	active	_____
11.	proud	_____	23.	afraid	_____
12.	disgusted	_____			

VOCI - MC Scale

Please rate the extent to which you agree with the following statements?	**Not at all**	**A little**	**Some**	**Much**	**Very much**
1. Often I look clean but feel dirty.	0	1	2	3	4
2. Having an unpleasant image or memory can make me feel dirty inside.	0	1	2	3	4
3. Often I cannot get clean no matter how thoroughly I wash myself.	0	1	2	3	4
4. If someone says something nasty to me it can make me feel dirty.	0	1	2	3	4
5. Certain people make me feel dirty or contaminated even without any direct contact.	0	1	2	3	4
6. I often feel dirty under my skin.	0	1	2	3	4
7. Some people look clean, but feel dirty.	0	1	2	3	4
8. I often feel dirty or contaminated even though I haven't touched anything dirty.	0	1	2	3	4
9. Often when I feel dirty or contaminated, I also feel guilty or ashamed.	0	1	2	3	4
10. I often experience unwanted and upsetting thoughts about dirtiness.	0	1	2	3	4
11. Some objects look clean, but feel dirty.	0	1	2	3	4
12. I often feel dirty or contaminated without knowing why.	0	1	2	3	4
13. Often when I feel dirty or contaminated, I also feel angry.	0	1	2	3	4
14. Unwanted and repugnant thoughts often make me feel contaminated or dirty.	0	1	2	3	4
15. Standing close to certain people makes me feel dirty and/or contaminated.	0	1	2	3	4
16. I often feel dirty inside my body.	0	1	2	3	4
17. If I experience certain unwanted repugnant thoughts, I need to wash myself.	0	1	2	3	4
18. Certain people or places that make me feel dirty or contaminated leave everyone else completely unaffected.	0	1	2	3	4
19. The possibility that my head will be filled with worries about contamination makes me very anxious.	0	1	2	3	4
20. I often feel the need to cleanse my mind.	0	1	2	3	4

OBQ-44

This inventory lists different attitudes or beliefs that people sometimes hold. Read each statement carefully and decide how much you agree or disagree with it.

For each of the statements, choose the number matching the answer that *best describes how you think.* Because people are different, there are no right or wrong answers.

To decide whether a given statement is typical of your way of looking at things, simply keep in mind what you are like *most of the time.*

Use the following scale:

Disagree very much	Disagree moderately	Disagree a little	Neither agree nor disagree	Agree a little	Agree moderately	Agree very much
1	2	3	4	5	6	7

1. I often think things around me are unsafe.

2. If I'm not absolutely sure of something, I'm bound to make a mistake.

3. Things should be perfect according to my own standards.

4. In order to be a worthwhile person, I must be perfect at everything I do.

5. When I see any opportunity to do so, I must act to prevent bad things from happening.

6. Even if harm is very unlikely, I should try to prevent it at any cost.

7. For me, having bad urges is as bad as actually carrying them out.

8. If I don't act when I foresee danger, then I am to blame for any consequences.

9. If I cannot do something perfectly, I should not do it at all.

10. I must work to my full potential at all times.

11. It is essential for me to consider all possible outcomes of a situation.

12. Even minor mistakes mean a job is not complete.

13. If I have aggressive thoughts or impulses about my loved ones, this means I may secretly want to hurt them.

14. I must be certain of my decisions.

15. In all kinds of daily situations, failing to prevent harm is just as bad as deliberately causing harm.

16. Avoiding serious problems (for example, illness or accidents) requires constant effort on my part.

17. For me, not preventing harm is as bad as causing harm.

18. I should be upset if I make a mistake.

19. I should make sure others are protected from any negative consequences of my decisions or actions.

20. For me, things are not right if they are not perfect.

21. Having nasty thoughts means I am a terrible person.

22. If I do not take extra precautions, I am more likely than others to have or cause a serious disaster.

23. In order to feel safe, I have to be as prepared as possible for anything that could go wrong.

24. I should not have bizarre or disgusting thoughts.

25. For me, making a mistake is as bad as failing completely.

26. It is essential for everything to be clear cut, even in minor matters.

27. Having a blasphemous thought is as sinful as committing a sacrilegious act.

28. I should be able to rid my mind of unwanted thought

29. I am more likely than other people to accidentally cause harm to myself or to others.

30. Having bad thoughts means I am weird or abnormal.

31. I must be the best at things that are important to me.

32. Having an unwanted sexual thought or image means I really want to do it.

33. If my actions could have even a small effect on a potential misfortune, I am responsible for the outcome.

34. Even when I am careful, I often think that bad things will happen.

35. Having intrusive thoughts means I'm out of control.

36. Harmful events will happen unless I am very careful.

37. I must keep working at something until it's done exactly right.

38. Having violent thoughts means I will lose control and become violent.

39. To me, failing to prevent a disaster is as bad as causing it.

40. If I don’t do a job perfectly, people won’t respect me.

41. Even ordinary experiences in my life are full of risk.

42. Having a bad thought is morally no different than doing a bad deed.

43. No matter what I do, it won’t be good enough.

44. If I don't control my thoughts, I'll be punished.

VOCI

Please rate each statement by putting a circle around the number that best describes how much the statement is true of you. Please answer every item, without spending too much time on any particular item.

How much is each of the following statements true of you?		**Not at all**	**A little**	**Some**	**Much**	**Very Much**
1.	I feel compelled to check letters over and over before mailing them.	0	1	2	3	4
2.	I am often upset by my unwanted thoughts of using a sharp weapon.	0	1	2	3	4
3.	I feel very dirty after touching money.	0	1	2	3	4
4.	I find it very difficult to make even trivial decisions.	0	1	2	3	4
5.	I feel compelled to be absolutely perfect.	0	1	2	3	4
6.	I repeatedly experience the same unwanted thought or image about an accident.	0	1	2	3	4
7.	I repeatedly check and recheck things like taps and switches after turning them off.	0	1	2	3	4
8.	I use an excessive amount of disinfectants to keep my home or myself safe from germs.	0	1	2	3	4
9.	I often feel compelled to memorize trivial things (e.g., licence plate numbers, instructions on labels).	0	1	2	3	4
10.	I have trouble carrying out normal household activities because my home is so cluttered with things I have collected.	0	1	2	3	4
11.	After I have decided something, I usually worry about my decision for a long time.	0	1	2	3	4
12.	I find that almost every day I am upset by unpleasant thoughts that come into my mind against my will.	0	1	2	3	4
13.	I spend far too much time washing my hands.	0	1	2	3	4
14.	I often have trouble getting things done because I try to do everything exactly right.	0	1	2	3	4
15.	Touching the bottom of my shoes makes me very anxious.	0	1	2	3	4
16.	I am often upset by my unwanted thoughts or images of sexual acts.	0	1	2	3	4
17.	I become very anxious when I have to make even a minor decision.	0	1	2	3	4

18. I feel compelled to follow a very strict routine when doing ordinary things.	0	1	2	3	4
19. I feel upset if my furniture or other possessions are not always in exactly the same position.	0	1	2	3	4
20. I repeatedly check that my doors or windows are locked, even though I try to resist the urge to do so.	0	1	2	3	4
21. I find it very difficult to touch garbage or garbage bins.	0	1	2	3	4
22. I become very tense or upset when I think about throwing anything away.	0	1	2	3	4
23. I am excessively concerned about germs and disease.	0	1	2	3	4
24. I am often very late because I can't get through ordinary tasks on time.	0	1	2	3	4
25. I avoid using public telephones because of possible contamination.	0	1	2	3	4
26. I am embarrassed to invite people to my home because it is full of piles of worthless things I have saved.	0	1	2	3	4
27. I repeatedly experience the same upsetting thought or image about death.	0	1	2	3	4
28. I am often upset by unwanted thoughts or images of blurting out obscenities or insults in public.	0	1	2	3	4
29. I worry far too much that I might upset other people.	0	1	2	3	4
30. I am often frightened by unwanted urges to drive or run into oncoming traffic.	0	1	2	3	4
31. I almost always count when doing a routine task.	0	1	2	3	4
32. I feel very contaminated if I touch an animal.	0	1	2	3	4
33. One of my major problems is repeated checking.	0	1	2	3	4
34. I often experience upsetting and unwanted thoughts about losing control.	0	1	2	3	4
35. I find it almost impossible to decide what to keep and what to throw away.	0	1	2	3	4
36. I am strongly compelled to count things.	0	1	2	3	4
37. I repeatedly check that my stove is turned off, even though I resist the urge to do so.	0	1	2	3	4

38. I get very upset if I can't complete my bedtime routine in exactly the same way every night.	0	1	2	3	4
39. I am very afraid of having even slight contact with bodily secretions (blood, urine, sweat, etc.).	0	1	2	3	4
40. I am often very upset by my unwanted impulses to harm other people.	0	1	2	3	4
41. I spend a lot of time every day checking things over and over again.	0	1	2	3	4
42. I have great trouble throwing anything away because I am very afraid of being wasteful.	0	1	2	3	4
43. I frequently have to check things like switches, faucets, appliances and doors several times.	0	1	2	3	4
44. One of my major problems is that I am excessively concerned about cleanliness.	0	1	2	3	4
45. I feel compelled to keep far too many things like old magazines, newspapers, and receipts because I am afraid I might need them in the future.	0	1	2	3	4
46. I repeatedly experience upsetting and unacceptable thoughts of a religious nature.	0	1	2	3	4
47. I tend to get behind in my work because I repeat the same thing over and over again.	0	1	2	3	4
48. I try to put off making decisions because I'm so afraid of making a mistake.	0	1	2	3	4
49. I often experience upsetting and unwanted thoughts about illness.	0	1	2	3	4
50. I am afraid to use even well-kept public toilets because I am so concerned about germs.	0	1	2	3	4
51. Although I try to resist, I feel compelled to collect a large quantity of things I never actually use.	0	1	2	3	4
52. I repeatedly experience upsetting and unwanted immoral thoughts.	0	1	2	3	4
53. One of my major problems is that I pay far too much attention to detail.	0	1	2	3	4
54. I am often upset by unwanted urges to harm myself.	0	1	2	3	4
55. I spend far too long getting ready to leave home each day because I have to do everything exactly right.	0	1	2	3	4

DASS – 21

Please read each statement and circle a number 0, 1, 2 or 3 which indicates how much the statement applied to you *over the past week.* There are no right or wrong answers. Do not spend too much time on any statement.

The rating scale is as follows:

0 Did not apply to me at all
1 Applied to me to some degree, or some of the time
2 Applied to me to a considerable degree, or a good part of time
3 Applied to me very much, or most of the time

1	I found it hard to wind down	0	1	2	3
2	I was aware of dryness of my mouth	0	1	2	3
3	I couldn't seem to experience any positive feeling at all	0	1	2	3
4	I experienced breathing difficulty (eg, excessively rapid breathing, breathlessness in the absence of physical exertion)	0	1	2	3
5	I found it difficult to work up the initiative to do things	0	1	2	3
6	I tended to over-react to situations	0	1	2	3
7	I experienced trembling (eg, in the hands)	0	1	2	3
8	I felt that I was using a lot of nervous energy	0	1	2	3
9	I was worried about situations in which I might panic and make a fool of myself	0	1	2	3
10	I felt that I had nothing to look forward to	0	1	2	3
11	I found myself getting agitated	0	1	2	3
12	I found it difficult to relax	0	1	2	3
13	I felt down-hearted and blue	0	1	2	3
14	I was intolerant of anything that kept me from getting on with what I was doing	0	1	2	3

15	I felt I was close to panic	0	1	2	3
16	I was unable to become enthusiastic about anything	0	1	2	3
17	I felt I wasn't worth much as a person	0	1	2	3
18	I felt that I was rather touchy	0	1	2	3
19	I was aware of the action of my heart in the absence of physical exertion (eg, sense of heart rate increase, heart missing a beat)	0	1	2	3
20	I felt scared without any good reason	0	1	2	3
21	I felt that life was meaningless	0	1	2	3

SHI

Please indicate whether the following statements are true or false for you:

1. People with whom I worked made sexual jokes that made me feel uncomfortable.
T F

2. I was touched by a coworker or supervisor in ways that made me feel uncomfortable.
T F

3. A coworker frequently asked me out for dates, even though I had asked him/her to stop.
T F

4. A supervisor or superior officer asked me out for dates, even though I had asked him/her to stop.
T F

5. A supervisor or superior officer threatened to block my promotion unless I agreed to have sex with him/her.
T F

6. A supervisor or superior officer threatened to block a favorable transfer unless I agreed to have sex with him/her.
T F

7. Coworkers made sexual comments about my body.
T F

8. My supervisor or superior officer made sexual comments about my body.
T F

9. My coworkers or superior officer exposed themselves to me in a sexual way.
T F

10. I was offered favorable assignments in exchange for sex with my supervisor or commanding officer.
T F

11. I was offered promotions in exchange for having sex with my supervisor or commanding officer.
T F

12. A coworker or coworkers attempted to have sex with me without my consent.
T F

13. My coworkers made demeaning comments to me because I am a woman/man.
T F

14. I was given the most unpleasant, difficult assignments because I was a woman/man.
T F

15. The people I worked with put up posters of women/men in provocative poses.
T F

16. My supervisor or superior officer attempted to have sex with me without my consent.
T F

17. Some of the people I worked with leered at me in a sexual way.
T F

18. Some of the people I worked with made catcalls or sexual remarks when I walked by.
T F

19. I was forced by a coworker or supervisor to have sex without my consent.
T F

20. Were you ever prevented from getting a promotion, favorable assignment, or transfer because you refused to have sex with someone?
T F