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Review

Abnormal and normal mental contamination

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ABSTRACT

Mental contamination is defined and the main features of the phenomenon are set out. In addition to the familiar form of abnormal mental contamination, as evident in psychological disorders, notably Obsessive-compulsive Disorder, the phenomenon of non-clinical mental contamination is common. The clinical form is distressing, uncontrollable, constant and dysfunctional. The normal phenomenon can be disturbing but it is usually dormant, evoked intermittently, transient, tolerable, manageable, not dysfunctional and psychologically fascinating. The cognitive theory of mental contamination encompasses the causes of mental contamination, its persistence, and individual vulnerability. The field would benefit greatly from additional work, such as that reported elsewhere in this Special Issue, to incorporate the unusual manifestations of visual contamination, morphing and self-contamination, and to account for the experience of mental contamination in nonclinical and other clinical manifestations.

1. Contact and mental contamination

There is converging evidence that the phenomenon of mental contamination is common and not confined to obsessive-compulsive disorder (OCD). Most of our considerable knowledge about mental contamination is drawn from the study and treatment of this disorder, but the understandable focus on OCD clouded the recognition of mental contamination as a distinctive psychological phenomenon. Interestingly, mental contamination was mentioned as early as 1980 (Rachman & Hodgson) but the phenomenon was not followed up until it was encountered in recent studies of the treatment of contact contamination. Contact contamination is caused by physical contact with dirty, disgusting, dangerous, diseased items or objects. It is unpleasant and generates strong urges to clean away the residue and/or source of the contaminating substance. Contact contamination is a common phenomenon (Rachman & Hodgson, 1980; Rachman, 2004) and in most instances people remove the residue and its traces easily and safely. In extreme cases however, the affected person is distressed and struggles to overcome the intense feelings of dirtiness/disgust. In attempting to deal with the contaminant, the person typically engages in repetitive compulsive cleaning and unadaptive avoidance. Compulsive cleaning arising from distressing feelings of contamination is one of the two most common symptoms of OCD. The other common symptom is compulsive checking.

In instances of contact contamination the site of the dirtiness is localized and accessible. In mental contamination however, the feelings of pollution are diffuse – an internal dirtiness without a circumscribed site of contamination. As the site of the contamination is not easily accessible, the compulsive washing usually focuses on the hands (a well-practised habit). For sufferers of mental contamination, this compulsive cleaning is misdirected and rarely successful.

The feelings of mental contamination can be evoked by memories, images, thoughts, impulses, and hence the affected person is vulnerable to recurrences of the feelings of contamination in many seemingly neutral circumstances, and without touching any discernibly contaminated item or object. It can emerge even while sitting alone at home. It is distressing, recognisably irrational and baffling. The main features of mental contamination include:

- Feelings of internal dirtiness/pollution.
- Feelings of dread, discomfort, shame and guilt that arise without physical contact with a contaminant.
- Primary source of the contamination is a person not a substance.
- Caused by misinterpretations of the significance of a perceived violation.
- Usually has a moral element.
- The violator becomes a contaminant and is strictly avoided; often the affected person cannot or will not say the violator's name.
- The site of contamination is not accessible.
- Compulsive washing/cleaning.
- Feelings of contamination can be generated internally by intrusive disturbing thoughts, memories, images and impulses.

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- Recognisably irrational.
- Abnormal mental contamination is constant but normal mental contamination is dormant and evoked intermittently.

2. Normal and abnormal contamination

There are two forms of contact contamination[1] - normal commonplace feelings of manageable contamination, and a pathological form. There are also two forms of mental contamination – pathological and normal commonplace mental contamination. The pathological form is distressing, causes significant interference in daily living, and is commonly associated with a clinical diagnosis; it is proposed to be caused by serious misinterpretations of perceived psychological and/or physical violation, and the originating source is human, not contact with inanimate objects or items.

One purpose of this article is to draw attention to the intriguing phenomenon of common, normal mental contamination. It is time to expand the scope of the construct. Severe, distressing, dysfunctional mental contamination is abnormal, constant and dominating. It drives compulsive washing/cleaning. Mild mental contamination is tolerable. This mild normal form can remain dormant for lengthy periods, only to be re-evoked intermittently by reminders of the violator or the violation.

The reactions caused by serious psychological and/or physical violations are proposed to include feelings of pollution and internal dirtiness. These feelings are often accompanied by fear, disgust, dislike, helplessness and anger (Rachman, Coughtrey, Shafran, & Radomsky, 2015). If these feelings and associated behaviour become intense, distressing, interfering, constant, and drives dysfunctional compulsive behaviour, it/they might then qualify as a psychological disorder. There are reliable assessment procedures for making the distinction between mental contamination which is symptomatic of a psychological disorder, and the phenomenon of normal mental contamination (e.g., Rachman et al., 2015; Radomsky, Rachman et al., 2014). The main features of abnormal and normal mental contamination are summarised in Table 1.

3. Laboratory findings

In the course of a study of the effects of a sexual assault, fifty female volunteers completed self-report scales of their short and long-term reactions to the violation (Fairbrother & Rachman, 2004). Their most significant reactions were feeling internally dirty and washing intensively. They reported that their negative feelings were re-evoked by memories of the violation and/or by images of the violation, and continued long after the violation had occurred.

The finding that negative feelings can be evoked by images of the violation was subsequently explored in a series of experiments in which non-clinical participants were asked to form various imaginal scenarios of receiving a non-consensual kiss. Using a variety of imaginal scenarios, the results consistently showed that feelings of mental contamination are readily induced in non-clinical participants (Elliott & Radomsky, 2009, 2012; Rachman et al., 2015). Moreover, the induced feelings of internal dirtiness were associated with strong urges to wash. A significant minority of the participants in these experiments engaged in actual washing behaviour and/or rinsing their mouths, despite only having listened to an audio recording.

Coughtrey, Shafran, and Rachman (2014) also discovered that feelings of contamination and pollution can be elicited in volunteer participants by asking them to recall/imagine a personally violating experience such as being humiliated, degraded, painfully criticised, betrayed. No physical contacts with dirty/dangerous, diseased objects were involved. When volunteers were asked to imagine a scenario in which they perpetrate a socially obnoxious action (e.g. betrayal, offensive criticism), a significant number experienced feelings of contamination (Rachman, Radomsky, Elliott, & Zysk, 2012). The results of surveys are indicative of the presence of the phenomenon (Coughtrey, Shafran, Knibbs, & Rachman, 2012).

4. Mental contamination is a common phenomenon

There are several sources of evidence demonstrating that mental contamination is a common phenomenon. Given that most people experience some disturbing/distressing events and misfortunes (Bonanno, 2004), and assuming that perceived violations are among such disturbances, it follows that there should be considerable evidence of mental contamination in the general population. It also follows that the phenomenon of mental contamination should be encountered in many cultural settings. It is to be expected that the nature of the perceived violations will be coloured by prevailing cultural beliefs and moral factors, but the basic phenomena of mental contamination should be discernible.

A recent meta-analysis of procedures to induce symptoms of OCD found a medium effect size for induction procedures in healthy populations and the magnitude of this effect was strongest for mental contamination, thought-action fusion and threat inductions (De Putter, Van Yper & Koster, 2017). Our earlier work on the subject has demonstrated that mental contamination is a statistically coherent and measureable phenomenon, and a body of evidence confirms that many non-clinical respondents endorse scales that measure mental contamination. (Radomsky, Rachman et al., 2014).

5. The cognitive theory of mental contamination

The theory encompasses the causes of mental contamination, its persistence, and individual vulnerability. Mental contamination is proposed to be caused by a serious misinterpretation of the personal significance of a psychological or physical violation. The source of the violation is invariably a person, and the common violations are degradation, humiliation, painful criticism, sexual assault and/or betrayal. The reactions to the violation are negative appraisals, such as 'I am pathetic, weak, hopeless, insignificant and incapable of defending myself'. Self-appraisals of this type tend to be prospective and sustain the person's feeling of being under current threat. This approach is modelled on Clark (1986) theory of panic disorder.

Clinical examples of the negative appraisals include: I will never get rid of the feeling that I am unclean and dirty; some people think that I am tarnished because of what happened; I feel permanently tarnished by what happened; If I cannot control my repugnant, repulsive thoughts I will go crazy; I will continue to feel polluted all of my life. Mental contamination is distressing and the affected person attempts to get rid of the exceedingly unpleasant feelings of pollution by vigorous repetitive washing/cleaning. Usually the clients/patients resort to washing their hands but it rarely helps because the site of the pollution is internal and hence inaccessible. The resort to their hands is explicable because most of us wash our hands several times each day; it is a simple, easy and satisfactory way to remove minimal discomforts.

In an experiment on non-clinical participants, mental contamination was induced when the participants formed the imagined scenario of receiving a non-consensual kiss with a man whose behaviour was described as highly immoral (Radomsky & Elliott, 2009, p. 1010). They found that "negative appraisals …of the kiss as a perceived violation" predicted mental contamination". Additionally, "…negative appraisals of personal responsibility for the occurrence of the kiss" also predicted mental contamination. This finding was replicated in the context of a kiss from a man described as highly moral (Elliott & Radomsky, 2013),

[1] Indeed, there are multiple ways to categorize and describe contact contamination. Although one could consider fear-based vs. disgust-based contact contamination, forms based on the source (e.g., animal vs. human), and others, we have elected to highlight normal vs. abnormal forms in order to underscore the vast potential to further understand mental contamination based on examinations of more common forms.