Phobias and Death: A Terror Management View of BII Phobia and Arachnophobia

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Terror Management Theory (TMT) is a theory that argues that a person's most fundamental need is the promise that they will live on after death (Greenberg, Pyszczynski, & Solomon, 1986). According to TMT, self-esteem is an internal measure of how well we believe we are living up to the standards of our culture, and therefore how likely we will "live on" after death as part of something greater than ourselves (Pyszczynski, Greenberg, Solomon, Arndt, & Schimel, 2004). Following this logic, when people are unable to believe they will achieve life after death, they experience great anxiety and fears— which, when chronic, can develop into mental illnesses (Arndt, Routledge, Cox, & Goldenberg, 2005). We sought to test this hypothesis with regards to arachnophobia and blood-injection-injury (BII) phobia.

According to TMT, people with mental illnesses fail (or are unable) to use self esteem to protect against anxiety (Arndt et al., 2005). Therefore, we studied differences in reported disgust and fear in people based on their spider and/or BII fears. Disgust and fear have been shown to be linked to both arachnophobia and BII phobia (Tolin, Lohr, Sawchuk, & Lee, 1997), and they are both found to increase after a person is made to think about death, known as mortality salience (MS) (Goldenberg et al., 2001; Lambert et al., 2014.) To examine these differences, we had participants report their spider and BII fears; then, half were made to think about their own death (MS prime) while the other half thought about a neutral topic, watching television (TV prime.) Next, participants took an alleged intelligence test, after which participants were randomly told either that they were highly intelligent, or simply thanked for their time and given no further information. Finally, participants filled out two surveys, presented in random order. They first reported how well different words, including fear-specific words, described their current emotions (affect.) They also reported how disgusting or repugnant they found items in five categories: rotting foods, blood and injections, death and mutilation, small animals, and smells. Participants were finally thanked, and all deception (i.e. the "intelligence test") was fully and honestly explained.

Surprisingly, the supposed neutral self-esteem condition failed to produce any meaningful results, despite multiple studies confirming the effect of MS on disgust and fear. We wonder if perhaps participants who were not given feedback on their test were ruminating on their performance, and therefore did not fully process the MS prime or the rest of the study. Because of this, we removed the neutral self-esteem condition from the rest of the analysis. We also chose to exclude disgust of death and injection items from our analyses because these are close enough to the MS prime and BII fears—any results could therefore be considered more of a confirmation of the prime and not a result thereof. Following this exclusion, we found that participants high in spider and BII fear did show significantly more disgust; however, no effect of MS was found. We also found a significant interaction between spider fear, MS primes, and reported fear, wherein participants who were high in spider fears *and* given an MS prime expressed more fear. There was no difference between participants who were given the TV prime, nor between participants low in spider fears regardless of MS or TV prime. We found a similar increase in fear in participants high in BII fears, although we saw some increase regardless of the MS/TV prime, albeit a smaller increase in the TV prime condition; when we controlled for overall negative affect, however, this interaction went away.

Without the neutral self-esteem condition, it is difficult to interpret these results. It is possible that participants low in spider fears were protected against fear following death because they had a self-esteem boost, which was unable to protect participants high in spider fears, as TMT would suggest. It is also, however, possible that participants high in spider fears are simply more susceptible to death anxieties. Finally, the differences between spider and BII fears are interesting. More research, with a more effective neutral SE condition, is necessary to explain these results.

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