

## Posttraumatic Growth Actions Work, Posttraumatic Growth Cognitions Fail: Results from the Intifada and Gaza Disengagement

Overview Paper

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Studies have begun to address the psychological consequences following exposure to terrorist activities (Galea, Ahern, Resnick, Kilpatrick, Bucuvalas, & Gold, et al., 2002; Schlenger, Caddell, Ebert, Jordan, Rourke, Wilson, et al., 2002; Schuster, Stein, Jaycox, Collins, Marshall, Elliot, et al., 2001; Silver, Holman, McIntosh, Poulin, & Gil-Rivas, 2002) and during ongoing terrorism exposure and threat (Bleich, Gelkopf & Solomon, 2003; de Jong, Komproe, Van Ommeren, El Masri, Araya, & Khaled, 2001; Hobfoll, Johnson, & Canetti-Nisim, 2006). These studies have demonstrated the relationship between the trauma of terrorism exposure, posttraumatic stress disorder (PTSD), and symptoms of depression.

In addition to recognizing the negative impact of trauma, the recent work of Tedeschi and Calhoun (1995) promoted an interest in the potential for a positive reaction to trauma, a construct they termed posttraumatic growth. Much of the ensuing work focused solely on the positive legacy of trauma including closer relationships, positive changes in self-perception and experiencing greater meaning. However, in taking this approach, studies often neglected to examine the link between posttraumatic growth and symptoms of psychological distress. In studies addressing this connection, an inconsistent pattern of results emerged as few studies pointed to the salutogenic role of posttraumatic growth (Ai, Cascio, Santangelo, & Evans-Campbell, 2005; Frazier, Conlon & Glaser, 2001) whereas others implicated posttraumatic growth in greater symptom levels (Lehman, Davis, DeLongis, Wortman et al., 1993; Park, Cohen & Murch, 1996; Tomich & Helgeson, 2004).

With the rise of global terrorism and the need for understanding its multifarious effects, several studies arose that address the possibility of positive reactions following exposure to terrorism and community disasters (Ai, et al., 2005, Hobfoll, et al., 2006). Results from these investigations have paralleled the mixture of positive and negative findings that appear in the literature. This article will briefly outline recent findings from two studies conducted in Israel during tumultuous periods of heightened terrorist activity within an evolving research program aimed at examining the role of posttraumatic growth as a risk or protective factor in the development of posttraumatic symptomatology.

We conducted a longitudinal study of terrorism during the Al Aqsa Intifada, a four year period (2000 – 2004) of increasing violence and terrorism in Israel. A nationally representative sample of Israelis (N = 1,136) was obtained using random digit dialing. Structured interviews were used to ascertain the level of posttraumatic symptomatology, terrorism exposure, the perception of growth related to the Intifada, and several constructs related to outgroup biases: threat perception and exclusionism of Arabs, and the endorsement of political violence.

Bivariate analysis indicated that posttraumatic growth was positively correlated to symptoms of PTSD. This illustrates the negative role that the growth construct can perpetrate in posttrauma adaptation. Multivariate exploration of the growth construct as a predictor of probable PTSD and PTSD-related functional impairment in logistic regression analyses, controlling for theoretically relevant demographic variables, demonstrated the same deleterious effect. The more growth Israeli's experienced, the greater their likelihood of experiencing symptoms of PTSD, probable PTSD, and functional impairment.



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## Growth Actions Work, Growth Cognitions Fail



*Stevan Hobfoll receiving  
the Lifetime Achievement  
Award at ICAP 2006,  
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Given the potential for profound existential activation following trauma, terror management theory was used as an organizing model to test the relationship between posttraumatic growth and outgroup bias. Terror management theory posits that the awareness of the inevitability of our death creates the potential for great anxiety and terror. This anxiety is lessened through cultural worldviews that provide a sense of self-esteem, that one is a person of value in a world of meaning (Becker, 1973; Greenberg, Solomon & Pyszczynski, 1986; Solomon, Greenberg & Pyszczynski, 2004). Being reminded of one's mortality (i.e., mortality salience) has been linked to the derogation of threatening outgroup members, the process of worldview defense, as individuals will strive to bolster and protect their cultural worldviews (Rosenblatt, Greenberg, Solomon, Pyszczynski, & Lyon, 1989). We posited that posttraumatic growth would function as a vehicle for worldview defense, as one dimension of posttraumatic growth measures the sinews of greater social connectedness following trauma. Given that exposure to terrorism has the potential to produce mortality saliency (Pyszczynski, Solomon, & Greenberg, 2003), we further hypothesized that Israeli Jews, who were exposed to terrorism and who consequently perceived posttraumatic growth, would likely evidence an increase in the endorsement of exclusionism and threat perception of Israeli-born Palestinian Arabs, and to further support the use of extreme political violence. The results of multiple hierarchical regressions supported the hypothesized relationship between posttraumatic growth and outgroup bias, further demonstrating its pathogenic rather than salutogenic consequences.

Taken together, these findings suggest that posttraumatic growth is not related to a positive and adaptive response in reducing posttraumatic symptomatology, but may rather function as a risk factor for developing symptoms of PTSD and impairment to one's functioning. Furthermore, whereas defensive processes of identification with ingroup members against threatening outsiders may portend the belief in greater social connectedness, this process does not appear to link to psychological wellness.

Upon reviewing the social psychological literature, we began to conceptualize posttraumatic growth not as a veridical phenomenon expected to ameliorate posttraumatic symptomatology, but rather a cognitive illusion that was employed as a method of coping (Taylor, 1983). We find support for this assertion in a recent study conducted on self-enhancement in individuals who were at or near the World Trade Center during the September 11, 2001 terror attacks (Bonanno, Rennie, & Dekel, 2005). Self-enhancement bias was a significant predictor of self-reported adjustment, an initial resilient outcome, ratings of better adjustment prior to the attacks, and positive affectivity. However, 18 months after initial interviews, friends and family rated self-enhancers as being less socially adjusted. So in this way, posttraumatic growth may serve the role of a cognitive coping strategy following extreme stress, but not a reified change in positive posttraumatic functioning.

In line with Victor Frankl's (1959) existential discourse and the weighty evidence of behavioral activation in the behavioral and cognitive behavioral tradition (Jacobson, Martell, & Dimidjian, 2001; Martell, Addis, & Dimidjian, 2004), we began to conceptualize true posttraumatic growth not simply as cognitive process, or intellectual exercise in reframing, but salutogenesis through *action focused growth* whereby an individual actualizes their benefit finding cognitions – or reifies their illusions through action. This leads us to hypothesize that within a group of individuals who are already living their lives in the pursuit of an ideological purpose, and who thereby take positive actions in the face of ongoing trauma exposure, the experience of posttraumatic growth would not only be beneficial, but demonstrable behaviorally. We turn now to a study conducted in the throws of the recent Israeli disengagement.

As evidence of Israel's commitment to peace and in line with the two state solution (i.e., one state for the Jewish people and one for the Palestinians), the Israeli government decided to remove the settlers in the Gaza Strip through the process of "disengagement."



For the settlers, this heralded a change in governmental policies that specifically undermined the ideological focus of the settlement movement in Israel, a movement in place for more than half a century. For them, this policy change was a betrayal and threatened the security of Israel.

We hypothesized that a representative group of settlers (N=190) who have been the target of repeated terrorist attacks and were a part of the forced evacuations from Gaza would have higher levels of PTSD and depression compared to settlers before the disengagement. Those who reported posttraumatic growth in the process of a lifestyle that demands *daily actions* to face their traumatic circumstances would be less likely to develop PTSD and depression than those who did not derive growth from their experience.

Comparisons of probable PTSD and major depression between settlers before and during the Gaza Disengagement offered clear evidence of the significance of this event to exacerbate already high levels of symptomatology. Rates of probable PTSD jumped from 6.5% to 26.3% and probable major depression rose from 3.2% to 27.4%. Consistent with our predictions, results from logistic regression analyses demonstrated that posttraumatic growth served as a protective factor against probable PTSD diagnosis. Individuals who took positive social actions during the disengagement and construed this action as growth, enjoyed a significant reduction in the odds of developing probable PTSD (but not probable depression).

### Conclusion

The role of posttraumatic growth as a beneficial process of adaptation and wellness has been challenged by our recent work in Israel. During the Intifada, Jews who experienced greater posttraumatic growth also had higher levels of PTSD symptoms, probable PTSD diagnosis, impairment of their functioning, and demonstrated greater out-group bias. However, in Gaza, we see a different pattern of results emerging, suggesting that posttraumatic growth may be a marker of positive adaptation when accompanied by actions, not solely cognitive maneuvers. It is our position that posttraumatic growth should be considered a positive phenomenon when its link to psychopathology is more clearly defined. Until such time, facilitating growth within the context of treating trauma survivors may be ill advised (Calhoun & Tedeschi, 1999). In our opinion, true growth and transcendence in the aftermath of trauma will be evidenced by a concomitant reduction in symptomatology.

### References

- Ai, A. L., Cascio, T., Santangelo, L. K. & Evans-Campbell, T. (2005). Hope, meaning, and growth following the September 11, 2001, terrorist attacks. *Journal of Interpersonal Violence*, 20(5), 523–548.
- Becker, E. (1973). *The denial of death*. New York, New York: Simon & Schuster.
- Bleich, A., Gelkopf, M., & Solomon, Z. (2003). Exposure to terrorism, stress-related mental health symptoms, and coping behaviors among a nationally representative sample in Israel. *JAMA: Journal of the American Medical Association*, 290(5), 612–620.
- Bonanno, G. A., Rennie, C. & Dekel, S. (2005). Self-enhancement among high-exposure survivors of the September terrorist attack: Resilience or social maladjustment? *Journal of Personality and Social Psychology*, 88(6), 984–998.
- Calhoun, L. G., & Tedeschi, R. G. (1999). *Facilitating posttraumatic growth: A clinician's guide*. Mahwah, N.J.: Lawrence Erlbaum Associates Publishers.
- de Jong, J. T. V. M., Komproe, I. H., Van Ommeren, M., El Masri, M., Araya, M., Khaled, N. et al. (2001). Lifetime events and posttraumatic stress disorder in 4 postconflict settings. *JAMA: Journal of the American Medical Association*, 286(5), 555–562.

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- Frankl, V. (1959). *Man's search for meaning*. New York: Touchstone.
- Frazier, P., Tashiro, T., Berman, M., Steger, M., & Long, J. (2004). Correlates of levels and patterns of positive life changes following sexual assault. *Journal of Consulting and Clinical Psychology, 72*(1), 19–30.
- Galea, S., Ahern, J., Resnick, H., Kilpatrick, D., Bucuvalas, M., Gold, J., et al. (2002). Psychological sequelae of the September 11 terrorist attacks in New York City. *New England Journal of Medicine, 346*(13), 982–987.
- Greenberg, J., Pyszczynski, T., & Solomon, S. (1986). The causes and consequences of a need for self-esteem: A terror management theory. In R. F. Baumeister (Ed.), *Public and private self* (pp. 189–212). New York: Springer-Verlag.
- Hobfoll, S. E., Canetti-Nisim, D., & Johnson, R. J. (2006). Exposure to terrorism, stress-related mental health symptoms, and defensive coping among Jews and Arabs in Israel. *Journal of Consulting and Clinical Psychology, 74*(2), 207–218.
- Jacobson, N. S., Martell, C. R., & Dimidjian, S. (2001). Behavioral activation treatment for depression: Returning to contextual roots. *Clinical Psychology: Science and Practice, 8*(3), 255–270.
- Lehman, D. R., Davis, C. G., DeLongis, A., Wortman, C. B., & et al. (1993). Positive and negative life changes following bereavement and their relations to adjustment. *Journal of Social & Clinical Psychology, 12*(1), 90.
- Martell, C., Addis, M., & Dimidjian, S. (2004). Finding the action in behavioral activation: The search for empirically supported interventions and mechanisms of change. In S. C. Hayes, V. M. Follette & M. M. Linehan (Eds.), *Mindfulness and acceptance: Expanding the cognitive-behavioral tradition*. (pp. 152–167). New York: Guilford Press.
- Park, C. L., Cohen, L. H., & Murch, R. L. (1996). Assessment and prediction of stress-related growth. *Journal of Personality, 64*(1), 71–105.
- Pyszczynski, T., Solomon, S., & Greenberg, J. (2003). *In the wake of 9/11: The psychology of terror*. Washington, D.C: American Psychological Association.
- Rosenblatt, A., Greenberg, J., Solomon, S., Pyszczynski, T., & Lyon, D. (1989). Evidence for terror management theory: I. The effects of mortality salience on reactions to those who violate or uphold cultural values. *Journal of Personality & Social Psychology, 57*(4), 681–690.
- Schlenger, W. E., Caddell, J. M., Ebert, L., Jordan, B. K., Rourke, K. M., Wilson, D., et al. (2002). Psychological reactions to terrorist attacks: Findings from the national study of Americans' reactions to September 11. *JAMA: Journal of the American Medical Association, 288*(5), 581–588.
- Schuster, M. A., Stein, B. D., Jaycox, L. H., Collins, R. L., Marshall, G. N., Elliott, M. N., et al. (2001). A national survey of stress reactions after the September 11, 2001, terrorist attacks. *New England Journal of Medicine, 345*(20), 1507–1512.
- Silver, R. C., Holman, E. A., McIntosh, D. N., Poulin, M., & Gil-Rivas, V. (2002). Nationwide longitudinal study of psychological responses to September 11. *JAMA: Journal of the American Medical Association, 288*(10), 1235–1244.
- Solomon, S., Greenberg, J., & Pyszczynski, T. (2004). The cultural animal: Twenty years of terror management theory and research. In J. Greenberg, S. Koole & T. Pyszczynski (Eds.), *The handbook of experimental existential psychology* (pp. 13–34). New York: The Guilford Press.
- Taylor, S. E. (1983). Adjustment to threatening events: A theory of cognitive adaptation. *American Psychologist, 38*(11), 1161–1173.
- Tedeschi, R. G., & Calhoun, L. G. (1995). *Trauma and transformation: Growing in the aftermath of suffering*. Thousand Oaks, California: Sage.
- Tomich, P. L., & Helgeson, V. S. (2004). Is finding something good in the bad always good? Benefit finding among women with breast cancer. *Health Psychology, 23*(1), 16–23.