

Positive Responses to Benefit and Harm: Bringing Forgiveness and Gratitude Into Cognitive Psychotherapy

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Forgiveness and gratitude represent positive psychological responses to interpersonal harms and benefits that individuals have experienced. In the present article we first provide a brief review of the research that has shown forgiveness and gratitude to be related to various measures of physical and psychological well-being. We then review the empirical findings regarding the cognitive and affective substrates of forgiveness and gratitude. We also offer a selective review of some of the interventions that appear to be effective in encouraging forgiveness and gratitude. To conclude, we suggest some ways in which the insights from the basic research on promoting forgiveness and gratitude might be meaningfully integrated into cognitive psychotherapy.

Key Words: Forgiveness, Gratitude, Well-being, Cognitive Psychotherapy, Interpersonal

Recently psychologists have reached a consensus that research has seriously neglected the strengths of human behavior (Fredrickson, 1998; McCullough & Snyder, 2000; Myers & Diener, 1995; Seligman & Csikszentmihalyi, 2001; Taylor, 2001). They argue that, instead of articulating the positive experiences that improve quality of life, many theories in psychology have focused mainly on curbing aggression, reducing psychopathologies, and controlling vices. Positive psychology is a response to this perceived oversight.

An area in which positive psychology might be applied successfully to cognitive psychotherapy is in the area of people's responses to other people's treatment of them. How should people respond when they are treated particularly well—or particularly poorly by others? Theorists of cognitive psychotherapy have had much to say about people's maladaptive responses to such interpersonal behavior (e.g., anger), but have had surprisingly little to say about *positive responses* to such behavior. In this domain, positive psychology may have much to offer: By helping people to respond more positively when others harm them and to better savor the interpersonal situations in which others are benevolent toward them, people may be able to gain resources for psychological well-being that would go untapped otherwise. The major reasons for the current success of cognitive psychotherapy are that: (a) identification and modification of specific cognitive processes associated with desired therapeutic outcomes have helped produce effective treatments; (b) such treatments have been consistently replicated by cognitive therapists; and (c) such treatments have yielded effects that are not only beneficial but appealing to clients who are increasingly seeking rational ways of directly improving their lives (Leahy, 2002). In this spirit, gratitude and forgiveness may also be useful additions to the armamentarium of cognitive psychotherapists. We now have a clear picture of the basic mechanisms underlying both phenomena, the reasons they are beneficial for people, practical applications for facilitating them, and we also know that the practice of forgiveness and gratitude are tools that clients can employ beyond the treatment context to directly improve their lives.

Forgiveness is a positive psychological response to interpersonal harm, and gratitude is a positive psychological response to interpersonal benefits. Despite the fact that forgiveness and gratitude have been viewed as perennial human concerns in many ancient theories of the good

life (Emmons & McCullough, 2003b; McCullough & Worthington, 1999), psychologists have only recently begun to explore the applications of forgiveness and gratitude to the promotion of human welfare. The present article addresses these two areas of research in positive psychology. Specifically, we first review the empirical research on forgiveness, including research on its links to health and well-being, basic research on cognitive and affective factors that encourage or deter forgiveness, and research on the effectiveness of forgiveness interventions. We then discuss the research on gratitude in a similar fashion. We close with some suggestions for integrating these bodies of research findings into future research and applications of cognitive psychotherapy.

Forgiveness: Links to Well-Being, Basic Research, and Intervention Research

McCullough, Worthington, and Rachal (1997) conceptualized forgiveness as a suite of transgression-related motivational changes toward a transgressor. When people forgive, their revenge and avoidance-related motivations subside, and motivations toward benevolence or goodwill increase or re-emerge. Forgiveness, they contend, occurs when victims can act not on motivations inspired by their initial experience of righteous indignation and hurt-perceived attack, but on a desire to restore goodwill or community with the offender.

Links of Forgiveness to Health and Well-Being

It is well established that blame toward others for one's misfortunes and sustained hostility and anger are physically and mentally harmful (Affleck, Tennen, Croog, & Levine, 1987; Miller, Smith, Turner, Gujjarro, & Hallet, 1996; Tennen & Affleck, 1990; Williams & Williams, 1993). Moreover, negative emotional states hinder immunological and cardiovascular functioning (McCraty, Atkinson, Tiller, Rein, & Watkins, 1995). Though controlled experiments have not yet verified causal relationships between forgiveness and physical health, forgiveness may be salubrious because it is negatively related to all of these harmful states (see review by Thoresen, Harris, & Luskin, 2000).

Witvliet, Ludwig, and Vander Laan (2001) provided more direct evidence that forgiveness may improve health. In their study, participants who were asked to imagine forgiving a real-life offender showed improvements in terms of cardiovascular (heart rate, blood pressure) and sympathetic nervous system functioning (skin conductance levels, corrugator electromyogram), compared to those who were asked to imagine not forgiving a real-life offender. Participants' psychophysiological responses paralleled their self-reported emotions (i.e., they felt more negative, aroused, angry, sad, and less in control), and they even persisted into the postimagery recovery period. The researchers also argued that because people may intensify their hurtful memories and vengeful thoughts in daily life, such psychophysiological responses may even be stronger during natural reactions to offenses. These results give a view of what happens to the body during experiences of unforgiveness and imply that such responses, if chronically exhibited, can seriously erode physical health by influencing susceptibility to and progression of disease. Recently, Lawler, Younger, Piferi, Billington, Jobe, Edmondson, & Jones (2003) reported similar findings. They found that people instructed to undergo an interview about a transgression from their past that they had forgiven manifested considerably less cardiovascular reactivity than did individuals who participated in an interview about a transgression that they had not forgiven. These findings go a step further from those of Witvliet and colleagues (2001) in that they suggest that forgiven transgressions elicit less cardiovascular reactivity than do unforgiven transgressions when people recall these transgressions and then discuss them in a social setting. Berry and Worthington (2001) also found forgivingness (a trait that represents a willingness to forgive when one is harmed by other people) to be related to lowered cortisol reactivity when people imagine a close relationship partner. Taken together, these three studies provide a strong indication that forgiveness may lead to less stress-related cardiovascular and neuroendocrine reactivity when people think about transgressions that they have incurred.

In addition to these possible physiological mechanisms for explaining the link between forgiveness and well-being, Thoresen and colleagues (2000) also suggested several psychosocial mechanisms that might explain the link between forgiveness and physical well-being. They suggest forgiveness may lead to increased optimistic thinking and decreased hopelessness, increased self-efficacy, higher levels of perceived social and emotional support, and, for some, a greater sense of transcendent consciousness and communion with God—all of which might promote physical health. Indeed, forgiveness is negatively related to excessive defensiveness, blame, and thoughts about revenge, processes that characterize a variety of psychopathologies (Greenwald & Harder, 1994). In a cross-sectional survey of 30 divorced or permanently separated mothers with children aged 10 to 13, Aschleman (1996) found that mothers who had forgiven the fathers for previous transgressions committed against them were more likely than unforgiving mothers to report a greater sense of self-acceptance and purpose in life, as well as less anxiety and depressive symptoms. Poloma and Gallup (1991) found in a nationally representative sample that people who are more forgiving also enjoy greater satisfaction with life, compared to less forgiving people.

Forgiveness may contribute to well-being mainly from its potential to help people mend and preserve supportive, close relationships (Karremans, Van Lange, Ouwerkerk, & Kluwer, 2003). Karremans and colleagues found that forgiving was more strongly associated with wellbeing in highly committed relationships rather than less committed relationships partly because not forgiving in close relationships leads to psychological tension (i.e., a state of discomfort resulting from conflicting cognitions and feelings). Not surprisingly, forgiveness appears to be beneficial for relational well-being (Nelson, 1993; Rackley, 1993; Woodman, 1991). This is significant when we consider the fact that lack of supportive relationships has been linked to a wide variety of psychological and physical diseases (Baumeister & Leary, 1995; House, Landis, & Umberson, 1988). McCullough, Rachal, Sandage, Worthington, and Brown (1998) found that the degree to which people in romantic relationships reported having forgiven each other was positively associated with both partners' satisfaction with and commitment to their relationships, suggesting that forgiveness is linked to both the forgiver and the forgiven person's reports of relationship quality. Conversely, research has demonstrated that endorsing revenge as a conflict resolution strategy is positively related to difficulty maintaining close friendships (Rose & Asher, 1999). The more that the children in this study reported "getting back" at friends in imaginary conflict scenarios, the fewer best friends they had, the more their peers rated them as hostile and less positive, and the less accepted they were by their peers.

Cognitive and Emotional Factors That Encourage Forgiveness

We turn to the experimental and longitudinal research that sheds light on cognitive and emotional factors that may be operative in facilitating or deterring forgiveness. These factors include: (a) empathy for the transgressor, (b) recognition of one's own flaws and shortcomings, (c) generous attributions and appraisals for the transgressor's behavior, and (d) rumination. All of these factors are amenable to change, and thus, may be important ways to facilitate forgiveness in clinical settings by cognitive psychotherapists as well as in the laboratory.

Empathy for the Transgressor. McCullough and colleagues (1997) helped to provide a theoretical rationale for why empathy for one's transgressor may be a crucial precursor to forgiveness. They proposed that forgiveness was structurally and functionally similar to altruistic behavior that likewise has been found to occur as a function of empathy (Batson, 1991). McCullough and colleagues (1997) first study yielded evidence that receiving an apology facilitates forgiveness by way of increasing empathy for the transgressor and that the motivational changes underlying forgiveness (i.e., more constructive and less destructive motivations toward the relationship) occur as a function of empathy. In their second study they found that an empathy seminar promoted more change in forgiving than did a comparison seminar (which excluded any explicit inductions of empathy) or a waiting-list control group, indicating that clinical interventions can influence forgiving by facilitating empathy for the offender (an outcome that can be achieved through a focus on dispositional, relationship, and situational variables). Other cross-sectional work has confirmed the empathy-forgiveness link. People who forgive their transgressor tend to have higher levels of empathy for them (McCullough et al., 1998; Zechmeister & Romero, 2002), and people who score higher in dispositional forgiveness also

tend to score higher on dispositional empathy (Maltby, Macaskill, & Day, 2002). Going even further to demonstrate that empathy and forgiveness may be causally related, McCullough, Fincham, and Tsang (2003) analyzed data from two daily diary studies and found that people are more forgiving than is typical for them when they have greater empathy than is typical for them regarding a transgressor. Further, they demonstrated that the degree of empathy one has for one's transgressors immediately following a transgression occurs may also exert a small effect on the rate with which one's benevolence toward the transgressor returns to high levels. Thus, empathy may explain not only between-persons variation in forgiveness—it may also explain why some people are more forgiving at certain times than they are at others.

Recognition of One's Own Flaws and Shortcomings. Work by Takaku (2001) suggests that one way to increase empathy and hence forgiveness is to induce feelings of hypocrisy or dissonance in people. If victims are made aware of times when they have committed similar behaviors to that of their offender or if they can be made to feel capable of behaving similarly under like circumstances, then the inconsistency may induce cognitive dissonance (Stone, Wiegand, Cooper, & Aronson, 1997). When people experience such dissonance, they become more able to empathize with the offender and hence more forgiving of them (Takaku, 2001).

Generous Attributions and Appraisals for the Transgressor's Behavior. The above analysis suggests one reason why people may have trouble forgiving an offender is because they are unable or fail to consider possible, mitigating circumstances related to a partner's transgression. Considerable research reveals that attributing a high degree of responsibility to one's transgressor for his or her behavior is an important obstacle to forgiveness (Fincham & Beach, 2002; Fincham, Paleari, & Regalia, 2002; Weiner, Graham, Peter, & Zmuidinas, 1991). When a transgression recipient views the transgressor as having been in control of his or her behavior, the transgression recipient tends to experience anger toward the transgressor (Weiner, 1986). If we fail to consider factors in the environment that may have been responsible or factors that made that behavior less than intentional for the actor, then we may be harboring an explanation for the predicament that confines us to feelings of righteous indignation or hurt-perceived attack, natural reactions in the immediate aftermath of transgressions (Gottman, 1993). Alternatively, an ability to incorporate external pressures or other uncontrollable circumstances that may have influenced the transgressor's behavior can help to deter these negative reactions and facilitate forgiveness instead (Fincham & Beach, 2002; Fincham, Paleari, & Regalia, 2002).

Rumination About the Transgression. Few recent discoveries in cognitive research have been more robust than the discovery that rumination regarding negative life situations is maladaptive. Rumination has emerged as an important cognitive process for explaining depression and alcohol use (Nolen-Hoeksema, 1998; Nolen-Hoeksema & Harrell, 2002) anxiety disorders (Clark, 2001), and, more to the point of the present article, anger (Rusting & Nolen-Hoeksema, 1998). Of late, theorists have also come to suspect that rumination is one of the major cognitive factors sustaining the desire for revenge (i.e., holding beliefs about the appropriateness of vengeful actions for obtaining one's goals and using it as an interpersonal problem-solving strategy) and deterring forgiveness for specific transgressions (McCullough et al., 1998). Cross-sectional research has shown that people who ruminated most intensely about the offense and offender were also more vengeful (McCullough, Bellah, Kilpatrick, & Johnson, 2001). McCullough and colleagues (2001) also found that ruminating and attempting to suppress that rumination were related to decreased forgiveness 8 weeks later.

We have explored this relationship in greater detail using data from two daily diary studies. These studies revealed that on occasions when people were ruminating more about a transgression than was typical for them, they also tended to have greater revenge and avoidance motivation, and less benevolence, regarding a transgressor than was typical for them. Moreover, people's ability to reduce their rumination was related at astonishingly high levels to the extent to which they forgave over the course of a 12-week follow-up period (r s were greater than .85 between linear changes in rumination and linear changes in avoidance, revenge, and benevolence motivation). These findings maintained over and above the possible confounding influence of trait negative affectivity. Thus, rumination may be a key cognitive process that deters forgiveness (McCullough & Bono, 2003).

Helping People Forgive With Psychological Interventions

For more than a decade, a variety of forgiveness intervention experiments seeking to help people forgive important relationship partners have been applied with apparent success. The people these experiments targeted became more likely to forgive, showed increased self-esteem, lower levels of depression and anxiety (Hebl & Enright, 1993), improved attitudes toward the people who hurt them, and increased levels of hope (Al-Mabuk, Enright, & Cardis, 1995). One study employing wait-list control methods showed that experiments can reliably produce such benefits (McCullough et al., 1997), while two others showed that the benefits can even last anywhere from 3 months up to 1 year later (Coyle & Enright, 1997; Freedman & Enright, 1997).

In a meta-analysis summarizing the effects of 12 different forgiveness group interventions, Worthington, Sandage, and Berry (2000) found that the interventions were, on average, effective in improving participants' forgiveness scores by 43% of a standard deviation (Cohen's $d = .43$) over the control group. They also observed that more contact was more efficacious for clients than less contact, with interventions lasting 6 or more hours yielding 76% of a standard deviation (Cohen's $d = .76$) over the control group and interventions lasting 4 or less hours yielding 24% of a standard deviation more (Cohen's $d = .24$). All of these findings show us that clinical interventions can successfully promote forgiveness.

Gratitude: Links to Well-Being, Interventions, and Laboratory Research

Gratitude is a cognitive-affective state that is typically associated with the perception that one has received a personal benefit that was not deserved or earned, but rather, due to the good intentions of another person (Emmons & McCullough, 2003a, 2003b). McCullough, Kilpatrick, Emmons, and Larson (2001) conceptualized gratitude as a *moral affect* because it results from and stimulates behavior that is motivated by a concern for another person's well-being. We could be grateful for a variety of benefits: personal (e.g., advice) or collective (e.g., books/programs your organization badly needed), material (e.g., a gift) or interpersonal (e.g., emotional acknowledgment from a friend), monetary (e.g., a loan) or nonmonetary (e.g., muchneeded help), mundane (e.g., a book you were wanting) or nonmaterial, such as benefits from nature (e.g., awe-evoking weather) or from spiritual life (e.g., experiences of divine interventions).

McCullough and colleagues (2001) also argued that gratitude has three moral functions. Gratitude can serve as a moral barometer because it indicates a change in one's social relationships as a result of people who he/she regards as moral agents for having augmented his/her personal well-being. Gratitude can also serve as a moral motive because it motivates people to respond to kindness with kindness and to subsequently inhibit destructive motivations toward a benefactor. Finally, gratitude can serve as a moral reinforcer because its expression can increase the chances that a benefactor will respond with benevolence again in the future, just as showing ingratitude can instill anger and resentment in benefactors and inhibit future acts of kindness. McCullough and colleagues (2001) concluded that the empirical findings strongly supported the notion of gratitude as a moral barometer and a moral reinforcer, but they concluded that the data were inadequate for evaluating the moral motive hypothesis.

Gratitude, Well-Being, and Health

Research also shows that dispositional gratitude is associated with other measures of positive affect and well-being. Watkins, Woodward, Stone, & Kolts (2003) found trait gratitude to be negatively related to resentment about the past, and to depression in clinical samples (Woodward, Moua, & Watkins, 1998). McCullough, Emmons, and Tsang (2002) also found gratitude to be negatively associated with depression, anxiety and envy in nonclinical samples. Moreover, dispositional gratitude was associated positively with optimism and hope. Thankfulness was related to less risk for internalizing (e.g., depression and anxiety) and externalizing disorders (e.g., substance abuse) in an epidemiological study involving 2,616 male and female twins (Kendler et al., 2003). Taken together, these results imply that gratitude is incompatible with negative emotions and pathological conditions and that it may even offer protection against psychiatric disorders.

Research also supports the notion that gratitude can elicit more kindness from a benefactor. Field experiments show that expressions of gratitude can reinforce kidney donation (Bernstein & Simmons, 1974), volunteering behavior toward people with HIV/AIDS (Bennett, Ross, & Sunderland, 1996), and more visits from case managers in a residential treatment program (Clark, Northrop, & Barkshire, 1988). Lab experiments show that benefactors who were thanked for their efforts were willing to give more and work harder for others, compared to those who were not thanked for their efforts (Clark, 1975; Goldman, Seever, & Seever, 1982; McGovern, Ditzian, & Taylor, 1975; Moss & Page, 1972). Moreover, it appears that people who are high in Social Desirability or Need for Approval (Crowne & Marlowe, 1960) are more strongly reinforced by beneficiaries' expressions of gratitude (Deutsch & Lamberti, 1986).

Taken together, these findings indicate that gratitude is an emotion that can help solidify and secure supportive social relationships. Experiences of gratitude come from acknowledging the "gratuitous" role certain social sources of support may play in propagating beneficial outcomes in our lives. Experiencing gratitude may help us reciprocate kindness toward those who benefit us; and it may be particularly adaptive to express gratitude because it can validate the efforts other people put forth on our behalf and help spur on more of such behavior.

Cognitive and Emotional Factors That Encourage Gratitude

There is less basic research on the cognitive and emotional factors that elicit gratitude than there is regarding forgiveness. However, what little basic research there is demonstrates that people experience gratitude when they *recognize that someone intended to promote their well-being*. Benefits described as *intentionally provided, costly to the benefactor, and valuable to the recipient* each helped increase the amount of gratitude people would expect to experience (Tesser, Gatewood, & Driver, 1968). People not only experience gratitude when they *believe a benefit was caused by the efforts of others* (Weiner, Russell, & Lerman, 1979; Zaleski, 1988), they are also able to correctly identify the effort of others as the cause of another person's gratitude (Weiner et al., 1979). If the benefits rendered are seen as costly to the benefactor, then people experience more gratitude, unless the benefactor produced the need for the benefit in the first place (Okamoto & Robinson, 1997). Moreover, people tend to experience less gratitude when benefits are expected or regarded as obligatory, such as in family relationships (Bar-Tal, Bar-Zohar, Greenberg, & Hermon, 1977).

Helping People Experience Gratitude With Psychological Interventions

As with forgiveness, intervention experiments seeking to increase the experience of gratitude in people have also been applied with apparent success. They likewise show that gratitude can have a beneficial impact on people's lives. Gratitude intervention research has relied mainly on getting people to recollect events from the past that help induce gratitude. Emmons and McCullough (2003) recently conducted three experiments investigating whether self-guided exercises designed to induce states of gratitude could lead to heightened well-being over time, compared to focusing on daily hassles, downward social comparisons, or on neutral life events. In three studies, they randomly assigned participants to different experimental conditions, and then had them keep daily or weekly records of their positive and negative affect, coping behaviors, health behaviors, physical symptoms, and overall life appraisals.

In Study 1 participants in the gratitude condition reported being more grateful than those in the hassles condition, feeling better about their life as a whole, being more optimistic about the future, spending more time exercising, and experiencing fewer health complaints, compared to participants in either of the other comparison conditions. Thus, a simple weekly intervention showed significant emotional and health benefits. In addition to showing that thinking more often about things to be grateful for can increase how much gratitude people experience, Study 2 also showed that participants in the grateful condition felt more joyful, enthusiastic, interested, attentive, energetic, excited, determined, and strong than those in the comparison conditions. The third study then replicated these effects in adults with neuromuscular diseases. Similar to the previous studies, the gratitude group showed significantly more positive affect and satisfaction with life, but they also showed less negative affect than the control group. Moreover, both self and peer reports reflected the increases in positive affect and life satisfaction. These studies

support the notion that gratitude causally influences subjective well-being and suggest that various populations may benefit from the regular experience and expression of gratitude.

To investigate which method of grateful recollecting would best enhance positive affect, Watkins and colleagues (2) conducted an experiment in which recollection was manipulated in different ways (i.e., thinking about someone you are grateful for, writing an essay about someone you are grateful for, or writing a letter to someone you are grateful for, which will allegedly get sent to that person), and positive and negative affect was measured before and after the manipulations. They found that all the gratitude conditions led to increases in positive affect, whereas the control condition (describing your living room) did not. In particular, the grateful thinking condition showed the strongest effect, perhaps because the act of writing an essay or a letter of gratitude on demand may have disrupted the experience of positive affect or caused some anxiety.

Research has also shown that gratitude or thankfulness can be increased as a function of interventions designed for other purposes. For example, meditation can promote gratitude as a quality of mindfulness (Shapiro, Schwartz, & Santerre, 2002), progressive muscle relaxation can help produce increased feelings of love and thankfulness (Khasky & Smith, 1999), and merely imagining being forgiven by one's victim can increase feelings of gratitude, presumably by making one grateful for being given the gift of forgiveness (Witvliet, Ludwig, & Bauer, 2002). These studies demonstrate that interventions aimed at increasing one's focus on the relationship between mind and body can also help engender grateful mindsets in people. In fact, a particular type of psychotherapy originating in Japan, known as Naikan therapy, orchestrates all of the above techniques so as to expand clients' awareness of their moral relationships with others (in terms of giving, receiving, and hurting) and aims to induce in clients a strong sense of gratitude to people who have provided them with benefits (Hedstrom, 1994; Reynolds, 1983).

Applying Research on Forgiveness and Gratitude to Cognitive Psychotherapy

From the existing research base on forgiveness and gratitude, we are now in a position to draw several tentative conclusions about forgiveness and gratitude that are relevant to their incorporation into the practice of cognitive psychotherapy. First, research now suggests strongly that forgiveness and gratitude are relevant for psychological, physical, and relational well-being. Studies also indicate that forgiveness and gratitude can both be facilitated experimentally through relatively simple psychological interventions. Finally, studies show that forgiveness and gratitude are not only realistic psychotherapeutic goals that can be attained with existing psychological interventions, but also, by encouraging people to experience forgiveness and gratitude, they may experience gains in other areas of their lives. Indeed, creative approaches to cognitive psychotherapy that include the judicious use of gratitude and forgiveness may help give "an extra nudge" to the adaptive changes that cognitive therapists seek to instill in their clients (Newman, 2002, p. 313).

For the most part, psychological interventions designed to facilitate forgiveness and gratitude have not explicitly incorporated basic research findings about the cognitive and affective roots of forgiveness and gratitude. Although there are a great many interventions for encouraging individuals, couples, and families to forgive, few of these interventions explicitly integrate research about the cognitive factors that appear to promote and/or deter forgiveness. Cognitive psychotherapists might do well to incorporate the findings regarding the role of specific cognitive processes (e.g., attributions, rumination, empathy and perspective taking, etc.) on forgiveness and gratitude into their applications of forgiveness and gratitude in clinical settings. By considering these factors explicitly in the design of interventions, the effectiveness of these therapies can likely be improved, and rendered more coherent within a cognitive approach to psychotherapy. Furthermore, most of the research on forgiveness and gratitude both have involved samples of people who are largely functioning without major psychological, medical, or relational difficulties (see Emmons & McCullough, 2003a; and Enright & Coyle, 1998, for descriptions of some notable exceptions). An important next step for work in this area would be to extend basic research on forgiveness and gratitude, as well as cognitive psychotherapy research on forgiveness and gratitude to samples of individuals who are experiencing marked difficulties in the domains of mental, physical, or relational well-being.

Relationships can be a cause of great happiness and of great distress in clients' lives. Gratitude may help clients to savor the benefits that they receive from others, thereby extending the emotional benefits that people receive from their positive social interactions with others. On the other side of the social coin, forgiveness may help to minimize the negative consequences of interpersonal harm for people's health, well-being, and social relationships. It is our hope that cognitive psychotherapists and researchers will take advantage of the benefits these two positive psychological constructs can confer by more actively encouraging people to incorporate gratitude and forgiveness into the grammar of their lives and relationships.

References

- Affleck, G., Tennen, H., Croog, S., & Levine, S. (1987). Causal attributions, perceived benefits and morbidity after heart attack: An 8 year study. *Journal of Consulting and Clinical Psychology, 55*, 29-35.
- Al-Mabuk, R. H., Enright, R. D., & Cardis, P.A. (1995). Forgiving education with parentally deprived late adolescents. *Journal of Moral Education, 24*, 427-444.
- Aschleman, K. A. (1996). *Forgiveness as a resiliency factor in divorced or permanently separated families*. Unpublished master's thesis. Madison, WI: University of Wisconsin
- Bar-Tal, D., Bar-Zohar, Y., Greenberg, M. S., & Hermon, M. (1977). Reciprocity behavior in the relationship between donor and recipient and between harm-doer and victim. *Sociometry, 40*, 293-298.
- Batson, C. D. (1991). *The altruism question*. Hillsdale, NJ: Erlbaum.
- Baumeister, R., & Leary, M. (1995). The need to belong: Desire for interpersonal attachments as a fundamental human motivation. *Psychological Bulletin, 117*, 497-529.
- Bennett, L., Ross, M. W., & Sunderland, R. (1996). The relationship between recognition, rewards, and burnout in AIDS caregiving. *AIDS Care, 8*, 145-153.
- Bernstein, D. M., & Simmons, R. G. (1974). The adolescent kidney donor: The right to give. *American Journal of Psychiatry, 131*, 1338-1343.
- Berry, J. W., & Worthington, E. L., Jr. (2001). Forgiveness, relationship quality, stress while imagining relationship events, and physical and mental health. *Journal of Counseling Psychology, 48*, 447-455.
- Clark, D. A. (2001). The persistent problem of negative cognition in anxiety and depression: New perspectives and old controversies. *Behavior Therapy, 32*, 3-12.
- Clark, R. D. (1975). The effects of reinforcement, punishment and dependency on helping behavior. *Bulletin of Personality and Social Psychology, 1*, 596-599.
- Clark, H. B., Northrop, J. T., & Barkshire, C. T. (1988). The effects of contingent thank-you notes on case managers' visiting residential clients. *Education and Treatment of Children, 11*, 45-51.
- Coyle, C. T., & Enright, R. D. (1997). Forgiveness intervention with post-abortion men. *Journal of Consulting and Clinical Psychology, 65*, 1042-1046.
- Crowne, D. P., & Marlowe, D. (1960). A new scale of social desirability independent of psychopathology. *Journal of Consulting Psychology, 24*, 349-354.
- Deutsch, F. M., & Lamberti, D. M. (1986). Does social approval increase helping? *Personality and Social Psychology Bulletin, 12*, 149-157.
- Emmons, R. A., & McCullough, M.E. (2003a). Counting blessings versus burdens: An experimental investigation of gratitude and subjective well-being in daily life. *Journal of Personality and Social Psychology, 84*, 377-389.
- Emmons, R. A., & McCullough, M. E. (2003b; Eds.), *The psychology of gratitude*. New York: Oxford.
- Enright, R. D., & Coyle, C. (1998). Researching the process model of forgiveness within psychological interventions. In E. L. Worthington (Ed.), *Dimensions of Forgiveness* (pp. 139-161). Radnor, PA: Templeton Foundation Press.
- Fincham, F. D., & Beach, S. R. H. (2002). Forgiveness in marriage: Implications for psychological aggression and constructive communication. *Personal Relationships, 9*, 239-251.
- Fincham, F. D., Paleari, F. G., & Regalia, C. (2002). Forgiveness in marriage: The role of relationship quality, attributions, and empathy. *Personal Relationships, 9*, 27-37.
- Fredrickson, B. L. (1998). What good are positive emotions? *Review of General Psychology, 2*, 300-319.
- Goldman, M., Seever, M., & Seever, M. (1982). Social labeling and the foot-in-the-door effect. *Journal of Social Psychology, 117*, 19-23.
- Greenwald, D. F., & Harder, D. W. (1994). Sustaining fantasies and psychopathology in a normal sample. *Journal of Clinical Psychology, 50*, 707-710.

- Hedstrom, L.J. (1994). Morita and Naikan therapies: American applications. *Psychotherapy, 31*, 154-160.
- House, J. S., Landis, K. R., & Umberson, D. (1988). Social relationships and health. *Science, 241*, 540-545.
- Karremans, J. C., Van Lange, P. A. M., Ouwerkerk, J. W., & Kluwer, E. S. (2003). When forgiving enhances psychological well-being: The role of interpersonal commitment. *Journal of Personality and Social Psychology, 84*, 1011-1026.
- Khasky, A. D., & Smith, J. C. (1999). Stress, relaxation states and creativity. *Perceptual and Motor Skills, 88*, 409-416.
- Lawler, K. A., Younger, J. W., Piferi, R. L., Billington, E., Jobe, R., Edmondson, K., & Jones, W. H. (2003). A change of heart: Cardiovascular correlates of forgiveness in response to interpersonal conflict. *Journal of Behavioral Medicine, 26*, 373-393.
- Leahy, R. L. (2002). Cognitive therapy: Current problems and future directions. In R. L. Leahy and E. T. Dowd, (Eds.), *Clinical advances in cognitive psychotherapy* (p. 418-434). New York: Springer Publishing Company.
- McCraty, R., Atkinson, M., Tiller, W., Rein, G., & Watkins, A. (1995). The effects of emotion on short term power spectrum analysis on heart rate variability. *American Journal of Cardiology, 76*, 1089-1093.
- McCullough, M.E., Bellah, C.G., Kilpatrick, S.D., Johnson, J. L. (2001). Vengefulness: Relationships with forgiveness, rumination, well-being, and the Big Five. *Personality and Social Psychology Bulletin, 27*, 601-610.
- McCullough, M. E., Bono, G., & Root, L. M. (2005). *Rumination, affect, and forgiveness: Three longitudinal studies*. Unpublished manuscript.
- McCullough, M.E., Emmons, R.A., & Tsang, J. (2002). The grateful disposition: A conceptual and empirical topography. *Journal of Personality and Social Psychology, 82*, 112-127.
- McCullough, M. E., Fincham, F. D., & Tsang, J. (2003). Forgiveness, forbearance, and time: The temporal unfolding of transgression-related interpersonal motivations. *Journal of Personality and Social Psychology, 84*, 540-557.
- McCullough, M. E., Kilpatrick, S. D., Emmons, R. A., & Larson, D. (2001). Is gratitude a moral affect? *Psychological Bulletin, 127*, 249-266.
- McCullough, M.E., Rachal, K.C., Sandage, S.J., Worthington, E.L., Jr., Brown, S.W., & Hight, T.L. (1998). Interpersonal forgiving in close relationships. II: Theoretical elaboration and measurement. *Journal of Personality and Social Psychology, 75*, 1586-1603.
- McCullough, M.E., & Snyder, C.R. (2000). Classical sources of human strength: Revisiting an old home and building a new one. *Journal of Social and Clinical Psychology, 19*, 1-10.
- McCullough, M. E., & Worthington, E. L., Jr. (1999). Religion and the forgiving personality. *Journal of Personality, 67*, 1141-1164.
- McCullough, M. E., Worthington, E. L., & Rachal, K. C. (1997). Interpersonal forgiving in close relationships. *Journal of Personality and Social Psychology, 73*, 321-336.
- McGovern, L. P., Ditzian, J. L., & Taylor, S. P. (1975). The effect of positive reinforcement on helping with cost. *Psychonomic Society Bulletin, 5*, 421-423.
- Miller, T. Q., Smith, T. W., Turner, C. W., Guijarro, M. L., & Hallet, A. J. (1996). A meta-analytic review of research on hostility and physical health. *Psychological Bulletin, 119*, 322-348.
- Moss, M. K., & Page, R. A. (1972). Reinforcement and helping behavior. *Journal of Applied Social Psychology, 2*, 360-371.
- Myers, D., & Diener, E. (1995). Who is happy? *Psychological Science, 6*, 10-19.
- Nelson, M. K. (1993). *A new theory of forgiveness*. Unpublished doctoral dissertation, Purdue University, West Lafayette, IN.
- Newman, C. F. (2002). Hypotheticals in cognitive psychotherapy: Creative questions, novel answers, and therapeutic change. In R. L. Leahy and E. T. Dowd, (Eds.), *Clinical advances in cognitive psychotherapy* (p. 311-324). New York: Springer Publishing Company.
- Nolen-Hoeksema, S. (1998). The other end of the continuum: The costs of rumination. *Psychological Inquiry, 9*, 216-219
- Nolen-Hoeksema, S., Harrell, Z. A. (2002). Rumination, depression, and alcohol use: Tests of gender differences. *Journal of Cognitive Psychotherapy, 16*, 391-403.
- Okamoto, S., & Robinson, W. P. (1997). Determinants of gratitude expressions in England. *Journal of Language and Social Psychology, 16*, 411-433.
- Poloma, M.M., & Gallup, G.H. (1991). *Varieties of prayer*. Philadelphia: Trinity Press International.
- Rackley, J. V. (1993). *The relationships of marital satisfaction, forgiveness, and religiosity*. Unpublished doctoral dissertation, Virginia Polytechnic Institute and State University, Blacksburg, VA.

- Reynolds, D.K. (1983). *Naikan psychotherapy: Meditation for self-development*. Chicago: University of Chicago Press.
- Rose, A. J., & Asher, S. R. (1999). Children's goals and strategies in response to conflicts within a friendship. *Developmental Psychology, 35*, 69-79.
- Rusting, C. L., Nolen-Hoeksema, S. (1998). Regulating responses to anger: Effects of rumination and distraction on angry mood. *Journal of Personality and Social Psychology, 74*, 790-803.
- Seligman, M. E. P., Csikszentmihalyi, M. (2000). Positive Psychology: An introduction. *American Psychologist, 35*, 5-14.
- Taylor, E. (2001). Positive psychology and humanistic psychology: A reply to Seligman. *Journal of Humanistic Psychology, 41*, 13-29.
- Tennen, H., & Affleck, G. (1990). Blaming others for threatening events. *Psychological Bulletin, 108*, 209-232.
- Tesser, A., Gatewood, R., & Driver, M. (1968). Some determinants of gratitude. *Journal of Personality and Social Psychology, 9*, 233-236.
- Shapiro, S. L., Schwartz, G. E. R., & Santerre, C. (2002). Meditation and positive psychology. In C. R. Snyder, S. J. Lopez (Eds). *Handbook of Positive Psychology* (pp. 632-645). London: Oxford University Press.
- Stone, J., Wiegand, A., Cooper, J., & Aronson, E. (1997). When exemplification fails: Hypocrisy and the motive for self-integrity. *Journal of Personality and Social Psychology, 72*, 54-65.
- Takaku, S. (2001). The effects of apology and perspective taking on interpersonal forgiveness: A dissonance-attribution model of interpersonal forgiveness. *Journal of Social Psychology, 141*, 494-508.
- Thoresen, C. E., Harris, A. H. S., & Lusk, F. (2000). In M.E. McCullough, K.I. Pargament, and C.E. Thoresen (Eds.), *Forgiveness: Theory, research, and practice* (pp. 254-280). New York: Guilford Press.
- Watkins, P. C., Woodward, K. Stone, T., & Kolts, R. L. (2003). Gratitude and happiness: Development of a measure of gratitude, and relationships with subjective well-being. *Social Behavior and Personality, 31*, 431-452.
- Weiner, B. (1986). *An attribution theory of motivation and emotion*. New York: Springer-Verlag.
- Weiner, B., Graham, S., Peter, O., & Zmuidinas, M. (1991). Public confession and forgiveness. *Journal of Personality, 59*, 281-312.
- Weiner, B., Russell, D., & Lerman, D. (1979). The cognition-emotion process in achievement-related contexts. *Journal of Personality and Social Psychology, 37*, 1211-1220.
- Williams, R., & Williams, V. (1993). *Anger kills: Seventeen strategies for controlling the hostility that can harm your health*. New York: Harper Perennial.
- Witvliet, C. V., Ludwig, T. E., & Bauer, D. J. (2002). Please forgive me: Transgressors' emotions and physiology during imagery of seeking forgiveness and victim responses. *Journal of Psychology and Christianity, 21*, 219-233.
- Witvliet, C.V., Ludwig, T., & Vander Laan, K. (2001). Granting forgiveness or harboring grudges: Implications for emotion, physiology, and health. *Psychological Science, 12*, 117-123.
- Woodman, T. (1991). The role of forgiveness in marital adjustment. *Unpublished doctoral dissertation, Pasadena, CA: Fuller Graduate School of Psychology*.
- Woodward, K. M., Moua, G. K., & Watkins, P. C. (1998, April). *Depressed individuals show less gratitude*. Presentation at the 1998 joint convention of the Western Psychological Association and the Rocky Mountain Psychological Association, Albuquerque, NM.
- Worthington, E. L., Sandage, S. J., & Berry, J. W. (2000). Group interventions to promote forgiveness: What researchers and clinicians ought to know. In M.E. McCullough, K.I. Pargament, & C.E. Thoresen (Eds.) *Forgiveness: Theory, research, and practice* (pp. 228-253). New York: Guilford Press.
- Zaleski, Z. (1988). Attributions and emotions related to future goal attainment. *Journal of Educational Psychology, 80*, 563-568.
- Zechmeister, J. S., & Romero, C. (2002). Victim and offender accounts of interpersonal conflict: Autobiographical narratives of forgiveness and unforgiveness. *Journal of Personality and Social Psychology, 82*, 675-68

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