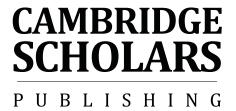# Interdisciplinary Analyses of Terrorism and Political Aggression

Interdisciplinary Analyses of Terrorism and Political Aggression

Edited by

Daniel Antonius, Adam D. Brown, Tali K. Walters, J. Martin Ramirez and Samuel Justin Sinclair

**CAMBRIDGE
SCHOLARS**

P U B L I S H I N G

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FOREWORD

In 2006, Coloquios Internacionales sobre Cerebro y Agresión (CICA) and the Society for Terrorism Research (STR) joined forces to further their goals of bringing together researchers and thought leaders in the field of terrorism research to share their ideas, learn from each other, and collaborate across nationalities and specializations. The leaders of these organizations – J. Martin Ramirez and Samuel Justin Sinclair – knew that the effort to understand terrorism, with the goal of reducing the incidents and their impact, must be international and multidisciplinary.

CICA had 25 years of experience bringing together researchers throughout the world in the field of aggression. In 1986, CICA created the Seville Statement of Violence, endorsed by the General Conference of UNESCO. In 2006, STR was formed from the recognition of the need for a non-partisan organization that could promote the study of terrorism and political violence, and disseminate new information across disciplines throughout the world.

In 2007, CICA and STR together invited a group of researchers, theoreticians, practitioners, and interested individuals from around the world and across disciplines to meet in Miraflores de la Sierra, Spain to share their research and ideas, to learn from each other's knowledge and experience, and influence future directions in the study of terrorism. This conference on the Interdisciplinary Analysis of Aggression and Terrorism provided the foundation for the ideas and information found in the chapters contained within this book.

These ideas have evolved and been further refined through subsequent international meetings and collaborations. In July 2008, the Polish Association of Social Psychology joined CICA and STR to host an international conference on Aggression, Terrorism, and Human Rights in Zakopane, Poland. In January 2009, the Society for Terrorism Research launched its international, interdisciplinary journal *Behavioral Sciences of Terrorism and Political Aggression*. In September 2009, the Social and Policy Research Institute (SPRI) at the University of Ulster, together with CICA and STR, hosted a conference on Political Violence and Collective Aggression: Considering the Past, Imagining the Future in Belfast, Northern Ireland.

We hope that you will find inspiration from the ideas and information in this book; inspiration to expand your exploration of terrorism and political violence beyond the frequently encountered discipline and geographic constraints, to join with your international colleagues across disciplines in the effort to eliminate terrorism.

Tali K. Walters and J. Martin Ramirez

PREFACE

Over the past decade, research on terrorism and political violence has increased quite dramatically, and has lead to numerous theoretical and empirical articles, books, and other texts spanning the various academic disciplines. This new focus of scholarly activity has undoubtedly contributed to our evolution in understanding the complexity of factors involved with terrorism, as well as improved our general awareness of this issue that affects so many people around the world.

Interestingly, despite contributions from most major academic disciplines, there have been few attempts to provide an interdisciplinary approach to the field of research on terrorism and political violence until more recently. That is, there have been few vehicles that have focused on bringing together scholars from different academic and/or government/non-government backgrounds in order to disseminate a more complete, and perhaps more valuable, view of the field. In the last couple of years, several academic journals have been founded under the primary objective of providing an interdisciplinary perspective to the field of terrorism research, including the Society for Terrorism Research's (STR) flagship journal, *Behavioral Sciences of Terrorism and Political Aggression*. That being said, few books have emerged that comprehensively review the research on terrorism and political aggression from an interdisciplinary perspective.

The idea for the collection of papers presented in this book emerged from the Coloquios Internacionales sobre Cerebro y Agresión (CICA) and STR's inaugural conference in Spain, 2007, where more than 80 scholars representing 28 countries and a variety of academic (and other) disciplines presented and discussed their empirical and theoretical research. The main goal of the conference was to initiate the process of integrating the research on terrorism *across* disciplines and societies/cultures, for purposes of generating a more complex understanding of the myriad of factors contributing to terrorism. With this objective in mind, and given the success of the conference, we decided to produce this volume as a means of furthering the above stated mission of disseminating an international and interdisciplinary science focused on terrorism and political violence.

The book you are sitting with is the culmination of these efforts. It is a volume that brings together such academic disciplines as criminology, psychology, psychiatry, police science, physics, sociology, biology, and international relations. More so, the various chapters also draw from a diverse group of international scholars representing the United States of America, England, Iran, Australia, Canada, Scotland, Poland, Bulgaria, Italy, and Spain. This eclectic cast of authors approaches the topic of terrorism from various angles, and provides the reader with a more nuanced view on issues of terrorism and political violence.

The first two chapters are both based on the extensive research literature on human aggressive and violent behavior. As aggression, whether physical or verbal, often play a significant role in terroristic acts, these two chapters provide the reader with a conceptual background for understanding issues of terrorism. Huesmann begins with a discussion of the possible make-up of individuals more likely to engage in terroristic behavior in the context of what we know about aggression more broadly defined. Based on his extensive research in developmental psychology and aggressive behavior, Huesmann presents a theoretical framework for understanding the factors involved in the development of terrorist behavior. Expanding on this, in Chapter Two Maile and colleagues offer further knowledge about the role of aggression and violent behavior in terrorism. Their chapter examines terroristic behavior from the perspective of aggression typology, and they discuss the short-comings of using traditional aggression classification schemes to describe violent behavior seen in terrorism contexts. Maile and colleagues also offer insights into the potential influence of personality characteristics and psychopathology on terroristic behavior.

In the following three chapters, the concept of fear and threat as important constructs within terrorism are addressed and discussed from various perspectives. In Chapter Three, Vail and colleagues use Terror Management Theory to explain how existential fear may intensify the drive towards radical causes, such as terrorism, in an attempt to achieve symbolic immortality. Related to this, Kossowska and colleagues examine in their chapter the psychological factors involved in the experience of threat and the social consequences when threat is related to terrorism specifically. In Chapter Five, Sinclair offers his insights into the impact of the ongoing *threat* of terrorism, and the ways in which people are affected as a function of anticipatory fears about future terrorism. Sinclair's chapter also presents empirical and theoretical models for understanding the psychological impact of prospective terrorism fears.

That terrorism or the threat of such acts may affect cognition and memory is hardly surprising given the significant relationship between aggression and fear. This subject matter is the central topic of Chapter Six, in which Brown and colleagues, drawing from their research experiences in the cognitive sciences, investigate how social information (e.g., media, conversations, social identity and expectations) encountered during terrorist attacks may impact memory.

In the next three chapters, Bux, Stein, and Roberts separately and with different approaches discuss the controversial topic of profiling of terrorist suspects. Bux' chapter provides the reader with a sound introduction to the troubles of using profiling as a tool to determine who are more likely to become terrorists. He examines current theories on profiling, and puts forward an alternative approach based on "grounded theory." In Chapter Eight, Stein briefly examines religious terrorism and offers suggestions of how traditional violence risk assessment can be used to potentially evaluate risk of terrorist attack by suspects. In the following chapter, Roberts discusses the distinction between *needing to obtain information* versus *ethical interviewing* of Islamist terror suspects.

Related to the topic of profiling, in Chapter Ten Dronzina examines social, organizational and individual level factors that underlie female bombers in Chechnya. Using her extensive knowledge on the topic, Dronzina presents a short synopsis of the conflict and offers some further insight into these female bombers.

Velarde and Carpintero-Santamaría give the reader a view of the present challenges of chemical, biological, radiological, and nuclear (CBRN) weapons and the threats posed by non-state actors and international terrorist organizations. Their chapter focuses particularly on the challenges for the "global security" to contain weapons of mass destruction. Extending on this, Calogero examines in Chapter Twelve the risk of nuclear catastrophes and how to intervene, manage, and minimize the risk of such potential devastating attacks. In the final chapter, Parker conceptualizes the relatively new field of cyberterrorism and the challenges that may lie ahead in this area.

We would like to acknowledge the marvelous support we have received from all of the authors during the process of putting this book together. This has been a time-consuming and laborious process, and we thus want to thank all of the contributors for their patience and general enthusiasm for the project. It should also be mentioned that although the final text has been subject to several phases of editing, due in part to the international constellation of authors, we have purposely tried preserve as much as possible of the authors' original texts, in an attempt to preserve

the essential meanings of their work. It is our hope that the meaningful relationship we have developed with all of the authors during the process of putting this book together, as well as the extensive work each one of the authors has put into preparing their individual chapters, is reflected in the quality of this final product.

Lastly, we want to thank Society for Terrorism Research (STR) and Coloquios Internacionales sobre Cerebro y Agresión (CICA), as well as our respective academic institutions for their support in this endeavor (Antonius: New York University School of Medicine/Institute for Social and Psychiatric Initiatives (*InSPIRES*); Brown: Weill Medical College of Cornell University; Walters: Tufts Medical School; Ramirez: Universidad Complutense and Kennedy School of Government at Harvard University; Sinclair: Massachusetts General Hospital and Harvard Medical School). We would also like to thank Leilani Khlopin and Alexandra Peters, Sarah Lawrence College, for help in editing early versions of the chapters.

Sincerely,
Daniel Antonius
Adam D. Brown
Tali K. Walters
J. Martin Ramirez
Samuel Justin Sinclair

CHAPTER ONE

HOW TO GROW A TERRORIST
WITHOUT REALLY TRYING:
THE PSYCHOLOGICAL DEVELOPMENT
OF TERRORISTS FROM CHILDHOOD
TO ADULTHOOD[*]

L. ROWELL HUESMANN

Abstract: While significant research has accumulated about the developmental psychology of aggressive and violent behavior, few attempts have been made to apply this research to understanding what makes a terrorist. In fact, some have argued that "terrorists are just like you and me" psychologically. However, certain patterns of development predispose some individuals to be more at risk for engaging in terrorism. The proximate causes of the act may be the individual's recent political and personal frustrations, mood, and the social-organizational pressures on the individual, but five more enduring psychological characteristics predispose some youth to be more susceptible to these forces: 1) having a more narcissistic sense of entitlement and need for admiration, 2) experiencing intense continuing negative feelings of frustration, rage, and dysphoria; 3) having a low baseline level of arousal and experiencing little negative emotional reaction to violence; 4) holding beliefs that the world is a "mean" hostile place; and 5) possessing normative beliefs – religious or secular – that the proposed terrorist act is "right." These characteristics are likely to be learned naturally in many youth in the deprived, repressive, unjust, and violent environments in which they grow up. These processes mold individuals to the point where they are susceptible to the situational,

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organizational, and peer forces that are more proximate stimuli for the terrorist act.

Although terrorism is a topic of primary importance today to civilized societies, there is an unfortunate dearth of empirical research concerning the kinds of individuals that are more likely to commit terrorist acts. Of course, this is a different and much narrower question than the broader question of what causes terrorism. This is a question about whether there are individual differences in tendencies or probabilities to behave in a certain way, and, if so, what they are.

It is not surprising that until recently little empirical research has been done to evaluate this question. Terrorists are hard to find, don't want to be studied, and are likely to deceive when studied. And then there are the ethical issues that may lead Institutional Review Boards to ban various empirical approaches.

The sparse research that has been done suggests that situational factors, peer-groups, and organizational psychological processes play an important role in channeling young people into terrorist acts while individual socio-economic factors do not (Atran, 2008; Merari & Friedland, 1985; Post, 2009). Certainly, the political oppression of an in-group with whom one identifies coupled with one's economic deprivation relative to an out-group stimulates the anger that sets the stage for revolts against the ruling out-group. Associations with other like-minded in-group peers and segregation from out-group peers promote group cohesion and a desire to act for the in-group. If the leaders of the revolt create the appropriate organizational mechanisms, they can channel the anger of youth into terrorist acts by attending to certain well developed psychological principles (e.g., make participation appear to be highly selective and honorific, cement in-group cohesion, demand public commitment which will make disengagement difficult and enhance self-beliefs in the cause, place the individual on a track with no choice points). Still, some individuals are more susceptible to jumping into this net and following the path to the terrorist act. The question of interest is "what characterizes these more susceptible individuals?"

While significant research has accumulated over the past century about the developmental psychology of aggressive and violent behavior, few attempts have been made to apply this research to understanding what makes a terrorist. Not surprisingly, few empirical studies have been conducted of terrorist subjects (Merari & Friedland, 1985; Atran, 2008)

and even fewer of suicide terrorists. The research that has been done suggests that terrorists are seldom psychotic and that situational factors, peer-relations, and organizational psychology play an important role (Atran, 2006; Atran, 2008). As a result some have concluded that there are no distinguishing psychological characteristics – that terrorists are psychologically "just like you and me" (Atran, 2004). The fact is, however, that the failure to reject a null hypothesis of no difference with such sparse data should not and would not be taken as evidence that there really are no differences.

The large existing body of literature about the social-developmental psychology of aggressive and violent behavior shows that people who commit violent acts are not "just like you and me." The psychological theory that has evolved to explain the development of aggressive and violent individuals in general can shed light on who might be most at risk to engage in personal violence or political terrorism. In this chapter I try to do that, not by presenting new empirical data, but by applying existing theory and supporting data on what makes children grow up to be violent to the question of "how do children grow up to be terrorists." The aim is to understand how individuals can deliberately, intentionally, and without remorse commit acts designed to kill scores of very innocent children, women, and men who have never directly done them any harm. Regardless of whether such behavior is instrumentally motivated by supposed political ends, by monetary gains, or by other intangible gains, such behavior is not normal in the adult human. How then can it happen as frequently as it seems to have happened throughout history?

Situation and Person

Let me begin by pointing out a fundamental lesson derived from decades of research on aggressive and violent behavior. Every violent act is the product of the impact on the perpetrator of situational factors proximal in time to the act and within person factors that have developed over time in that individual. These within-person factors in turn are the products of innate predispositions and socialization experiences dependent on the environmental context in which the person grew up. So your hitting another person in the face may be the product of that person insulting you (a proximal situational factor) and your personal tendency to respond to provocations. That personal tendency in turn may be a result of your innate impulsivity and how you have been socialized about retaliation.

This is not rocket science. These are very simple basic principles of psychology. Yet all too often they are lost in the media hype that

surrounds violence and terrorism. The mass media and many otherwise intelligent science writers always want a nice sound byte explanation of why people kill. Where is the smoking psychological gun? The terrorist must have been abused as a child, right? The terrorist must have had a traumatic experience – perhaps seeing a relative killed, right?

Well, yes, some terrorists were abused as children and some terrorists saw relatives killed, but many did not. What is more likely to be true is that most grew up in ways that according to what we know about aggression placed them a little more at risk for behaving aggressively and that according to what we know about social influence placed them a little more at risk of being influenced by impulsive peer-groups or of being manipulated by charismatic individuals who have a political agenda that involves violence. When the situation was right, most were then seduced into committing their murderous acts by these political parent figures who understood the principles of manipulating others behaviors through social influence. What little data has been collected on failed terrorists supports this view, I think.

For example, Barber (2008) traced Palestinian youths' identity development to a history of ''personal, harsh, and debasing experiences they had with violence'' (p. 306). From childhood on, Barber described ''compelling meaning systems'' that influenced identity development: ''history, as it grounded the struggle in its past iterations; politics, as it gave substance to the nationalistic goals of the struggle; culture, as it collected all segments of the society together in a duty-bound resistance to perceived violations of dignity and rights…the Palestinians knew, and valued, who they were because of the abundant information that defined them'' (p. 306). Barber argues that this is a way these kids develop a strong ideology that may protect them against anxiety and depression, but an ideology, I am arguing, that makes behaving violently (particularly toward the out-group) seem more acceptable to them.

Contrary to what some in the popular press would like to believe, research shows that there are seldom single predisposing or precipitating factors that turn otherwise normal children into terrorists. Children grow up to be terrorists when there is a convergence of many predisposing and precipitating factors. Certain background characteristics, patterns of development, and socialization experiences predispose some youth to be more at risk than others for committing acts of terrorism. The proximate causes of the act may be situational factors and social-organizational pressures, but I propose that at least five psychological characteristics predispose some youth to be more at risk than others for engaging in

violent terrorist acts. Each of these has empirical support which I will outline later.

First, youth are more at risk who have narcissistic senses of entitlement and needs for recognition. They both become more angry when their sense of entitlement is threatened, and they are more easily swayed by the promise of heroic recognition. Second, youth who are characteristically more angry or dysphoric should be more at risk. The anger and sadness may stem both from personal issues and political perceptions. But we know that those who "feel" bad are more likely to "act" bad. Third, youth who have lower baseline levels of emotional arousal and do not react emotionally to observing violence are at greater risk. They simply don't "feel" that bad about what they do to innocents. Fourth, youth are at greater risk who hold more negative cognitive schemas about the world including believing that the world (or at least part of the world) is a "mean" place where hostile, evil forces thrive. Finally, youth are more at risk who have acquired normative beliefs – religious or secular – that terrorist acts are "right" and justified.

Unfortunately, I believe that these characteristics, which I will shortly describe in more detail, are likely to be acquired naturally through socialization and learning by many youth in the deprived, repressive, unjust, and violent environments in which they grow up. Some children, with certain innate predispositions, may be more susceptible to acquire these characteristics, but socialization processes can move most children in these directions.

What I am arguing is that those who become terrorists tend to grow up in ways that, according to what we know about violent behavior, would place them a little more at risk for behaving violently in general. Such children may appear quite normal under normal circumstances. However, when the situational factors then converge to promote terrorism, they behave as terrorists. At that point an important situational factor for many is the organizational processes to which they are exposed to social influence by other peers or by charismatic terrorist leaders who know how to manipulate them toward their own goals.

Social Influence

The importance of the immediate social context and the social influence process in most acts of mass violence against relative innocents cannot be underestimated. Whether it is a nation's designated leaders indoctrinating its patriotic soldiers to the necessity of mass bombing of enemy cities or it is the self-appointed leader of a power-seeking splinter

group indoctrinating its followers to the necessity of killing innocent members of its perceived repressors, the indoctrination process is central to most acts of mass violence.

However, I am not going to write extensively about this social influence process that ensnares these at risk individuals and points them down the highway to their violent act. Merari (2002) and others have documented this process well. The potential violent perpetrator, most often an impressionable youth who has expressed a public desire to act, is offered a chance to prove him or herself worthy of serving the "cause." The terroristic act is given a positive name – becoming a martyr. Acceptance is made to seem to be a special honor and a test to be passed. The recruit must publicly volunteer, but is often required to "think about it first" and come back to volunteer, heightening both the value of the goal and the commitment of the volunteering act. Yet the situation is manipulated so not volunteering is almost impossible socially. When this process is repeated enough, it requires little action to continue it. It becomes a self-perpetuating process that subsets of society promote without even being aware of it.

In the Second World War potential Kamikaze pilots were brought together in a group and told that only those who volunteered could possibly be considered for acceptance in this sacred task; however, it was made very difficult not to volunteer. Those who did NOT want to volunteer were asked to step forward. In Palestine, suicide bomber recruits are asked to volunteer in a similar way in groups where not volunteering will bring derision. When everyone in the group pledges to each other to die killing the target people, a failure to act then becomes an act of betrayal to one's peers. Withdrawal of the commitment once made is not allowed and is not a possibility socially. It is reinforced by the standard social-psychological persuasive influence tactic of having the recruits make their commitment on videotape and watch the videotape themselves. Such public commitments have long been known to be one of the most powerful attitude change techniques available to reinforce one's belief in what one is doing and to insure compliance (Cialdini, 2001).

Not All Youth Can Be Influenced To Violence

All of these are standard social-influence techniques well-grounded in psychological science. But many individuals do not let themselves be recruited to kill innocents as soon as they realize what act is intended. Some, who are recruited initially, quickly balk. And some who are indoctrinated do not carry out the act anyway. The same was true in

Hitler's Germany and it was even true in the Western democracies during the Second World War. Not every air force officer was willing to be a party to incinerating thousands of women and children in Germany and Japan with urban carpet bombing.

In the rest of this chapter I want to draw from the accumulated research on aggressive and violent behavior to address two questions related to these very important individual differences: (1) What are the situational factors that make it more or less likely that young men and women will succumb to social pressures or leaders' urgings to commit violent acts against innocent individuals, and; (2) What are the predisposing characteristics of the young men and women who are most likely to carry out violent acts against innocent individuals when urged to do so for political reasons?

In this discussion it is important to remember that a predisposing factor is *neither a necessary nor a sufficient* condition for a behavior to occur. Additionally, because situation and person INTERACT to produce behavior, there can be little doubt that almost anyone can be motivated to violence against innocents in sufficiently extreme situations; and there can be little doubt that some people will behave violently against innocents in almost any situation. It is the product of situation and person that is determinant.

Social-Cognitive-Emotional Process Model

To explicate this process in more detail, I need to turn to the emerging unified process-model that is gaining acceptance among social-cognitive theorists as a way to understand the commission of aggressive/violent acts. While three specific models have been proposed respectively by Anderson and Bushman (2002), Dodge (1986), and Huesmann (1988, 1998), these models all adopt similar premises about the processing of information in social problem solving, the social-cognitive structures involved, the interacting role of emotions and cognitions, and the interaction of person and situation. These models have provided for a coherent framework to think theoretically about aggression, and have also stimulated substantial research. They now can guide us in understanding the situations that make political violence against innocents most likely and in understanding which persons are most likely to commit the violent acts.

These models begin with the assumption that human memory can be represented as a complex associative network of nodes representing cognitive concepts and emotions. Experience leads to the development of links

among elemental nodes. Sets of concepts that are strongly interconnected are known as knowledge structures. If these concepts are relevant to social behavior, we call them social cognitions. The activation of a simple node or a more complex knowledge structure or emotion at any time is determined by how many links to it have been activated as well as the strength of associations among the activated links. When total activation is above threshold, the knowledge structure or emotion is activated and "experienced." It is given its "meaning" by the nodes with which it is linked that are activated when it is activated. Partial, sub-threshold activation of a node by a stimulus is what is called "priming."

It is important to realize that "activated" does not mean entering conscious awareness. Research over the years has shown that social cognitions (attitudes, beliefs, schemas, biases, scripts) have profound automatic effects on thinking and behavior of which a person may be completely unaware (Bargh & Chartrand, 1999). Information-processing models specify sequences of processes that occur in the brain, but they do not assume that individuals are "aware" of this processing.

Research has suggested that three social cognitions are particularly important in explaining individual and situational differences in the likelihood of violent behavior:

(1) *The world schemas* that the individual has encoded to represent the world. For example, is it a mean world or a nice world? These influence the attributions the individual makes about external events. Are others' actions hostile or benign, for example?

(2) *The repertoire of social scripts* that an individual has encoded. What do we mean by a script? We mean a sequence of conditions, behaviors, and expected outcomes that can serve as a program for a sequence of social behaviors. Does the repertoire include mostly aggressive and violent programs for dealing with social problems, or are other programs encoded?

(3) *The normative beliefs* an individual has encoded about what kinds of social scripts are appropriate and acceptable. Is violent behavior thought to be acceptable?

What determines what world schemas, social scripts, or normative beliefs most influence behavior at any time? Of course, no cognition can be activated unless it has been encoded. Among the encoded cognitions those most strongly linked in the past to the individual's *current emotional*

state and to the *current situational cues* will experience the greatest increase in activation. The sum of this activation and residual activation from very recent experiences will determine which social cognitions and emotions dominate. While this theory is usually called a social-cognitive theory, it could just as easily be called a social-cognitive-emotional theory. The links between encoded cognitive structures – scripts, schemas, and beliefs – and emotional responses are critical in determining what cognitions are activated most highly.

This model also explains different characteristic forms of violent behavior. One important distinction between different types of violence is whether the act is "reactive-hostile-emotional" or "proactive-instrumental (Berkowitz, 1993; Dodge & Coie, 1987). Within the described framework, reactive-emotional aggression is driven by strong emotional responses coupled with hostile world perceptions, primed scripts for aggressive behavior, and normative beliefs accepting violence. Proactive-instrumental aggression, on the other hand, is driven by strong orientations toward achieving a desirable goal but little emotional reactivity, coupled again with hostile world schemas, primed scripts for aggressive behavior and normative beliefs accepting violence (Huesmann, 1998). Aggressive behaviors are often not purely one type or the other, but represent some combination of the process. Furthermore, some common process deficits (e.g., low inhibitory control, hostile beliefs toward others) may increase the chances of either type of aggressive behavior. However, different individuals may well be predisposed more toward one type or the other. For example, some neuroscientists have hypothesized that frontal lobe processes are involved more with proactive non-emotional aggression while limbic system processes are involved more with reactive-hostile aggression.

Most acts of terror that involve long-term planning would seem to fall more on the proactive-instrumental side of this distinction. Planners of acts of terror would certainly seem to be acting proactively and non-emotionally. It is less clear with the "foot soldiers." They may well be acting more reactively in response to their emotional feelings. Of course, the clever planner can take advantage of this fact to manipulate the foot soldier into doing what the planner wants. However, at the same time the foot soldier who is behaving reactively may change his/her mind at the last minute (if it is possible) as his/her hostile-reactive emotions diminish. The case study I present later reflects this kind of situation.

How a Terrorist Decides to Act

To illustrate the role of these social cognitions, imagine what happens when a potential young terrorist is faced with a decision on whether to act? The same process operates as operates for any other social problem.

To begin with, that person's current emotional state primes world schemas, scripts, and beliefs that in the past have been linked to this emotional state. For example, negative, sad, and angry emotions raise the activation level of encoded mean world schemas. Scripts emphasizing violence and death are also more likely to be primed by negative emotions.

These emotional primings are then complemented by the effect of situational cues in priming specific cognitions related to violence and in priming additional emotions. For example, even a momentary exposure to a smiling person may dampen the effect of the negative emotions in priming violent thoughts, while the sight of a gun may directly enhance the priming of violent thoughts.

These primed cognitions and emotions then serve as input to an attributional process aimed at interpreting the situation. For example, the youth makes attributions about the meaning the situation to which he or she is exposed and these attributions depend critically on his or her currently activated world schemas. We know that attribution of hostile intent, whether correct or incorrect, is a frequent precursor of aggressive violent acts. The youth who perceives the world as a mean place and who is in a very bad mood may attribute hostility even to the most innocent acts of children and women of another ethnic group. This is all the easier if the youth has a distorted schema of the other group that enables him to "dehumanize" them. Derogatory names for the other group and segregation from the other group promote such dehumanization and make hostile attributions more likely.

In the next stage the youth must select a script to guide his behavior. The same negative emotions and situational cues that primed mean world schemas are likely to prime violent scripts. And the hostile attributions resulting from the initial processing of the situational cues will make the priming of aggressive scripts even stronger. At the same time the youth's mood may be turning more negative due to the hostile attributions he has made. This increases even more the likelihood that a violent script will be activated.

Finally we come to perhaps the most important stage for understanding differences in the propensity to commit violent acts against innocents – the script evaluation stage. The script is considered and evaluated in light of

the normative beliefs the individual holds and the expected outcome from the script. Normative beliefs are both moral prescripts and practical filters for behavior. If one's normative beliefs are that violence against children is unacceptable, a retrieved script for violence against children will be rejected. Again, this evaluation is not only a cognitive process but an emotional process. Even if the script does not violate a normative belief, it may be rejected because it "feels bad." The emotional tone linked to the expected outcome of a script is activated when the script is activated and the outcome is imagined. That emotional value is combined with the cognitive value of the outcome for a total evaluative value. If it is not sufficiently positive, the script will not be employed.

Situational Influences

This model explains some well known data about situational influences on human aggressive and violent behavior. For example, a principle well established by Berkowitz and others is that "when we feel bad, we are more likely to act bad" (Berkowitz, 1993). It does not matter much what makes us feel bad, and the bad feeling does not have to start out being anger. Any negative emotion – sadness, fear, anger – can increase the chances that we will behave aggressively. It follows that aversive situations, regardless of whether they are frustrating, depressing, or angering, make violent acts more likely. Why? Because the "bad feelings" are linked to violent scripts and hostile world schemas. Thus, "bad feelings" prime violent scripts and hostile world schemas which make a violent act more likely according to our model. Thus, the daily environments of many young terrorists in which aversive stimulation is constant are ideal situations for increasing the risk of violent behavior.

A second well known situational fact about human aggression is that when we are sufficiently provoked, we "enjoy" hurting others (Baron, 1977). While unprovoked persons will halt actions that they learn are hurting others, the highly provoked person will increase behaviors that they learn are really hurting others. Hurting others is rewarding in such situations. Thus the perception of hostile intent in innocent others or *those who care deeply about the innocent others* becomes vital because it becomes the provocation that makes hurting the innocent others rewarding. The youth whose mean world schema is activated and who attributes hostile intent and provocation to innocent others or, more likely, to those who care deeply about those others can "enjoy" hurting the innocent others. Hurting them will hurt those who have provoked the

terrorist. That is why killing innocent women and children can truly be rewarding to a terrorist.

Predisposing Personal Factors

But even when situational factors converge to promote political violence, some or perhaps even most youth do not behave violently. Our social-cognitive-emotional model also provides a guide to person differences that promote violent behavior and how these differences likely develop. What characteristics should a youth have or acquire to make him/her most at risk for being manipulated into these violent acts? How can we "grow a good terrorist"? Well, as the title of this essay suggested, we do not need to try very hard to create the conditions in which this can happen.

To begin with, our model suggests that youth with more narcissistic senses of entitlement and need for recognition will be more likely to engage in terrorist acts. Why? For two reasons. First, when their in-group is oppressed or attacked, it affects them more severely and generates more anger because it threatens their 'sense of entitlement' (Baumeister, et al., 1996). Second, the outcome expectancy of adulation for being a "*shahid (martyr)*" is particularly attractive to such a person. How do more narcissistic personalities develop? Within the psychological community there are disputes about the origin; however, it is generally agreed that over indulgence and overvaluation by parents and admiration that is unbalanced with realistic feedback may contribute. These are not parenting characteristics particularly associated with raising children in areas of conflict, but they may be made more likely when parents fear for their children's survival.

Second, individuals who may not have a particularly high sense of entitlement but generally feel frustrated, irritated, or sad will be more at risk. As I described above when discussing situational influences, when one feels "bad," one tends to act "bad" (Berkowitz, 1993). Thus individuals who are characteristically depressed or irritated are ripe to respond to situational stimuli with more aggressive and violent responses.

Third, individuals with low arousal and little negative emotional reaction to violence will be more likely to kill innocent people without much remorse. Every potential script must go through an evaluative filtering process, and this process includes imagining the outcome of the script and its emotional tone. If the activated emotional arousal is intense, negative and aversive, the script is much less likely to be employed. In fact, there is now a significant body of research by Raine, Venables, and

Williams (1990), Farrington (1997), and others showing that *youth with lower baseline arousal* are in fact more likely to behave violently. Furthermore, there is recent evidence that those youth *who show less negative arousal to observing blood, gore, and violence* are more likely to behave aggressively (Kirwil, 2002; Moise-Titus, 1999).

How are such people created? Innate abnormalities in arousal systems may undoubtedly predispose some individuals in this direction. Those who are extreme on this dimension are known as psychopaths or sociopaths. However, there are gradations in the tendency to experience negative emotional arousal to thoughts of violence, blood, and gore. More important than innate differences in the case of many young potential terrorists may be childhoods that include *overwhelming exposure to blood, gore, and violence* in their communities, among their friends and family, and even in the mass media they see. They become habituated (desensitized) through repeated exposures and these stimuli no longer produce the negative emotional reactions they once did. Such desensitization is a well-established psychological phenomenon (Carnagey, Anderson, & Bushman, 2007; Huesmann & Kirwil, 2007). Consequently thinking about the unthinkable – the outcome of a bomb exploding among innocent women and children – is not as unpleasant anymore and such scripts are more likely to be evaluated positively.

Repeated exposure to violence around them while they are growing up has three other important consequences for the potential terrorist youth according to our model:

(1) It teaches them violent scripts. They encode the scripts they see others using and repeated observations make the scripts well encoded and highly accessible. This is standard observational learning (Bandura, 1977). Youth learn far more through imitation and observation than they learn through conditioning. Imitation in humans is an evolutionarily evolved automatic process and growing up in a politically violent environment provides numerous models for acquiring scripts for violent behavior.

(2) Repeated observations of the violence and aggression around youth reinforce their views that the world is a mean place (Gentile et al., in press; Metropolitan Area Child Study Research Group, 2007). Their schemas about the world and others emphasize hostility and conflict. Such hostile world schemas make hostile attributions about others intentions more likely. In turn, hostile attributions about an out-group increase the likelihood of

aggressive and violent behaviors directed at the group (Dodge et al., 1990).

(3) Exposure to violence and aggression all around them makes violence seem normative and acceptable (Guerra, Huesmann, & Spindler, 2003). The normative beliefs they encode and later use to evaluate scripts are more likely to be accepting of violence and aggression. Aggression seems more "morally" justified and normative.

While we do not yet have empirical evidence of these processes leading to terroristic acts, we do have evidence of how exposure to violence in urban neighborhoods in which American children are growing up produces just these effects. For example, in a study of over 4,000 children in violent neighborhoods in the Chicago area, my colleagues and I have shown that exposure to community violence leads to the children cognitively rehearsing scripts for violent behavior; adopting beliefs more accepting of violent behavior; and behaving more violently in the next year (Guerra, Huesmann, & Spindler, 2003).

Of course, there are other individual characteristics not directly tied to experiences in a violent environment that will also enhance the likelihood of a young male or female carrying out violent acts against innocents. Being socialized to possess negative ethnic stereotypes about the other group that makes it easy to dehumanize them will help. If we want our budding terrorist to be even more likely to carry out a violent act against a specific population, another kind of exposure would also be valuable according to our model. Constant exposure to derogatory stereotyping of the target population and derogatory nicknames for them ('gooks,' 'huns,' 'dinks') by those with whom the young terrorist identifies – his family, teachers, peers, media personalities, and heroes – would lead to the encoding of negative-valenced attitudes toward the target population. This makes dehumanization of the target population easier. Dehumanization of the target prevents identification with the target and reduces *empathy*; so the value of the violent outcome is not reduced by the experience of vicarious pain. Additionally, normative beliefs about actions toward sub-humans can be employed in filtering potential scripts rather than normative beliefs about humans.

Biological predispositions toward hyperactivity and impulsivity may also increase the risk for terroristic aggression as may low CNS serotonin and an inability to delay gratification or deal with frustration non-aggressively. In our model these factors can be thought of as reducing the

depth of processing in searching for social scripts and in causing a greater focus on immediate gains and losses rather than long-term gains and losses. To a youth who sees little positive long-term outcomes in life, the short-term gains associated with what he or she thinks is a heroic act of suicide will seem more attractive. If the youth has higher than average impulsivity and a lower than average ability to delay gratification, the short-term gain of this immediately accessible script may push him/her to action.

And what are the short-term gains of killing innocent women and children? As argued earlier, hurting people who have provoked a youth or hurting people the provoker cares about produces some gain for the youth. However, an additional source of gain for the perpetrator of political violence can be the perceived gain in recognition and power he/she can achieve from his/her act, rather than any tangible gain. The manipulators of terrorist youth constantly emphasize the recognition and adulation that the youth's act will bring to him/her just as great war leaders and generals try to make their soldiers believe that killing the enemy will bring them recognition as heroes. This is perhaps one of the most important distinctions between the motivations behind violent acts for direct personal gain and violent acts for political gain. The social-cognitive-emotional model requires that any script that is executed produce perceived gain to the perpetrator. The consequence is that youth who have a greater need for recognition and a greater need for power will be more susceptible to the blandishments of terrorist leaders and more likely to carry out the killing act.

A Case Study

Let me try to illustrate better how both the situational precipitating factors and the predisposing person factors I have discussed influence terrorists' behavior in accord with my model by presenting one short case study. Let us consider the case of Arien Ahmed, a 20-year-old Palestinian woman who at the last moment on Wednesday, May 22, 2002, decided not to blow herself up and kill scores of men, women, and children on a pedestrian mall in Rishon le Zion, Israel (Bennet, 2002)

We know more about her than many suicide terrorists because she surrendered to the Israeli authorities and talked freely about herself. She grew up in a broken family and was raised by conservative relatives against whom she rebelled, revealing a stubborn, impulsive streak. She grew up during the highly violent years of the 1980s and 1990s on the West Bank where she observed many violent acts. From this alone we

would expect her to have been desensitized to violence, to have acquired scripts for violent behavior, and to have developed a jaundiced view of the world as a hostile, mean place. However, she also fell madly in love with a terrorist leader who became her lover and molded her normative beliefs toward the acceptability of violent acts against Israelis. Then a series of situational events occurred which shaped her behavior as she moved toward her own terrorist act. Her lover was killed by the Israel army which, of course, depressed, angered, and provoked her, but which also made her value the future less. She stated: "So I lost all my future." In other words she began to value short-term outcomes much more than long-term possibilities; she wanted to genuinely hurt the society that had provoked her by killing her lover, and her dysphoric mood primed hostile world schemas and aggressive/violent scripts. She volunteered to carry out suicide training and was accepted, but the training was not of the sophisticated type I described earlier. Little attempt was made to use social-influence processes to ensnare her. Perhaps she would have gone no further in carrying out a bombing, but then she quarreled bitterly with a relative which made her even more angry and depressed. When right afterwards, her group proposed that she proceed, she agreed.

Now all of this fits pretty much with just what our social-cognitive-emotional model predicts:

Dysphoric mood and provocation creating a desire to hurt and priming hostile world schemas and violent scripts.

A focus on short-term outcomes and immediate psychological gain.

A history of long exposure to violence that teaches aggressive scripts, normative beliefs accepting violence, and mean world schemas through observational learning, and desensitizes negative emotional reactions to violence.

Some signs of impulsivity and difficulty in delaying gratification and some signs of a need for power.

So why did Arien not complete her violent act? In her own words she says:

"As I walked down the pedestrian mall, I looked at the sky, I looked at the people, and then I remembered a childhood belief – that nobody has the right to stop anybody's life."

In psychological terms, the positive elements of the situation – the lovely sky, the smiling people – primed positive affective feelings that counteracted her bad mood. Also, her mood may have improved because more time had gone by since her lover's death and quarrel with her relative. With a better mood and less focus on the provocation of her lover's death, the value of a script that hurt others declined and the value of a script that involved future life increased. But perhaps most importantly, her better mood and the sight of the women and children around her primed the retrieval of the normative belief that "taking a life is wrong." As a result, the script for a violent bombing was finally rejected and the search for an alternative script began. Arien decided to surrender to Israeli authorities. She even then rejected the script of returning to her home as impossible because of the expected reaction of her handlers. She plans to settle in Jordan when released from prison because "my people won't have me." Such a view suggests that her need for recognition within her society may not have been very strong which may also have contributed to her turning about according to our model.

Of course, this is just one case study. To confirm a theory such as the one I have presented, we need to collect substantial amounts of empirical data. However, I am convinced that such data would confirm the major elements of the theory I have proposed. The best way to test these ideas would be with a prospective longitudinal study of a large sample of youth in areas where violence and terrorism are endemic. While this is a daunting undertaking, the payoff could be high.

Summary

The meager research on those who carry out political acts of extreme violence knowingly against completely innocent men, women, and children suggests that the perpetrators are seldom psychotic or abnormal in a clinical sense. They are not more economically deprived than most in their country or in-group. Most commit their act under the strong influence of peer-groups or organizations who either consciously manipulate them into the act with social influence processes or unconsciously provide the social-psychological support for such an act. Nevertheless, some situations increase the risk of such acts, and some people are much more likely to commit such acts.

The social-cognitive-emotional theory that has evolved to explain aggressive and violent individuals in general also can explain who might be most susceptible to committing terrorist acts, what environments mold them, and what immediate situations make their violent acts most likely.

The budding terrorist is most likely to have a high narcissistic sense of entitlement and need for recognition. He or she should be someone who finds social recognition and feelings of power gratifying. Killing innocent others is the ultimate demonstration of power over them, and social recognition as a hero is perhaps the largest reward that can be expected to be gained with such killings.

By the time he or she is required to act, the budding terrorist may "feel really bad in general" but not "bad about aggressing" due to their characteristically low levels of arousal. This feeling may be predominately frustration or rage engendered by repeated aversive stimulations but it could also be dysphoria. We know that feeling bad, whatever the reason, makes people more aggressive (Berkowitz, 1993). The situation should also make the potential perpetrator feel provoked by the targets or those who care deeply about the targets; so he or she has a desire to hurt them (Baron, 1977).

The budding terrorist may well also display low baseline arousal and show little emotional reaction to observing violence. Some individuals may be predisposed in this direction, but others may become habituated and desensitized to violence by repeated exposures in their environment or even in the media. We know that such low arousal individuals are more prone to engage in proactive aggression (Moise-Titus, 1999; Kirwil, 2002). We know that individuals desensitized to blood, gore, and violence are more prone to act violently (Moise-Titus, 1999).

The youth most at risk for engaging in terrorism should also have acquired world schemas, behavioral scripts, and normative beliefs that support such actions. The budding terrorist should have a distorted world schema that represents the world as a "mean" place where hostile, evil forces thrive. Such a schema makes it easy to dehumanize objectively innocent victims and see them as "enemies" or as non-human entities (Zimbardo, 1969). We know that individually aggressive youth typically engage in such hostile attributional biases (Dodge, Price, Bachorowski, & Newman, 1990); and we should expect to find the same in young terrorists.

The violent environments of undeveloped, non-democratic countries with one-dimensional information sources and mass media are ideal for promoting such thinking. The budding terrorist's repertoire of social scripts should be dominated by those that emphasize violence and aggression. Again, a childhood environment of violence and aggression would be ideal for promoting the acquisition of such scripts through observational learning (Huesmann, 1998). Finally, the budding terrorist should have developed normative beliefs that what they are going to do is