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Communicating Aggression

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Communicating Aggression

Editor's Introduction

All too often and all too sadly, human beings have shown a tendency towards violence and aggression. This violence manifests itself both in action and in words. The larger context for aggressive communication comes, of course, from human behavior in general. A number of researchers, primarily in anthropology, psychology, and sociology, have proposed theories to explain human aggression—ranging from human instinct or human drives all the way to strategic actions through which people seek to accomplish particular gains.

Aggression in communication can take many forms. One concern, stemming from the 1920s on, has to do with violent or aggressive content in the entertainment media, whether in films, on radio programs, or on television. The long tradition of communication research that flowed from this concern focused on what such violence might do to viewers or listeners, often investigating whether children or young people learn violent behaviors through imitating what they see or hear in entertainment media. Such studies showed mixed results, with some demonstrating a connection between the consumption of violent media and violent behavior, but many other studies not finding that connection, or finding the connection only under certain very limited circumstances. A few of these studies ask the earlier question as to whether or not violence or aggressive behavior resides naturally in human beings. If it does, then people should witness such aggressive behavior in the whole range of activities, including interpersonal interaction and verbal communication.

Most people immediately recognize verbal aggressiveness or verbal violence. This can occur, clearly, in arguments, or even through shouted insults—whether that happens in a sporting event or a political rally or even among people driving down the highway. Other more subtle manifestations of aggressive communication emerge in many ways: perhaps people ignore one another, or show disrespect for one another, or more or less enter into the opposite of polite behavior or cooperative behavior. These various kinds of violence or aggressive behavior can occur in almost any setting, from interpersonal relationships among friends to marriage or family situations through school situations and workplace situations. Some communica-

tion research has begun to focus more specifically on these antisocial behaviors, especially school bullying or even workplace bullying. Communication researchers have sought not only to identify or categorize kinds of aggressive communication but also to provide recommendations for how to resolve or even prevent situations in which aggression manifests itself in people's day-to-day communication.

In the past *Communication Research Trends* has examined some of the ways in which aggression or violence intersects with communication, notably in terms of the effects of violence in television programming or films (White, 1984), but also in terms of reporting about violence, war, and terrorism by the news media (Cordelian, 1992; Biernatzki, 2002, 2003). *Trends* has tended to overlook the fact that human communication can also show its violent streak in our interactions with one another. This issue, then, of *Communication Research Trends* examines aggressive communication primarily in an interpersonal setting.

Professor Paola Pascual-Ferrá seeks to provide a context for aggressive communication and for the study of aggressive communication. Her essay begins with an overview of some of the theories of aggression and then looks at how these aggressive behaviors manifest in communication. Next she examines particular communication theories and treatments for aggressive communication. Unfortunately a number of scholars contest these theories, with researchers disagreeing on both the value of the theory as well as the measurement tools that these theories use.

* * *

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Communicating Aggression

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1. Introduction

Media pundits and news sources both at home and abroad have labeled the 2016 presidential election in the United States as one of the most divisive in the history of the country. Among the causes of that division is what many in the country perceive as a rhetoric of hate, fomented by the use of verbally aggressive tactics, with one candidate labeled as “America’s bully” and the other a “crook” who should be locked in prison, among other insults (Haraldsson, 2016). In this rhetorical climate, verbal aggressiveness became the weapon of choice over reasoned debate and skilled argumentation. This tendency to verbal aggression has infected voters and continued beyond Election Day. Many agree with Senator Harry Reid’s claim that the rhetoric of Donald Trump’s campaign has “emboldened the forces of hate and bigotry in America” (Lee, 2016). In the days after the election, the media covered protests in different cities across the U.S., and many featured people marching on the streets using expletives when referring to the President-elect. At the same time, since the election, social and traditional media have reported several incidents of written and uttered hate speech meant to intimidate members of non-White ethnic groups. Many people fear that the campaign has created an environment where this type of aggressive communication becomes the norm and that, in turn, these will lead to other forms of aggression like hate speech, physical attacks, and hate crimes. The literature on verbal aggressiveness and verbal aggression provides a timely perspective on the causes and consequences of the rhetoric present during the 2016 presidential campaign.

Scholars in the field of communication define verbal aggressiveness as a “personality trait that predisposes persons to attack the self-concepts of other people instead of, or in addition to, their positions on topics of communication” (Infante & Wigley, 1986, p. 61). Verbal aggressiveness is manifested in acts of verbal aggression. Communication scholars have studied verbal aggressiveness and verbal aggression within the

context of instructional, political, entertainment media, computer mediated, workplace, medical care, sports, and family communication, among other communication contexts (for recent representative studies, please see Avtgis & Rancer, 2010). As of 2016, a search query for peer-reviewed communication journal articles containing the exact phrases “verbal aggressiveness” or “verbal aggression” in the title yield over 250 results since the first title published in *Communication Monographs* (see Greenberg, 1976). Some examples of verbal aggression include character attacks, competence attacks, insults, maledictions, teasing, ridicule, profanity, and threats (Infante, 1988). Even though verbal aggression itself does not leave a physical mark on the victim, the long-term consequences can be even more psychologically devastating than physical aggression (Buss, 1961; Infante & Wigley, 1986). The effects of verbal aggression on victims can range from damaged self-concepts to hurt feelings, anger, irritation, embarrassment, and discouragement (Infante & Wigley, 1986). Verbal aggression can lead to the deterioration or even termination of the relationship between those involved, and even precipitate physical violence (Berkowitz, 1962; Gelles, 1974; Infante & Wigley, 1986; Infante, 1988; Patterson & Cobb, 1973; Toch, 1969; Zillmann, 1979). Communication scholars have traditionally treated verbal aggressiveness as a negative trait and, as such, it has been categorized as a form of incompetent communication and part of the “dark side” of communication (see Nicotera, 2015; Olson, 2015).

This article offers a review of the literature on aggression, beginning with theories from different disciplines that have informed our understanding of verbal aggressiveness, then looking at how aggression is manifested in communication, and the different approaches in defining and treating it. The article ends with a summary of the main points from the literature, implications for our understanding of the current political rhetorical climate, and suggestions for future research.

2. Theories of Aggression: An Interdisciplinary Perspective

Most scholars working on aggression research have noted the difficulty of defining the term for the lack of consensus among the various disciplines that study it (Bandura, 1973a; Baron & Richardson, 1994; Baron & Byrne, 1977; Berkowitz, 1993; Felson & Tedeschi, 1993; Geen, 2001). Scholars from various fields have traditionally acknowledged five major lines of thinking in the evolution of human aggression research in the 20th century: instinct (aggression as innate), drive (aggression as an externally-elicited drive), social learning (aggression as learned and acquired), cognitive (the role of perception and thought-processing; for an overview of these, see Baron & Byrne, 1977; Baron & Richardson, 1994; Geen, 2001; Huesmann, 1994), and biological theories.

A. Instinct theories

Late 19th and early 20th century psychologists saw aggression as primarily a biologically inherited instinct. In his *Principles of Physiological Psychology*, first published in Germany in 1873, Wundt referred to the “instinct of propagation” and the “instinct of self-defense” identified by phrenologist Franz Joseph Gall (1758–1828) as two of 27 “internal senses” responsible for different mental processes in humans (Wundt & Titchener, 1904, p. 287). In his *Lectures on Human and Animal Psychology*, Wundt later explained “instinctive action in man” to mean “something purposive, but involuntary, half impulsive and half reflex” (Wundt, Creighton, & Titchener, 1896, p. 393). For Wundt, competing theories that viewed instinctive action as “a mechanized intelligent action, which has been in whole or part reduced to the level of the reflex” and as “a matter of inherited habit, gradually acquired and modified under the influence of the external environment in the course of numberless generations” did not need to be mutually exclusive: “Instincts may be actions originally conscious but now become mechanical, and they may be inherited habits” (Wundt, Creighton, & Titchener, 1896, p. 395). Wundt’s contemporary and American counterpart, James (1890) defined instinct as “the faculty of acting in such a way as to produce certain ends, without foresight of the ends, and without previous education in the performance” (p. 383). Even though this definition suggests that instincts are invari-

able and innate and lead to inescapable impulses, James believed that humans could rise above them by way of *experience and reason*; “whenever the mind is elevated enough to discriminate,” humans can choose between two contrary impulses (pp. 390–393). Before coining the term *fight-or-flight*, Cannon (1914) referred to the work of James when describing how animals adapted to threats as follows:

Fear is a reaction aroused by the same objects that arouse ferocity. The antagonism of the two is an interesting study in instinctive dynamics. We both fear, and wish to kill, anything that may kill us; and the question which of the two impulses we shall follow is usually decided by some one of those collateral circumstances of the particular case, to be moved by which is the mark of superior mental natures. (p. 415).

James had followed the work of zoologist Heinrich Schneider who observed that,

all the *special* movements which highly evolved animals make are differentiated from the two originally simple movements, of contraction and expansion, in which the entire body of simple organisms takes part. The tendency to contract is the source of all the self-protective impulses and reactions, which are later developed, including that of flight. The tendency to expand splits up, on the contrary, into the impulses and instincts of an aggressive kind, feeding, fighting, sexual intercourse, etc. (p. 382)

Following this observation, Cannon (1914) coined the term *fight-or-flight*, which he describes as follows: “The cornering of an animal when in the headlong flight of fear may suddenly turn the fear to fury and the flight to a fighting in which all the strength is desperation displayed” (p. 277).

Many scholars researching aggression usually cite the work of Sigmund Freud and ethologist Konrad Lorenz for their direct application of instinct theories to human aggression. Freud (1923) saw aggression as the expression of one of two classes of instincts that work on the human psyche—the death instincts, which seek the destruction of “organic life” and the return to “an inanimate state,” and Eros, the sexual or life instincts,

which are oriented towards the creation and preservation of life. In his correspondence with Albert Einstein regarding “the curse of war” in human history, Freud used an analogy from physics to illustrate this duality of life and death instincts and applied it to aggression:

[This] may perhaps have some fundamental relation to the polarity of attraction and repulsion that plays a part in your own field of knowledge ... It seems as though an instinct of the one sort can scarcely ever operate in isolation; it is always accompanied—or, as we say, alloyed—with an element from the other side, which modifies its aim or is, in some cases, what enables it to achieve that aim. Thus, for instance, the instinct of self-preservation is certainly of an erotic kind, but it must nevertheless have aggressiveness at its disposal if it is to fulfill its purpose” (Freud, 1932/1970, p. 17).

Similarly, Lorenz (1966) pictured aggression as a “fighting instinct in beast and man which is directed against members of the same species” (p. 3). In Lorenz’s view, aggression marks an important adaptation in animals emerging from the natural selection process that serves, among other things, to assist in self-preservation and mating. For Lorenz, aggression as a beneficial adaptation also remains true for humans because of our evolutionary origin and because we are subjected to the same “laws of natural causation” as other species found in nature (pp. 214–215). In humans, however, aggression becomes problematic because the development of culture, in particular technologies of mass destruction such as nuclear weapons, has outpaced the development of the social inhibitions to control our aggression and keep us from hurting one another (pp. 229–231).

Ultimately, Freud and Lorenz’s view of aggression is highly deterministic; humans remain prisoners of their own aggressive instincts and have to continuously struggle against them. These theories do have their critics. Some criticisms of instinctive theories include a lack of direct evidence (e.g., specific genes that account for aggression), generalizations made from organisms that are less complex than humans, and ignoring the behavioral adaptability of humans and the influences of the environment and social forces, among others (Geen, 2001; Baron & Richardson, 1994).

B. Drive theories

Freud also believed that aggression was the individual’s “primordial reaction” when something or

someone blocked his or her desire to attain pleasure or to avoid pain (Dollard et al., 1939, p. 21). This idea served as a stepping-stone to the second line of thinking in aggression research—the drive theories, also referred to as theories of arousal. Expanding on Freud’s work, Dollard, Doob, Miller, Mowrer, and Sears (1939) advanced the *frustration-aggression hypothesis*: “aggression is always a consequence of frustration” (p. 1). They defined aggression as “any sequence of behavior, the goal response to which is the injury of the person toward whom it is directed,” (p. 9) and frustration as “an interference with the occurrence of an instigated goal-response at its proper time in the behavior sequence” (p. 7). Dollard and his colleagues proposed that, even if an individual tried to suppress or restrain his or her aggressive impulse, frustration would always find its way through an overt form of aggression, even if delayed. The level of aggression would depend on the strength of the instigation, the degree of interference, and the number of frustrated-response sequences (p. 28). The instigation refers to what activates the desire to attain the predicted goal-response, and the goal-response refers to the action that would conclude the predicted sequence. Furthermore, Dollard and his colleagues subscribed to the belief that “the expression of any act of aggression is a catharsis that reduces the instigation to all other acts of aggression” (p. 53), also referred to as the catharsis theory of aggression.

Some have criticized the frustration-aggression hypothesis for dictating that frustration always results in aggression (for a summary of the major critics, see Berkowitz, 1962). For Berkowitz, there are two main reasons why the frustration-aggression hypothesis falls short. First, Berkowitz does not believe that frustration necessarily leads to aggression. He refers to Janis’s (1951) review of fear reactions among victims of air warfare in Germany, Great Britain, and Japan and to the work by Scott and Fredericson (1951) with aggressive responses among rats and mice subjected to physical pain as evidence that frustration can lead to other responses, such as fear. In other words, someone might choose “flight” over “fight” as a response to frustration. Berkowitz does believe that frustration arouses anger, which in turn predisposes the person to choose aggression over other available reactions. However, the final choice will be determined by the presence of what he calls “aggression-evoking cues,” or “stimuli associated with the anger instigator” (Berkowitz, 1962, p. 33, 49). For Berkowitz, two aspects of the situation determine whether a person chooses “flight” instead of

”fight”: “(1) *fearful events signify noxious consequences*, and as a result of these events the individual anticipates either physical or psychological damage to himself; (2) *the frustrated individual sees himself as having low ‘power’ relative to that of the frustrating agent*” (p. 43).

Second, the frustration-aggression hypothesis fails to consider other important forms of aggression. He terms one of these forms of aggression instrumental aggression, or the use of aggression to attain some goal or end other than causing injury to another person, such as coercion, dominance, or power over others. Bullying can be considered instrumental aggression when the end goal is to gain popularity or establish superiority over peers. Berkowitz writes, “Aggression in the service of dominance strivings also would be an instance of this instrumental aggression and therefore is not necessarily produced by frustrations” (Berkowitz, 1962, p. 31). Furthermore, Berkowitz believed that aggression was also “due to acquired aggressive habits” (p. 35). If a person has learned from others to pick up a sword when provoked rather than to become ashamed of his own anger, the individual will likely pick up the sword. He cited Bandura and Huston’s (1961) study to show that “children can acquire hostile modes of behavior merely by observing the aggressive actions of adults” and that this learning process happened mostly by imitation rather than Freud’s more complex concept of “identification with the aggressor” (cited in Berkowitz, 1962, p. 31).

Dollard and his colleagues ignored the concept of instrumental aggression in their original work. However, this changed with later proponents of drive theories. Both Buss (1961) and Feshbach (1964) distinguished between hostile or “angry” aggression and instrumental aggression as part of their work (Buss, 1961, p. 3). Feshbach defined *hostile aggression* as a “learned drive whose primary antecedents are past exposure to punishment and present threats to self-esteem” and “for which the goal response is injury to some object,” and *instrumental aggression* as that “directed toward the achievement of nonaggressive goals” and where injury occurs mostly as a means to another end (p. 258). Others have made parallel distinctions. For example, Zillmann (1979), who proposed the excitation-transfer theory of aggression, distinguished between *annoyance-motivated* and *incentive-motivated* aggression, with the first being more retaliatory and reactive and the second being mostly employed to attain rewards. Other parallel distinctions

include *reactive* versus *proactive* aggression (Crick & Dodge, 1996; Dodge & Coie, 1987) and *impulsive* or spontaneous versus *premeditated* (Barratt, Stanford, Dowdy, Liebman, & Kent, 1999). These sets of labels all stand parallel to the initial concept of *hostile* versus *instrumental* aggression. Barratt (1991) added a third category, “medically related” aggressive acts, to include symptoms of serious medical and psychiatric disorders. Therefore, researchers divide most subtypes of aggression into two groups: the impulsive / reactive / affective or hostile / non-planned and the premeditated / proactive / instrumental / predatory or controlled (Mathias, Stanford, Marsh, Frick, Moeller, Swann, & Dougherty, 2007).

Buss (1961) noted that attack victims used instrumental aggression as a way to stop their tormentors from continuing to inflict pain. Bandura (1973a) also observed that people used aggression to alleviate aversive treatment (p. 200). This idea forms the basis of the escape-avoidance theory later advanced by Dengenerik and Covey (1983) that considered negative reinforcement and the motivation to escape or avoid an attack an important instigator of aggression. Other examples of instrumental aggression include Feshbach’s belief that individuals were driven to inflict pain on others as a way to increase their self-esteem and sense of power (Feshbach, 1964; Bandura, 1973a). Walster, Berscheid, & Walster (1973) and Chadwick-Jones (1976) echo the latter when they looked at the use of instrumental aggression by individuals to “maintain social equity” and for “self-aggrandizement,” respectively (Dengenerik and Covey, 1983, pp. 163–164). The idea of instrumental aggression formed the basis for the theory of coercive power proposed by Tedeschi and his colleagues (Tedeschi, Schlenker, & Linkskold, 1972; Tedeschi, Schlenker, & Bonoma, 1973; in Tedeschi, 1983). According to Tedeschi, the theory of coercive power stipulates that several factors guide a source’s decision to choose instrumental aggression as a way to coerce another, including “lack of self-confidence, time perspective, and failure to perceive costs, fear, self-preservation and face saving, maintenance of authority, conflict intensity, norms of self-defense and reciprocity, modeling and learning, and perceived injustice” (p. 146).

All these ideas regarding the instrumental use of aggression echoed the “instinct for mastery” proposed by Freud in 1905, best described as “a non-sexual force whose aim is to seize control of, or dominate, objects in external reality” (Akhtar, 2009, p. 147). In the

1940s, Ives Hendrick developed the “instinct for mastery” hypothesis, which Akhtar summarizes as follows: “the ‘instinct for mastery’ (1) reflects an inborn need to control the environment, (2) is non-sexual but can become sexualized, and (3) yields a special kind of pleasure, i.e., that derived from a task well performed” (Akhtar, 2009, p. 147). For example, bullying, terrorism, the use of military force or political coercion are forms of instrumental aggression used to dominate or intimidate others (Geen, 2001, p. 5). We see another example of instrumental aggression in the parent who says something verbally aggressive to the child in an effort to get the child to obey. Struggle tactics in negotiations also fall under instrumental aggression (Pruitt, Mikolic, Peirce, & Keating, 1993). This distinction between hostile and instrumental forms of aggression will prove very important in guiding future research on the causes and treatments for aggression. (For more discussion of the hostile and instrumental types of aggression, see Baron & Richardson, 1994; Berkowitz, 1962, 1993; Buss, 1961; Geen, 2001; Kingsbury, Lambert, & Hendrickse, 1997).

C. Social learning theories

The definition of aggression as primarily a biologically inherited instinct, however, leaves out important considerations, not the least of which is the influence of the environment and interpersonal interactions on individual behavior. Social psychologists, with their consideration of factors outside the individual, brought to the forefront the idea of humans as social animals. For example, Mead (1934) changed the language from “instinct” to “impulses” and spoke of 10 groups of “impulses,” of which at least one invoked aggression, namely the impulse of “attack on, and defense from, hostile forms of prey,” an impulse juxtaposed to the impulse of “flight and escape from dangerous objects” (Mead & Morris, 1934, p. 349). The instincts associated with lower animals, he argued, were definite and restrictive. By changing the language, Mead afforded the possibility that humans could use reason and their “higher” capacities to modify and even control these impulses, including the impulse to fight. He believed these human impulses differed from lower animals’ instincts because the former were capable of “indefinite modification,” and that these modifications occur as part of humans’ social experience: “The life of the child in human society subjects these and all the impulses with which human nature is endowed to a pressure which carries them beyond possible compari-

son with the animal instincts. ... This pressure is, of course, only possible through the rational character that finds its explanation, if I am correct, in the social behavior into which the child is able to enter” (pp. 349–350).

Expanding on the work of Mead, Blumer (1969) stated that, “social interaction is a process that *forms* human conduct instead of being merely a means or a setting for the expression or release of human conduct. Put simply, human beings in interacting with one another have to take account of what each other is doing or is about to do; they are forced to direct their own conduct or handle their situation in terms of what they take into account” (p. 8). From the perspective of symbolic interactionism, *no man is an island*. People create meaning through interaction and exchange with others, in context, and the meaning that people assign to the different elements of the situation will affect how each person responds. For example, Geen (2001) highlights the concept of intent in defining aggression: if the aggression is accidental and the aggressor did not intend to harm the victim, then it might not be considered aggression (Dollard et al., 1939). In addition, Baron and Richardson (1994) included in their definition of aggression that one must direct the behavior to another “being who is motivated to avoid such treatment” (p. 7). The problem with this last definition is that it leaves out, for example, people who join fight clubs because they find fighting rewarding. Yet, most people would agree that the fighting that goes on in fight clubs constitutes acts of aggression. While intent makes for an important distinction, aggression does not require a victim unwilling to take the abuse. It is still aggression when the two parties willfully and excitedly engage in the fight.

Baron and Richardson also included in their definition that aggression must be directed toward living beings. For example, they do not consider kicking furniture and breaking vases or dishes out of anger, or any other act toward an inanimate object, as aggression unless it causes harm to another person or living being. While they might not consider the act itself as aggression toward someone, the person still acts aggressively. In fact, the term *property aggression* includes actions like stealing and vandalism of inanimate objects (Gottfredson & Hirschi, 1993). When researchers wish to identify a person’s aggressive tendencies, for example, the fact that an individual punched a wall out of anger, and not another person, can still serve as an indicator of the person’s level of aggressiveness.

Feshbach's and Berkowitz's references to aggression as a "learned drive" and "acquired" habits provided a link to the third major line of thinking on human aggression research—social learning. Symbolic interactionism, with its emphasis on the creation of meaning through human interaction and the important role of perception in the construction of the self-concept, contributed to the transition from the instinct and drive theories of human aggression to the social learning perspective. As noted before, Mead (Mead & Morris, 1934) changed the language from "instinct" to "impulses," a view which Blumler followed and expanded. The social learning perspective came about in part to include this aspect of interaction that had been neglected in the study of aggression thus far. Bandura (1973a) argued that, during the social labeling process, "People come to judge certain actions as aggressive on the basis of a variety of criteria," and that "*intentions* attributed to the performer will alter the way his actions are categorized" (p. 6). Thus, he advocated that, "a full explanation of aggression must consider both *injurious behavior* and *social judgments* that determine which injurious acts are labeled as aggressive" (p. 5). Bandura believed that most research had focused on the behavioral component and not enough had been done to study the judgmental component, which led him to embark on a social learning analysis of aggression.

Unlike Feshbach, Berkowitz, and Buss, Bandura (1973a) argued that since both hostile and instrumental aggression are goal-driven, researchers should regard both as *instrumental*. Bandura argued that rather than focusing on motivation as the distinguishing factor for different forms of aggression, it would "be more accurate to differentiate aggressive actions in terms of their functional value" (p. 3). Bandura's theory did not ignore the role that biology played in an individual's predisposition to aggression. It also did not deny that frustration could cause aggression. It just afforded greater weight to the role that direct experience, observation, and social situations played on an individual's aggressive display: "it is not that frustration creates aggression, but that aversive experiences produce emotional arousal that can elicit a variety of behaviors, depending on the types of reactions people have learned for coping with stressful conditions." "People are not born with performed repertoires of aggressive behavior. They must learn them in one way or another" (pp. 204, 212). Beyond being predisposed to aggression, an individual's execution of his or her aggressive

act would depend in large part on the instigating circumstances that arise and how the person had learned to cope in situations like that in the past.

Bandura divided his theory into three main mechanisms—acquisitions (how the individual acquired a tendency for aggression), instigation (how aggressive patterns were activated in the individual), and maintenance (conditions that helped sustain the use of those aggressive patterns). In terms of acquisition mechanisms, Bandura listed biological factors, observational learning (which included modeling behavior), and direct experiences. He specified four types of aversive instigators that can incite aggression—physical assault, verbal threats and insults, adverse reductions in conditions of life (such as poverty), and the thwarting of goal-directed behavior. In addition, he identified four non-aversive types of instigators: incentive (which prompted the individual to act aggressively because he or she anticipates positive consequences), modeling (which could have four different functions—directive, disinhibitory, emotional arousal, and stimulus-enhancing), instructional (a rewards and punishment system of compliance and obedience), and delusional instigators, or what he referred to as "bizarre beliefs" (Bandura, 1983, p. 20). Finally, Bandura explained four main ways in which individuals maintained their aggressive patterns—external reinforcement (which included using aggression as an effective means of achieving tangible rewards such as food, social and status rewards, and reduction of aversive treatments by others), punishing consequences (which could be experienced by the self or learning from the experiences of others), vicarious reinforcement (seeing others use aggression successfully for their own benefit), and self-regulatory mechanisms (which included a system of self-reward and/or self-punishment for aggression and disengaging or disassociating oneself from one's aggressive actions). As Baron & Richardson (1994) observed, "in contrast to the motivational and instinct theories, the social learning approach does not view human beings as constantly driven or impelled toward violence by built-in internal forces or ever present external stimuli (i.e., aversive stimuli) ... Thus, it is considered more optimistic with respect to the possibility of preventing or controlling such behavior than the other perspectives" (pp. 36–38).

Bandura considered cognitive control to be essential in understanding aggression: "Man's cognitive capacities tremendously increase the information he can derive from his experiences, and thus partly deter-

mine how he will be affected by them” (Bandura, 1973a, pp. 49–50). He believed that the anticipated consequences of their behavior guided people’s actions, that memories from learned behaviors could be activated by specific circumstances, and that human ability for problem-solving allowed people to consider alternative actions and their consequences. An individual’s thought process became very important in subsequent studies of aggression. In fact, Bandura believed in the notion that anger could be self-provoked: “By thinking about past insulting treatment, a person can work himself into a rage long after the initial emotional reactions have subsided” (p. 57).

D. Cognitive theories

In the literature of aggression, this was later linked to the concept of *rumination*, defined as “repetitive thoughts around a common theme, absent immediate environmental demands for those thoughts” (Ray, Wilhelm, & Gross, 2008, p. 133), and *anger rumination* specifically defined as “the degree to which individuals tend to focus on angry moods” (Nolen-Hoeksema, 1991, p. 193; cited in Wigley, 2010, p. 395). The desire to understand the thought patterns guiding the actions of individuals that may or may not engage in aggressive behavior became the focus of the fourth line of thinking in human aggression research occurring during most of the 1980s—cognitive-based models and theories of aggression (Eron, 1994). This line of thinking merged lessons from both frustration-aggression and social learning theories, and included newer understandings of how the human brain processed information, as well as “genetics, neuroanatomy, endocrinology, and physiology” (p. 9). Cognitive theories of aggression assumed that “the way in which the individual perceives and interprets environmental events determines whether he or she will respond with aggression or some other behavior” (p. 7). According to Eron, these theories rested on models of cognition developed by information processing theorists during the 1960s and 1970s.

In his modified version of the frustration-aggression hypothesis, Berkowitz (1962) already had established that the presence of “cues or releasers, stimuli associated with the anger instigator” would determine whether the individual gave in to the drive-specific behavior and, if so, the strength of the aggressive response (p. 49). During the 1980s, Berkowitz changed his thinking about aggression once more to reduce the importance of aggressive cues (what he had called “the

weapons effect”) and to focus more on the emotional and cognitive process involved in the dynamics of aggression. Berkowitz, like many scholars influenced by the work of Bandura and the role of perception in human interaction, had come to believe that how a person reacts to a situation depended on the person’s interpretation of that situation. Sociologist W. I. Thomas had early on advanced the ideas that the influence of participants’ interpretations or “the definition of the situation” on behavior played a role: “Preliminary to any self-determined act of behavior there is always a stage of examination and deliberation which we may call *the definition of the situation*” (Thomas, 1923, p. 23), and “If men define things as real, they are real in their consequences” (Thomas & Thomas, 1928, pp. 571–572). In linking cognition to aggression, Berkowitz suggested that, “aggressive inclinations will be stimulated as long as negative affect is experienced” (Berkowitz, 1993, p. 97). He called this part of “the associative network perspective,” which later became known as Berkowitz’s *cognitive neoassociation model* (Baron & Richardson, 1994).

Zillmann (1988) also went back and revised his own excitation-transfer theory of aggression to include the role of cognition, or what he referred to as “cognition-excitation interdependencies” (Zillmann, 1988). According to Zillmann, if a person believes a danger to be real, and continues to think about that threat to the self, then the person will remain aroused. If, however, the person recognizes some elements that lessen the perception of danger, then the excitement will weaken. In addition, sensitivity to certain situations due to previous experiences will cause preappraisals of the situation to either stimulate arousal or prevent strong reactions if the person knows what to expect: “In principle, preappraisals can take the sting out of many endangerments and, hence, curtail anger and angry aggression by holding excitatory reactions to a minimum or by preventing their development altogether” (p. 54).

Researchers and theorists have employed plenty of cognitive models and theories in the study of human aggression (for reviews of the relevant literature, see Baron & Richardson, 1994; Berkowitz, 1993; Felson & Tedeschi, 1993; Geen, 2001; Huesmann, 1994). According to Eron (1994), they differ “in terms of exactly what is learned, specific behaviors, cue-behavior connections, attitudes, perceptual biases, response biases, or scripts or programs for behavior” (p. 7). However, several concepts frequently found among cognitive models are worth noting here—attributions

and *appraisals*, *social information processing*, and *scripts* or *schemata* (Geen, 2001). All of these underscore the role of perception, which James (1890) himself had emphasized as important in triggering the “fear or kill” response, referring to the work of Russian physicist Victor Kandinsky with hallucinatory patients as a way to illustrate how the perception of things might influence human behavior

The concept of meaning forms an essential aspect of understanding communication between people. Not a property of messages, meaning forms the “subjective responses that individuals in a given language community learn to make, either to things they directly experience in reality or to particular symbols they use to label that reality”; it is best understood as the “experiences that occur ‘in our heads,’ where only we—and no one else—can experience them” (DeFleur, Kearney, Plax, & DeFleur, 2005, pp. 13–14). Steinfatt and Millette (2009) state that, “Communication is inherently a meaning assignment process within the individual” (p. 299). Verbal aggression can be triggered by different elements of the communication framework and during different parts of the communication process. Attribution theory attempts to explain the motives and intent behind informing words and actions that people attribute to one another. Berkowitz (1993) refers to attributions as “having to do with the cause of an emotion-arousing event,” while appraisals refer more to “almost any kind of interpretation or assessment of the situation” (p. 86). However, he notes that the term used is more a matter of preference. Geen (2001) lists three main types of attribution—intent, motive, and foreseeability. These form part of the attributional analysis process that Ferguson and Rule (1983) suggest takes place in a person’s head between provocation and aggression. The process consists of three main steps: understanding the harmful act (which includes attributions of intent, motive, and foreseeability), judging what should have happened (based on existing norms), and comparing what ought to have happened with what happened before arriving at a final verdict, so to speak. Geen also refers to the *hostile attribution bias*, which he explains as “any tendency that the person may have towards attributing hostility to the other person can influence the cognitive construction of the exchange and the response that one makes to it” (Geen, 2001, p. 52).

Crick and Dodge’s (1994) *social information processing* model identifies particular stages of processing social information and social cues, and it predicts that if a person does not go through these stages of pro-

cessing, then he or she will respond inappropriately or in a way that appears as maladjusted. The model includes six stages: (1) encoding of cues; (2) interpretation of cues; (3) clarification of goals; (4) searching for and accessing responses to cues; (5) selecting among available responses; and (6) enacting selected response. According to Dodge and his colleagues, the presence of a hostile attribution bias can affect the person’s ability to go through the different stages of processing and result in an inappropriate response.

Huesmann’s (1988) *script theory* proposes that aggressive behavior is part of a “script” that has been programmed in a person’s mind since childhood. The script is both learned through observation and (re)enactment. At first, when the person is just a child, these scripts “influence the child’s behavior through ‘controlled’ mental processes . . . but these processes become ‘automatic’ as the child matures” (Huesmann & Miller, 1994, p. 161). Schneider & Shriffrin (1977) distinguished *controlled* or slower mental processes that involve greater awareness by the individual from *automatic* or faster mental processes that happen almost unconsciously (Huesmann & Miller, 1994). For example, if two people in a dyad who have known each other for some times have been at odds lately, the presence of a hostile attribution bias in the individuals’ heads can bias their communication encounters to perceive threats and provocations that the other did not communicate because they are already biased by their negative affect.

Another relevant and important concept within attribution theory, *fundamental attribution error*, refers to “the tendency to attribute the cause of events to personal qualities” (Littlejohn & Foss, 2008, p. 71). Explained another way, “When we have success, we interpret it as the result of our hard work and ability, but when others have that same success, we tend to think of them as lucky. Conversely, when others fail, we consider it their own fault, but when we fail, we blame others . . .” (Griffin, 2009, p. 475). This biased form of perception overlooks the situational factors that can influence behavior. Similarly, *social judgment theory* predicts that “we weigh every new idea by comparing it with our present point of view” or attitude (Griffin, 2009, p. 183). Sherif and Hovland (1961) looked at attitudes as three different “latitudes” rather than “point[s] along a continuum”—the *latitude of acceptance* (or what the person considers acceptable), the *latitude of rejection* (or what the person considers objectionable), and the *latitude of noncommitment*

(when the person is undecided or has no opinion on the matter). We judge the words of others based on our latitude of acceptance, rejection, or non-commitment of the ideas presented to us. Additionally, Sharif predicted that ego-involvement, or the importance of an issue in a person's life, serves as a sort of "anchor" that tends to determine all our other thoughts regarding that issue and is demonstrated by group membership. He hypothesized two different types of perceptual error linked to our level of ego-involvement—*contrast* ("whereby people judge messages that fall within their latitudes of rejection as further from their anchor than they really are") and *assimilation* ("whereby people judge messages that fall within their latitudes of acceptance as less discrepant from their anchor than they really are") (Griffin, 2009, p. 186). As explained by Griffin, the more committed someone is to an issue, the larger their latitude of rejection. Anything that falls within that range tends to be rejected, many times forcefully. He explains that this contrast effect often leads to polarization of ideas.

E. Biological theories

The new millennium brought with it a resurgence of biological premises in the study of aggression. As Nelson states in the preface to *Biology of Aggression*, "For years the role of learning and environmental influences, both social and nonsocial factors, were prominent in discussions of the etiology of human aggression. Biological factors were not thought likely to be important candidates for dealing with human aggression" (Nelson, 2006, p. v). New technological advances in neuroscience, genetics, pharmacology, molecular biology, and other areas of biological research have allowed scientists to study the human body, particularly the human brain, in more detail and gain a clearer understanding of the link between physiological processes and aggression (for examples of the new aggression literature in the areas of genetics, biology, and neurobiology, see Costello, 1996; Howard, 2006; Huber, Bannasch, & Brennan, 2011; Nelson, 2006; Siegel, 2005). However, as evident from the beginning of this essay, this line of research is not new. In fact, it seems as if the study of aggression has come full circle, returning once more to its physiological roots (recall the influence of Gall's phrenology in Wundt's concept of "instinct," the influence of zoology in James and Cannon's fight-or-flight, and the premise of ethologist Lorenz's "fighting instinct" as humans' evolutionary inheritance and part of our animal nature).

Indeed, attempts at understanding the human brain and its relationship to aggression have always been a part of aggression research. In 1969, José Delgado showed how stimulating the hypothalamus could control aggressive behavior in cats and monkeys, among other species (Goldstein, 1989). Also, in the late 1960s and 1970s, researchers believed that high aggressiveness in males was caused by an additional Y chromosome, which became known as the "XYY male syndrome" and that led to the profiling of men who possessed this biological trait as criminals. (This theory was later discredited by the low ratio of XYY males in prison and in the population in general when compared to the number of criminals who did not possess an extra Y chromosome.)

Others have looked at the heredity aspect of aggression through the studies of twins and the adoption of siblings into separate stable and unstable home environments (Howard, 2006). Bateson (1989) reported that, "the twin studies have produced heritability estimates of about 0.6, which means that 60% of the variation in the aggression scores is attributed to variation in the genes" (p. 40). Weiner and Wolfgang (1990) linked aggression to the following biological causes: tumors and other disruptions of the limbic system, epileptic seizures, endocrine abnormalities, birth complications, nervous system abnormalities, hyperactivity disorders, genetic abnormalities, learning disorders, personality disorders, low autonomic activity or psychopathic behavior, disconnect between the limbic area and inhibiting areas of the frontal cortex, low blood sugar, effects of alcohol and psychoactive drugs (p. 284, quoted in Howard, 2006). Other scholars have been identified specific areas of the brain linked to aggression, such as the basal ganglia (Herbert, 1989), and specific neurotransmitters, such as the role of serotonin (Lish, Kavoussi, & Coccaro, 1996) and nitric oxide (see Chiavegatto, Demas, & Nelson, 2006), among others. In the introduction to his book on the neurobiology of aggression, Bandura (1969) writes, "the neural basis of aggressive behavior in humans resembles that of animals, and the forms of aggression seen in humans parallel those observed in animals" (p. 1), and Huber and Brennan write in their own book on the genetics of aggression, "As we witness animals engaged in situations of conflict, we cannot help but be drawn by the behavior's inherent relevance to our own biological roots. The knowledge that human aggression arises from our genetic heritage makes it all the more likely that it is of an adaptive nature" (p. 1). All these

ideas echo the sentiment stated by Lorenz back in the 1960s: “There cannot be any doubt, in the opinion of any biologically minded scientist, that intrapsychic

aggression is, in man, just as much of a spontaneous instinctive drive as in most other higher vertebrates” (Lorenz, 1964, p. 49).

3. Forms of Aggression within a Communication Encounter

One can count many different forms of aggression. We can categorize aggression by its causes and goals. This usually has taken the form of dichotomous sets of subtypes. The first subtypes of aggression consist of hostile versus instrumental aggression. Hostile or affective aggression often has its motivation in anger. Usually caused by provocation, it serves as a form of retaliation or revenge. The aggressor wants to cause harm to the victim who provoked him or her. Some refer to hostile aggression as emotional aggression. Instrumental aggression, on the other hand, serves a purpose that is not primarily to injure or harm the target of the act but rather works as a means to get something else. (For a discussion of the hostile and instrumental types of aggression, see Bandura, 1973a; Baron & Richardson, 1994; Berkowitz, 1962, 1993; Buss, 1961; Geen, 2001; Kingsbury, Lambert, & Hendrickse, 1997). For example, bullying, terrorism, the use of military force or political coercion are forms of instrumental aggression used to dominate or intimidate others (Geen, 2001, p. 5). The already cited example of a parent speaking harshly to a child falls into this category as well as do tactics in negotiation (Pruitt, Mikolic, Peirce, & Keating, 1993). Bandura (1973a) argued that, since both hostile and instrumental aggression are goal-driven, they should both be seen as instrumental. To address this problem, Zillman came up with new labels for hostile and instrumental aggression, namely annoyance-motivated and incentive-motivated aggression, respectively (Zillman, 1979). Other labels used to distinguish between these two different types of aggression include reactive versus proactive aggression (Dodge & Coie, 1987) and impulsive or spontaneous versus premeditated (Barratt, 1991). These sets of labels are all parallel to the initial concept of hostile versus instrumental aggression. Barratt, Stanford, Felthous and Kent (1997) added a third category, “medically related” aggressive acts, to include symptoms of serious medical and psychiatric disorders. Therefore, most subtypes of aggression can be divided into two groups: the impulsive / reactive /

affective or hostile / non-planned and the premeditated / proactive / instrumental / predatory or controlled (Mathias, Stanford, Marsh, Frick, Moeller, Swann, & Dougherty, 2007). Within a communication interaction, the most readily distinguished manifestations of aggression are nonverbal and verbal forms.

A. Nonverbal aggression

Infante (1988) underscores the importance of nonverbal messages in verbally aggressive communication; they can substitute for words or sentences, while at the same time they reinforce verbally aggressive messages. Infante notes many nonverbal acts can tell a person he or she is incompetent, of low character, or can imply a threat. An angry tone of voice, for example, can be verbally aggressive by making the person feel insecure, anxious, and threatened. Infante gives the following examples of non-verbal gestures that people can construe as aggressive: “shaking a clenched fist, a look of disgust, shaking the head in disbelief, a look of contempt, rolling the eyes, a deep sigh, and tone of voice; they can be stand-alones or serve to reinforce verbally aggressive messages” (p. 22). Aggression can also take the forms of a *direct* attack to the target or an *indirect* one, expressed through people or objects that the target cares about; *active* or overt behaviors; and *passive* or covert actions (Baron & Byrne, 1977, p. 406). All of these constitute different forms in which people express aggression nonverbally.

Rancer, Lin, Durbin, and Faulkner (2010) developed and tested a taxonomy of 51 aggressive nonverbal behaviors, which they divided into five different categories and found the top most hurtful behaviors within each to be as follows:

The top four most hurtful *facial expressions* were giving a look of disdain, frowning, tightened / pursed lips, and scowling; the top four *eye behaviors* included a hard angry stare, rolling of the eyes, averting gaze, and giving the “evil eye;” the *vocalic behaviors* that were found to cause the most hurt included the use of a snap-

ping / sharp / harsh tone, an unintelligible muttering / grumbling under a person's breath, raising of the voice, and laughing using a mocking tone. The top four hurtful *kinesic behaviors* were getting into a person's face/space, turning away of the head, throwing objects at the wall or ground, and slamming doors or other objects with force. The top four *nonverbal disconfirmation behaviors* that were found to cause the most hurt included walking away, stepping back/away, storming away, and giving someone the silent treatment. (pp. 272–273)

Other nonverbal behaviors include pointing fingers, crossing of the arm, “slitting the throat” gesture, giving the finger, and sticking out the tongue, among others. Rancer and colleagues (2010) also found that people high in verbal aggressiveness were more likely to use aggressive nonverbal behaviors “due to reciprocity, disdain, anger, because a discussion degenerated into a nonverbal fight, being taught to use nonverbal aggression, for trying to appear tough, and wanting to be mean to the other person” (p. 280). In addition to these are all the subtle and indirect nonverbal ways in which people in a long-term relationship express aggressiveness towards each other by, for example, intentionally leaving the toothpaste cap off or squeezing the toothpaste tube in a way that the person knows the other person feels vehemently about, to more serious acts like intentionally destroying another person's cherished possession to “get even.”

B. Verbal aggression

Infante and Wigley (1986) conceptualize verbal aggressiveness as a trait opposite of argumentativeness, or the tendency “to advocate positions on controversial issues and to attack verbally the positions which other people take on these issues” (Infante & Rancer, 1982, p. 72). They differentiate verbal aggressiveness and argumentativeness mainly by their loci of attack: while an argumentative person attacks another person's idea or position on an issue, the verbally aggressive person attacks another person's self-concept or character instead (Infante, 1981, 1988; Infante & Rancer, 1982; Infante & Wigley, 1986). Furthermore, Infante (1987, 1988) imagines these two traits as part of a broader construct of “aggressiveness” that consisted of four facets—two constructive (i.e., *assertiveness* and *argumentativeness*) and two destructive ones (i.e., *hostility* and *verbal aggressiveness*). Infante and Wigley (1986) locate this aggressiveness construct within Costa and McCrae's (1980) bigger trait model of per-

sonality, then divided into three main dimensions with six facets each—*neuroticism* (which included anxiety, depression, self-consciousness, vulnerability, impulsiveness, and hostility), *extraversion* (which included attachment, gregariousness, excitement-seeking, positive emotions, activity, and assertiveness), and *openness* (which included fantasy, esthetics, feelings, actions, ideas, and values). Infante and Wigley see the two constructive facets of aggressiveness (i.e., assertiveness and argumentativeness) as occupying the extraversion dimension and the two destructive ones (i.e., hostility and verbal aggressiveness) as occupying the neuroticism dimension (p. 63). Examples of verbal aggressiveness provided by Infante (1988) include “character attacks, competence attacks, insults, maledictions, teasing, ridicule, profanity, threats, background attacks, physical appearance attacks, and nonverbal indicators” (pp. 21–22). Because of the latter, Infante (1987) began employing the term *symbolic aggressiveness*—rather than just “verbal aggressiveness”—so as to include both verbal and nonverbal forms of aggression.

C. Reasons for aggressive communication

Wilmot & Wilmot (1978) define conflict as “an expressed struggle between at least two interdependent parties, who perceive incompatible goals, scarce rewards, and interference from the other party in achieving their goals” (p. 9). This often occurs with *instrumental* symbolic aggression, or the use of verbal and nonverbal aggression for an ulterior motive or goal attainment that does not simply cause harm or injury to the other person. In most instances, instrumental aggression occurs as a result of a (1) perception of scarcity (there can only be *one* winner), (2) perception of incompatible goals or interference with goal attainment (we both want to win but there can only be *one* winner), and (3) perception of interdependence (I can only win in relation to another person and within the context of a competitive social interaction). Wilmot and Wilmot write, “Parties who perceive that the other can interfere with their goal attainment likewise perceive that there are scarce resources—money, land, status, power, or others” (p. 9). This often leads to conflict between people. Covey (1986) explains that part of the problem is that most competitive people are also highly dependent and have a mental framework of “Win/Lose” (there can only be one winner and the other person necessarily becomes the loser) rather than “Win/Win” (both people can win) in their interactions with others (p. 45).

The research to date on symbolic aggression has focused almost exclusively on the verbal manifestation of the aggressiveness trait (for a thorough review of the literature on argumentation and verbal aggression to date, see Avtgis & Rancer, 2010). Infante and Wigley (1986) offer several reasons for verbal aggression: “*frustration* (having a goal blocked by someone, having to deal with a disdained other); *social learning* (individuals are conditioned to behave aggressively and this can include modeling where the person learns the consequences of a behavior vicariously by observing a model such as a character in a television program); *psychopathology* (involves transference where the person attacks with verbally aggressive messages those people who symbolize unresolved conflict); and *argumentative skill deficiency* (individuals resort to verbal aggression because they lack the verbal skills for dealing with social conflict constructively)” (p. 62). Later, Infante (1987, 1988, 1989, 1995) changed “*frustration*” to “*disdain*” or “expressing extreme dislike for someone” (Infante, Chandler, & Rudd, 1989, p. 166). Several scholars have focused on identifying verbal messages that trigger reactive verbal aggressiveness or defensiveness. Jack Gibb (1961) identified six “climates” that he believed would make a person act defensively: *evaluation* (“the sender seems to be evaluating or judging the listener”), *control* (“someone is trying to do something to someone else—to change an attitude, to influence behavior, or to restrict the field of activity”), *strategy* (“the sender is perceived as engaged in a stratagem involving ambiguous and multiple [hidden] motivations”), *neutrality* (“appears to the listener to indicate a lack of concern for his welfare”), *superiority* (“when a person communicates to another that he feels superior in position, power, wealth, intellectual ability, physical characteristics, or other ways”), and *certainty* (“the effects of dogmatism... Those who seem to know the answers, to require no additional data, and to regard themselves as teachers rather than as co-workers”) (pp. 411–416). This last one seems particularly relevant when related to the verbal aggressiveness construct as conceptualized by Infante and Wigley (1986). According to Gibb, people perceive this last group of individuals “as needing to be right, as wanting to win an argument rather than solve a problem, and as seeing his ideas as truths to be defended. This kind of behavior often was associated with acts which others regarded as attempts to exercise control” (p. 415). This points once again to the idea that increasing an individual’s level of argumentativeness, as

Infante, Chandler, and Rudd (1989) suggest, and the argumentative skills deficiency model might actually be counter-productive. (See below, Section 4A.)

Cissna and Sieburg (1986) define disconfirmation as “impl[ying] the relational message, “You do not exist,” and negat[ing] the other as a valid message source” (p. 231). By disconfirming another person and/or his or her message, we risk triggering verbal aggression. Cissna and Sieburg identified the following disconfirming responses: *indifferent* (“denying existence or relation”), *impervious* (“denying self-experience of the other”), and *disqualifying* (“denying the other’s significance”) (p. 233). Disconfirmation by indifference includes denying the presence of the other person, avoiding involvement (which includes impersonal language, avoiding eye contact, physical contact, or other nonverbal “distancing” cues), and rejecting communication through irrelevant or non sequitur-type responses. Imperviousness, on the other hand, “denies or distorts another’s self-expression and fosters dehumanized relationships in which one person perceives another as a pseudo-image rather than as what that person really is” (p. 235). In terms of disqualification, a person can disqualify another person, his or her message, and/or sending a message that disqualifies itself by lacking clarity or incongruity.

Bolton (1986) identifies 12 communication “spoilers” that are

high-risk responses—that is, responses whose impact on communication is frequently (though not inevitably) negative. These roadblocks are more likely to be destructive when one or more persons who are interacting are under stress... They frequently diminish the other’s self-esteem. They tend to trigger defensiveness, resistance, and resentment... (p. 135)

These common communication “roadblocks” include: (1) *criticizing* (“Making a negative evaluation of the other person, her actions, or attitudes”); (2) *name-calling* (“‘Putting down’ or stereotyping the other person”); (3) *diagnosing* (“Analyzing why a person is behaving as she is; playing amateur psychiatrist”); (4) *praising evaluatively* (“Making a positive judgment of the other person, her actions, or attitudes” when these are used “as a gimmick to try to get people to change their behavior” or other ultimate goal that involves manipulation); (5) *ordering* (“Commanding the other person to do what you want to have done”); (6) *threatening* (“Trying to control the other’s actions by warning of negative consequences that you will instigate”); (7) *moralizing*

(“Telling another person what she should do [“preaching”]”); (8) *excessive/inappropriate questioning* (“Closed-ended questions” that cannot “usually be answered in a few words”); (9) *advising* (“Giving the other person a solution to her problems,” particularly if the advice is unwanted or forced); (10) *diverting* (“Pushing the other’s problems aside through distraction”); (11) *logical argument* (“Attempting to convince the other with an appeal to facts or logic, usually without consideration of the emotional factors involved”), and (12) *reassuring* (“Trying to stop the other person from feeling the negative emotions she is experiencing”) (pp. 135–136). Furthermore, they group these roadblocks into three major categories: *judging* (1 through 4), *sending solutions* (5 through 9), and *avoiding the other’s concerns* (10 through 12).

Similarly, Vangelisti (1994) identifies 10 different types of “messages that hurt”: (1) *accusation* (“A charge of fault or offense”); (2) *evaluation* (“A description of value, worth, or quality; (3) *directive* (“An order, set of directions, or a command; (4) *advice* (“A suggestion for a course of action”); (5) *expressing desire* (“A statement of preference; (6) *information* (“A disclosure of information”); (7) *question* (“An inquiry or interrogation”); (8) *threat* (“An expression of intention to inflict some sort of punishment under certain conditions”); (9) *joke* (“A witticism or prank”), and (10) *lie* (“An untrue, deceptive statement or question”) (see Vangelisti, 1994, p. 61 for examples of aggressive statements that fall under each type). In addition to these, specific “buttons” arise between two people who have known each other for some time that can knowingly trigger a verbally aggressive reaction.

Roberto and Eden (2010) identify the following traditional ways in which a student bullies another stu-

dent: “say mean and hurtful things or make fun of him or her, or call him or her mean and hurtful names; completely ignore or exclude him or her from their group of friends or leave him or her out of things on purpose; hit, kick, push, shove around, or lock him or her inside a room; tell lies or spread false rumors about him or her or send mean notes and try to make other students dislike him or her,” among others (pp. 199–200). They define cyberbullying as “the deliberate and repeated use of communication technology by an individual or group to threaten or harm others” (p. 201). Willard (2007) proposes a typology with seven major types of cyberbullying: *flaming* (“Brief heated exchanges involving angry, rude, vulgar, or threatening messages, often in a public setting”), *harassment* (“Repeatedly sending offensive messages”), *denigration* (“Publicly sending or posting untrue or cruel statements about a person”), *impersonation* (“Posing as someone else and sending or posting material that makes that person look bad or places them in danger”), *outing and trickery* (“Sharing embarrassing, private, or sensitive information with others with whom it was never meant to be shared; or, engaging in tricks to solicit such information that is then made public”), *exclusion/ostracism* (“Intentionally excluding a person from an online group”), and *cyberstalking* (“Repeatedly sending threatening or intimidating messages”) (Roberto & Eden, 2010, p. 205). For exclusion/ostracism, Roberto and Eden include using online groups or platforms “to exclude a person from a traditional group.” Other scholars have come up with other types of messages that are very context-specific, like “trash talk” in the context of sports (Kassing & Sanderson, 2010) and heckling in political communication (Seiter & Gass, 2010).

4. Two Competing Models of Verbal Aggression

A. The argumentative skills deficiency model

Infante and Wigley (1986) define verbal aggressiveness as “a personality trait that predisposes persons to attack the self-concepts of other people, instead of, or in addition to, their positions on topics of communication” (p. 61). Further, they propose verbal aggressiveness forms a kind of symbolic aggression, which has its origin in frustration, social learning, psychopathology, and argumentative skills deficiency. (See Section 3C for a full discussion of these components and the corresponding research.)

The argumentative skill deficiency model (ASDM) offers that, in the course of an argument, people who lack the appropriate skills in argumentation will more likely become verbally aggressive, which then could lead to physical aggression. Infante and his colleagues define argumentativeness as “the ability to present and defend positions on the issues, and to attack the positions which other people take (Infante & Rancer, 1982),” and place the construct within the broader trait of assertiveness, “a general tendency to be interpersonally dominant, ascendant, and forceful” (p.

7). ASDM proposes argumentative skills training as a way to reduce the incidence of verbal aggression in our society (Infante, 1988; Infante, Chandler, & Rudd, 1989). In their study of interspousal violence, Infante, Chandler, and Rudd (1989) predict “that violence in a marriage is more likely when both spouses are unskilled argumentatively because the probability of verbal aggression is greater” (p. 167). Several scholars from other disciplines had suggested that verbal aggression often resulted from a lack of appropriate communication skills (Bandura, 1973a; Chandler, 1986; Gelles, 1974; Ponzetti, Cate, & Koval, 1982; Toch, 1969; Watson, 1982; all in Infante et al., 1989). Infante and his colleagues conclude that training people in argumentative skills would help these individuals refrain from becoming verbally aggressive during arguments, thus reducing the possibility of conflicts escalating into physical violence (Infante 1981, 1988, 1995; Rancer & Avtgis, 2006). To that end, Infante (1988) formulated the Inventional System for argumentation around four major issues (i.e., problem, blame, solution, and consequences). He proposes the system, grounded on principles of argumentation and debate, as a tool to help people generate arguments when discussing controversial issues, so that they could argue better and constructively rather than resorting to verbal aggression while in a discussion. Infante’s proposal to reduce verbal aggression by teaching appropriate argumentation skills lines up well with Bandura’s prescription for adopting “constructive coping methods” and developing “competencies that provide new sources of reward” (in this case, in the form of increased self-efficacy and confidence in one’s ability to argue constructively and persuasively) as a way to treat aggression. Many of the components of Infante’s 1988 book emulate Bandura’s cognitive behavioral therapy (CBT) strategies (see Section 5). Wigley (2010) adds to the overall model by identifying Verbal Trigger Events (VTEs), “statements that lead to explosive verbal responses by others,” attitudinal dispositions and thought patterns (self-focused attention, defensiveness, anger rumination, negative urgency, and hypersensitivity) to create awareness of the situational influences that trigger verbal aggression: “The emphasis, here, is not on a paradigm shift but, rather, towards refocusing efforts to examine the triggers of everyday reactive verbal aggression” (Wigley, 2010, p. 397).

The argumentative skills deficiency model coupled with the argumentative skills training programs teaching people how to argue constructively have

served as one diagnosis and treatment to the widespread problem of verbal aggression that is fitting to the field of communication. However, Infante and his colleagues formulated the ASDM within the context of a specific dyad (the intimate relationship between a husband and a wife) and a specific problem (arguments over controversial topics that could trigger interspousal violence) (Infante et al., 1989), but the researchers also offered ASDM as a solution for one specific type of aggression—reactive aggression—marked by the need for each person in the dyad to assume an “attack-and-defend” position as each retaliates against the other until the chain of reciprocity spirals out of control (“aggressiveness begets aggressiveness,” “verbal aggression begets verbal aggression”: Infante, 1988; Rancer & Avtgis, 2006; Wigley, 1998). ASDM does not address other types of aggression that can occur within the dyad and that cannot be remedied by teaching people how to become more skilled debaters. For example, a person motivated to use verbal aggression to manipulate or bully another person will probably not change his or her tactic to rational argumentation. Also, ASDM does not address instances of verbal aggression in contexts beyond the dyad where the rules of argumentation and logic would seem irrelevant, such as the verbal aggression often displayed in sporting events or political demonstrations. By oversimplifying a highly complex problem, the argumentative skills deficiency model overlooks other types of aggression and other contexts that might call for alternative solutions beyond the field’s rhetorical tradition. A review of the literature on aggression shows the difficulty scholars face even to agree on a single definition of aggression (Bandura, 1973a; Baron & Richardson, 1994; Baron & Byrne, 1977; Berkowitz, 1993; Felson & Tedeschi, 1993; Geen, 2001) and how reducing verbal aggression to a skill deficiency problem ignores its greater complexity.

A more serious problem, however, lies with the measure developed by Infante and his colleagues to measure verbal aggressiveness. The Verbal Aggressiveness Scale (VAS), created by Infante and Wigley in 1986 and used in over 100 studies since then to measure verbal aggressiveness, became the focus of much subsequent debate. First, controversy surrounded the *dimensionality* of the scale (Beatty, Rudd, & Valencic, 1999; Chory-Assad, 2002; Infante, Rancer, & Wigley, 2011; Levine, Beatty, Limon, Hamilton, Buck, & Chory-Assad, 2004; Levine & Kotowski, 2010;

Levine, Kotowski, Beatty, Van Kelegom, 2012; Kotowski, Levine, Baker, & Bolt, 2009). Many studies show the presence of a two-factor structure rather than the uni-dimensional scale claimed by Infante and Wigley (1986) and Infante, Rancer, and Wigley (2011). The latter claim that the second orthogonal factor found in the initial factor solution resulted from a methodological artifact—*wording bias*. In fact, Infante and Wigley (1986) have explained that, when developing the VAS, “a special effort was made to reduce defensiveness in responding to items pertaining to behaviors usually considered socially undesirable” (p. 63). Thus, they used statements “When [an aversive communication event takes place], I...” in order to justify behaviors that may be construed as socially undesirable and reduce defensiveness by justifying actions that might be verbally aggressive. Levine, Kotowski and their colleagues contend, however, that the “negatively” worded items constitute a completely different factor, “verbal benevolence,” not just the absence of verbal aggressiveness (Chory-Assad, 2002; Levine et al., 2004; Levine & Kotowski, 2010; Kotowski et al., 2009). The two-factor structure found support as well in studies conducted by Suzuki and Rancer (1994) and Chory-Assad (2009). However, the latter also found that the 20-item VAS and the 10 benevolence items significantly predicted verbal aggressiveness, while the 10 verbally aggressive items did not do so at a statistically significant level. Furthermore, she showed that the standardized beta for the 20-item VAS and the 10 benevolent item component were identical in magnitude, with the coefficient of the 10 benevolent items component inversely related to verbal aggressiveness, although Levine and Kotowski have shown that “the two factors differentially predicted communication outcomes, and, therefore, are not just opposite ends of a single dimension” (Levine & Kotowski, 2010). Pascual-Ferrá (2013) tested both the single-factor and the two-factor approach and showed that, whether the second factor is a latent method effect or a theoretically meaningful construct, a two-factor model is the better fitting model for the Verbal Aggressiveness Scale.

Second, the items’ reliability estimates have also triggered strong debate. While most studies report average reliability estimates in the low .80s for the full 20-item VAS (Rubin, 2009), Beatty et al. (1999) found the alpha of the 10-verbally aggressive and 10-verbally benevolent items to be .82 and .77, respectively. Beatty and his colleagues suggested that, if the researchers removed the 10 benevolent items from the

VAS and replaced them by 10 verbally aggressive items equally reliable as those already in the measure, the alpha for 20 verbally aggressive items would go up to approximately .99, making it a far superior measure. On the other hand, Chory-Assad (2002) found that the reliability of the 10-item verbally aggressive component was only .68 in her study. However, she offered that the alpha, as well as the lack of significant findings in predicting verbal aggressiveness for the verbally aggressive component, could have resulted from the composition (potentially predominantly non-aggressive) and size (only 87 undergraduates) of the sample. Moreover, a study by Beatty, Pascual-Ferrá, and Levine (2014) refers to Raykov’s (2001) assertion that Cronbach’s alpha tends to *underestimate* the reliability of congeneric measures, which have *tau*-equivalent items and independent or random item errors, and to overestimate the reliability of noncongeneric measures, with items that are not tau equivalent and with correlated item errors. The study reports the average correlation between verbal aggressiveness items to be .30, and that between verbal benevolence items to be .27; the measure was found to be noncongeneric. Using a Raykov’s (2001) formula to estimate the reliability of noncongeneric measures using CFA, Beatty and his colleagues found that the reliability coefficients for the 10 verbal aggressiveness items and the 10 verbal benevolence items dropped to .48 and .69, respectively (compared to Cronbach’s alpha coefficients of .80 and .78, respectively). This overestimation is due to spurious effects of the latent variable(s) that inflate inter-item correlations (Pascual-Ferrá, 2013; Pascual-Ferrá & Beatty, 2015). Thus, it seems that the VAS is not as reliable as previously reported, which in turn could have major implications for past and future studies reporting correlations between VAS and other variables.

Third, a number of other researchers have questioned the validity of the measure. Levine et al. (2012) and Kotowski et al. (2009) argue that little if no evidence links VAS scores to actual verbally aggressive behavior, and what little there is, is puny. A meta-analysis conducted by Levine, Kotowski, Beatty, and Van Kelegom (2012) showed that of the total of 125 verbal aggression studies present in the literature, only two studies linked verbal aggression to actual behavior. Although these studies did not focus on testing the argumentative skills deficiency model, they do present an important point in the literature: the lack of studies that link measures of verbal aggression to actual

behavior. Levine and his colleagues argue that, "Predictive and convergent validity requires empirical evidence of strong scale-behavior correspondence, and absent such evidence, validity cannot be presumed" (Levine et al., 2012, p. 97). In their recent meta-analysis of trait-behavior correlations in argumentativeness and verbal aggressiveness, Levine et al. (2012) found that only two out of 125 studies using the VAS correlated VAS scores to VA behavior and found that the trait-behavior correlation was .01. They conclude that, "There is no evidence in the literature that scores on the VAS correlate with actual verbally aggressive behavior . . . what little evidence exists indicates a very weak association, and this is inconsistent with convergent and predictive validity" (p. 107). While Infante, Rancer and Wigley (2011) contend that "a large body of research demonstrates validity of the ARG & VA scales, Levine et al. (2012) counter-argue that those research studies were mostly based on self-reports of projected and recalled communication exchanges and not actual behaviors. They conclude that both the Argumentativeness and the Verbal Aggressiveness scales "fail to measure what they are purported to measure" (Levine & Kotowski, 2010).

Studies demonstrating the effects of argumentative skills training on verbal aggression also have been sparse and mixed (for a review of relevant studies, see Avtgis & Rancer, 2010; Rancer & Avtgis, 2006; also, see Roberto, 1999). Wigley (1998) cites two studies yielding positive results. Colbert (1993) showed that students with experience in competitive debate scored higher in argumentativeness and lower in verbal aggression than the students who did not have the same training in argumentation. Similarly, Sanders, Wiseman, and Gass (1994) found that argumentative skills training increased critical thinking skills and decreased verbal aggressiveness. Ironically, the researchers also found that the training had no effect on the trait argumentativeness of the trainees, and that no statistically significant differences in verbal aggressiveness scores appeared between those who participated in the experimental condition and those who did not. In an experimental study by Roberto & Finucane (1997), students who received training in argumentation reported an increase in their motivation to argue and in their ability to generate more arguments than those who did not. However, the researchers also found that the level of verbal aggressiveness among the students in the experimental condition had also increased immediately after the training. Rancer et al. (1997,

2000) surveyed the same students one year later and found that, while the students' argumentativeness scores had not changed significantly from their scores immediately after the training, their level of verbal aggressiveness had increased significantly after one year (Rancer & Avtgis, 2006). They observe that perhaps the training had not succeeded in helping students distinguish between personal and issue-focused verbal attacks. Wigley (1998) has suggested that maybe "the ASD model only operates in argumentative situations (Infante, Trebing, Shepherd, & Seeds, 1984). If other catalysts operate as trigger mechanisms for aggression, then programs designed to remediate aggressive tendencies through the teaching of argumentation might be ineffective and, therefore, needlessly costly" (p. 209), and "that [if] genetics is the primary cause of verbal aggressiveness, and [if] situational and environmental influences are quite small (Beatty & McCroskey, 1997) . . . then efforts targeting ASD for remediation may be doomed to failure" (p. 210). This trend of findings is not dissimilar to the overall findings for catharsis effects in the broader aggression literature cited above. The idea that "aggression begets aggression" might actually apply here as well. Following Zillmann, there is a possibility that the arousal experienced while debating an argument might lead to an excitation-transfer and increase the person's potential for aggressiveness later on, particularly if the person had already demonstrated a higher level of verbal aggressiveness.

B. The communibiological perspective

The social learning approach taken by Infante and his colleagues stands in stark contrast with the premise of scholars employing a communibiological perspective on verbal aggression (Beatty, McCroskey, & Valencic, 2001). [See the review of communibiology in COMMUNICATION RESEARCH TRENDS, Boren & Veksler, 2011.] Beatty and his colleagues define communibiology as "a paradigm for the study of human communication that emphasizes the role of neurobiological systems in the production of behavior" (Beatty, McCroskey, & Floyd, 2009, p. 3). According to this view, people behave differently due to differences in their neurobiological makeup. In his essay on the future direction of trait theory and research, Beatty (1998) proposed that the study of communication traits needed to be grounded in biology: "To argue that we understand cognitive processes such as encoding, message construction, strategic thinking, planning, anger, and embarrassment

without understanding the role and operation of the brain in regard to our research specialization weakens the intellectual status of our field” (p. 313).

The communibiology paradigm already has been applied to two of the most important traits in communication studies—communication apprehension and verbal aggressiveness. In applying communibiology to verbal aggression, Beatty and McCroskey (1997) established that high levels of trait verbal aggressiveness related to “(1) a low threshold for BAS [behavioral activation system] activity, (2) a low threshold for FFS [fight or flight system] activity, but a high threshold for BIS [behavioral inhibition system]” (p. 453). In other words, people high in aggressiveness resort to verbal aggression when the stimuli in the environment triggers BAS and FFS activity but does not stimulate the BIS system enough to counteract the effect of the others. Several studies have found that verbal aggression correlates with asymmetry in the prefrontal cortex, with more activity occurring in the right prefrontal cortex than the left (Heisel, 2010; Pence, Heisel, Reinhart, Tian, & Beatty, 2011).

A meta-analysis of twin studies by Beatty, Heisel, Hall, Levine, and La France (2002) found aggressiveness to be 58% heritable. Shaw, Kotowski, Boster, and Levine (2012) found that prenatal androgen exposure (PNAE), as indicated in the ratio of the length between the second and the fourth finger, correlated with the verbal aggressiveness trait. (For a more complete review of studies applying communibiology to verbal aggression, see Beatty & Pence, 2010.) Just as scholars criticized Lorenz’s position in his day, several have criticized the communibiological approach to verbal aggression for being too deterministic, presenting a rather pessimistic view of human behavior, and diminishing the potential of people to be shaped by their environment through social learning (Rancer & Avtgis, 2006). Some have dismissed it as not being “traditional,” suggesting that it lies outside the purview of the field of communication (Wigley, 1998). Finally, some of the findings related to the twin studies have been criticized as an oversimplification of the complexity of trait heredity and for coming across as highly dogmatic (McCroskey & Beatty, 2000a, 2000b; Condit, 2000a, 2000b). The latter suggest that around 60% of aggressiveness, and up to 80% of other personality traits, are heritable (Beatty, Heisel, Hall, Levine, & La France, 2002; Beatty & McCroskey, 1998; Beatty & Pence, 2010; Valencic, Beatty, Rudd, Dobos, & Heisel, 1998). Furthermore, a meta-analysis of twin studies looking at

different communication traits, including verbal aggressiveness, found that the environment had “virtually no effects” in explaining variance (Beatty, 2005; Beatty, Heisel, Hall, Levine, & La France, 2002, p. 13), and that “determinants of aggressive behavior which appear to represent situational factors are largely moderated by genetic sources” (Valencic, Beatty, Rudd, Dobos, & Heisel, 1998, p. 337). For these scholars, nature definitely trumps nurture (Beatty & McCroskey, 1997, 1998; Beatty, McCroskey, & Floyd, 2009; Beatty, McCroskey, & Valencic, 2001; Beatty & Pence, 2010). They show that the influence of prenatal hormones (Beatty & McCroskey, 1997, 1998; Beatty, McCroskey, & Pence, 2009; Beatty & Pence, 2010; Shaw, Kotowski, Boster, & Levine, 2012), individual differences in neurobiological activity in the *fight-or-flight system* (FFS), the *behavioral activation system* (BAS) and the *behavioral inhibition system* (BIS) identified by Gray (1991) (Beatty & McCroskey, 1997; Shaw, Kotowski, Boster, & Levine, 2012; Valencic, Beatty, Rudd, Dobos, & Heisel, 1998), and asymmetry in the pre-frontal cortex (Heisel, 2010; Pence, Heisel, Rinehart, Tian, & Beatty, 2011) override any social learning influences on the development of trait verbal aggressiveness.

Beatty & Pence (2010) note, however, that in studies comparing argumentativeness with verbal aggression, individuals with moderate trait argumentativeness generate the most aggressive messages, not the group lower in argumentativeness. They suggest that argumentative skills training for individuals with low to moderate argumentative skills would be inconsistent and counter-intuitive given the evidence already presented by Infante and his colleagues. In other words, training people with low trait argumentativeness to become even moderately argumentative would suggest increasing their level of verbal aggressiveness as well. In his study of the frequency of students suspended for fighting as related to their trait argumentativeness and trait verbal aggressiveness levels, Roberto (1999) hypothesizes that boys high in verbal aggressiveness and low in argumentativeness would have been suspended for fighting more frequently than boys who had other level combinations of these two traits. While he found a verbal aggressiveness main effect, the study shows that the hypothesized combination did not have the predicted effect and, furthermore, that there was no main effect either for level of argumentativeness. In addition, since Infante and Wigley (1986) initially considered argumentativeness and verbal

aggression as two independent constructs, they stipulate a zero correlation between argumentativeness and verbal aggressiveness, and found a $-.04$ correlation in their first validity test. Beatty and Pence (2010) observed that, “Although the adage ‘correlation does not equal causation’ is well known, it is equally true that one variable cannot be taken as the cause of the other if they do not covary. The relationship between argumentativeness and verbal aggression is simply too weak to sustain a causal theory based on the proposition” (p. 18). However, Infante et al. (1984) acknowledged that “verbal aggression may in certain circumstances be related to argumentativeness” (cited in Roberto & Finucane, 1997, p. 23) and later found that ARG and VAS scores of wives in violent and nonviolent marriages correlated $r = .24$ ($p < .05$) and $r = .20$ ($p < .01$), respectively (Infante et al., 1989). Other studies reported similarly significant and even larger correlations (Rancer, Whitecap, Kosberg, & Avtgis, 1997; Roberto & Wilson, 1996; Roberto & Finucane, 1997). As suggested by Beatty and his colleagues, these inconsistencies are difficult to resolve and raise reasonable doubts about the credibility of the argumentativeness skills deficiency model.

For other predictors of aggressive communication, results on personality traits and discriminant validity tests show equally mixed results. The path between psychoticism and verbal aggressiveness in Heisel, La France, and Beatty (2003) was significant ($r = .26$, $p < .05$). In Valencic et al. (1998), the correlation between psychoticism and verbal aggressiveness was both large and significant ($r = .50$, $p < .05$), and psychoticism \times neuroticism (P \times N) had a multiplicative effect that accounted for 27% and psychoticism \times extroversion (P \times E) accounted for 28% of the variance in trait verbal aggressiveness. Together, these predictors accounted for 30.25% of the variance in VAS scores (Valencic et al., 1998). In their original formulation of argumentativeness and verbal aggressiveness as two independent constructs, Infante and his colleagues determined that argumentativeness and verbal aggressiveness occupied the extraversion and neuroticism dimensions of Costa and McCrae’s 1980 trait model of personality. However, in their path model of personality variables and trait aggressiveness, Heisel, La France, and Beatty (2003) found that the path between neuroticism and verbal aggressiveness was not significant but that the one between extraversion and verbal aggression was ($r = -.25$, $p < .05$). Valencic et al. (1998) did not report a main effect for neuroticism on verbal aggression, but based

on their model, neuroticism increased verbal aggressiveness only slightly ($r = .08$) while psychoticism had a significant effect on verbal aggression ($r = .62$) (refer to Figure 13.3 in Hamilton, Buck, Chory, Beatty, & Patrylak, 2009). Beatty, Pascual-Ferrá, and Levine (2014) showed that when the 10 verbal benevolence items were removed from analysis, the remaining 10 verbal aggressiveness items correlated significantly with neuroticism ($r = .23$, $p < .05$) but the 10 verbal benevolence items did not ($r = .049$, n.s.), suggesting that the inclusion of the 10 verbal benevolence items in the scale might actually confound the relationship that Infante and his colleagues had predicted between verbal aggressiveness and neuroticism.

Bandura (1973a) recognized the primacy of neurobiology on human aggression. He understood the consequence of the Delgado’s work controlling aggression in animals through stimulating the hypothalamus. He also talked about how hormones (p. 21), breeding (p. 23), physiology (pp. 26–27), neonatal practices (p. 27), lesions in the subcortical structures of the brain, and dysfunctional neural activity all factored into the aggression equation. He stated the following: “The social learning theory of human aggression adopts the position that man is endowed with neurophysiological mechanisms that enable him to behave aggressively, but the activation of these mechanisms depends upon appropriate stimulation and is subject to cortical control. Therefore, the specific forms that aggressive behavior takes, the frequency with which it is expressed, the situations in which it is displayed, and the specific targets selected for attack are largely determined by social experience” (pp. 29–30). In other words, biology might determine the readiness with which I fight, but how I fight is something I pick up from socializing with others. Biology might determine a criminal’s desire to kill, but how the criminal learned to use weapons is something different. Perhaps this is what Bandura means when he writes that, “People are not born with performed repertoires of aggressive behavior; they must learn them in one way or another” (p. 61). Thus, we should include social learning effects, even if the ratio of genetics to social environment in traits like communication apprehension is something close to 80:20, as Beatty, McCroskey and Heisel (1998) have proposed. The multiplicative effect of biological preconditions and social learning together might account for much of the variance in the manifestation of verbal aggression, while holding environmental factors (including socioeconomic) constant.

5. Conclusion

This essay does not intend to present an exhaustive review of the literature on aggression, which is extensive. For example, this review has not considered other social and environmental factors linked to aggression that are also important, such as heat, crowding, noise, pollution, cultural norms, exposure to violent media, social structures, and group dynamics such as mob behavior, which involves many interesting theories like contagion theory, convergence theory, emergent-norm theory, deindividuation theory, and socio-cultural theories, among others (see Baron & Byrne, 1977; Felson & Tedeschi, 1993; Flannery, Vazsonyi, & Waldman, 2007; Geen & Donnerstein, 1983; Goldstein, 1994; Huesmann, 1994; Shaver & Mikulincer, 2011). Rather, the review has aimed to demonstrate aggression as a highly complex phenomenon that has baffled most of the scholars who have attempted to explain it. Therefore, I sought to show how reducing any form of aggression, such as verbal aggression, to a one-factor explanation, such as skills deficiency, can be problematic.

We know from the literature on aggression that frustration can lead to aggression, particularly in the presence of aggressive cues (Berkowitz, 1962). However, frustration and the presence of aversive stimuli do not necessarily lead to aggression. Aggression can result from a cognitive deficiency (e.g. Crick & Dodge, 1994), medical conditions, or biological predispositions (Barratt, 1991; Beatty & McCroskey, 1997; Coccaro, 2003; Nelson, 2006; Siegel, 2005); it can be exacerbated by social, economic, cultural and environmental problems such as heat, crowding, noise and pollution, among others (Baron & Byrne, 1977). It can be triggered by group dynamics through contagion, deindividuation, emergent norms, and convergence (e.g. Goldstein, 1994). Residues from physical exertion, exposure to violent media or erotica, arousing comedy, and sexual arousal can intensify aggressive behavior, though some of this appears short-lived (Zillmann, 1979). Also, people who tend to dwell on negative thoughts and replay negative experiences in their heads can become aggressive even after some time has passed since the triggering event. Aggression does not have to be emotional, hostile, or even reactive; it can be premeditated,

incentive-motivated, or proactive without springing from frustration or anger. A person can use instrumental aggression for the purpose of manipulating or dominating others (Knutson, 1973; Tedeschi, 1983); as a means to another end not related to aggression (e.g., material rewards—think Gordon Gekko, the character from the movie *Wall Street*); to increase self-esteem, sense of power, maintain social equity; for self-aggrandizement (Bandura, 1973a; Chadwick-Jones, 1976; Dengenerik & Covey, 1983; Feshbach, 1964; Walster, Berscheid, & Walster, 1973); or simply to stop being attacked, abused, mistreated, or bullied by another person(s) (Bandura, 1973a; Buss, 1961).

Many scholars do agree that people can pick up or learn aggressive patterns of behavior from the environment and that a person's perception and cognitive processing of a situation, especially when accompanied with negative affect (Berkowitz, 1993) will inform his or her reaction. Finally, almost everyone agrees that some people seem more naturally predisposed to aggression than others, and that some aggression is inherently biological, although to what extent depends on the scholar and where that person stands on the "nature vs. nurture" debate. Beyond the pharmacological and more invasive treatments for aggression, catharsis theory proved very popular for a while. Freud's idea that venting and releasing some steam by engaging in smaller, less harmful acts of aggression as a form of "cathartic discharge" that would succeed in "draining" pent-up aggressive energy was popular for some time (Buss, 1961; Dollard et al., 1939; Lorenz, 1966). The idea of re-directing or displacing one's aggression on to an object or another person (not the original target but a licensed therapist, or, for that matter, a Bobo doll), by channeling it through competitive contact sports like boxing or wrestling, or through role-playing and imagined acts of aggression ("fantasy violence") were also considered feasible alternatives. Lorenz (1966) suggested that the Olympic games were a far healthier way for the nations of the world to channel their "collective militant enthusiasm" (p. 272).

However, research studies have not supported the catharsis effect of reducing aggression (Bushman, Baumeister, & Stack, 1999). If anything, some evidence suggests the opposite—that the catharsis act

ends up reinforcing and even rewarding aggression in the individual, leading him or her to more acts of aggression (Bandura, 1973a; Baron & Richardson, 1994; Berkowitz, 1993; Bushman, Baumeister, and Stack, 1999; Buss, 1961; Geen, 2001; Zillmann, 1979). Bandura provides ample evidence that catharsis actually reinforces rather than reduces aggression (Feshbach, 1956; Freeman, 1962; Kahn, 1966; Kenny, 1952; Nelson, 1969; all cited in Bandura, 1973b, p. 208). In other words, “aggressiveness begets aggressiveness,” just like “verbal aggression begets verbal aggression” (Infante, 1988; Rancer & Avtgis, 2006; Wigley, 1998). Instead, Bandura believes that social learning theory provides both an explanation and a better treatment for aggression (Bandura, 1969). According to Bandura, social learning offers the following approaches to treat aggression: “modeling alternative modes of response (Chittenden 1942); selective reinforcement in which aggressive actions are nonrewarded while constructive coping methods are actively supported (Hawkins et al. 1966; Patterson, Cobb, & Ray 1971; Sloane, Johnson, & Bijou 1967; Zeilberger, Sampen & Sloane 1968), elimination of fantasied instigators of violent outbursts (Agras 1967), and development of competencies that provide new sources of reward (Staats and Butterfield 1965)” (Bandura, 1973b, p. 208). He also shows that “cognitively restructuring the provocative situation” (Kaufmann & Feshbach, 1963) and explaining the motives of an obnoxious student to his peers (Mallick & McCandless, 1966) reduced students’ tendency to behave aggressively (both in Bandura, 1973b, p. 208). Around 1975, cognitive-behavioral therapy (CBT) and anger management programs became legitimate forms of treatment for aggression. Today, the latter involves understanding “situational activators (‘triggers’), how thoughts and beliefs influence anger, self-observation, relaxation techniques, problem solving, conflict resolution strategies, and other CBT coping skills, such as calming self-statements, communication of emotions, and appropriate assertiveness” (Novaco, 2007, p. 39; for different reviews of the literature on the use of CBT to treat aggression, see Cavell & Malcolm, 2007; Coccaro, 2003).

More recent models and theories of aggression such as the General Affective Aggression Model (GAAM) (see DeWall & Anderson, 2011), the *I³ theory* (“I-cubed theory”; see Slotter & Finkel, 2011) and the “biopsychosocial” approach (Berman, McCloskey, & Broman-Fulks, 2003), include biology and cognitive processes as part of a broader, more holistic, and com-

prehensive model without disregarding the role of the environment and social learning. In the end, the answer to the question of what causes aggression and how we can predict it best probably lies closer to the view articulated by Eron:

No one of these factors by itself can explain much of the variance in the extent and intensity of violent behavior in the population, much less predict who will engage in such behavior. It is only when there is a convergence of a number of variables that aggressive or violent behavior occurs (Eron, 1982). Aggressive behavior does not routinely occur, however, even when these factors do converge. (Eron, 1994, p. 9)

As evident in the verbal aggression literature, most of the research reviewed either focused on the root causes of verbal aggression and/or trying to understand what triggers it. Some research has looked at the use of different techniques to reduce verbal aggressiveness, but the evidence is mixed at best and there is no consensus on whether these treatments are effective in reducing verbal aggressiveness. Moreover, there are serious criticisms of the way we have measured verbal aggressiveness traditionally, ranging from the dimensionality to the reliability of the VAS. All this would throw into question many of the results published in the literature that uses the VAS as the main measure of the construct. Pascual-Ferrá (2013) and Beatty, Pascual-Ferrá, and Levine (2014) have suggested using a modified 10-scale version of the VAS instead. Future researchers using the scale should consider comparing their results from the full 20-item to the 10-item scale, in addition to looking at the correlated item errors that indicate the the presence of latent factors.

The study of verbal aggression should interest communication scholars, sociologists, social psychologists, and linguists studying the effect of language and communication on society, especially in light of the recent political climate and political rhetoric in the United States. Does the use of verbally aggressive language by politicians in fact “embolden” voters to express unpopular opinions that may violate our shared understanding of what is “politically correct”? Does the aggressive language itself lead to aggressive behavior?

Future research should attempt to establish strong correlations between the trait as measured and the trait as observed. Scholars should continue to look for connections between traits and actual behavior, and between verbal aggression and physical aggression. Researchers should pay more attention to the root of verbal aggression in each individual, rather than

attempting to develop a one-size-fits-all solution to reduce verbal aggression. The latter path includes complicating what we mean regarding verbal aggression by considering its openly hostile, instrumental, and functional forms, and by asking whether it emerges from frustration, social learning and upbringing, and/or the individual's psychological makeup. The study of aggressive communication has endless applications, and studies in this area can contribute to understanding and re-educating others on the consequences verbal aggression can have not only for individual lives but also for the moral fabric of society.

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Book Reviews

Kurylo, Anastacia and Tatyana Dumova (Eds.). *Social Networking: Redefining Communication in the Digital Age*. Madison, NJ: Fairleigh Dickinson University Press, 2016. Pp. xii, 189. ISBN 978-1-61147-738-2 (cloth) \$70.00; 978-1-61147-739-9 (e-Book) \$69.99.

To those seeking a fascinating book filled with various perspectives and ideas, I recommend *Social Networking: Redefining Communication in the Digital Age* edited by Anastacia Kurylo and Tatyana Dumova. This book contains 10 essays by various authors, all writing about how social media and networking have created a substantial power in the world. From the communicative, social, and cultural changes to the political, historical, and economic impacts—social media have touched individuals, groups, and society as a whole. These chapters explain social networking sites and the usage, adoption, new perspectives, connectedness, and ideas they have sparked. Ultimately, this book contains a variety of professional perspectives backed by research. This review will briefly touch on the contents of each chapter.

In the first chapter, “Together and Apart: Social and Technical Networks” Guy Merchant leads the reader to understand that we are all interconnected by social networking sites. Merchant states, “It could be argued that to be fully part of the 21st century one needs to perform a sustained and continuously refreshed social presence, making visible one’s experiences through multiple connections with others” (p. 9). By social presence, he means the willingness to consistently share who we are with, where we are, and what we are doing on these social networking sites. Essentially, one must create a “narrative of self” and share it with others (p. 13).

To understand how social networks got to where they are today, Merchant reviews the history of social networking and social media starting with bulletin boards and the chat function. Later enhancements included making a user profile visible to others, listing friends, and creating a news feed. A whole new vocab-

ulary has emerged as social networking grew, and Merchant analyzes specifically the new meaning of the word “network.” Network now refers to interconnectedness that social media has created and ultimately the interconnectedness of the Internet itself—made up of people and technologies. Merchant also looks into the difference between social and technical networks. He finds that bringing them together is significant. Overall, Merchant tells the reader that social networking, and studying social networking, is relevant to everyone.

In “The Application of Traditional Social Network Theory to Socially Interactive Technologies: A Reconceptualization of Communication Principles,” Corey Jay Liberman discusses several theories and terminologies. One question he addresses is, “What makes people want to be a member of a social network?” Liberman believes that they see a group that has people who have similar qualities to theirs and by joining that group, a person must gain something, and in return the group gains as well.

Liberman explains many basic terminologies of social networking, including Centrality. Specifically, degree centrality occurs when one person (a node) connects with many others (ties) on social media. The more ties a node has, the more “noteworthy” the node becomes, giving it degree centrality. Having degree centrality can give a node qualities such as power and trust by other nodes (p. 28). Degree centrality can vary by different social networks. Liberman also considers homophily or similarity on networks, asking whether homophily draws people together or results from their common participation in the network. Liberman believes that the study of non-mediated social networks has had a great effect and is extremely useful for the study of mediated social networks.

The third chapter, “Social Networking Sites, Self Disclosure, and Personal Engagement” (Pamela J. Kalbfleisch) discusses how people interact with social media sites on a personal level, using dating sites as an example. Kalbfleisch explains the positives and negatives of self disclosure, backing them with research. When it comes to appearance on social media, she points out how even the amount of connections or “friends” one has on social media can give others a perception of whether they are “cool” or not (p. 48). Kalbfleisch also discusses the benefits and drawbacks of social interaction and creating relationships through social media, giving the example of how relationships can be ended in painfully spelled-out ways, such as by

people not only breaking up face-to-face but also blocking one another's writing on social media. In addition, social media can also be a place where the opposite happens, and relationships are rekindled. In the end, Kalbfleisch leaves the reader with many questions. She ultimately states, "It is clear that the future is bright for those interested in studying personal engagement with social networking sites" (p. 50). This statement, I believe, is one of the greatest quotes in this book.

Giuseppe Lugano begins his chapter, "Mobile Social Networking," by defining relevant terminologies. This leads to an introduction of how mobile social networking has evolved through the last decade. Lugano goes through the evolution by discussing the iPhone, Web 2.0, Mobile 2.0, digital communities, and more. Lugano talks about what he calls the "exploratory" and "growth and maturity" stages. The exploratory stage occurred when smartphones first emerged, and the growth and maturity stage took place when complete digital conversion occurred (p. 55). The author also goes into great detail on the research about mobile social networking, providing a table mapping out research perspectives. He explains the difference between SMS-based, client-based, and cross media-based categories. In addition, Lugano touches on the marketing and societal perspective of mobile social networking and how it will impact the future, including a prediction of human-robotic social networks.

"Students, the Ivory Tower, and Educational Uses of Social Networking Sites" by Kurylo and Yifeng Hu was definitely worth the read. This chapter discussed how social networking should increase integration in teaching and learning. The authors believe that students, particularly in college, are not taking full advantage of social networking sites that could improve their professional network, an example being LinkedIn. The stereotype of the Ivory Tower for academics was proved wrong in this chapter. Beginning with the stereotypes of academic persons having the characteristics of lacking common sense, feeling elite, and being distant and isolated, the authors directly point out why they are not true, and how social networking sites can improve both teaching and learning. Kurylo and Hu identify the reservations that students and teachers have to using social networking sites in education, but also state, "The use of SNS in education yields a variety of positive outcomes for students" (p. 83). For me, as a student, this was very a very interesting read.

In "The Illusion of Control: A Historiographical Examination of Social Media, Bookmarking, and Perceived Control in the Digital Sphere," Pamela E. Walck and Hans K. Meyer offer an extremely fascinating history. They begin with by reminding readers how when reading books, people tend to place a bookmark inside to save a page placement for a later day. With social media, people perform a similar practice, and can share the things that they want to save. In fact, on social media, "this kind of sharing leaves us with more than when we started" (p. 94). Few people realize that companies actually make money by people's sharing on social media. Walck and Meyer explain that when people share information, they are mostly likely motivated by gratification of their needs, citing the social cognitive theory and how people gain necessary social support from like-minded people. Often times, many people will alter what is being shared, and it will change as time goes on; a Wikipedia page provides the key example for Walck and Meyer. The authors also use Amazon.com as another example of how interaction with customers has changed over the years, such as customer reviews and wish lists. As a user of social media, this sentence particularly stood out to me, "While most Facebook users may assume their feeds are populated by random stories, posts, and tags from friends and acquaintances, this is far from reality" (p. 99). The authors further explain the algorithms behind what people see everyday on their social media; social media content does not appear by chance or randomly as many consumers assume. Another surprise in this chapter came with the discussion of the interesting differences in social media use based on gender, as, for example, the high level of female participation in the social media site Pinterest. Overall, the chapter touched on the "illusion of control" that consumers of social media believe that they have, while the natural tendencies to bookmark and share information have a lot more going into them than meets the eye.

"Social Networking in Times of Crisis" (Hayley Watson, Kush Wadhwa, Lemi Baruh, and Salvatore Scifo) explains how people reach to social media in crisis situations. This chapter lists numerous examples of disasters and times of distress that were shared and discussed on social media, something that resonates, as I have done exactly the same thing with social media quite a few times in crisis situations. The authors state, "communication is often in the form of risk communication, that is, informing other of the risks they potentially face" (p. 113). The information shared about a

crisis situation helps people prepare for the dangers that they or others face and helps spread awareness of the situation world-wide. The authors separate how people use media in crisis situations: to reach the public directly or to go through organizations. They note the challenges that social media bring when communicating about crises, such as the resistance and organizational structure of social media itself. Some of the biggest challenges they identify include information's becoming lost in the mass amount on social media, and the miscommunication of facts. Overall, this chapter traces how that crisis information takes place through social media, and the benefits and drawbacks to this.

Zeynep Günel and Lemi Baruh begin their chapter, "Social Networking Technologies and Social Movements" by stating that social media sites' increased popularity is "causing significant changes in collective movements" (p. 131). In addition, "Activists are able to organize, collaborate, and mobilize at greater speeds and lower costs" (p. 131). An example of such activist organization is the videos of police violence streamed during the Egyptian revolution, which led to uproar and anger of people around the world and led to people joining the protest. Not only has social media helped activists gain followers and changed the organization tactics of networks, but they also have increased the connections of people around the world with speed and personal impact. Another example that the authors provide comes from social media's role in the Occupy Wall Street cause. There are both positives and negatives of social media use with activist movements, such as, an incredible way to spread information while running the risk of having that information monitored by the state. In general, social media have increased the speed and effectiveness of many activist causes.

In "Networked Activism in China" Zixue Tai gives a detailed explanation of China's economical and political background paired with the rise of networked activism. The Chinese Communist Party keeps a tight hold on the mainstream media. "Local and state propaganda departments still often issue directives to pull strings as to what is to be covered in the media" (p. 147). This provides an interesting situation to study, due to the sheer population of China, the numerous media outputs and severe control and surveillance by the government. The chapter points out that despite the regulations, the Chinese people contribute and consume a large amount of media, and many have the common belief that they can enhance change through

their participation. Despite the governmental control, microblogging has become an output for people to express controversial concerns on a large scale. It is no wonder that the people have found places to vent about their ideas, leading to a rise in digital activism and networks of protests. This chapter includes a few examples of protests that began online and grew with popularity. Tai predicts that the coming years will see changes in the balance of the strict media laws and the increase in collaboration of the technological movements.

The final chapter of this book, "Social Network Research Methods: Approaches and Key Issues" comes from Dumova, one of the book's editors. She notes that analyzing social networks presents interesting challenges to the researcher. One can study everyone from individuals to gigantic groups of people, from a number of perspectives and subjects. In addition, there exist a vast number of social networking sites to study in qualitative, quantitative, and a mix of other approaches. Dumova points out the methodological struggles with studying social networking, including the levels of analysis, data sources, sampling strategies, and ethical and use strategies. Dumova does a thorough job of explaining the methodological approaches to researching social networks, and constructively points out the challenges.

I recommend this book to all undergraduate and graduate students, teachers, researchers, and anyone interested in social networking. Each chapter offers valuable information and carries an important perspective on social media and networking. There is much to be learned about the history of social media, where it is today, and where it will be tomorrow in all aspects of study. Social networking is a part of everyday life for the majority of the world, making this read a necessity.

The books contains an index; each chapter has its own endnotes and reference list.

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Squire, Jason E. (Ed.). *The Movie Business Book* (fourth edition). New York: Routledge (A Focal Press Book), 2017. Pp. xxiii, 628. ISBN 978-1-138-65627-7 (cloth) \$114.75; 978-1-138-65629-1 (paper) \$38.21.

Where many books about film present the topic as either a history of cinema or as a critical exercise in interpreting films, this edited collection introduces film making as a production process and as a movie busi-

ness. Edited by Jason Squire, an associate professor of practice at the University of Southern California School of Cinematic Arts, it draws on the experience of film professionals. Most of the chapters in the collection are authored by people working in the industry; for example, the material about producing films and the role of the producer comes from Michael London, a Los Angeles-based producer. Similarly in the chapter on directing the reader gains the experience of Doug Liman, a New York director.

Squire begins with an introduction that sets the stage by identifying some of the “disrupters” that have changed the movie business: the Internet as both a distribution medium and as a venue for low-cost production, the multiplication of screen technologies, the collapse of the traditional release windows, a qualitative change in the customers and their expectations, increased costs, and the rise of piracy. Squire then identifies the traditional movie business in terms of its industrial segments (production, distribution, exhibition) and its stages of production (development, pre-production, production, and post-production). He also briefly introduces the business models current in the Hollywood process.

The rest of the book itself follows the organizational principle identified as the stages of production—the progression of film making from beginning to end. Like every film, the book begins with the development of a film and ends with its international distribution. Individual sections examine the creators, the “property,” money, management, “the deal,” production, marketing, revenue streams, theatrical distribution, theatrical exhibition, home entertainment and self distribution, the DIY model, consumer products, international film, and a look to the future. This list of section headings gives a very good outline of the industry itself—not only particular practices within the industry but also the attitudes and production tasks and hurdles that an individual working on film must face.

The first section, “The Creators,” introduces the reader to the role of the producer, the director, and the film maker. “The entrepreneurial independent producer initiates the movie. The job is akin to a general contractor building a house” (p. 19). Liman likens the job of the director to that of a storyteller; he illustrates the tasks involved by references to his own work. This leads directly to the second section about intellectual property—the idea or story or script that a producer and writer will develop. These chapters address the role of the screenwriter as well as of the agent (who repre-

sents the screenwriter and the other participants), and of the story editor; a final chapter introduces intellectual property rights. This last chapter takes into account the management of property rights and the legal side of the film making industry. For those less familiar with intellectual property, this chapter provides an excellent introduction in very accessible terms. The third section of the book examines money and film finance. Here the reader meets an entertainment lawyer who deals with the money behind the films, a compliance consultant who details how people are actually paid in the film making process, and a financial analyst who shows how the markets evaluate the movie companies themselves. The movie business can require large sums of money, most of it coming from investors who seek a return on their investment, a process detailed in the three chapters of this section.

After people have secured the intellectual property and financing, the next step moves closer to production. And so, this section of the book examines the management of making films. Typically, in the Hollywood model, studios fill this function. The section includes chapters from the perspective of the studio chairman, in this instance Alan Horn of the Walt Disney Studios. Another perspective comes from Marvel Studios, in a chapter authored by Kevin Feige, its president. The complexity of the studio role appears in a chapter by David Picker, the former president of Columbia Pictures, Paramount Pictures, United Artists, who describes “the movie company as financier-distributor” (p. 158). To keep the reader aware of the changing world of the movie business, Barbara Boyle describes the role of independent producers.

All manner of agreements and contracts figure into the movie business. Section 5 explores the roles of the entertainment lawyer and the talent agent; while readers will probably know something about both, the chapters offer more detail about these jobs. Stephen Kravit focuses on the business affairs, writing “within a fully structured company, business affairs (or deal making) ranks as one of the five key management-level divisions, along with production, distribution (or sales), marketing, and finance, all reporting to the chief operating officer” (p. 187). This division handles all things dealing with contracts and money. Another lesser known (but logically predictable) aspect of the business deals with insurance: the completion guarantee. “The completion guarantor is a company that guarantees motion pictures, television, or other entertainment will be produced on time, on budget, and according to

contractual specifications with distributors” (p. 199). Steve Mangel introduces the reader to its various aspects: proof of funds, legal documentation, monitoring, delivery, and claims.

The book then moves into the actual process of production with chapters breaking the process down into production management and production workflow. The first chapter here examines production management with a personal account by Michael Grillo whose career spans every aspect of production. Grillo gives examples of a production budget (with “above the line” and “below the line” costs) and a seven page outline of the steps of film making from pre-production to a sample list of credits. The second chapter, by Allen Kupetsky, the second assistant director for the film *The Social Network*, presents a case study of film practice, based on that motion picture, including script pages, shooting schedule, call sheet, and production reports.

As much work goes on in the film process after the completion of the post-production work on the film as took place in making the film itself. Several sections address these activities. Motion picture marketing includes market research, publicity, advertising, third-party promotions, and both media and online activities. Kevin Goetz offers a chapter specifically introducing market research, outlining the regular practices. Another kind of marketing takes places through film festivals, which provide both screening and award opportunities as well as sales venues. Steve Montal includes a January to December calendar of festivals, a description of key festivals, and key questions for the production team as they choose the festivals for the release of their films.

The second post-film section examines revenue streams. Linda Benjamin takes the reader through the concept of release windows (when and by which media the film will reach the public) and the potential revenue from each. These include the full range of possibilities running from theatrical release through to the timing of online streaming. Each of these releases provides revenue for the studio. Ilan Haimoff offers a simple introduction to studio accounting, with several very helpful sample case studies.

Though already alluded to in the chapter on release windows, the practices of film distribution need separate treatment. Here two chapters each examine a different distribution model. Daniel Fellman looks at the studio distribution and Tom Quinn examines independent distribution. Each of these writers works in the industry, representing either studios or independent

releases. The next section of the book moves from distribution to exhibition. Exhibition forms a business in itself. Here, Shari Redstone, the president of National Amusements, one of the largest theater theatrical owners in the United States, describes the business and its components. She covers a range of key topics from film booking to film rental to theater design and the various kinds of projection systems. A different perspective comes from the independent exhibitor. Robert Laemmle and Greg Laemmle, the chairman and president of Laemmle Theatres, respectively, provide a history of their company as an example the independents, covering corporate organization and revenue planning.

Another avenue for exhibition takes place through home entertainment or by way of self distribution. This section of the book provides a chapter on each. All of the major studios have a home entertainment division; the chapter on home entertainment comes from Ronald Sanders, the president of Warner Bros. Worldwide Home Entertainment. Home distribution began with videotapes and has moved through DVDs and Blu-ray technology to downloads. Sanders briefly introduces each and then summarizes the licensing and financial aspects involved, noting that complex legal requirements necessitate each country having its own managing director. Jamie Wilkinson, the founder of an e-commerce platform for film and television, describes the process of online self-distribution. Self-distribution refers to how new film makers can distribute their own work online and includes video-sharing sites (like YouTube, Snagfilms, and Vimeo), aggregators (intermediaries like Amazon, iTunes, Hulu, and Netflix) and self-distribution (using tools like Distrify, Reelhouse, and VHX). He concludes the chapter with 30 “lessons” gleaned from his company’s data, including “1. YouTube traffic converts to sales at a rate twice that of traffic from Twitter or Facebook” and “18. Consider giving away the first 10 minutes of your movie for free. This is an effective way to attract audiences” (pp. 455, 457).

A new aspect of film making in the movie business comes from what the editors called the DIY or do-it-yourself model. Squire introduces this particular approach to film, providing its history, key aspects, and lessons on audience demographics and film festivals. He includes examples from 2005–2015, with the latter year seeing *Tangerine*, a film “shot entirely on an iPhone 5s” (p. 473). Eric Fleischman, independent producer, describes how the model works by drawing on his own experience.

Another revenue stream for film studios and independent producers comes from consumer products. These products include models of the characters appearing in a film, clothing lines based on the film or its advertising, or other consumer products linked to the film (toys with the film logo, for example). Each increases the revenue of a given film. Al Ovadia, whose company focuses on the sale of children's television, describes the product cycle related to such marketing.

The film industry has become even more of an international industry than in the past; Section 14 examines global markets, with an additional chapter just on the Chinese market. Rob Aft of Compliance Consulting provides an overview of how studios and independent producers work in the global arena, covering topics ranging from "rights deals" to pre-sales, to financing with global partners. He offers brief introductions to film making in and with China, Germany, the UK, France, Japan, Latin American countries, Russia, Spain, Australia and New Zealand, Italy, the Benelux countries, the Scandinavian countries, Korea, Japan, and the other Asian countries. Given its growing importance, Shaoyi Sun devotes a separate chapter to China, noting that "By 2012 China had overtaken Japan to become the world's second-largest film market after North America" (p. 529). He introduces the major players—studios, exhibitors, and government entities.

Finally the book ends with a look at the future or, better, a look at the future based on the past. Dan Ochiva walks the reader through entertainment technologies, beginning with early film processes and ending with digital film making. He describes the technical specifics of each step of both production and distribution. He concludes by noting that the field continues to grow and develop rapidly, much more so that an essay written even a year ago can foresee. This will always create a area of uncertainty and an opportunity for the industry itself.

The Movie Business Book provides a very comprehensive look at the film industry, not from the perspective of scholars, but from that of practitioners. This will be a very valuable book for students interested simply in how the industry works, and for those interested in a career within that industry. Given its perspective, this collection provides a wonderful resource and a complement to other film studies texts. The book contains a detailed index but, as a non-scholarly book, it does not offer a bibliography or reference list.

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Valerio Fuenzalida of the Pontificia Universidad Católica de Chile writes in response to TRENDS' review of research on soap operas, pointing out a number of additional resources about work in Latin America. He describes an ongoing international research effort on telenovelas and soap operas. "This effort is named Obitel (observatorio de la telenovela iberoamericana): Chile, Argentina, Brazil, Uruguay, Ecuador, Colombia, Venezuela, México, Spain, Portugal, Perú, Hispanic USA. Each country writes down its own chapter with a common scheme and a defined number of pages. So we have 10 books with the evolution of telenovelas in each country and an annual overview written by the editors Immacolata Vasallo de Lopes (Brazil) and Guillermo Orozco (México). The books have been published in Portuguese, Spanish, and English. The quantitative analysis exhibits common ratings valid for the whole TV in the America. The effort is the most important serial analysis of telenovela in Iberoamerica and perhaps in the world." All of the work Professor Fuenzalida mentions are available on the Obitel website: <http://obitel.net>

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