# Shyness, Social Anxiety, and Social Phobia

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#### INTRODUCTION

In 1971, one of us conducted the now well-known Stanford Prison Experiment (Zimbardo, 1977), a study with the purpose of examining the role of situational factors in producing behaviors, thoughts, and feelings typically assumed to manifest as dispositional attributes of the person, such as sadism or submissiveness. Preselected normal college students, randomly assigned to play the role of prisoner or guard in a simulated prison, were having such extreme reactions—extreme stress as prisoners, and brutal and sadistic behavior as guards—that they had to be released early. The study demonstrated how powerful context and situation are in producing the syndrome of affect, behavior and cognition relating to authoritarianism, aggression, submission and despair.

One conclusion pointed out in the post-mortem seminar and analysis of that experiment was that the coercive control that typified the guard mentality and the passive-reactive mentality of the prisoners seemed to be combined in the mental makeup of the shy person. The "guard self" issued constraining demands that limited the freedoms of the behaving aspect of the "shy self"; the shy person reluctantly submitted and thereby lost personal autonomy and a sense of personal esteem. That conceptualization led to considering the situational and personal determinants of shyness in adults, and in turn, to a long-term research program, The Stanford Shyness Program (Zimbardo, 1977). The Stanford Clinic was founded in 1977, and later renamed The Shyness Clinic.

From the outset, the Shyness Clinic's programs were designed to meet the expressed needs of people in our community. Responses to the initial Stanford Shyness Survey (see appendix in Zimbardo, 1977) served as guidelines for selecting techniques to help shy individuals who sought its services. Therapists

helped clients implement strategies that addressed their concerns about their negative thoughts, inhibited or overactive behaviors, painful emotions, and difficulty regulating uncomfortable physiological arousal. Over the subsequent three decades, we learned much from our interactions with clients, our own empirical research, and emerging relevant developments in the fields of social psychology, personality theory, and clinical psychology.

The early sections of this chapter will introduce you to the spectrum and psychological manifestations of types of social avoidance—from shyness to social phobia—and describe new findings about both the fluidity and discreteness of the categories. We will describe how and when shyness and its more extreme manifestations originate. We will not address cultural variations or comorbidity of the various categories, which can be found in the second edition of this book (Henderson & Zimbardo, 2010).

That latter portion of this chapter will be devoted to research and techniques for shyness that have informed our Shyness Clinic and the successful treatment of clients, including our "Social Fitness Training" and, more recently, Compassion-Focused Therapy.

# **Social Backdrop**

During the personal growth movement, which straddled the 1970s, many people adopted the posture that it was up to individuals to make their lives better. "I can do it" captured the directives of the day: self-responsibility and self-efficacy. Following that period, psychology became increasingly medicalized. Extreme shyness was conceptualized as a psychological disorder, social phobia, a relatively rare but serious problem within the person, treatable by doctors/professionals acting on the person. Unfortunately, this scheme would logically serve to increase the passivity and pessimism of those already feeling that they are helpless and passive observers of life. Our overarching treatment mission at the clinic—one about which we are quite passionate—has been to guide individuals in ways that empower them to help themselves. We have sought to promote the idea that our clients can overcome their inhibitions and become more socially comfortable and competent, indeed, even that they should do so, given that as social beings, each of us has important and valuable contributions to make to the general community.

While directing the Shyness Clinic for over 25 years, one of us developed a new model to guide our treatment program. We operated based on the belief that even extreme shyness is best conceptualized as a state of inadequate "social fitness," analogous to inadequate physical fitness. This analogy is useful in several ways and on several levels. It allows an ecological analysis that takes into account the fit between characteristics and goals of the individual, and the demands and expectations of the social environment, as each varies over time and across situations. Rather than dichotomizing people into categories of "socially phobic" or "not socially phobic," "socially anxious" or "not socially anxious,"

"shy" or "not shy," the model admits to a continuum for each dimension, which we believe better accords with reality: Few of us may be considered worldclass social athletes, just as few are world-class physical athletes. Moreover, the model accommodates varying definitions of "world-class" across cultures, and across situations within a given culture. The usefulness of the metaphor is illustrated by the fact that social fitness, like physical fitness, is importantly determined by the amount of time and effort spent exercising social skills (working out) and learning (through observation and instruction) the social norms and expectations (rules) of various sociocultural niches (sports or games). The model also makes explicit the implicit self-theories of shyness and the degree to which being willing to see one's shyness as a malleable emotional state, rather than a fixed personality trait, is associated with taking advantage of social learning opportunities (Beer, 2002; Dweck, Chiu, & Hong, 1995). For example, arriving at college believing shyness is malleable has been associated with decreases in performance anxiety, although not with social interaction anxiety (Valentiner, Mounts, Durik, & Gier-Lonsway, 2011).

Since the first edition of this book, we have added in our group work an emphasis on resisting the negative social stereotyping of ordinary shyness, which has grown during the last 50 years. The research of Claude Steele and others has taught us about the power of negative stereotyping on a target's level of self-consciousness (whether inside or outside awareness) and well-being in general (Davies, Spencer, & Steele, 2005; Eagly & Karau, 2002). Recent research reveals the effects of the negative stereotyping of shyness as a personality trait and the assigning of moral blame to individuals, and reframes the problem as existing outside society (Lane, 2007; Scott, Hinton-Smith, Harma, & Broome, 2012). Aho (2010) writes: "[T]he effort to pathologize shyness tells us more about who we are in late modernity and how "normal" emotions and behaviors are socially and historically constructed than it does about neurotransmitters in the brain. It reveals the extent to which the human being should not be interpreted as an encapsulated individual with an internal dysfunction but as an engaged situated subject that is already being shaped by a background of social and historical meanings" (p. 191). He goes on to say that the problem with the DSM is that we cannot situate individual symptoms within meaningful contexts or look at why Americans value extraverted behavior and marginalize shyness. He adds that modesty and humility went out of fashion in the 20th century and were replaced by an emphasis on self-expression, charm, and selling oneself as necessary in order to succeed in a capitalist economy.

It is important to help clients not only to recognize stereotyping as it happens and to counter it, at least internally, but also to contribute to effectively educating the larger society regarding both the potential strengths of some aspects of shyness and the harmful effects of stereotyping any temperament or personality style, all of which have particular strengths and weaknesses. The recent statistics that 50% to 60% of college student samples report being shy cause one to wonder to what degree the trait is adaptive, given that it not only

occurs more frequently in the population, but also constitutes more than half of college student samples. A recent study of 1194 college students revealed that 36% of 58% of self-reported shy people did not see it as a problem (Carducci, Stubbins, & Bryant, 2007). In contrast to earlier studies, only 1.3% denied ever having been shy. Strangers, people of the opposite sex, and individual authority remain the biggest challenges, as shown in our earlier surveys. Clinicians and researchers alike continue to struggle with problems of definition and of convergent and discriminant validity between the constructs "shyness", "social anxiety", and "social phobia". Each of these constructs shares similarities: continua of severity are seen in each, ranging from mild, infrequent, and transitory difficulty to severe, chronic and debilitating problems. Yet, each has been used to define distinct aspects of psychological life vis-à-vis interpersonal functioning. The challenge in agreeing on definitions related to shyness will be creating and clarifying shared definitions that neither omit important components of a construct nor generalize to the extent that terms are interchangeable and thus devoid of precise meaning.

### **Shyness**

Shyness has been defined as "a heightened state of individuation characterized by excessive egocentric preoccupation and overconcern with social evaluation, ... with the consequence that the shy person inhibits, withdraws, avoids, and escapes" social interactions (Zimbardo, 1982; pp. 467-468). William James (1890) considered shyness a basic human instinct, following Darwin. Izard (1972) described shyness as a discrete, fundamental emotion. An emotion profile in a "shy" situation includes interest and fear, which interacts with shyness (Izard, 1972). Carver and Scheier (1986) defined shyness in self-regulation terms, with unfavorable social outcome expectancies leading to disengagement in task efforts.

While most definitions of these constructs involve discomfort and the motivation to escape situations that contribute to it, we need to acknowledge that shyness per se does not necessarily involve problematic emotion or avoidance of goals important to the shy person. One distinction to be made is that shyness may include social anxiety as an emotional component, but social anxiety does not necessarily lead to shyness behaviorally. The avoidant behavior has already been conditioned to external stimuli and is not triggered by feelings of anxiety.

Although social phobics have been described as more avoidant than the shy, these comparisons were based on samples of normal college students, and the authors pointed to the dearth of empirical studies of shyness treatment samples (Turner, Beidel & Townsley, 1990). They also reported that social phobia was defined by specific criteria while shyness was not.

Although shyness is part of common language and described both as an emotional state or trait, specific criteria for chronic problematic shyness were delineated when treatment at the Stanford Shyness Clinic was initiated in 1977.

Chronic shyness was defined as "a fear of negative evaluation that was sufficient to inhibit participation in desired activities and that significantly interfered with the pursuit of personal or professional goals" (Henderson, 1992).

Recent research has supported our belief and the early findings of Turner, et al. (1990) that shyness is heterogeneous. Interestingly, many people who say they were excessively or extremely shy as children do not meet criteria for any psychiatric disorder as adults. Furthermore, 50% of people with a lifetime history of complex social phobia did not view themselves as very shy as young people (Cox, MacPherson, & Enns, 2005). Their findings were consistent with those of Heiser, Turner, Beidel, & Roberson-Nay (2009), who found only modest support for a direct relationship between even extreme childhood shyness and social phobia later in life.

We believe that final definitions await descriptions of the emotional states and self-reported traits of those who refer themselves for shyness treatment, compared with those who refer themselves for social phobia treatment, particularly given that a somewhat different pattern of comorbidity was revealed in our shyness clinic sample (St. Lorant, Henderson & Zimbardo, 2000).

We define chronic shyness almost entirely in terms of the person's self-report, in order to avoid an external performance standard according to which observers assign individuals to diagnostic categories. Research in personality psychology suggests that self-reports are more valid for personality traits than observer ratings, particularly among those who openly report their traits (Lamiell, 1997). Social phobia definitions imply that significant impairment in functioning is comparable across groups. Assessment of impairment is, at best, imperfect among clinical evaluators, particularly across settings and instruments, in spite of suggested guidelines for the global assessment of functioning in the Diagnostic and Statistical Manual of Mental Disorders (DSM-5<sup>TM</sup>) (American Psychiatric Association, 2013). For instance, socioeconomic status and cultural influences often constrain what shy people are able to do. Those who are not performing well in school may be constrained by extraverted teachers who value active and competitive verbal exchanges over written expression and more collaborative verbal interaction with an emphasis on listening skills. Those who appear higher functioning in some settings, by virtue of social class and privilege, may be underachieving in relation to their peer group (Henderson, Martinez & Zimbardo, 1999).

In summary, definitions of clinical samples of shy and socially phobic individuals are similar, but also show differences. The emotional states of both shyness and social anxiety are probably nearly universal in normative samples, and people who are shy, socially anxious, or socially phobic in only one or two situations likely never present to clinicians. Such individuals may construe their distress as an intransigent temperamental factor, or simply a natural part of life. Furthermore, they may not be motivated to change if highly verbal participation or dominant assertive behavior is infrequently required in significant areas of their daily lives. Notably, adding to the literature concerning the heterogeneity

of shyness, recent research has revealed a substantial proportion of highly shy people who report no social fears in diagnostic interviews (Heiser et al., 2009).

#### **PREVALENCE**

Over the last 30 years, estimates of the prevalence of social phobia in the general population have increased from 2% to over 12% with 26% of women and 19% of men reporting they were "very shy" growing up (Cox et al., 2005; Kessler, Chiu, Demler, & Walters, 2005).

Estimates of self-reported dispositional shyness have also increased, from 40% to 58% (Carducci et al., 2007; Carducci & Zimbardo, 1995). Sixty-four percent of those who label themselves as shy said they do not like being shy, and 65% considered it to be a personal problem. Adolescent self-reports include rates as high as 61% (Henderson & Zimbardo, 1993).

#### DEVELOPMENT OF CHRONIC SHYNESS

A number of factors are instrumental in the development of problematic shyness, including parental and peer rejection, and parental overprotection, leading to a lack of self-efficacy. Specific conditioning events play a role, such as being teased or shamed by teachers or other children in front of others, and observational learning, that is, viewing classmates or siblings being humiliated or harshly treated. Performance failures, traumatic events, and emotional or physical abuse or neglect also contribute (Zimbardo, 1982). The negative stereotyping of shyness in Western countries likely leads to more social avoidance.

Previous investigations of the relationship of shyness and social phobia suggested that the onset of social phobia was characterized by negative conditioning experiences, while the onset of shyness was not (Turner et al., 1990). Recent findings also suggest that early Behavioral Inhibition (BI) and concurrent lower family stress predict shyness during middle childhood, while anxiety symptoms are predicted by BI, early family negative affect and family stress in middle childhood (Volbrecht and Goldsmith, 2010). Notably, family stress predicted higher anxiety but lower shyness, suggesting possibly that shy children may have needed to reach beyond the family or become more assertive. The authors also stressed, as we do, the importance of distinguishing shyness from anxiety.

Shyness has also been linked to poorer vocabulary scores mediated by executive functioning skills, particularly in more stimulating home environments that are generally associated with better vocabulary skills (Blankson, O'Brien, Leerkes, & Marcovitch, 2011). The authors speculated that negative arousal may interfere with cognitive control. These findings speak to the importance in families and schools of suiting the particular stimulation, and the timing of it, to different child temperaments rather than a "one size fits all" model. Because shy children also tend to initiate fewer interactions with teachers and do not draw attention to themselves through conflict, teachers must be especially alert

to their needs and initiate contact with them to allow the same level of closeness that other children obtain through more bids for attention (Rudasill & Rimm-Kaufman, 2009).

Our current theory of the development of chronic and problematic shyness is based on the associations of private self-consciousness, attribution style, and negative emotional states (Henderson, 2002; see Ingram for a review, 1990). Because negative affective states draw attention inward, they likely lead to the trait of private self-consciousness, which is simply the tendency to focus inward on one's thoughts and emotions. It is frequently associated with seeing the self as responsible for external events.

We have demonstrated that private self-consciousness in shy adolescents and young adults exacerbates self-blame and shame (Henderson & Zimbardo, 1993). We argue that children who experience rejection, and negative emotions in response to that rejection, focus inward, thus leading them to believe that they cause or contribute disproportionately to the negative or undesirable events occurring around them. Thinking patterns and maladaptive attributions of responsibility may be influenced by whatever emotion is present, whether fear, shyness, shame, or anger. If one is afraid, others look dangerous and the self appears vulnerable. If one is shy, others look attractive, but potentially critical and rejecting. If one does not measure up in one's own eyes and is ashamed, others appear contemptuous and self-abased. If one is angry, other people appear untrustworthy and hurtful. These vicious attribution cycles may develop at relatively young ages (Rubin & Krasnor, 1986). We also believe that these ruminative cycles lead to negative beliefs about the self, others, and potential social transactions. In line with our theory, Trew and Alden have recently shown that rumination linked social anxiety to trait anger and also to outward anger expression (2009).

Further support is suggested by more recent research revealing that increased shame responding between preschool and school age was predicted by higher mother shaming or lower inhibition in girls, and higher mother shaming if boys were very inhibited and for boys in general if fathers were also shaming (Mills, Arbeau, Lall, & De Jaeger, 2010). Girls showed more shame by school age than boys.

Empirical findings call into question the idea that inherent temperament components on the part of the shy inevitably must prevent adequate social behavior or social acceptance. Skilled social behavior by the shy has been demonstrated when their socially based shyness arousal is misattributed to an external source, such as a neutral noise source (Brodt & Zimbardo, 1981). Furthermore, a study of shy and non-shy college students involved in social interaction suggested that the actual experience of the two groups was not different. What differed was the shy group's belief that their feelings and thoughts were abnormal (Maddux, Norton & Leary, 1988). Whatever the origins of shyness, social anxiety, and social phobia, there appears to be a good deal of room to modify social perception and social behavior, whether early or later in life.

# **Areas of Overlap**

Somatic symptoms tend to be similar for shy, socially anxious, and socially phobic adults, as are frequent negative cognitions (Leary & Kowalski, 1995; Turner et al., 1990; Zimbardo, 1977). Adolescent shy clients report frequent negative thoughts, including self-blame for negative social outcomes. Interestingly, socially phobic children do not report negative cognitions as frequently as adults (Beidel & Morris, 1995). We found that socially anxious children had poorer recognition of self-presentational motives and less appreciation of the links between beliefs, intentions, and emotions in faux pas situations, particularly when they were high in negative affect (Banerjee & Henderson, 2001).

Situations that present some form of perceived social difficulty are also similar across the three constructs. Socially phobic children say that the most common upsetting event for them is an "unstructured peer encounter" (Beidel & Morris, 1995). This is also among the challenging situations that are most frequently reported retrospectively by Shyness Clinic clients and normative samples of shy adults (Henderson, 1992; Zimbardo, 1977). Specific upsetting events in childhood that have led to or exacerbated social distress are also common to all three phenomena (Heimberg & Becker, 2002; Leary & Kowalski, 1995).

# Age of Onset

Shy college students in treatment report a mean age of onset of 10 years for problematic shyness (Henderson, Martinez, & Zimbardo 1999). Social withdrawal becomes noticeable in early childhood and may or may not be a precursor to later shyness or social phobia (Rubin, Coplan & Bowker, 2008). Social phobia usually begins in early to mid-adolescence, with an average age of onset of around 16, and generally has a chronic, unremitting course (Turner et al., 1990). The second most frequent onset is elementary school, and it tends to be earlier for generalized than non-generalized social phobics (Beidel & Morris, 1995).

Social phobia researchers have understandably reasoned that shyness started much earlier than social phobia given the results of infant studies in which evidence of "behavioral inhibition" was seen as early as 21 months (Kagan & Reznick, 1986; Turner et al., 1990). Most researchers agree, however, that behavioral inhibition is a precursor to shyness in some children, but is demonstrably not in a significant proportion of them, nor is it a stable trait (Cheek & Briggs, 1982; Henderson & Zimbardo, 2010).

Researchers have begun to study risk-taking and aggressiveness in shy and socially anxious individuals. A multiwave longitudinal study revealed that children who were shy at age six were less aggressive at seven and that those at eight were less aggressive at age 10; but from age 17 on, the relationship reversed, and shy adolescents were more aggressive five years later, but only in adolescents with low levels of parental support and who spent minimal time in part-time work (Hutteman, Denissen, Asendorpf, & Van Aken, 2009).

#### **Adolescent Onset**

Adolescence appears to be the age of onset for many kinds of social anxiety, phobic avoidance, and chronic shyness. Perspective-taking ability has been seen as one of the major reasons, in that awareness of discrepancies between the perspectives of others and the view of the self can promote painful negative social comparisons. The accuracy of perspective, taking in relation to the self, however, appears to vary both in shy children and adults (Alden & Wallace, 1991; Rubin & Asendorpf, 1993).

Self-blaming tendencies may lead to misperceptions of others' views of the self (Henderson & Zimbardo, 1993). Increased interpersonal avoidance also limits opportunities for feedback that can counter negative self-perceptions and provide occasions for receiving constructive feedback.

Negative social comparisons with others who are more extraverted may exert considerable influence on the development of chronic shyness and social phobia in adolescence. It will be important to continue to differentiate shyness, social phobia, and social anxiety in children and adolescents, because the phenomenology and precursors may differ in systematic ways.

# INDIVIDUAL DIFFERENCES IN SHY AND SOCIALLY PHOBIC INDIVIDUALS

Shyness has been conceptualized as more heterogeneous than social phobia (Turner et al., 1990). The heterogeneous appearance of shyness may reflect not only the continuum of mild defensive caution to extreme fears and social inhibition, but also the different domains of difficulty found in shyness. Some report few negative thoughts, but are inhibited and avoidant; others report physiological responses that interfere with cognitive processing; still others report a great deal of worry, but display little overt behavioral difficulty. Some report the presence of negative emotions like shame and resentment, but little physiological arousal (Henderson, 1992). Clinical observation also reveals many socially anxious individuals who attribute their anxiety to more general feelings of insecurity, denying both shyness and phobic tendencies.

The behavior genetics concept of "niche picking," that is, selecting the environment most suited to one's traits, may be the factor that separates problematic shyness, social anxiety, and social phobia from adaptive shyness, transient social anxiety, and transient social avoidance (Rowe, 1997; Xinyin, Rubin & Boshu, 1995). Communal and collaborative environments, rather than highly competitive or authoritarian environments that place a strong value on personal dominance, may provide more and better opportunities for the contributions of the shy.

# **Subgroups**

These observations have led to several attempts to define subgroups. For example, Buss (1986) classified fearful shy individuals vs. self-conscious shy

individuals. In the former group, fear of novelty and autonomic reactivity is hypothesized to be the major component; in the latter group, it is excessive awareness of public aspects of one's self. Pilkonis (1977) distinguished the privately shy from the publicly shy. The privately shy were socially skilled but self-doubting and uncomfortable; the publicly shy were more visibly uncomfortable and less skilled.

Zimbardo (1977) divided shy individuals into two groups, shy introverts and shy extraverts. Shy introverts often preferred to be alone, liking ideas and inanimate objects. Turner, Beidel and Townsley (1990) speculated that this group, in the extreme, resembled schizoid personality disorder, and indeed this diagnostic group may comprise a proportion of our clinic sample. These individuals do, however, report desiring at least some connection with others.

The second group Zimbardo (1977) identified was socially skilled, but suffered internally, constrained by social expectations and concerned about social rules. Turner, Beidel and Townsley (1990) speculated that these were the most likely candidates for social phobia, being both sociable and shy. Shy extraverts appeared to function best in highly structured situations where everyone knew and played their roles as expected. Many talkshow hosts, standup comedians, and professors in large lecture courses rather than seminars report being shy.

# CHARACTERISTICS OF SHY AND SOCIALLY PHOBIC INDIVIDUALS

# **Somatic Symptoms**

Heart palpitations, shakiness, blushing, muscle twitching, sweating, and urinary urgency are reported by social phobics and are also common physiological responses in shy and socially anxious college students and in our clinic patients (Beidel, Turner & Dancu, 1985; Henderson, 1992). However, there are fewer reports of nausea and chills among adult social phobics and shyness clinic clients than for socially phobic children (Beidel, Christ & Long, 1991). Parental ratings of shyness and higher heart rates in a stressful task have been modestly correlated in children. However, some findings are contradictory (Henderson & Zimbardo, 2010). No differences between social phobics, the shy and the nonshy were shown on physiological measures in other studies, although the shy and the socially phobic perceived more arousal (Edelman & Baker, 2002; Heiser et al., 2009). Socially anxious college students showed the same pattern during a public speaking task (Mauss, Wilhelm, & Gross, 2004). In our clinic sample cardiac rates have not been measured directly, but most of our clients report high subjective anxiety ratings when engaging in simulations of feared social situations.

The exception is a small group of clients who report little somatic distress and low subjective anxiety ratings during simulated exposures. These clients tend to be behaviorally passive in interaction and often initiate little social contact outside the context of the group. We wonder if these individuals resemble the adult version of passive isolation in familiar situations (Rubin & Asendorpf, 1993). This pattern may be related to the reciprocal effect of biological differences interacting with growing psychological inhibition in the face of rejection and negative experiences.

# **Cognitive Features and Perception**

The cognitive components of shyness, social anxiety, and social phobia have been the subject of considerable interest over the past 30 years. Early clinical observation and empirical studies revealed a plethora of findings regarding the tendencies to (1) worry; (2) regard normal experiences of shyness as shameful and unacceptable; (3) be preoccupied to the point of interference with performance and empathic behavior; (4) appraise interpersonal situations in threatening ways; and (5) make maladaptive attributions for social behavior (Beidel, Turner, & Dancu, 1985; Carducci & Zimbardo, 1995). Our clients demonstrate a double standard in that they do not judge others, including other group members, for responses such as blushing, although they expect negative judgment for their own similar reactions. Recent research has also revealed a double standard wherein socially anxious women expect to be judged for acknowledging anxiety more than others would be judged, while simultaneously understanding the likelihood of negative social outcomes for hiding anxiety, which emotion-suppression research confirms (Voncken, Alden & Bogels, 2006).

Self-blaming attributions are common in our shyness clinic clients, as are entrenched negative beliefs about the self. There are also frequent negative thoughts and beliefs about others. We have developed a scale called the Estimations of Others Scale (EOS) to assess these negative thoughts and beliefs (Henderson & Horowitz, 1998). The scale has high internal reliability (.91 alpha) in a college student sample. Shy students score significantly higher on this scale than the non-shy, and clinic clients score significantly higher than students.

Our research on perceptions of facial expressions of emotions has revealed that shy college students and Asian American students are slower to recognize disgusted facial expressions than the non-shy, appearing less, not more sensitive to social threat emotions, in contrast to our original prediction (Henderson, Kurita & Zimbardo, 2006). Asian Americans were slower to recognize facial expressions of anger than the non-shy, and the shy group did not differ from Asian Americans or the non-shy. Groups did not differ in sensitivity to fear, surprise or sadness, and the shy and the Asian American group were slower to recognize happiness. Earlier research had shown that the shy and Asian Americans tend to value harmony and are higher in interdependent self-construals (Markus, Mullally, & Kitiyama, 1997). They also have a more reflective intellectual style that may make them less willing to acknowledge social threat emotions until they are obvious and the context is considered, particularly if they are not directed at them. Less sensitivity to happiness expressions may be related to valuing pleasant vs. high intensity positive emotion.

Consistent with our original hypotheses, however, that shy individuals would be more sensitive to facial expressions of emotion, and therefore recognize facial expressions earlier in the development of an emotion, Beaton, Schmidt, Schulkin, & Hall (2010), studying neural responses to faces with different emotional expressions, found that shy individuals showed higher neural activation than the non-shy across a number of brain loci and a range of emotions. These authors were using full-blown emotion expressions, however, not a range of expressions from slight to full blown, consistent with earlier research showing increased amygdala activation to angry and contemptuous faces in generalized social phobia (Stein, Goldin, Sareen, Eyler Zorilla, & Brown, 2002).

Another hypothesis is that there may be avoidance reactions or suppression of emotion that may take longer processing time. Young and Brunet (2011) found that undergraduates' sociability, but not shyness, was related to categorizing faces accurately when presentation time was limited, but not when unlimited. Three categories of sociability were identified, high, medium, and low. Those in the medium and low groups performed more poorly when facial expressions of emotion were viewed in rapid succession, but not when time was unlimited. The largest difference in performance between rapid and unlimited presentation was seen in the low sociable group. High sociables were more accurate than the lows and did not differ across rapid and unlimited presentations. Shyness and sociability are proposed to be distinct constructs (Cheek & Buss, 1981), and the authors suggest that low sociability may be the disadvantage in terms of judging facial emotions, not shyness per se.

Ten-year-old children whose parents rated them as shy had a more difficult time discriminating facial expressions based on the spacing of features, but not in differentiating faces based on the appearance of facial features or faces' external contours (Brunet, Mondloch, & Schmidt, 2010). Using teacher reports of 337 preschoolers' shyness in Head Start, Strand, Cerna and Downs (2008) found that shyness predicted worse facial recognition scores for angry emotions, but not for happy, sad, and fearful emotions as depicted in photographs, and shyness predicted less improvement in scores for all four emotions over a six-month period. The authors speculated that the tendency to avoid may affect the social learning process. However, shyness was unrelated to recognition of schematic drawings of facial emotions and to emotional perspective taking. People high in trait anxiety more generally appear more likely to have their attention drawn to fearful expressions, but have their attention held by angry expressions (Fox, Mathews, Calder, & Yiend, 2007).

Of note, however, is a recent study of children with Social Phobia, High Functioning Autism and normal controls (ages 7–13 years), wherein no evidence was found for negative interpretation biases in children with SP or HFA who were similar to normal controls (Wong, Beidel, Sarver, & Sims, 2012). Children with HFA were less accurate in detecting mild affective expressions than controls. Behavioral ratings of social skill and social anxiety were not associated with facial affect recognition ability. Interestingly, shyness is correlated with empathic

concern, which recently was shown to be related to accuracy of fear recognition at brief exposures (Besel & Yuille, 2010), and accuracy of fear recognition has been related to prosocial behavior (Marsh, Kozak, & Ambady, 2007).

#### Affective Features

Compared to normative samples, shy clients report considerably higher levels of social anxiety, shame, guilt, depression, and resentment, with higher levels of shame and anger predicting passive aggression (Henderson & Zimbardo, 1998, August). However, embarrassment is correlated with shyness in normative samples (Crozier & Russell, 1992). In contrast, one-third of an extremely shy group without social phobia reported no social fears during a diagnostic interview (Heiser et al., 2009). Social anxiety, depression-related emotions and embarrassment are frequently reported in the social phobia treatment literature (Turner et al., 1990). The study of negative emotionality in socially anxious children is a growing area of research (Banerjee & Henderson, 2001), and shyness in children has been related to verbal embarrassment attributions to a negative audience and to nonverbal embarrassment attributions to positive, negative and neutral audiences (Colonnesi, Engelhard, & Bogels, 2010).

#### **Behavior**

Behaviors associated with chronic shyness are similar to those associated with social anxiety and generalized social phobia; that is, shy people speak less in social settings, less often initiate new conversation topics, avert their gazes, exhibit nervous mannerisms, and show fewer facial expressions (Leary & Kowalski, 1995; Zimbardo, 1977). The exception is alcohol use. Social phobics appear to be more likely to use alcohol to reduce social anxiety (Schneier, Martin & Liebowitz, 1989; Bruch et al., 1992). Shy individuals and observers alike usually describe shy behaviors as reticent, quiet, awkward, or overactive (Cheek & Briggs, 1982; Zimbardo, 1982). Shy college students are less visible and less assertive in the workplace, and are less likely to use career-planning resources (Cheek & Busch, 1981). They display less verbal fluency and fewer leadership skills. They also show less verbal creativity when faced with evaluation (Cheek & Stahl, 1986).

Conversations between the shy are dominated by talk about the immediate physical/social setting, rather than themselves, and leave it ambiguous as to who is to speak next (Manning & Ray, 1993). The exception is for "favored" topics that are discussed extensively. Shy individuals are less self-disclosing, even to the point of telling physicians and psychologists too little about problem areas to obtain adequate help (Zimbardo & Piccione, 1985). Genuine self-disclosure may also involve the risk of communicating negative thoughts and feelings about the self, increasing inhibition (Henderson, 1992).

When we consider nonverbal behavior, shy people keep others at a greater physical distance than do those who are less shy (about 12 inches farther away).

The difference is greater with an opposite-sex stranger than a same-sex stranger, and when a stranger is coming toward them than when they are moving toward the stranger (Zimbardo, 1977). They maintain minimal eye contact and smiling, and have a closed, "defensive" posture, low speaking voice, and constrained bodily movements, with minimal hand and arm gesturing (Zimbardo, 1977). These often can be changed with simple instruction and practice. Interestingly, Scott et al., (2012) based on their own experimental practices, have suggested that sociology researchers who experience shyness when doing field research can more openly discuss strategies to help manage the "dramaturgical stress" that goes along with the improvisation that is necessary in the field while maintaining high performance standards. Recent research on judging approachability has also emphasized the importance of having one's facial expression match body expression, because the meaning of the body expression appears to be highly dependent on the valence of the associated facial expression (Willis, Palermo, & Burke, 2011).

A study of socially anxious college students by Alden and Bieling (1998) reveals that negative behaviors can be readily changed when negative appraisals of social situations are altered by an experimental manipulation. When told that their personality profiles were similar to their conversational partners, indicating that they would easily relate well to each other, anxious individuals were indistinguishable from non-anxious individuals in likeableness, appropriateness, and similarity.

More-recent research has also shown that socially anxious individuals around close friends are likely to engage in more relationship-promoting behaviors and are seen as more socially competent (Pontari, 2009). However, Baker & McNulty (2010) found that shyness was related to lower levels of relationship self-efficacy and marital relationship satisfaction, with self-efficacy mediating the effect. Interestingly, and in contrast, partner shyness was unrelated to marital problems or marital satisfaction. Notably, however, shy college students reported equivalent emotional self-disclosure in romantic relationships as the non-shy in a recent study, and shyness was associated with a romantic and calm love style (Erwin & Pressler, 2011).

Moreover, clinical observation has suggested that when shy clients are not self-focused, their behavior is indistinguishable from non-shy individuals and is often highly skilled. These observations lend at least clinical credence to the idea that behavioral deficits may disappear when critical self-consciousness is reduced and shy clients are focused on a cooperative task with others. A key is the external focus on a task rather than internal focus on self or experiencing the self under scrutiny by others—that is a shyness elicitor.

# **Family Characteristics**

Parenting characteristics that may promote shyness are controlling, insensitive, or overprotective styles that involve frequent correction and shaming (Bruch, 1989). Social phobics who report parental overprotection are less responsive to the behavior of a conversation partner, and their failure to respond to friendly overtures

leads to rejection (Alden & Taylor, 2006). Many patients report minimal social interaction with peers and a lack of family support for such interaction. Some also report little interaction with family friends or relatives. Because extended family socializing predicts less shyness in young adults (Bruch, 1989), parental sociability in itself appears conducive to preventing shyness in children.

Engfer (1993) found that parents of shy children were less sensitive to children's expressed needs and more prone to use strongly assertive strategies. Hane, Cheah, Rubin, and Fox (2008) found that children of mothers who rated them as socially reticent at age four were more socially withdrawn at age seven when mothers were not positive, and observed social reticence was associated with greater social withdrawal when mothers were very negative; a better social outcome was found for preschoolers when mothers were positive.

The self-critical tendencies of shy adults may be the result of restrictiveness and rejection by parents, because these parental behaviors have been shown to be related to the development of self-criticism in adolescents more generally, particularly when received from the same-sex parent (Koestner, Zuroff & Powers, 1991). Self-criticism remains stable into young adulthood for women, but not for men. However, men exhibit a relationship between self-criticism and inhibited aggressive impulses.

#### SOCIAL FITNESS TRAINING

We see shyness not as pathology, but a suboptimal level of social functioning. Social fitness, involving daily social exercise and various practice situations, addresses both the need for emotional connection and the importance of agentic behavior in coping with life's challenges.

Research findings from personality theory, social psychology and clinical psychology inform our techniques. The exposures and skill-building components of our groupwork are based on social cognitive theory, stressing the development of competency and cognitive-emotional self-regulation, and presupposing a more complex and reciprocal causality among people, and between people and the environment (Bandura, 2008). If clients can increase personal self-efficacy by taking responsibility for their behavior, but not for social outcomes outside their control, they are more likely to maintain the cognitive, emotional, and behavioral gains accrued in treatment.

Interpersonal process theory provides an additional theoretical framework (Leary, 1957). Given that shyness is apparently related to lower relationship satisfaction, if shy individuals are seen as ineffective communicators, focusing on interpersonal skills in one-on-one peer relationships is important, whether they lack skills or just do not express them when socially anxious (Arroyo & Harwood, 2011). We also use the interpersonal motives theory to inform therapists' responses to clients' bids to be led or dominated (Horowitz, et al., 2006). Therapists gently counter such bids with egalitarian behavior and invitations to collaborate and lead in learning.

Shyness, social anxiety, and social phobia treatments usually include cognitive restructuring and role-plays of threatening situations (Heimberg & Becker, 2002). We include social skills training and a specific focus on negative attributions and beliefs about the self and others, as well as the negative emotions that they engender: shame for beliefs about the self, and resentment and hurt for beliefs about others, plus how the presence of private self-awareness exacerbates painful emotions and unsupportive thinking. Therapists also help clients link thoughts and emotions to early experiences to instill insight into their anxiety and motives for interpersonal avoidance.

# Adding a Compassion-Focused Therapy Approach to Social Fitness Training

Social fitness, including Compassion-Focused Therapy—now called Compassionate Social Fitness—is our new model of helping people deal with shyness, social anxiety, and social phobia, because it best fits our goal to transfer research and theory from social, evolutionary and personality psychology into behavioral, cognitive, and emotional regulation strategies that help individuals thrive in social interaction. As individuals learn about the strategies and accompanying theory, practise new behaviors that are informed by them, and then practise those behaviors in ordinary life, they increase "social fitness."

"Social fitness" provides an umbrella term within an evolutionary framework that is continuous and dynamic, including many levels of social competence and comfort. Finding one's social "sport" or niche involves matching discrete personality differences to situations where these characteristics are seen as strengths.

The three key themes to the CFT aspect of our social fitness model are fundamental to the de-shaming and de-pathologizing process. We start with our commonalities in the evolutionary flow of life, and the inevitable concern about whether we are valued in the minds of others. We also borrow from Buddhism and other traditions where *cultivating a sense of self on purpose* is core to the art of becoming (Gilbert, 2009; Henderson, 2011).

The therapist explains the importance of social affiliation to the human lineage, highlighting our three types of emotion: threat-focused (anger and anxiety), achievement-focused (joy, excitement and pleasure), and contentment-and friendship-focused (peaceful well-being). The circumstances of our birth and early life are not our fault, and human life involves suffering and tragedy, including painful shyness, but we are biologically set up to feel contentment and to be calmed down by the kindness of others. It is also true for our relationships with ourselves: the kinder and more supportive and understanding we are with ourselves, the better we feel.

CFT highlights the value of developing compassion—defined as a sensitivity to suffering, in ourselves and others, with a commitment to try to relieve and prevent it—to organize our brains and minds. This involves two very different psychologies: (1) a sensitivity, which involves turning toward and engaging

with that which causes pain, rather than turning away, denying, and trying to avoid it; and (2) the process of alleviation, which is not avoidance, but genuine alleviation or acceptance and tolerance of suffering. Using the three principles of the flow of life above, clients can understand the sources and nature of suffering, positioning themselves to consider how to alleviate it.

A range of compassion-focused exercises, including compassionate imagery exercises, are used to cultivate compassionate motivation, behavior, thinking, and feeling, as well as sensorimotor awareness, refocusing individuals out of unhelpful loops and preoccupations, and into evolved, care-based mentalities and affect systems that reduce threat-related emotions.

Whether socially anxious, shy, or phobic, people can achieve some measure of social fitness and social success by choosing activities and situations that are suited to their individual temperaments. They can also understand that "temperament" is sometimes a word for well-ingrained habits developed adaptively in traumatic or non-rewarding situations that no longer serve a useful purpose. As behavior change in compassionate social fitness training occurs, along with new emotions and revised emotional and cognitive understandings, new "temperament" variables emerge.

We have outlined the similarities as well as some differences between the three related constructs of shyness, social anxiety and social phobia, and noted treatment comparisons (CBT, role-plays, exposure). In general, shyness is the popular, more inclusive term that often involves a fear of rejection for anticipated failed social performances. The reactions it engenders run the gamut from garden-variety social awkwardness to extreme social isolation. Social anxiety is the negative affect that can impair social interactions in both shyness and social anxiety disorder, the latter being the preferred clinical diagnostic category. We also note the interacting roles of affect, cognition, and action in the etiology and treatment of each construct. Novel to treatment and prevention is the role we offer of social fitness training combined with attributional retraining and the inclusion of compassion-focused therapy.

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