



The Other Side of Malingering: Supernormality

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ABSTRACT

Supernormality refers to the tendency to systematically deny the presence of common symptoms (e.g., intrusive thoughts). The current article describes the psychometric qualities of a 37-item self-report measure of supernormality (i.e., Supernormality Scale; SS). The SS was administered to nonclinical individuals ($n = 95$), noncriminal psychiatric patients ($n = 28$), nonpsychiatric delinquents ($n = 49$), and a heterogeneous sample of forensic patients ($n = 59$). Within the healthy control sample, some employees were instructed to feign supernormal behaviour, while others were asked to respond honestly to SS items. Findings indicate that the SS demonstrates adequate test-retest stability and internal consistency. In the forensic patient sample, elevated SS scores were significantly related to denial of intrusive thoughts in a thought suppression paradigm. However, accuracy parameters for the SS (i.e., sensitivity and specificity) showed that there is room for improvement. Nevertheless, our findings indicate that the SS might be a useful research tool for measuring denial of common symptoms.

INTRODUCTION

Some authors (e.g., Hare, 1991) have suggested that psychopathic individuals are very successful in feigning a mental disorder because of their pathological lying and their use of manipulative behaviour to deceive others. Cleckley (1982) attributed psychopaths' success in deceiving others to their ability to hide traditional signs of falseness behind a facade of social charm. This often cited idea has fuelled the clinical intuition that psychopathic individuals are extremely good at feigning symptoms of mental disorder. Indeed, according to DSM-IV (American Psychiatric Association, 1994), the presence of an antisocial personality disorder is a primary consideration in the assessment of malingering (p. 683). Since pathological lying and manipulative behaviour

are considered to be core features of psychopathy and are listed among the criteria for a DSM-IV (1994) diagnosis of antisocial personality disorder, an intimate link between psychopathy and malingering has been suggested (e.g., Rogers & Cruise, 2000).

Although some studies (Gacone, Meloy, Sheppard, Speth, & Roske, 1995) have provided evidence for such link, more recent studies failed to find support for the psychopathy-malingering association (e.g., Cima, Merckelbach, Knauer, & Hollnack, in press; Poythress, Edens, & Watkins, 2001). One problem with the psychopathy-malingering link is that it assumes that psychopathic individuals have a tendency to display one particular type of deception. Meanwhile, deception encompasses a broad variety of behaviours ranging from denial of psychiatric disorders to malingering

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(McCann, 1998). The latter involves exaggeration of symptoms, falsification of information, and/or fabrication of complaints motivated by external incentives (Ensalada, 2000). Whereas malingering is characterized by exaggeration of negative features (i.e., faking bad), denial refers to minimization of symptoms and exaggeration of positive features (i.e., faking good) in order to manipulate others.

Some authors (e.g., Hall & Poirier, 2001) seem to assume that denial is an equivalent of, or at least closely linked to, social desirability. Social desirability is the tendency to deny minor faults or inadequacies that most persons would readily endorse. That is, social desirability is engagement in positive impression management by expressing social desirable answers according to the common norms and values of society (Edens, Buffington, Tomicic, & Riley, 2001).

It may well be the case that the link between psychopathy and deceptive behaviour is strongly affected by the context in which it occurs. An example may clarify this point. An adult who has a lengthy history of antisocial behaviour and who is facing a long prison sentence may be motivated to feign insanity in an attempt to avoid a long and harsh incarceration. Time spent in a mental health institution seems less difficult than being sent to prison, especially when the individual has prior experiences with incarceration. However, when this adult already serves his time in a mental institution, he may be motivated by different factors. Exhibiting signs of mental illness may prolong his stay in a mental hospital. Thus, in this context, deception may take the form of minimizing psychopathology.

In this particular context, faking good might imply more than just exhibiting a tendency to endorse "normal" answer options. For example, it is quite common for healthy people to report that they have experienced at least at some occasions intrusions (i.e., "normal obsessions"; Rachman & de Silva, 1978), rituals (i.e., "normal compulsions"; Muris, Merckelbach, & Clavan, 1997), worrisome thoughts (i.e., "normal worry"; Clark & Claybourn, 1997), and mild persecutory delusions (Fenigstein & Vaenabale, 1992). Thus, many psychopathological phenomena have their mild counterparts in the general population,

which is precisely the basis for dimensionality or continuum approaches to psychopathology (e.g., Claridge, 1997). Persons with a tendency to produce social desirable answers would not necessarily deny common, but slightly deviant human experiences. However, the psychopathic patient in a mental institution might try to deny these experiences in an attempt to make a healthy impression on his evaluators. We refer to this type of deception as "supernormality," so as to differentiate it from the type of social desirability that is measured with lie-scales.

In clinical treatment of forensic patients, malingering may provide therapists with a pessimistic view about treatment gains. In contrast, supernormality may lead to an erroneous impression that progress is being made when, in fact, the patient still has psychopathological symptoms. A case in point is a recent Dutch study by Nijman, de Kruyk, and van Nieuwenhuizen (in press) who found that personality disordered criminals showed significantly more treatment progress than did psychotic forensic patients. However, as these authors note, treatment improvement does not necessarily imply diminished risk for recidivism after release. The point is that indices of treatment progress heavily rely on self-reports of patients. Personality disordered patients and in particular antisocial or psychopathic patients might have a tendency to endorse nonsymptomatic answer options.

There is a broad consensus in the literature that deceptive behaviour is difficult to detect (Ensalada, 2000). A number of authors have called into question clinicians' capacity to detect feigning (Cima, Merckelbach, Nijman, Knauer, & Hollnack, 2002; Faust, Hart, & Guilmette, 1988; Faust, Hart, Guilmette, & Arkes, 1988; Heaton, Smith, Lehman, & Vogt, 1978). Their studies show that clinicians are not very successful in identifying feigning when they have to rely on unstructured interviews and/or traditional tests. This observation served as an important impetus for the development of special tests and questionnaires intended to detect feigning (see, for overviews, Hall & Poirier, 2001; Rogers, 1997). The majority of these tools focus on malingering (i.e., fake bad). Although there are instruments for measuring the more benign forms of faking good (e.g., the Social Desirability Scale; Crowne

& Marlowe, 1960), the questionnaire to be described below differs from such lie scale questionnaires in that it intends to tap specifically denial of common psychological symptoms. There is, to the best of our knowledge, no instrument for measuring supernormality.

In light of these considerations, we developed a self-report measure of supernormality. Below we address the construction of this Supernormality Scale (SS). We also report on the basic psychometric properties (e.g., internal consistency, test-retest reliability) of the SS. In an attempt to evaluate the construct validity of the SS, we also collected data on how forensic patients attribute blame for their criminal behaviour. We argued that a correlation between SS scores and a tendency to perceive external rather than internal (i.e., mental) justification for crimes would support the construct validity of the SS. To further explore the validity of the SS, we also examined whether SS scores are related to a tendency to report no or only a few intrusive thoughts during a “white-bear” procedure (e.g., Wegner, Schneider, Carter, & White, 1987). We anticipated that individuals with high SS scores would report few intrusions under conditions that are known to promote intrusive thoughts.

METHOD

Item Construction

Our primary goal was to construct a brief and easy-to-understand self-report scale that might be used as a research instrument for measuring supernormality. In selecting items, we assumed that supernormality and social desirability lie on a continuum. Thus, we first selected a set of 11 typical social desirability items from widely used instruments such as the Minnesota Multiphasic Personality Inventory-2 (MMPI-2; Hathaway, McKinley, & Engel, 2000) and the Social Desirability Scale (SDS; Crowne & Marlowe, 1960). Illustrative examples are: “Lately, I have become a more sociable person” and “I always show consideration for weaker people.” We added a set of 28 supernormality items which intend to tap tendencies to portray oneself as an individual who is completely free of anything that is even remotely related to psychopathology. We asked forensic psychiatrists and psychologists to generate a number of such supernormality items. After eliminating social desirability items and items with overlapping

content, 28 supernormality items were retained in the pool. After a second discussion round, seven supernormality items were omitted because it was not clear whether they tapped supernormality, social desirability or preference for a normal life. Typical examples of the remaining 21 supernormality items are “I am feeling physically and mentally extremely well” and “I have never had any mental problems.” We added five bogus items to obscure the real purpose of the SS (i.e., “I love to watch TV”; “I like it when the weather is hot”; “I like listening to music”; “I like to sleep in a darkened room”; and “I like to read.” Thus, the final SS version consisted of 37 items with a dichotomous (yes-no) scoring format (see Table 1). Four items had a reversed scoring format (i.e., Items 6, 13, 23, and 28). After recoding these items, the number of yes-responses is summed to derive a total SS score (range: 0–32).

Participants

The SS was administered to 231 participants. There were five groups: (i) 45 healthy control participants (14 women), with a mean age of 35 years ($SD = 11.7$); (ii) 28 noncriminal psychiatric control patients (13 women), with a mean age of 35 years ($SD = 11.7$); (iii) 49 nonpsychiatric control criminals (only men), with a mean age of 42 years ($SD = 11.2$); (iv) 50 healthy participants (30 women), with a mean age of 37 years ($SD = 11.3$) who were instructed to “fake good” on the SS; (v) 59 forensic patient (only men), with a mean age of 39 years ($SD = 10.9$).

Healthy participants (i.e., Groups (i) and (iv)) were qualified nurses, therapists or medical doctors who were recruited from the Forensic Institute at Düren, Germany. They volunteered to complete the SS, but were blind as to the purpose of the study. Noncriminal psychiatric patients (ii) were recruited from closed or open-wards at Psychiatric Institute Düren, Germany. Most of them (i.e., more than 75% of the subsample) had a diagnosis of schizophrenia or mood disorder. Nonpsychiatric criminals were recruited from a prison in Eusenkirchen, Germany (iii). Forensic patients (v) were recruited from the Forensic Institute at Düren, Germany. All of them had been convicted for severe criminal offences. Forensic and noncriminal patients as well as nonpsychiatric criminals completed the SS after they had given their informed consent. In addition, forensic patients completed Gudjonsson’s Blame Attribution Inventory (GBAI) during a second session. Healthy participants (i), noncriminal psychiatric patients (ii), and nonpsychiatric criminals (iii) were pooled together to form a mixed control group.

Instruments

To evaluate how forensic patients and nonpsychiatric criminals attribute blame for their offences, we

Table 1. SS Items, Percentage of Endorsement, Corrected Item-Total Correlations, and Factor Loadings in a Mixed Sample of Healthy Participants (Forensic) Psychiatric Patients, and Criminals ($N = 231$).

Items	%	Corrected item-total, r	Factor 1	Factor 2
<i>Supernormality</i>				
(1) I'm feeling physically and mentally extremely well.	63	.49	.71	.12
(2) I have my problems under full control.	46	.48	.61	.02
(3) Without medicine, I'm feeling well or even better.	51	.30	.39	.01
(5) I have felt well for a long time now.	52	.36	.49	.03
(6) Sometimes, I'm afraid without any reason.	63	.41	.62	.09
(7) Most people with whom I live today are obviously more mentally ill than I am.	42	.33	.28	.22
(9) My mental state is completely normal.	63	.46	.73	.20
(11) Even without the help of others, I can live my own life very successfully.	48	.47	.45	.20
(12) I do not have problems with negative thoughts, that influence my mind.	55	.45	.54	.07
(13) Sometimes, I feel unhappy without knowing why.	49	.43	.54	.04
(15) I'm never bored.	39	.38	.42	.08
(17) My sexual life is absolutely normal.	71	.28	.51	.20
(19) I'm mentally doing so well that I can live on my own.	70	.52	.67	.01
(21) If I wanted to I could find a job easily.	63	.31	.35	.08
(23) I still have to work on myself.	12	.24	.24	.11
(24) I have never had any mental problems.	31	.45	.51	.08
(27) I'm my own best therapist.	39	.36	.37	.13
(28) Sometimes, I have trouble getting through a working day.	57	.35	.36	.14
(30) I do not need treatment for my problems.	60	.37	.65	.23
(34) I do not have bizarre phantasies.	55	.41	.29	.35
(37) In fact, I do not need any further help.	34	.43	.51	.06
<i>Social desirability</i>				
(10) I'm convinced that I will never do anything that is forbidden.	47	.34	.09	.74
(16) If I was not in my present situation, I would do very well.	27	.35	.09	.49
(20) Under no circumstances, will I become aggressive again.	37	.45	.14	.60
(22) I try to help everybody who has problems.	51	.28	.08	.59
(26) I will always help people who are in need of something.	66	.33	.01	.57
(29) Even if I were to take drugs or drink alcohol in the future, I would not do anything which was forbidden.	43	.23	.05	.51
(31) I always show consideration for weaker people.	67	.41	.12	.56
(32) I'm convinced that I will never get mentally ill again.	17	.34	.21	.33
(33) Lately, I have become a more sociable person.	63	.27	.01	.46
(35) I constantly try to understand other people.	65	.15	.19	.54
(36) Lately, I have become a more disciplined person.	58	.35	.11	.47

Note. Items 6, 13, 23, and 28 have a reversed coding.

administered the revised version of the Gudjonsson Blame Attribution Inventory (GBAI; Gudjonsson & Singh, 1989). The 42-item GBAI consists of three subscales: external attribution, which relates to the extent to which the respondent blames others for his crime, mental element attribution, which relates to how much mental control a respondent believes he had at the time of the crime, and guilt attribution, which has to do with feelings of shame and remorse for the criminal act.

The GBAI has been administered to psychiatric and prison populations in Britain, Iceland, and Northern Ireland and demonstrates adequate transcultural validity in the sense that all studies reported a robust relationship between severity of offence and certain blame attributions (Gudjonsson & Petursson, 1991). Cima et al. (submitted) noted that the German translation of the GBAI possesses acceptable test-retest stability (e.g., $r = .84$, for the mental-element

attribution scale) and good internal consistency (e.g., Cronbach's $\alpha = 0.83$ for the mental-element attribution scale). The fact that forensic patients displayed higher scores on the mental-element and guilt-feeling attribution scales than honestly responding control individuals supports the construct validity of the GBAI (Cima et al., submitted).

Procedure

Healthy controls completed the SS in groups of approximately 25 individuals. They were assigned to either one of the two groups. One group (i.e., Group (i)) was instructed to respond honestly to the SS, while the other group (i.e., Group (iv)) was instructed to respond so as to make an extremely healthy impression. Participants in this group were asked to imagine that they were forensic patients who were evaluated for probation. Psychiatric patients (i.e., Group (ii)) and criminals (i.e., Group (iii)) were instructed to respond honestly to the SS and were tested in groups of approximately 10 persons. Forensic patients (i.e., Group (v)) were also instructed to respond honestly to the SS items and were tested individually.

Twelve forensic psychiatric patients from Group (v) (mean age: 39.5 years; $SD = 13.8$) were invited to participate in a "white-bear" procedure (e.g., Rasin, Merckelbach, & Muris, 2000; Wegner et al., 1987). All of them were incarcerated because of crimes involving child abuse. The white-bear experiment consisted of

four consecutive phases. During Phase 1 (suppression), patients were instructed to "try not to think of a white bear" for a 5-min period. During Phase 2 (expression), they were told that "you may think of everything, including white bears." Again, this phase lasted for 5 min. Phase 3 was a 5 min suppression phase in which patients were instructed to avoid thoughts of children. Phase 4 was a 5 min expression phase in which patients were allowed to think of everything, including children. During each phase, patients used a pen to mark on a paper every occurrence of the target thought (i.e., white bears or children).

RESULTS

Factor Analysis

Because SS scores were reasonably normally distributed (see Fig. 1), factor analysis was conducted on SS data obtained in the mixed sample of 231 respondents (cf. supra). The five items that served as distracters were not included in this analysis. Since we assumed that supernormality and social desirability form a continuum, we expected the factors to be related. Hence, a principal component analysis with an oblique rotation was employed. This procedure

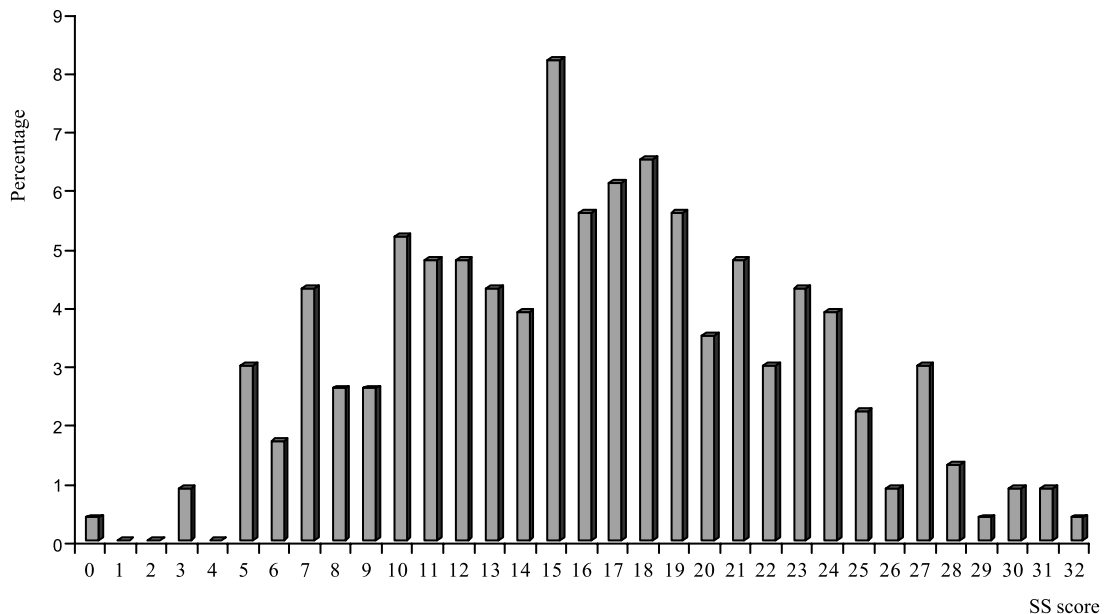


Fig. 1. Distribution of total Supernormality Scale (SS) scores in 231 participants.

revealed nine factors with an eigenvalue >1.0 . Of these nine factors only four explained 5% or more of the variance in SS variance. While this suggests a 4-factor solution, inspection of the screen plot suggested the predicted 2-factor solution. The eigenvalues of these two factors were 6.2 and 3.1, respectively, and together, they explained 29.1% of the total variance. With this in mind and given the interpretability of the factors, we decided to adopt the 2-factor solution, which is shown in Table 1. Table 1 also presents endorsement rates and corrected item-total (i.e., total SS scores) correlations. Correlation between the two factors was moderate ($r = .25$, $p < .01$). As can be seen, factors reproduced the distinction between social desirability and supernormality. Thus, by and large, supernormality items primarily loaded on Factor 1, whereas social desirability items primarily loaded on Factor 2.

Internal Consistency

Internal consistency of the total SS in the mixed sample of 231 participants was adequate, with Cronbach's alpha being 0.86. Internal consistencies of the two SS subscales (i.e., supernormality and social desirability) for this sample were 0.85 and 0.78, respectively.

Temporal Stability

Test-retest stability (6 weeks) for the final SS version was found to be high ($r = .90$) in a sample of 18 forensic psychiatric patients (mean age: 39.2 years; $SD = 10.5$), mean SS scores on the two occasions being 19.6 ($SD = 4.6$) and 19.1 ($SD = 5.5$), respectively.

Figure 1 shows the frequency distribution of total SS scores in the sample ($N = 231$). Skewness and kurtosis parameters indicated that scores followed a relatively normal distribution (skewness = 0.10; $SE = 0.16$; kurtosis = 0.48; $SE = 0.32$). Mean total SS score of the total sample was 16.18 ($SD = 6.4$).

Validity

To evaluate the validity of the SS, we compared SS scores of five groups. The first group ($n = 45$) consisted of honestly responding control participants (cf. supra). The second group ($n = 28$) consisted of noncriminal psychiatric patients. The

Table 2. Mean Total SS Scores, *SD*, and Range of Total SS Scores of Honestly Responding Controls ($n = 45$), Noncriminal Psychiatric Patients ($n = 28$), Nonpsychiatric Criminals ($n = 49$), Instructed Normals ($n = 50$), and Forensic Patients ($n = 59$).

Groups	Mean	<i>SD</i>	Range
Controls	15.33	4.81	5–27
Psychiatric patients	10.18	5.29	5–25
Criminals	15.67	6.45	3–30
Instructed	18.48	6.50	0–32
Forensic patients	18.15	5.90	5–31

third group ($n = 49$) were the nonpsychiatric control criminals. The fourth group ($n = 50$) consisted of normal controls who were instructed to feign supernormal behaviour and a fifth group involved 59 forensic psychiatric patients.

Table 2 shows mean total SS scores for these groups. A one-way Analysis of Variance (ANOVA) made clear that the groups differed significantly with regard to their mean total SS scores, even when age and sex were entered as covariates: $F(4, 224) = 11.43$, $p < .001$. Follow-up t tests were conducted to evaluate pairwise differences between the groups. Noncriminal psychiatric patients had significantly lower total SS scores than all other groups (all t s > 3.80 , all p s < 0.001). In terms of effect size, these differences were large: all Cohen's d s > 0.91 . Forensic patients had significantly higher total SS scores than honestly responding controls, $t(102) = 2.61$, $p < .01$, a difference that was in the medium range ($d = 0.50$). However, forensic patients did not significantly differ from nonpsychiatric criminals and instructed participants (Bonferroni corrected p s $> .01$). As well, honestly responding controls had significantly lower total SS scores than instructed normal controls, $t(93) = 2.66$, $p < .01$; $d = 0.54$. They did not differ from the nonpsychiatric criminal group, $t(92) < 1.0$, NS. Likewise, instructed normal controls did not differ from nonpsychiatric criminals, $t(97) = 2.16$, $p > .01$.

As another exploration of the construct validity of the SS, we computed Pearson product-moment correlations between SS scores and GBAI subscale scores for the subsample of forensic psychiatric patients ($n = 59$). SS was found to be

modestly, but significantly related to external attribution of blame ($r = .24, p < .05$). In addition, SS was negatively associated with mental-element attribution. Again, although this correlation reached significance, it was modest ($r = -.26, p < .05$). The correlation between SS and guilt attribution remained nonsignificant ($r = -.10$).

As a third approach to the construct validity of the SS, we calculated for a subset of forensic psychiatric patients ($n = 12$) correlations between SS scores and expression of target thoughts. Mean total SS score for this subsample was 17.91 ($SD = 5.82$; range: 7–25). During Phase 2, patients exhibited the typical rebound effect in that they reported 33.75 ($SD = 42.56$) target thoughts about white bears against 0.42 ($SD = 0.90$) white bear thoughts during Phase 1 (i.e., suppression): $F(1, 11) = 7.28, p < .05$. During Phase 4, no rebound effect for reports of target thoughts occurred: $F(1, 11) = 1.93, p = .19$. That is, during Phase 4, patients reported a mean number of 3.58 target thoughts about children ($SD = 6.16$) against 0.92 target thoughts about children ($SD = 1.98$) during Phase 3. SS scores were not related to white bear targets during Phase 2 ($r = .18, p = .58$), but they were significantly and negatively related to reports of target thoughts about children during Phase 4 ($r = -.59, p < .05$). Apparently, the higher the SS scores, the lesser the willingness to report target thoughts about children, a finding that supports the validity of the SS.

Diagnostic Accuracy

To evaluate whether the SS can be used as a screening tool, sensitivity and specificity were determined. They refer to the proportion of individuals with the target behaviour (i.e., supernormality) who test positive (sensitivity) and the proportion of individuals without the target behaviour who accordingly test negative (specificity). To calculate these parameters, we only included honestly responding healthy controls ($n = 45$) and instructed normal controls ($n = 50$) in our analyses. The precise relationship between sensitivity and specificity depends on the selected cut-off point (Hsiao, Bartko, & Potter, 1989). For example, sensitivity can be increased by setting the cut-off at a lower point in the SS distribution,

Table 3. Sensitivity and Specificity Rates for Different SS Cut-Off Points ($n = 95$).

Cut-off	Sensitivity (%)	Specificity (%)
≥ 10	94	9
≥ 15	74	42
≥ 18	58	67
≥ 20	36	82
≥ 22	28	93

but the cost of doing so will be a decrease in specificity (i.e., an increase in false positives).

Table 3 demonstrates how diagnostic accuracy parameters vary with different SS cut-off points. As can be seen, with the most optimal cut-off point of 15, sensitivity is 0.74, but specificity is only 0.42. In other words, a cut-off of 15 correctly identifies 74% of the instructed participants (sensitivity) and 42% of the honestly responding participants (specificity). Thus, corresponding false negative and false positive rates are 26% and 58%, suggesting that the SS is not very good as a diagnostic screening instrument. Within the subsample of forensic patients ($n = 59$), 45 (76.3%) patients had a total SS score exceeding the cut-off of 15.

DISCUSSION

Evaluation of deceptive behaviour within the forensic context often relies on instruments measuring malingering. The SS was designed to tap the other side of the coin: supernormality. The results presented above indicate that the SS is a promising research tool for assessing this type of behaviour. To begin with, the SS displays adequate reliability in terms of internal consistency and test-retest stability. Secondly, the SS possesses predictive validity in the sense that certain categories of individuals who are known to exhibit supernormal characteristics (i.e., people who were instructed to feign supernormal behaviour) display higher scores on this scale than do control individuals. Thirdly, the significant correlations between SS and GBAI subscales suggests that supernormality is related to minimalizing responsibility for crime (i.e., externalization of blame) and denial of mental illness. Admittedly,

these correlations remained modest and further research is warranted to investigate in more detail the links between supernormality and blame attribution. Finally, instructions to suppress target thoughts resulted in more target thoughts later on (i.e., rebound effect) when targets were white bears, but not when targets were children. The absence of a rebound effect for target thoughts involving children correlated significantly with forensic patients' SS scores. In sum, then, the current results suggest that the SS possesses a reasonable preliminary construct validity.

Having said this, we also have to acknowledge that the accuracy parameters for the SS were poor. With the optimal cut-off of 15, false negative and false positive rates were considerable. While honestly responding controls had significantly lower SS scores than either controls instructed to fake good or forensic patients, the distribution data indicated that there was a substantial overlap between SS scores of these three groups. As things stand, it would be premature to use the SS as a diagnostic screening tool. The primary reason for presenting the current data is to encourage researchers and clinicians to develop practical tools for detecting supernormality. The SS might serve as a starting point for this endeavour. One way in which the SS can be improved is by identifying more symptoms that are common in the normal population, but that might be readily denied by forensic patients who want to fake good. Once such symptoms have been identified, one could increase the number of SS items thereby improving its diagnostic accuracy.

It would also be informative to collect SS data in forensic patients with psychopathic traits. Recent studies (e.g., Cima et al., in press; Poythress et al., 2001) noted that there is no close relationship between psychopathic traits and the tendency to fake bad (i.e., malingering). On the other hand, depending on the precise context, there might be a relationship between psychopathy and fake good (i.e., supernormality). Of course, the SS has to be optimized before the relationship between supernormality and psychopathic personality characteristics can be investigated. Another research area that might benefit from the SS is the evaluation of forensic treatment programs. In as far as outcome studies in this domain are not concerned with

recidivism rates, they often have to rely on self-reports of forensic patients (e.g., prognostic questionnaire, Part B; Seifert, Jahn, Bolten, & Wirtz, 2002). An optimized SS might be used to correct for positively biased reports in this group.

Pritchard (1997, p. 98) noted that "most of the recent attention to performance distortion has focused on "malingering," that is the false production of signs and symptoms of pathology. Little attention has been given to the minimization of signs and symptoms of genuine deficits. There is currently no available research on the detection of denial or minimization during neuropsychological evaluations." As far as we can see, Pritchard's conclusion does not only apply to neuropsychological, but also to psychiatric evaluations. The construction of the SS was an attempt to remedy this omission. However, in its current form, it is only a first step in the direction of a diagnostic tool.

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