

Chapter 36

Self-Compassion Scale (SCS)

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Abstract

Self-compassion involves relating to ourselves with self-kindness and less self-judgment, feelings of common humanity and fewer feelings of isolation, mindfulness and decreased over-identification in situations of perceived failure, inadequacy or personal suffering. Most research on self-compassion uses the Self-Compassion Scale (SCS) to measure the construct. The SCS is considered to be reliable and appears to have adequate convergent, discriminant, predictive, and known groups validity. There is an ongoing discussion about whether self-compassion is better measured as a global construct, or whether it is best measured as two separate constructs which represent compassionate versus reduced uncompassionate self-responding. The application of the state-of-the-art bifactor-ESEM framework to the factor structure of the SCS supports the existence of a global self-compassion factor as well as the six specific dimensions, but does not support the use of two separate factors. Adaptations of the SCS include a short version, a youth version, a state version, and a measure of compassion for others.

Keywords: Bifactor; Bifactor-ESEM; CFA; ESEM; Factor structure; Self-compassion; Self-Compassion Scale (SCS); Validity

INTRODUCTION

Over the last few years, research on self-compassion has grown at an exponential rate. There have been over 2500 articles or dissertations written about self-compassion since 2003 (based on a Google Scholar search of entries with "self-compassion" in the title in February 2020), almost half of which have been published in the last two years. The majority of research studies have utilized the Self-Compassion Scale (SCS; Neff, 2003a) to examine the construct of self-compassion. Neff's (2003b) operationalization of self-compassion was based on compassion for others as broadly conceptualized in Buddhist philosophy (e.g., Brach, 2003; Kornfield, 1993; Salzberg, 1997). From a Buddhist perspective, in order to have compassion for another's suffering it is necessary to open to their pain with mindfulness, respond with loving-kindness, and recognize interconnectedness in the experience of suffering. Self-compassion represents this state of mind turned inward, and refers to how we relate to ourselves in instances of perceived failure, inadequacy or personal suffering.

According to Neff's theoretical model (Neff, 2003b, 2016a, 2016b; Neff et al., 2018, 2019), self-compassion is comprised of various components that combine and mutually interact to create a self-compassionate frame of mind when faced with personal inadequacy or life difficulties: increased self-kindness and reduced self-judgment, greater feelings of common humanity and fewer feelings of isolation, greater mindfulness and less over-identification. Self-kindness entails being gentle, supportive and understanding towards oneself. Rather than harshly judging oneself for shortcomings, the self is offered warmth and acceptance. Common humanity involves recognizing the shared human experience, understanding that all humans fail, make mistakes, and lead imperfect lives. Rather than feeling isolated by one's imperfection - egocentrically feeling as if "I" am the only one who has failed or am suffering - one takes a more

connected perspective with regard to personal shortcomings and individual difficulties.

Mindfulness involves being aware of one's present moment experience of suffering with clarity and balance, without running away with a dramatic storyline about negative aspects of oneself or one's life experience - a process that is termed "over-identification."

As Neff (2016a) writes, the various components of self-compassion are conceptually distinct and tap into different ways that individuals *emotionally* respond to pain and failure (with kindness and less judgment), *cognitively* understand their predicament (as part of the human experience and less isolating), and *pay attention* to suffering (in a mindful and less over-identified manner). The six elements of self-compassion are separable and do not co-vary in a lockstep manner, but they do mutually impact one another. Put another way, self-compassion represents a dynamic system in which the various elements of self-compassion are in a state of synergistic interaction (Neff, 2016a, 2016b).

SCS Items

The 26 items of the SCS (Neff, 2003a) are written in a face-valid manner and measure the cognitions and emotions associated with compassionate and uncompassionate responses to feelings of personal inadequacy and general life difficulties. Sample items are: Self-Kindness ("I try to be loving towards myself when I'm feeling emotional pain"), Self-Judgment ("I'm disapproving and judgmental about my own flaws and inadequacies"), Common Humanity ("When things are going badly for me, I see the difficulties as part of life that everyone goes through"), Isolation ("When I think about my inadequacies it tends to make me feel more separate and cut off from the rest of the world"), Mindfulness ("When I'm feeling down I try to approach my feelings with curiosity and openness"), and Over-Identification ("When something upsets me I get carried away with my feelings"). Scores for negative items representing

uncompassionate self-responding are reverse-coded to indicate their absence. Neff (2003a, 2003b) defines self-compassion as the relative balance of more compassionate and less uncompassionate responses to suffering, which is why the SCS measures both.

The SCS was developed in a sample of college undergraduates (Neff, 2003a). After identifying 71 items that were easily understood by students using a small pilot sample ($n=68$), exploratory factor analyses (EFA) were used with a larger sample ($n=391$) to identify 26 items that loaded best on separate subscales representing the six components of self-compassion. Confirmatory factor analyses (CFA) were used to provide support that scale items fit as intended with the proposed a priori theoretical model (Furr & Bacharach, 2008). An initial CFA found an adequate fit to a six-factor inter-correlated model (NNFI=.90; CFI=.91) and a marginal fit to a higher-order model representing the construct of self-compassion as a whole (NNFI=.88; CFI=.90). Cross validation using CFA in a second sample ($N=232$) found adequate fit for a six-factor inter-correlated model (NNFI=.92; CFI=.93) and a higher-order model (NNFI=.90; CFI=.92). Findings supported the use of the 26 items chosen for the SCS, and suggested that the subscales could be examined separately or else that a total score could be used to represent overall self-compassion levels.

Scale Validity

In addition to finding support for the factor structure of the SCS, Neff (2003a) found that total SCS scores evidenced good internal reliability (Cronbach's $\alpha = .92$), as did the six subscales (Cronbach's α ranging from .75 to .81). Test-retest reliability over a three-week interval was also good for the total score (Cronbach's $\alpha = .93$) and six subscale scores (with Cronbach's α ranging from .80 to .88). The internal reliability of SCS scores is generally found to be high, as evidenced by recent studies examining the SCS in seven US samples (Neff et al., 2018) or in

twenty international samples (Neff et al., 2019).

There is a large body of research indicating that scores on the SCS are associated with wellbeing, constituting construct validity. For example, higher scores on the SCS have been linked to greater levels of happiness, optimism, life satisfaction, body appreciation, perceived competence, and motivation (Hollis-Walker & Colosimo, 2011; Neff et al., 2018; Neff, Hsieh & Dejithirat, 2005; Neff, Pisitsungkagarn & Hsieh, 2008; Neff, Rude, & Kirkpatrick, 2007); lower levels of depression, anxiety, stress, rumination, self-criticism, perfectionism, body shame and fear of failure (Breines, Toole, Tu, & Chen, 2014; Finlay-Jones, Rees, & Kane, 2015; Neff, 2003a; Neff et al., 2005; Neff et al., 2018; Raes, 2010), and healthier physiological responses to stress (Breines et al., 2014; Friis, Johnson, Cutfield & Consedine, 2016). There is also evidence for predictive validity. Longitudinal studies have found that self-compassion levels predict stress, depression, anxiety, suicidality, and coping over time (Stefan, 2019; Stutts & Blomquist, 2018; Stutts, Leary, Zeveney & Hufnagle, 2018; Zeller, Yuval, Nitzan-Assayag & Bernstein, 2015; Zhu et al., 2019).

Moreover, findings with the SCS converge with those obtained with experimental methods involving behavioral interventions or mood manipulations (e.g., Albertson, Neff, & Dill-Shackleford, 2015; Breines & Chen, 2012; Diedrich, Grant, Hofmann, Hiller, & Berking, 2014; Johnson & O'Brien, 2013; Leary, Tate, Adams, Allen & Hancock, 2007; Neff & Germer, 2013; Odou & Brinker, 2014; Shapira & Mongrain, 2010; Smeets, Neff, Alberts & Peters, 2014), suggesting that findings with the SCS are robust.

The SCS demonstrates good discriminate validity. First, it is not significantly associated with social desirability (Neff, 2003a). Self-compassion can also be empirically differentiated from self-esteem, and the SCS demonstrates incremental predictive validity with regard to the

construct (Kreiger, Hermann, Zimmermann & grosse Holtforth, 2015; Neff & Vonk, 2009) including in longitudinal research (Marshall et al., 2015). In addition, self-compassion can be differentiated from self-criticism. Although a key feature of self-compassion is the lack of self-judgment, overall SCS scores still negatively predict anxiety and depression when controlling for self-criticism and negative affect (Neff, 2003a; Neff et al., 2007). Neff et al. (2007) found that the SCS predicted significant variance in positive wellbeing after controlling for all of the Big Five personality traits. Moreover, Neff, Tóth-Király and Colosimo (2018) established incremental validity with neuroticism in three separate studies, and Stutts et al. (2018) found that self-compassion predicted depression, anxiety and stress while controlling for neuroticism in a longitudinal study.

The SCS demonstrates known groups validity: undergraduate and community adults evidence significantly lower scores on the SCS than individuals who practice Buddhist meditation, as would be expected given the Buddhist roots of the construct (Neff, 2003a; Neff & Pommier, 2013). Similarly, clinical populations have lower levels of self-compassion than non-clinical populations (e.g., Castilho et al., 2015; Werner et al., 2012), to be expected given that a lack of self-compassion is seen as a transdiagnostic feature of clinical populations (Schanche, 2013).

The scale demonstrates good convergent validity as well. For instance, therapists' ratings of how "self-compassionate" individuals were (using a single item) after a brief interaction significantly correlated with self-reported SCS scores (Neff et al., 2007), and there was a strong association (.70) between self-reported and partner-reported scores on the SCS among couples in long-term romantic relationships (Neff & Beretvas, 2013). Similarly, high levels of agreement (.77) were found between independent coders using SCS items to rate the level of self-

compassion displayed in brief verbal dialogues (Sbarra, Smith, & Mehl, 2012). These findings suggest that the SCS measures behaviors that are clearly observable by others.

Factor Structure of the SCS

Neff (2003a) originally used confirmatory factor analysis (CFA) to examine the factor structure of the SCS, and found adequate fit for a higher-order model and a six-factor correlated model, justifying use of the SCS as a total score or else six subscale scores. Since then, several other validation studies have been carried out on the SCS (for an overview, see Neff et al., 2019). While the six-factor correlated model has generally been replicated, findings of a single higher-order factor have been inconsistent. Some studies have found support for a higher-order model (e.g. Benda & Reichová, 2016; Castilho, Pinto-Gouveia, & Duarte, 2015; Dundas et al., 2016), but others have not (e.g., Costa, Marôco, Pinto-Gouveia, Ferreira, & Castilho, 2015; López et al., 2015; Montero-Marín, Gaete et al., 2016; Neff, Whittaker & Karl, 2017; Williams, Dalgleish, Karl, & Kuyken, 2014).

Several researchers have argued that the SCS should not be measured with a total score representing the holistic construct of self-compassion, but should instead be measured with two factors representing positive (self-kindness, common humanity, and mindfulness items) and negative (self-judgment, isolation and over-identification) self-responding (e.g., Costa, Marôco, Pinto-Gouveia, Ferreira, & Castilho, 2015; López et al., 2015; Muris & Petrocchi, 2017). These researchers tend to use the term “self-compassion” to describe the positive factor and the terms "self-criticism" or "self-coldness" to describe the negative factor (Costa et al., 2015; Gilbert, McEwan, Matos, & Ravis, 2011; López et al., 2015). Note that self-criticism and self-coldness primarily describe self-judgment and do not describe isolation (a way of cognitively understanding suffering) or over-identification (a way of paying attention to suffering). Also, this

term obscures the fact that negative items are reverse-coded to indicate their absence. Therefore, we prefer the terms “compassionate” vs. “reduced uncompassionate” self-responding to describe these two sets of subscale items. The argument is more than a semantic one, however.

The two factor approach is theoretically justified by scholars such as López et al. (2015) and Costa et al. (2015) with reference to Gilbert's (2005) model of social mentalities, in which the soothing aspect of "self-compassion" is thought to tap into the mammalian safeness system (parasympathetic nervous system) and the critical response of "self-coldness" is thought to tap into the threat defense system (sympathetic nervous system). Because these two systems are distinct at the physiological level, it is argued that they should not be simultaneously represented in an overall scale score. Neff (2016a) counters that while the sympathetic and parasympathetic nervous systems can be understood as distinct, research suggests the two systems continuously interact and co-vary (Porges, 2001). Self-compassion is seen to reflect the relative balance between increased compassionate and decreased uncompassionate self-responding, which is why the SCS measures both simultaneously. It should also be noted that subscales representing compassionate and uncompassionate responding are not differentially associated with physiological markers of sympathetic and parasympathetic response (Neff et al., 2018; Svendsen et al., 2016).

Empirical support for a first-order two-factor model has been poor. López et al. (2015) conducted exploratory factor analysis (EFA) and found that compassionate items loaded on one factor and reduced uncompassionate items loaded on a second factor. No CFA was conducted to confirm this two-factor model, however. Costa et al. (2015) compared a higher-order model, a six-factor uncorrelated model, a two-factor uncorrelated model that separated compassionate and reduced uncompassionate self-responding items, and a two-factor model that included correlated

errors designed to improve model fit, and although they found that the two-factor model with correlated errors had the best fit, that fit was inadequate using standard cutoff values (e.g. Hu & Bentler, 1999). In other research, moreover, a two-factor model has not been supported (e.g., Cleare, Gumley, Cleare & O’Conner, 2018, Neff et al., 2017), including in 20 international samples examined by Neff et al. (2019).

It is important that the psychometric analyses used to examine psychological measures be consistent with the psychological theory underlying those measures (Morin, Arens, & Marsh, 2016a). Higher-order models are commonly employed to validate the simultaneous use of a total score and sub-scale scores in measures of multidimensional psychological constructs (e.g., Chen, West, & Sousa, 2006; Gignac, 2016). A higher-order model represents several first-order factors (representing sub-scale scores) and a higher-order factor (representing a total score) that explains their inter-correlation, but makes the strong and rather unrealistic assumption that the higher-order factor only influences individual item responses through the pathway of the first-order factors. This assumption, however, is not likely to hold in practice and has been shown to be unrealistic and rarely verified (Gignac, 2016; Morin et al., 2016a; Morin, Myers, & Lee, in press). Neff (2016b) argues that the hierarchical models first used to validate the SCS were inappropriate to model self-compassion, given that items tap into behaviors that are influenced by specific factors such as kindness and mindfulness *and* the general factor of self-compassion simultaneously. A self-compassionate mindstate is thought to operate as a multidimensional system.

The bifactor approach is an increasingly popular way to model multidimensional constructs (Reise, 2012; Rodriguez, Reise, & Haviland, 2016). Unlike a higher-order model, a bifactor model does not assume that the general or group factors are superordinate or subordinate

than the other, and models the direct association of the general factor and group factors on individual item responses. The group factors are orthogonal (i.e., they do not correlate), facilitating the disaggregation of the total covariance into global and specific elements. Omega values can also be calculated that represent the amount of reliable variance in item responding explained by the general factor. Neff (2016a) argues that a bifactor model provides a better theoretical fit with her conceptualization of self-compassion than a higher-order model.

Nonetheless, support for a bifactor CFA model of the SCS has also been mixed. Neff et al. (2017) found support for a bifactor CFA model in four different samples, and Cleare et al. (2018) independently replicated these findings. Others have not replicated these findings, however (Brenner, Health, Vogel & Credé, 2017; Coroiu et al., 2018; Montero-Marín et al., 2016). Some researchers have also used bifactor models to argue for two general factors representing compassionate and uncompassionate self-responding, each with three positive or negative specific factors. For instance, Brenner et al. (2017) and Coroiu et al. (2018) compared a CFA one-bifactor and two-bifactor model, and found better fit for a two-bifactor model (although certain fit indices were poor). It is important to note that these studies examined two *uncorrelated* general factors, however, a model that runs directly counter to Neff's (2003b) conceptualization of self-compassion as a balance between increased compassionate and reduced uncompassionate self-responding. Halamová et al. (in press) found better fit for a correlated two-bifactor model over one-bifactor models in ten international samples ($n = 13623$), but employed unidimensional item response theory, which is inappropriate for multidimensional constructs such as self-compassion.

None of the analytic approaches discussed so far are fully consistent with a model of self-compassion as a multidimensional system. For instance, CFA has also been criticized for

implicitly assuming the unidimensionality of psychological constructs (Morin et al., 2016a; Morin, Arens, Tran, & Caci, 2016b). This unidimensionality is expressed by forcing scale items to load only on their respective factors without manifesting any cross-loadings on other factors, when in fact in multidimensional measures scale items are fallible by nature and are expected to demonstrate associations with non-target, yet conceptually-related constructs. This is not related to random measurement error, but to the notion that items often present more than one source of true score variance and subsequently belong to more than one construct. The six components of the SCS are conceptually close and interrelated as a system, thus it is reasonable to expect significant associations between items and other subscales (for instance a self-kindness item on the SCS might be expected to load on reduced self-judgment, or an isolation item might be expected to load on over-identification). CFA forces these non-target associations, which manifest in the form of cross-loadings, to be zero. This is problematic, given that even small cross-loadings could inflate factor correlations when not accounted for in the model (Asparouhov, Muthén, & Morin, 2015).

Exploratory Structural Equation Modeling (ESEM), as a synergy of EFA and CFA, is specifically designed to model these types of system-level interactions by freely estimating cross-loadings (Marsh, Morin, Parker, & Kaur, 2014; Morin, Marsh, & Nagengast, 2013). Despite the term "exploratory" which is a semantic distinction and not a statistical one, target rotation (Browne, 2001) facilitates the use of the ESEM framework in a confirmatory manner, making it possible to directly compare it to CFA (Tóth-Király, Bóthe, Rigó, & Orosz, 2017). Hupfeld and Ruffieux (2011) as well as Tóth-Király, Bóthe & Orosz (2017) used ESEM to examine the factor structure of the SCS and found that it provided a better fit and a more realistic representation of the data compared to CFA.

Fortunately, a bifactor model can also be estimated in conjunction with ESEM (Morin et al., 2016a, 2016b). Neff et al. (2019) argue that the bifactor-ESEM framework is the most theoretically appropriate way to analyze the SCS because it can simultaneously model both the specific and overall relationship of items using a bifactor analytic approach as well as their interaction as a system with an ESEM approach. Neff et al. (2019) examined the factor structure of the SCS using bifactor-ESEM analyses in 20 international samples - 7 English and 13 non-English - including 10 community, six student, one mixed community/student, one meditator, and two clinical samples ($n=11,685$). Five different models were systematically examined with both CFA and ESEM: a one-factor, two-factor correlated, six-factor correlated, a bifactor model, and a two-bifactor correlated model representing two general correlated factors (each with three group factors representing compassionate and reduced uncompassionate self-responding). Analyses found that the ESEM models were generally superior to the CFA models. Also, while a one factor and two-factor correlated ESEM models had poor fit across samples, a six-factor correlated, single bifactor and two-bifactor ESEM models had excellent fit in every one of the 20 samples examined. When examining fit for the sample as a whole, fit for a first order six-factor correlated model was excellent (CFI=.99, TLI=.97, RMSEA=.05) and a single bifactor model also had excellent fit (CFI=.99, TLI=.97, RMSEA=.05). Fit for a correlated two-bifactor was similar (CFI=.99, TLI=.99, RMSEA=.04). However, apart from the statistical criteria, theoretical conformity and the examination of parameter estimates (i.e., factor loadings) should also be conducted. While factor loadings generally supported the loading of individual items on their six respective subscale factors ($M\lambda=.56$), as well as a single general factor ($M\lambda=.62$), separate compassionate vs. uncompassionate factors were not well-defined by their corresponding factor loadings ($M\lambda=.22$ and $M\lambda=.17$, respectively). This argues against the use of two general factors

and supports the superiority of the bifactor-ESEM model with one general factor. Moreover, 95% of the reliable variance in item responding could be attributed to a total score.

This general pattern of results – with a six-factor correlated and bifactor-ESEM model displaying excellent model fit in addition to clearer factor definition - was replicated in a separate study by Neff, Tóth-Király and Colosimo (2018) in two additional samples (N=576 and N=581). In this case, the amount of reliable variance explained by a total self-compassion score was 94% and 98%, respectively. They were also replicated by Tóth-Király, Bóthe and Orosz (2017) in a Hungarian sample (n=505). It should be noted that in every one of the 23 samples in which a correlated two-factor first order model, a bifactor model, and a correlated two-bifactor model using both CFA and ESEM have been systematically compared, support has been found for one general factor and not two factors. Also, none of the studies that have found evidence for a two-factor model over a one-factor model (e.g., Brenner et al., 2017; Costa et al., 2015; López et al., 2015; Halamová et al., in press) have examined a bifactor ESEM representation (the most theoretically appropriate model).

Finally, Tóth-Király and Neff (2020) examined the generalizability of the SCS via tests of measurement invariance across a wide range of populations, varying according to features such as student status, gender, age, and language. Secondary data was used for this purpose and included a total of 18 samples and 12 different languages (n=10997). Multigroup analyses revealed evidence for the configural, weak, strong, strict, and latent variance-covariance of the bifactor exploratory structural equation modeling representation of the SCS across different groups. These findings suggest that the SCS provides an assessment of self-compassion that is psychometrically equivalent across groups.

These psychometric findings are buttressed by research on how the components of self-

compassion are configured within individuals. Phillips (2019) used latent profile analyses in two samples to examine profiles or patterns of scores on the various SCS subscales and found only three patterns - high in the three positive and low in the three negative subscales, low in the three positive and high in the three negative subscales, or moderate in both. There were no individuals who were high or low in both compassionate and uncompassionate responding, suggesting they form a balanced system and are not independent. In summary, the empirical evidence supports the measurement and understanding of self-compassion as a holistic mindstate comprised of six distinct but overlapping components that operate as a system.

The SCS has been translated into 22 different languages. It is recommended that attempts to translate the SCS into other languages use the bifactor-ESEM approach to validate translations. MPlus syntax for the bifactor-ESEM model used in Neff et al. (2019) can be found in the supplementary materials for that article.

Other Formats of the SCS

Self-Compassion Scale Short Form (SCS-SF). A short form of the SCS containing 12 of the original 26 SCS items was developed for those who are primarily interested in examining self-compassion as a whole (Raes, Pommier, Neff, & Van Gucht, 2011). A Dutch sample (n=271) was used to construct the SCS-SF. To create the scale, two items from each of the six self-compassion subscales were selected that demonstrated high correlations with the long SCS total score and high correlations with their intended SCS subscale. A second Dutch sample (n=185) was used to validate the factor structure of the SCS-SF. Confirmatory factor analyses supported the same correlated six-factor structure as found in the original study of the long form (Neff, 2003a), as well as a single higher-order factor of self-compassion. The SCS-SF was then validated in a third, English sample (n=415). The six-factor structure and a single higher-order

factor was replicated. The SCS-SF demonstrated adequate internal consistency (Cronbach's $\alpha \geq .86$ in all samples) and a near-perfect correlation with the long form SCS ($r \geq .97$ all samples). The SCS-SF is a reliable alternative to the long form SCS, especially when looking at overall self-compassion scores. Because each subscale only contains two items, however, reliability of the subscales is lower (r 's ranging from .54 - .75). Therefore, use of the SCS-SF subscales is not recommended. Also, future research needs to validate the factor structure of the SCS-SF using bifactor-ESEM.

Self-Compassion Scale for Youth (SCS-Y). Neff et al. (in press) have created a youth version of the SCS that is appropriate for use with early adolescents in middle school. Study 1 ($n=279$) developed the 17-item scale from an initial pool of 36 items. Items were selected that had the strongest target loadings, relatively low cross-loadings, adequate content validity, and performed well in subsequently re-estimated measurement models. Three items were selected each representing the subscales of self-kindness, mindfulness, common humanity, self-judgment, isolation, but only two items representing over-identification were found to be adequate. The same models examined by Neff et al., 2019 for the SCS were used with the SCS-Y. Bifactor-ESEM supported the use of a general self-compassion score and six subscale scores, but not two positive and negative scores (similar to the SCS). Study 2 cross-validated the factor structure of the SCS-Y with a second sample of youths ($n=402$). Reliability was good: Cronbach's $\alpha \geq .82$ for a total SCS-Y score in both samples, and the subscales were also generally reliable. Study 3 ($n=102$) found support for the test-retest reliability of the SCS-Y ($r = .83$). Study 4 ($n=212$) established construct validity by demonstrating that SCS-Y scores were significantly associated with mindfulness, happiness, life-satisfaction, depression, resilience, and achievement goal orientation in expected directions. Overall, findings suggest that the SCS-Y is a reliable and valid

measure of self-compassion for use with youths.

State Self-Compassion Scale Long (SSCS-L) and Short Form (SSCS-S). Neff, Tóth-Kiraly, Kuchar & Davidson (2020) have also created a state form of the SCS designed to be used for the experimental study of self-compassion: The 18-item SSCS-L can measure the six components of self-compassion, and the six-item SSCS-S can measure global levels of self-compassion only. Items were developed by reframing trait SCS items in state form: For example, "When I'm going through a very hard time, I give myself the caring and tenderness I need" was rewritten as "I am giving myself the caring and tenderness I need." Also, instructions were changed so that respondents were asked think of a particular difficulty or struggle in their lives currently as they responded to items. In Study 1 (n=588), participants were given 26 potential items, and three items per subscale were selected to create the 18-item SSCS-L (similar to the procedure described for the SCS-Y). The same models examined by Neff et al., 2019 for the SCS were used with the SSCS-L. Psychometric properties of the SSCS-L were excellent: a bifactor-ESEM representation (with one global factor representing self-compassion and six specific factors representing its components) was supported, while a two-factor solution was not supported. In fact, the correlation between the two latent factors in the CFA two-bifactor model was so high ($r = .887$) as to suggest redundancy. The SSCS-L total score was reliable ($\alpha = .94$), as were the six subscales (α 's $> .73$). The 6-item SSCS-S was created by selecting one item from each SSCS-L subscale with a strong loading on the general self-compassion factor. The SSCS-S had a near perfect ($r = .96$) correlation with the SSCS-L. The SSCS-S also demonstrated good reliability ($\alpha = .86$). Psychometric analyses other than reliability were not conducted on the SSCS-S because it was designed to be a proxy measure of the SSCS-L.

In Study 2 (n=411) a self-compassionate mindstate induction (SCMI) was created that

was designed to be consistent with Neff's theoretical model of self-compassion. Writing prompts were given which guided participants to write about the current difficulty in their lives with mindfulness, common humanity and kindness. The SCMI was found to increase state self-compassion using both the SSCS-L and SSCS-S with large effect sizes. The six subscales of the SSCS-L also changed to a remarkably similar degree. The factor structure of the SSCS-L was replicated before and after manipulation, suggesting it is a robust measure of state self-compassion. Reliability was high for both the SSCS-L and SSCS-S. Global state self-compassion and the six components were associated with positive and negative affect in the expected directions, providing construct validity.

The Compassion Scale (CS). Although not strictly another format of the SCS, Pommier, Neff, and Tóth-Király (2020) created a measure of compassion for others with a similar structure to the SCS. Compassion was operationalized as experiencing kindness, a sense of common humanity, mindfulness, and lessened indifference toward the suffering of others. Study 1 (N = 465) developed a 16-item scale (with four items per subscale) from a pool of 80 items using the same procedures that were used for the SCS-Y and SSCS-L. Various CFA and ESEM models were examined, and a bifactor ESEM structure (with one global factor representing compassion and four specific factors representing its components) was supported. Study 2 (N = 510) cross-validated the CS in a second student sample. Study 3 (N = 80) established the test-retest reliability of the scale ($r = .81$). Study 4 (N = 1394) replicated results with a community sample, while Study 5 (N = 172) replicated results with a sample of meditators, providing known-groups validity. Study 6 (N = 913) made small changes to the CS items to improve face validity.

Across studies, the CS was associated with other measures in a theoretically consistent manner. For instance, it was not significantly associated with social desirability or submissive

compassion (providing discriminant validity), it had large associations with compassionate love for humanity and a compassionate disposition (providing convergent validity), and moderate associations with wisdom, mindfulness and social connectedness (providing construct validity). The CS total score was found to be reliable (Cronbach's alpha ranged from .77 to .90 across studies), and subscales also showed adequate reliability. Results indicated that the CS and SCS have a modest correlation, with most people reporting much higher compassion for others than the self.

Use of the SCS

Appendix 1 presents the 26 SCS items, along with coding instructions. The SCS can be administered in a paper or computerized format. It is freely available for use by anyone interested, including researchers, clinicians, and individuals. Although researchers should cite Neff (2003a) in publications using the scale, no other permission to use the scale is needed. Researchers can find the SCS (along with the SCS-SF, SCS-Y, SSCS-L, SSCS-S, SCMI, and CS) on the research tab at www.self-compassion.org. Translated versions of the SCS are also available. In addition, individuals can fill out the SCS and have their scores automatically calculated at the site. Instructions for administering the SCS are straightforward. Individuals are asked to consider “How I typically act towards myself in difficult times.” They are instructed to “Please read each statement carefully before answering. To the left of each item, indicate how often you behave in the stated manner, from 1 = “Almost Never” to 5 = “Almost Always.” Anchors are not given for responses of 2, 3 or 4 but are intuited based on the distance from the endpoints. Scores for negative items representing uncompassionate self-responding are reverse-coded to indicate their absence. Means for each subscale are first calculated, then a grand mean of the six subscale means is used to represent overall self-compassion levels.

There have not been norms established for what constitutes low, medium or high levels of self-compassion. However, mean scores on the SCS are typically very close to 3.0 among undergraduates and community adults in the U.S., and the standard deviation is typically very close to .60 (Neff, 2003a; Neff & McGehee, 2010; Neff & Pommier, 2013; Yarnell & Neff, 2013). Thus, a score of 2.4 or below could be considered low, a score between 2.4 and 3.6 could be considered average, and a score of 3.6 or above could be considered high.

Recommendation for Use of a Total Score vs. Subscale Scores

Given that over 94% of the reliable variance in item responding on the SCS can be explained by a general self-compassion score (Neff, Tóth-Király, & Colosimo, 2018; Neff et al., 2019), this would suggest that self-compassion is best understood as a holistic construct and that a total score should be used in most research. However, the six-factor structure of the SCS has also consistently been confirmed, meaning that use of the individual subscales is also valid. Use of the six separate subscales may have relevance for understanding the mechanisms by which self-compassion engenders well-being. There are some differences in the strength of the association between various SCS components and various outcomes. For instance, a meta-analysis by Muris and Petrocchi (2017) found that the SCS subscales representing reduced uncompassionate self-responding are more strongly linked to psychopathology than those representing compassionate responding.

A similar pattern of findings was obtained by Neff et al. (2018), who investigated the differential link of the six SCS subscales and wellbeing in seven domains – psychopathology, positive psychological health, emotional intelligence, self-concept, body image, motivation, and interpersonal functioning. They found that while reduced negative self-responding had a stronger link to negative emotionality and self-evaluation than positive self-responding, they were

roughly equivalent predictors in other domains. Given the negativity bias and the tendency for negative events to be more potent than positive events (Rozin & Royzman, 2001), it makes sense that reduced levels of negative self-responding would be more strongly associated with psychopathology and have a stronger influence on self-evaluation. However, increased compassionate responding also had substantial correlations with psychopathology, and tended to have a stronger association with outcomes like emotional awareness, goal re-engagement, compassion for others and perspective-taking. For many aspects of psychological functioning, moreover, such as happiness, wisdom, body appreciation, or grit, all six subscales appeared to make an equal contribution to well-being. In summary, these findings suggest that both compassionate and reduced uncompassionate self-responding make an important contribution to psychological functioning, supporting the idea that they operate together as a holistic system.

Some scholars have argued that because reduced uncompassionate self-responding tends to have a stronger association with negative outcomes than compassionate responding, that its inclusion in the definition and measurement of self-compassion inflates the link between self-compassion and negative mood states such as anxiety and depression (Brenner et al., 2018; Muris & Petrocchi, 2017; Pfattheicher et al., 2017). In fact, Muris and colleagues (Muris, Otgaar, & Petrocchi, 2016; Muris, Otgaar & Pfattheicher, 2019; Muris & Petrocchi, 2017) have argued that items representing uncompassionate self-responding should be dropped from the measurement of self-compassion for this reason. From our point of view, given that reduced uncompassionate self-responding is inherent to self-compassion, these items must be retained. We interpret findings regarding the differential link of subscales to psychopathology as “explaining” not “inflating” the link between self-compassion and psychopathology.

Most of the criticisms of the SCS have been based on cross-sectional findings with the

SCS, but an examination of how the components of self-compassion change in real time using experimental methods can shed more light on the how the construct operates. In the experiment conducted by Neff et al. (2020) discussed above, for instance, a global state self-compassion score had a significant positive correlation with positive affect and negative correlation with negative affect (with medium effect sizes) at pretest. There was also a slight trend for state components representing compassionate self-responding to be more strongly linked with positive affect, and those representing reduced uncompassionate self-responding to be more strongly linked to negative affect. However, a self-compassionate mindstate induction reduced negative affect with a large effect size, and actually changed negative affect more than positive affect. A total self-compassion score did not appear to inflate the link between self-compassion and negative mood, quite the opposite. These findings suggest that measurement of the reduced uncompassionate self-responding entailed by a self-compassionate mindset is essential to understand its functioning.

Similarly, a recent meta-analysis of 27 randomized-controlled trials of self-compassion interventions (Ferrari et al., 2019) found that all six subscales of the SCS changed significantly as a result of training, suggesting that the components of self-compassion change in tandem. They also found moderate effects for reduced stress, depression and anxiety, and moderation analyses found that the improvements in depression symptoms continued to increase at follow-up. Changes in the components of trait self-compassion after intervention echo those found with state self-compassion after experimental induction, and re-enforce the position that measurement of the reduced uncompassionate self-responding entailed in a self-compassionate mindset is essential. These findings also imply that the best way to reduce uncompassionate self-responding is to increase compassionate self-responding - they do not operate independently.

For researchers who are primarily interested in the benefits of a self-compassion in terms of implications for intervention, therefore, use of a total score is most appropriate. For those more interested in unpacking the mechanisms of *how* self-compassion enhances well-being, however, it may be useful to examine the six constituent components themselves. However, we caution against entering the six subscales simultaneously in regression analyses to determine their differential association with outcomes. Given the deep intertwining of the various components in the definition, operation, and measurement of self-compassion, and given that almost all of the reliable variance in item responding on the SCS is explained by the system of self-compassion as a whole, to separate out the shared variance of the six subscales could change their meaning in a way that would undermine the interpretability of findings.

Limitations

It should be noted that the SCS is a measure of Neff's (2003b) conceptualization of self-compassion only. There are other ways to conceptualize and measure the construct, however. For example, Social Mentality Theory (SMT; Gilbert, 1989, 2005) posits that self-compassion is a state of mind that emerges from mammalian bio-social roles involving care-giving and care-seeking, while self-criticism emerges from evolved social roles that protect us from social threats. The Forms of Self-Criticism and Self-Reassurance Scales (Gilbert, Clarke, Hempel, Miles & Irons, 2004) was developed to measure these two ways of relating to oneself, and is a more appropriate measure for those working within the Social Mentality Theory framework. More recently, Gilbert and colleagues (Gilbert et al., 2017) have developed a model of compassion for self, for others, and from others, based on the broadly used definition of compassion as sensitivity to suffering with a commitment to try to alleviate it (Goertz, Keltner, & Simon-Thomas, 2010). They developed the Compassion Engagement and Action Scales,

including self-compassion and other compassion scales with items tapping into engagement with distress and the motivation to alleviate that distress (e.g., thinking about and taking actions to help). Note that these scales do not measure kindness or common humanity as a feature of compassion.

Strauss et al. (2016) proposed that compassion for self or others involves five key elements: (1) Recognizing suffering; (2) Understanding the universality of suffering in human experience; (3) Feeling empathy for the person suffering (4) Tolerating uncomfortable feelings in response to suffering, so remaining open to and accepting of the person suffering: and (5) Motivation to alleviate suffering. Gu, Baer, Cavanagh, Kuyken, and Strauss (2019) have created a measure of self-compassion that assesses these five elements. While the SCS taps into most of these elements, no items explicitly address the motivation to alleviate suffering out of concern that it is easily conflated with resistance to personal distress (undermining the fourth element) in a way that is less problematic in measures of compassion for others. Still, future research might fruitfully explore whether adding items to the SCS that are focused on the motivation to help and support oneself in times of distress could strengthen the measurement of self-compassion.

Summary

Self-compassion is a state of mind that describes how we relate to ourselves in situations of perceived failure, inadequacy or personal suffering, and is commonly measured with the SCS. The SCS is considered to be reliable and appears to have adequate convergent, discriminant, predictive, and known groups validity. There is an ongoing discussion about whether self-compassion is better measured as a global construct versus measuring compassionate and reduced uncompassionate self-responding separately. The application of the state-of-the-art bifactor-ESEM framework provides a way to take into account the multiple sources of construct-

relevant psychometric multidimensionality inherent in the SCS. Evidence using this approach supports the co-existence of a global self-compassion factor as well as the six specific dimensions, but does not support the use of two separate factors representing compassionate versus reduced uncompassionate self-responding.

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Appendix 1

The Self-Compassion Scale

HOW I TYPICALLY ACT TOWARDS MYSELF IN DIFFICULT TIMES

Please read each statement carefully before answering. To the left of each item, indicate how often you behave in the stated manner, using the following scale:

Almost never
1

2

3

4

Almost always
5

1. I'm disapproving and judgmental about my own flaws and inadequacies.
2. When I'm feeling down I tend to obsess and fixate on everything that's wrong.
3. When things are going badly for me, I see the difficulties as part of life that everyone goes through.
4. When I think about my inadequacies, it tends to make me feel more separate and cut off from the rest of the world.
5. I try to be loving towards myself when I'm feeling emotional pain.
6. When I fail at something important to me I become consumed by feelings of inadequacy.
7. When I'm down, I remind myself that there are lots of other people in the world feeling like I am.
8. When times are really difficult, I tend to be tough on myself.
9. When something upsets me I try to keep my emotions in balance.
10. When I feel inadequate in some way, I try to remind myself that feelings of inadequacy are shared by most people.
11. I'm intolerant and impatient towards those aspects of my personality I don't like.
12. When I'm going through a very hard time, I give myself the caring and tenderness I need.
13. When I'm feeling down, I tend to feel like most other people are probably happier than I am.
14. When something painful happens I try to take a balanced view of the situation.
15. I try to see my failings as part of the human condition
16. When I see aspects of myself that I don't like, I get down on myself.
17. When I fail at something important to me I try to keep things in perspective.
18. When I'm really struggling, I tend to feel like other people must be having an easier time of it.
19. I'm kind to myself when I'm experiencing suffering.
20. When something upsets me I get carried away with my feelings.
21. I can be a bit cold-hearted towards myself when I'm experiencing suffering.
22. When I'm feeling down I try to approach my feelings with curiosity and openness.
23. I'm tolerant of my own flaws and inadequacies.
24. When something painful happens I tend to blow the incident out of proportion.
25. When I fail at something that's important to me, I tend to feel alone in my failure.
26. I try to be understanding and patient towards those aspects of my personality I don't like.

Coding Key for Subscale factors:

Self-Kindness Items: 5, 12, 19, 23, 26

Self-Judgment Items (reverse scored): 1, 8, 11, 16, 21

Common Humanity Items: 3, 7, 10, 15

Isolation Items (reverse scored): 4, 13, 18, 25

Mindfulness Items: 9, 14, 17, 22

Over-identified Items (reverse scored): 2, 6, 20, 24

To compute a total self-compassion score, take the mean of each subscale (after reverse coding), then compute a total mean.