

Mediators and the Trait of Sensory Processing Sensitivity: Study Reveals A Significant Correlation.

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Abstract

Are mediators born or made? Is there such a thing as a ‘natural mediator?’ Bowling and Hoffman’s influential (2003) collection, ‘Bringing Peace into the Room,’ considers: ‘How the personal qualities of the mediator impact the process of conflict resolution.’ These questions are troubling for practitioners and educators. Does training matter, or are such qualities, or traits, innate? ‘Trait’ can be defined as ‘A distinguishing quality or characteristic, typically belonging to a person’ (Lexico 2020). Are some individuals drawn to conflict resolution work because they already possess these qualities? Or because they seek them? This article contributes to the debate by reporting on a study into the prevalence of a particular trait, sensory processing sensitivity, in a sample of 181 English-speaking mediators. The study found that these mediators were significantly more likely to possess the trait than the average population. The implications for practice and training are discussed.

Key words: sensory processing sensitivity; highly sensitive person; HSP;
mediators; mediation; mediation empirical research

Introduction

Defining the problem

Are mediators born or made? Is there such a thing as a ‘natural mediator’ (Benjamin 2001)? Bowling and Hoffman’s influential (2003) collection, ‘Bringing Peace into the Room,’ considers: ‘How the personal qualities of the mediator impact the process of conflict resolution.’ These questions are troubling for practitioners and educators. Does training matter, or are such qualities, or traits, innate? ‘Trait’ can be defined as ‘A distinguishing quality or characteristic, typically belonging to a person’ (Lexico 2020). Are some individuals drawn to conflict resolution work because they already possess these qualities? Or because they seek them? This article contributes to the debate by reporting on the prevalence of a particular trait, sensory processing sensitivity, in a sample of 181 English-speaking mediators.

Mediators quickly become aware of the complexity of their work and the myriad choices facing them in each moment. They learn a correspondingly wide range of techniques and strategies, and may also pledge allegiance to broader models or schools, such as ‘facilitative’, ‘transformative’ or ‘evaluative’ mediation (Charkoudian, De Ritis, Buck and Wilson 2009; Morris 2015; though see Kressel, Henderson, Reich and Cohen 2012 for evidence that these are poor predictors of

skill). However, while much mediation literature focuses on models or techniques, less attention has been paid to individual difference among mediators. What sort of people are they? If their qualities or traits truly ‘impact the process of conflict resolution,’ which are they most likely to possess?

Sharma, Bottom and Elfenbein found significant individual variables amongst negotiators (2013; see also Elfenbein 2015). If similar investigations were carried out among mediators, what traits might they reveal? Potential candidates include *emotional intelligence* (Boland and Ross 2010); *adaptivity* (Coleman et al. 2015) and *systematic intuition* (Benjamin 2006). For reasons outlined below we chose to study the prevalence of a single trait, sensory processing sensitivity, among a sample of mediation practitioners. Mediators in this sample possess the trait in much higher numbers than the average population. We report on our study and its implications, and hope this will stimulate further trait-based research in mediation.

Why sensory processing sensitivity?

Two of the authors have regularly experienced being called ‘oversensitive’ or ‘thin-skinned,’ or being told to ‘lighten up.’ While not unusual, it is not everyone’s experience, so we were heartened to discover a substantial body of research into sensitivity. Much of this work has been undertaken by Elaine Aron, a psychologist whose experiences of sensitivity led her to undertake therapy. Her therapist described her as a ‘highly sensitive person’ (Aron 2003) and this led her to develop the questionnaire on which our study is based. Although Aron’s work originated in the early 1990s, subsequent research has validated her original hypothesis

identifying sensitivity as a measurable psychological trait (recent studies include Smith, Sriken and Erford 2019; Pluess, Lionetti, Aron and Aron 2020).

The term highly sensitive person has a lay or commonsense meaning but Aron's explanation uses the more technical 'sensory processing sensitivity.' The terms distinguish between the underlying trait of sensory processing sensitivity (SPS) and the highly sensitive person (HSP) who possesses the trait.

Aron describes how HSPs manifest their SPS trait, and the population ratio in which they are typically found:

'there is strong evidence for two strategies in the face of novel stimulation - either exploration or a quiet vigilance, which may lead to retreat. Although there is some disagreement as to whether this is a continuum or the latter strategy is a temperament category of about 15% to 25%, the difference is well accepted' (Aron and Aron 1997: 345).

Such 'well accepted' differences in temperament were originally described by Hippocrates and Galen, revived by Freud and Jung, and later endorsed in Kagan, Snidman, Arcus and Resnick's (1994) study of infant traits. Recent research suggests SPS is a more stable trait than previously understood, though not uniformly determinative (Greven et al. 2019; Acevedo 2020). Acevedo defines SPS as 'an innate, genetically based trait that is characterized by enhanced awareness and responsivity to the environment and other individuals' (2020: 4).

Although the 'continuum' debate raised by Aron remains unresolved, Naumann, Acevedo, Jagiellowicz, Greven and Homberg (2020) argue that 'the relatively few but growing studies on the neural and genetic basis of SPS provide

evidence of the neurobiological mechanisms underlying SPS'. These accounts suggest highly sensitive people's response to conflict is distinct from the physiological stress reactions commonly described as 'fight/flight/freeze/tend-and-befriend' (Tanz and McClintock 2017).

This responsivity can be overwhelming, causing those with the trait to withdraw from stressful or overpowering situations - hence a potential link to introversion. The trait has an 'up' side, however: 'What this difference in arousability means is that [HSPs] notice levels of stimulation that go unobserved by others' (Aron 1996: 5).

These qualities may also assist HSPs working in areas like the creative arts. The following passage caught our attention:

'One can well imagine reasons for individuals with this trait being an especially functional subgroup of any population, given their low sensory thresholds and awareness of subtlety, their conscientiousness, and their tendency to reflect before acting... the unusually sensitive might prove to be the unusually valuable' (Aron and Aron 1997: 349).

O'Rourke and Walsh further clarify:

'This doesn't mean HSPs have more acute senses, but that their brain refines the data into much more detail than other brains. (HSPs don't see better, they just register more of what they see)' (2012: 2).

Much of Aron's popular writing is devoted to helping HSPs address negative consequences of their arousability, elements of which may stem from childhood trauma (1996: 66). These can in turn affect career choices: Roberts (2007) found

that negative childhood experiences influenced some individuals' decisions to train as mediators.

The development of the HSP concept

Aron and her husband, Arthur, documented their account of the sensory processing sensitivity trait in a 1997 article (Aron and Aron 1997). Their findings distinguish SPS from other 'trait' concepts, including Eysenck and Eysenck's (1975) Personality Questionnaire and Barrick and Mount's (1991) 'Big Five'. In Aron's view, sensory processing sensitivity is a single, one-dimensional construct, related to, but not the same as, social introversion and emotionality. Roughly one third of her participants reported an unhappy childhood and tended to have higher scores on social introversion, emotionality and other sensitivities. The rest differed little from the general population except in terms of basic sensitivity.

From this research Aron and Aron developed the 27-item HSP Scale which we employed for our study. A key question is the prevalence of high SPS in the general population. Aron and Aron based their analysis on the 25% of their sample scoring highest on the HSP scale, citing Kagan et al's (1994) claim that approximately 20% of babies were 'highly reactive' to stimuli. We therefore adopted this 20% figure as a population baseline. Recent scholarship uses the higher figure of 30% (Greven et al. 2019:292; Acevedo 2020:8).

Aron's work suggests that those identifying as HSP extract more data from situations than the average population; are more than usually sensitive to emotions; and their preferred style of interacting is 'pause and reflect' (Aron and Aron 1997:

347). Smolewska, McCabe and Woody (2006) propose a three-component structure to SPS comprising Ease of Excitation (EOE), Aesthetic Sensitivity (AES), and Low Sensory Threshold (LST). Evans and Rothbart's more critical (2008) study of the HSP questionnaire claims it identifies two distinct dimensions: 'sensory sensitivity' and 'sensory discomfort.' However, they found no correlation between the two, casting doubt on Aron's claim that SPS is 'linked to a tendency to experience over-arousal and negative emotionality' (Evans and Rothbart 2008: 118).

More recent research identifies a genetic basis to high SPS, suggesting potential adaptive benefits which may explain its evolutionary persistence (Jagiellowicz, Xu, Aron, Aron, Cao, Feng, and Weng 2011; Licht, Mortensen and Knudsen 2011; Acevedo, Aron, Pospos and Jesson 2018). Despite limitations, those high in the trait: 'will be more aware of harm, threats and foes... Thus, they will have the advantage of knowing how to best respond to the environment, as well as being able to share this information with others. This, as well as their proclivity for empathic concern, will enhance cooperation' (Acevedo 2020: 10).

This brief review indicates potential benefits of the SPS trait for mediators and others whose work involves observing and interpreting complex human interaction. However, it can also bring:

'inherent complications, such as requiring more downtime to integrate information, feeling tired or drained when experiences require a lot of processing, and the tendency to become overwhelmed in overstimulating situations' (Acevedo 2020: 7).

Benham (2006) found a link between SPS and both stress and ill health.

Other studies have noted its contribution to burnout (Meyerson, Gelkopf, Eli and Uziel 2020; Redfearn, van Ittersum and Stenmark 2020; Pérez-Chacón, Chacón, Borda-Mas, and Avargues-Navarro 2021).

How might sensory processing sensitivity affect mediators?

Aron accords HSPs with ‘reflectivity, a preference for input over output and a talent for retrospective and prospective reflection about consequences’ (Aron and Aron 1997: 349). Those high in SPS appear to notice subtleties including other people’s internal states (Redfearn et al 2020: 371). High scores are also associated with increased brain activation of regions involved in attention and action planning (Acevedo et al 2014). These characteristics may assist mediators engaged in the complex and dynamic task of working with two or more people in conflict (Jones and Hughes 2003).

While high levels of SPS could be useful for mediators, some of its consequences could be disadvantageous. HSPs without social support can become ‘fearful, over-aroused, or more easily depressed through repeated aversive experiences’ (Aron and Aron 1997: 362). Over-sensitivity could lead to the avoidance of difficult situations (Benham 2006) – clearly a problem for those working with conflict. And HSPs, with their risk of stress and burnout, may need to devote greater attention to self-care than the average population (Redfearn et al 2020).

Acknowledging, then, that the SPS trait may bring both benefits and drawbacks for mediators, we wondered whether those possessing the trait would be over, or under, represented among actual practitioners. This led to our research

question: *What is the ratio of HSPs within a sample of practising mediators and how does this compare to the general population?* A higher ratio would tend to indicate that the advantages of the trait outweigh the drawbacks for the profession; a lower ratio the opposite.

The study

In order to answer this question we conducted an online survey (Ward and Corbett 2007), choosing Aron's original questionnaire as our research instrument (appendix 1). The 27-point closed ended questionnaire claims those agreeing that 14 or more of the questions apply to them are 'probably highly sensitive.'

The primary aim of our survey was to compare the proportion of HSPs in a sample of mediators to the proportion in the average population. We also sought additional demographic data on, for example, gender, years of practice, profession of origin and practice area. To avoid priming we did not declare the true purpose of the questionnaire, stating instead that we were interested in learning about mediator characteristics.^{iv}

Participants

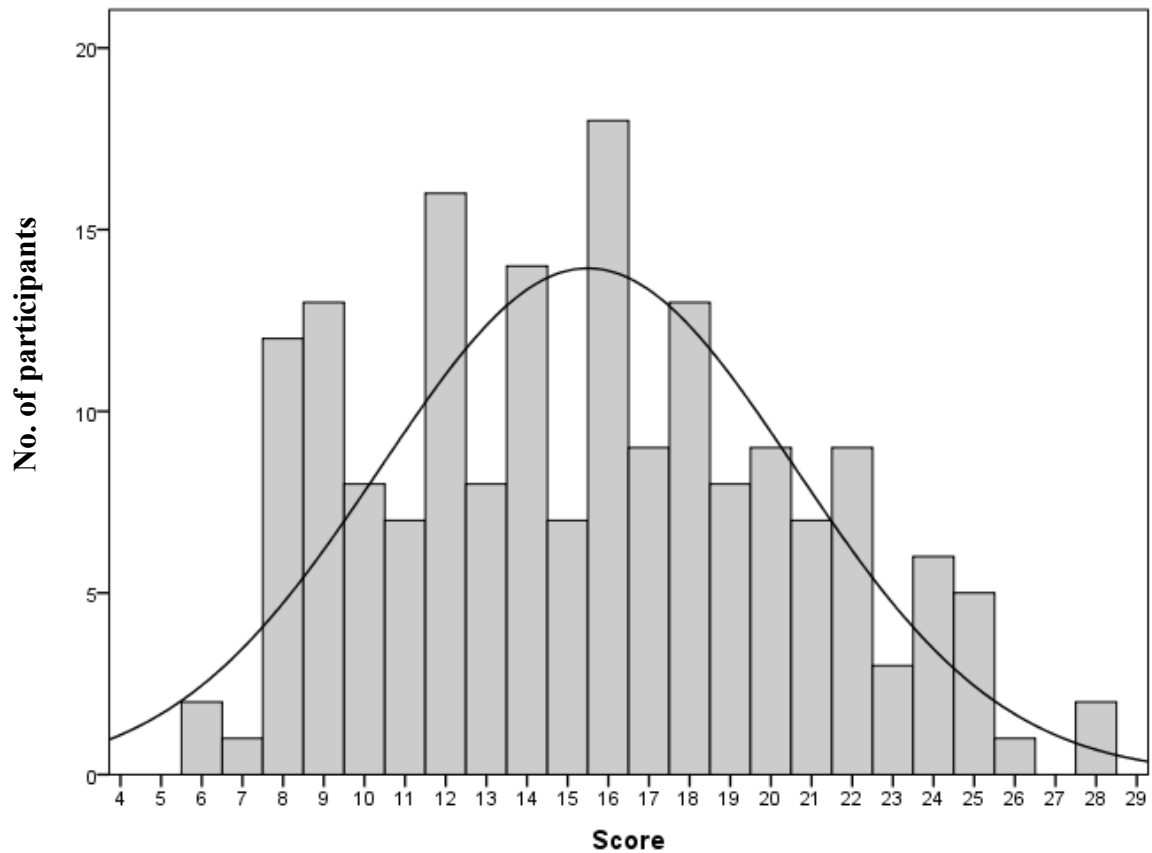
We initially distributed the survey link to 45 potential informants via our own professional organisations. The covering email invited recipients to complete the anonymous questionnaire and, if they wished, forward the link to professional contacts (the *pass-along effect*, Phelps, Lewis, Mobilio, Perry and Raman 2004, described elsewhere as *link-tracing*, *chain referral* or *snowball sampling*,

Thompson 1997). We then sent the survey link to a number of other professional bodies in the UK and USA. 181 people completed the survey between July and October 2013. Nearly half were from the USA and over 40% from the UK.

Findings

Of the 181 participants who completed the survey, 113 (62%) scored 14 or more, and there were significantly more HSPs than non-HSPs in the sample, $\chi^2(1, n = 181) = 11.19, p < .001$. The distribution of scores on the HSP questionnaire is displayed in Figure 1. The mean score was 15.46, the most common score (i.e., mode) was 16, and the median score was also 16. These measures of central tendency indicate that the mediators in our sample are likely to be classified as high in sensory processing sensitivity, and that the distribution of scores approximates a normal distribution.

Figure 1: Distribution of scores on the highly sensitive person questionnaire



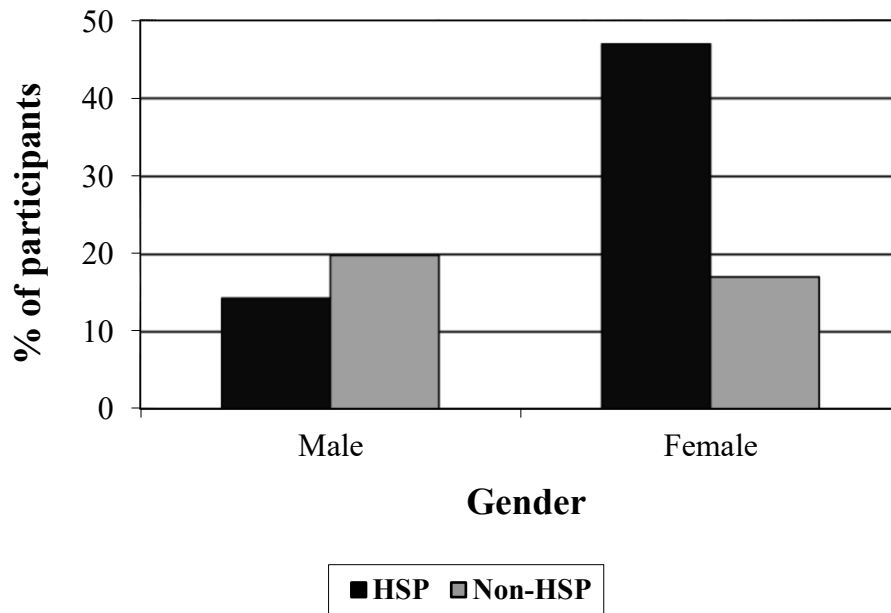
The proportion of our sample of mediators who can be considered HSP is therefore 62%. This is significantly greater than either of Aron’s baseline figure of 20% of the general population or later estimates of 30% (see above, **Development of the HSP concept**). We consider the implications of this finding in the discussion section, below.

Alongside the HSP questionnaire we gathered additional demographic information to provide more detailed context. We turn to that now before discussing the implications of our finding below.

Gender differences in classification as HSP. The distribution of the entire data set demonstrated that more females than males completed the survey.^v Figure 2 provides a % breakdown by HSP group. The strong skew of the distribution (skewness = -1.27) confirms that more females were categorized as HSPs than males, and among HSP respondents the most common gender was female.^{vi} The distribution of responses for the non-HSP participants indicated that the most common gender was male,^{vii} and fewer males than females were categorized as high in sensory processing sensitivity.

In three of Aron and Aron's original seven studies women scored significantly higher than men on the HSP scale (1997: 356). The correlation of SPS with female gender has been confirmed in later research (Benham 2006; Licht et al 2011) despite Aron's contention that HSPs are fairly evenly distributed between females and males (1996: iii). She claims boys are more likely to suppress the trait as they grow up because high sensitivity does not conform to Western societal scripts for maleness (ibid, p. 73). Our data tend to confirm the later empirical findings of a gender different in the prevalence of SPS.

Figure 2: Percentage of respondents who were male or female by highly sensitive person (HSP) category



Relationship between years mediating and sensory processing sensitivity. The distribution of responses for HSP participants indicated that the most common year group was 15 years and over, and the median was 10 to 14 years (see Figure 3 for % breakdown by HSP category).^{viii} The distribution of responses for the non-HSP participants was very similar.^{ix}

The central tendency information indicates that the respondents constituted an adequate spread of mediators in terms of experience approximating a normal population. Though not attaining statistical significance, visual inspection indicates that the proportion of HSP to non-HSP participants is greatest among new entrants to the profession (71%) and relatively stable for the remainder of the sample (57% - 63%, see Figure 4). Our findings also suggest that HSP mediators remain in the field for fewer years than non-HSP mediators.^x

Figure 3: Years mediating by highly sensitive person (HSP) category (%)

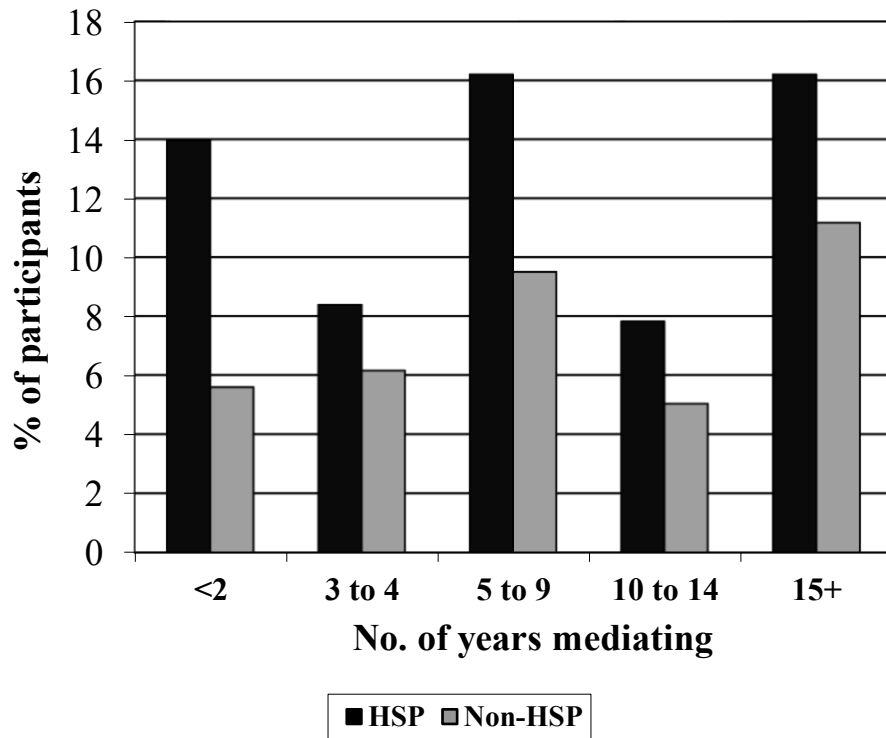
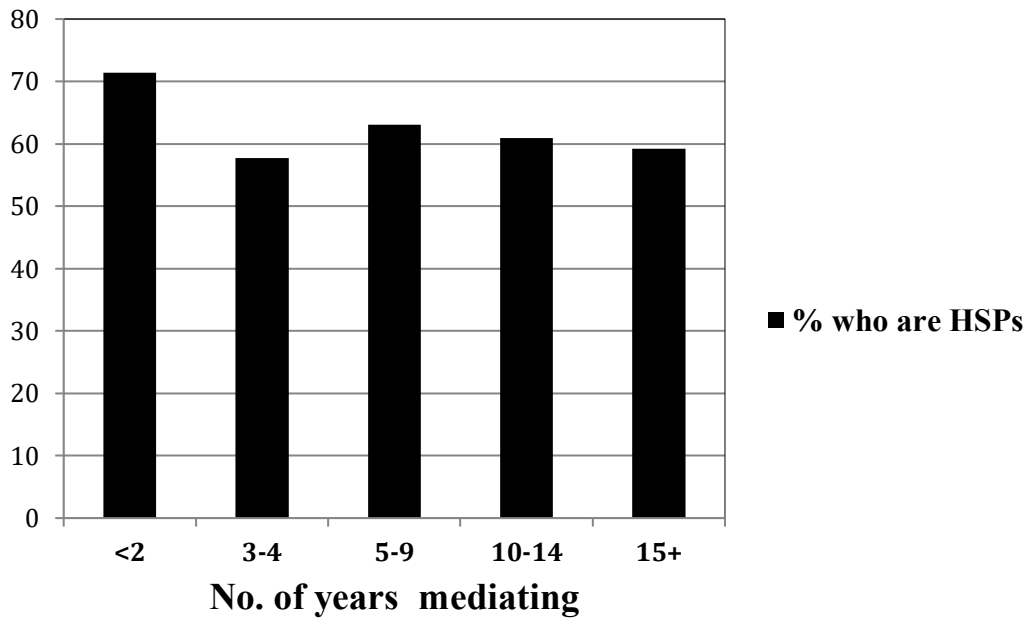


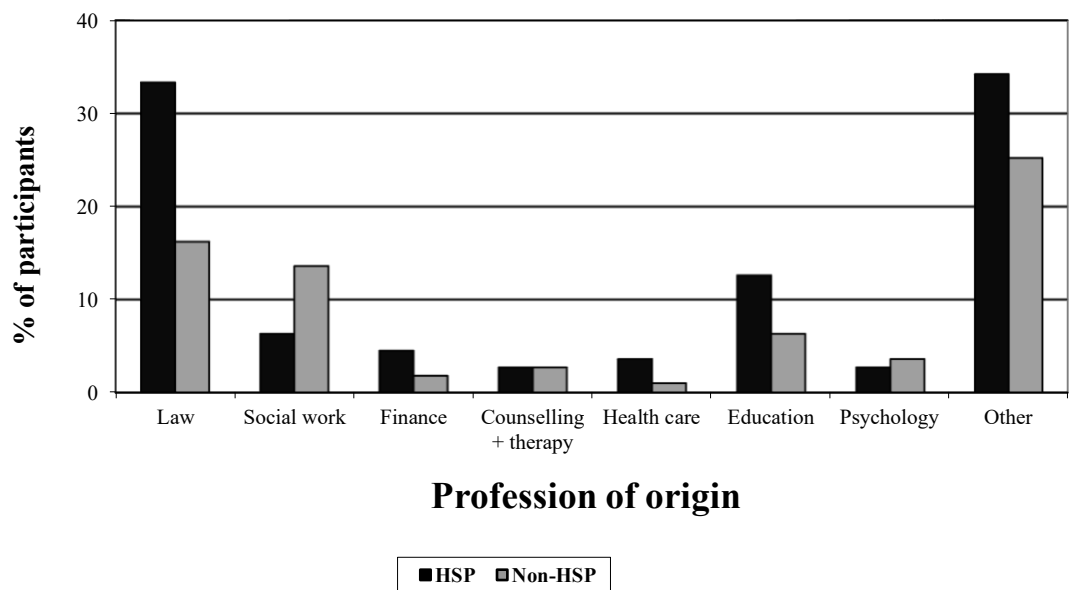
Figure 4: percentage of HSPs for each category of years mediating



Profession of origin of mediators. The most common profession across the dataset was ‘Other,’ suggesting that mediators in our sample were drawn from a range of careers. The only statistically significant association between HSP score and profession of origin^{xi} was for law.^{xii}

Interpreting this finding is challenging. On the one hand law’s emphasis on business and rationality (Riskin 2010) might reasonably be associated with a lower preponderance of the SPS trait. Yet that same emphasis could explain why HSPs within the legal profession might be drawn to mediation as a counterpoint to lawyering. Visual inspection suggests the opposite phenomenon for social workers, with fewer than half our sample scoring 14 or more. These are matters for further research.

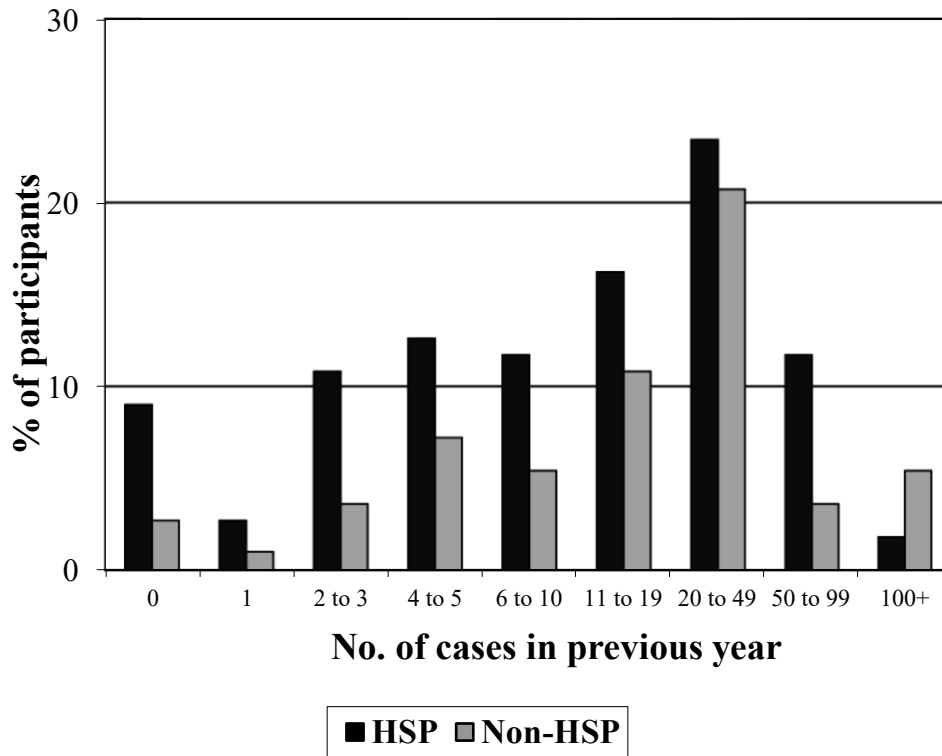
Figure 5: Profession of origin by highly sensitive person (HSP) category (%)



Note. Only 111 participants responded to this question

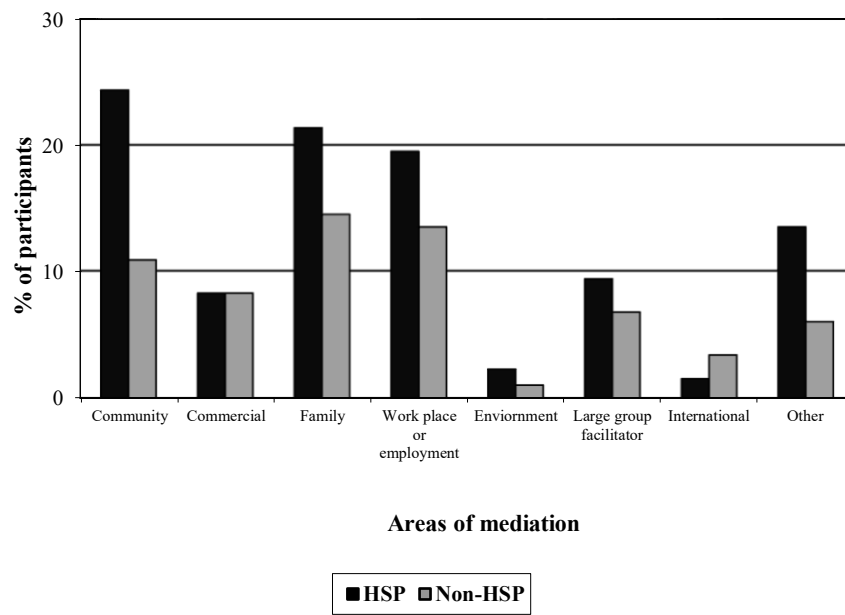
Is there a relationship between number of cases in the previous year and HSP score? The distribution of the entire data set collapsing across HSP category demonstrated that the most common grouping was 20 to 49 cases in the previous year, indicating a reasonably sized case load. The median number of cases was 11 to 19^{xiii} (see Figure 6 for % breakdown by HSP group). Mode and median were close together suggesting a typical distribution, though the negative skew (-.58) indicates that more participants had a lower rather than higher case load. This may not surprise mediators, many of whom find it difficult to get as many cases as they would like (Mayer 2004).

Figure 6: Number of cases in previous year by highly sensitive person (HSP) category (%)



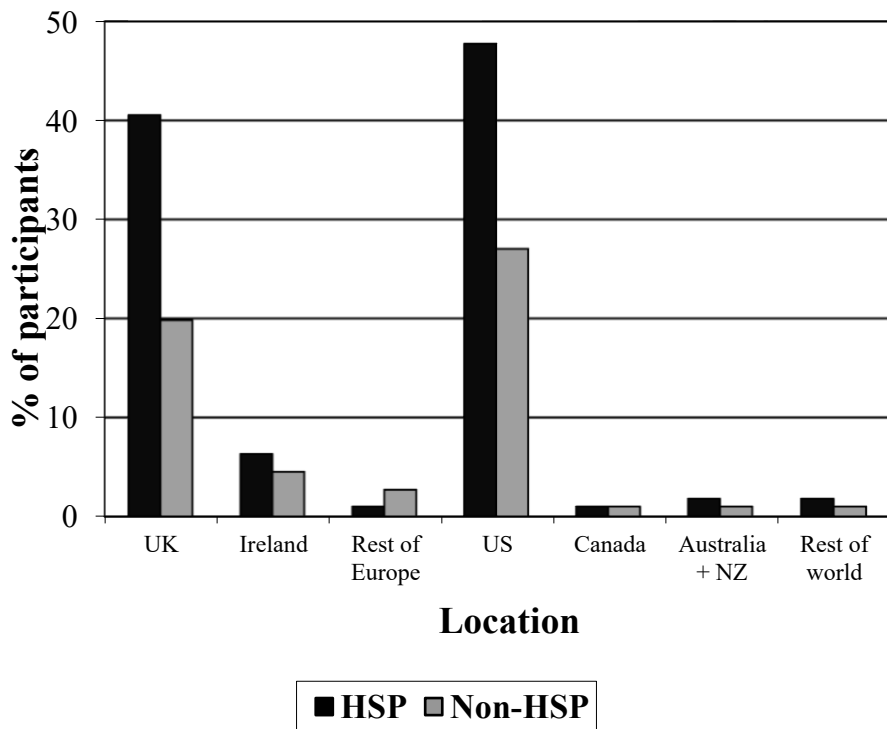
Practice areas. The most common area of mediation was conflict resolution amongst family members. A total of 267 responses were collected for this measure due to respondents selecting more than one practice area. As we were unable to identify respondents' primary area we did not analyse the data but report the percentage breakdown by group (see Figure 7). Visual inspection indicates that the proportion of HSPs is lowest among those self-reporting as commercial and international mediators.

Figure 7: Areas of mediation



Geographical location. The distribution of the entire data set collapsing across HSP category demonstrated that the most common geographical location of respondents was the US (See Figure 8). Only 111 participants responded to this question. Given the likelihood of response or sampling bias (e.g., differences in internet use across regions of the world) we did not analyse these data but provide them for interest.

Figure 8: Geographical location by highly sensitive person (HSP) category (%)



Discussion

Our study was based on a hunch, namely that practitioners high in sensory processing sensitivity might be either over- or under-represented among the mediator population. Our conclusion is that mediators in our sample were significantly more likely to manifest this trait than the general population, whether Aron’s original baseline of 20%, or more recent estimates of 30%, are accepted. In fact the majority (62%) of the mediators in our sample could be described as HSP in terms of Aron’s definition.

Ours is a relatively small study aimed at contributing to further debate and research. However, the idea that an unusually large proportion of practitioners possesses a particular trait is striking. It raises challenging questions for a new and

barely established profession. Why this trait? Are high levels of sensory processing sensitivity advantageous for the work itself, as we speculate above? Or are those high in SPS drawn to mediation? If the latter, what is it about highly sensitive people that makes mediation appealing? Or, to flip the question, what is it about mediation that draws HSPs? Further research will provide a more fine-grained understanding of the interplay between sensory processing sensitivity and mediators.

We hope our study stimulates additional trait-based research with mediators. Researchers have employed one of the widely used personality scales to identify attributes representing the common core of particular professions. The *Myers-Briggs Type Indicator (MBTI)* has been applied to lawyers (Marcin 1992), negotiators (Peters 1993) and mediators (Lisle Baker 2004). Conflict strategy has been investigated using the *Big Five* personality factors (Antonioni 1998; Moberg 1998). Tehrani and Yamini (2020) use a combination to investigate conflict resolution styles. The HSP questionnaire has been used to investigate burnout among nurses (Redfean et al 2020; Pérez-Chacón et al 2021), dentists (Myerson et al 2020) and teachers (Lindsay 2017; Pérez-Chacón et al 2021). Wilson and Irvine (2014) concluded, however, that a coherent account of mediator traits was still absent from the literature.

We noted (Figure 2 above) that a significantly greater proportion of women in our sample were high in SPS. Further research should determine whether this is an artefact of a relatively small sample. Given the higher SPS scores for females in other studies (Benham 2006; Licht et al 2011) it would not be surprising if this also held true for mediators. Picard found that female mediators used more

‘socioemotional patterns of meaning when describing mediation, while males used far more “pragmatic traits” (2000:199). Equally noteworthy is the relatively small proportion of HSPs among male mediators.

Parties too may be high in sensory processing sensitivity, and thus more vulnerable in some settings, such as relationships under stress (Aron and Aron 1997; Pérez-Chacón et al 2021). At the same time their tendency to ‘engage in more comprehensive processing of all types of information’ (Redfearn et al 2020: 371 may make them particularly discerning (or demanding) consumers. Aron’s books describe a range of difficulties such individuals face and strategies for making the most of their trait. There is useful material here for all mediators, irrespective of their own characteristics.

Practice and training implications: are mediators born or made?

Given the array of factors – ability, preference, life experience, luck – implicated in ‘the making of a mediator’ (Lang and Taylor 2000) our study was unlikely to provide a definitive answer. The path to mastery in any profession clearly requires both talent and application. Nonetheless our investigation into a single trait led to a finding that a sample of practising mediators was more likely than not to be high in sensory processing sensitivity. What are the implications for training and supervision, self-care and reflective practice?

Training and supervision. Self-knowledge is profoundly important for those daring to intervene in others’ conflict (Daicoff 1997; Irvine 2013). Knowing where they sit on the SPS spectrum could be useful to individual mediators, both in terms

of practice and in considering their training needs. A focus on strengths leads to more rapid learning and greater satisfaction than emphasising weaknesses (Rath 2007) and is likely to enhance trainees' self-efficacy and motivation (Bandura 1977). HSPs may respond well to exercises involving close attention, such as noticing party responses and forming appropriate questions. Efenbein suggests combining trait awareness with a focus on capabilities: 'Traits may be hard to change, but they are not destiny—we can change our behaviors from what is typical when the stakes warrant it' (2015:134).

What might those high in SPS need to change? The capacity to extract extra data from everyday scenes is likely to be a useful skill (Schlegel, Mehu, van Peer and Scherer 2018:13) but might distract mediators from the bigger picture. Those lower in SPS may demonstrate readier skills in strategic thinking or the capacity to ignore aspects of the situation in the interests of achieving a settlement. Learning by observation (Bandura 1977), often fostered by co-mediation, may help HSPs develop these capabilities.

Self-care. Aron predicts the value of SPS to the 'advisory class,' such as psychotherapists and consultants (1996:117). However, the trait is part of a package deal and, despite its benefits, brings 'inherent complications' including fatigue and a need for downtime (Acevedo 2020: 7). Practical suggestions for HSPs to deal with over-arousal include relaxation strategies such as frequent breaks, outdoor exercise and calm breathing (Aron 1996: 6-10).

These observations highlight a paradox found in our own study. A significant proportion of our mediator sample is high in SPS, yet undertakes the

very sort of work that exposes them to conflict and potential problems with over-arousal. Aron speculates: ‘many HSPs insist on working on the front lines, so to speak, receiving the most stimulation. They would feel guilty staying behind...’ (2003:126). Further research could shed light on why mediation appears to attract these individuals.

Lindsay (2017) found that high SPS teachers benefit from awareness of the trait and a stronger understanding of its value in the classroom. This improves self-efficacy while decreasing stress, burnout and teacher attrition. Acevedo suggests working with another, as occurs in co-mediation. When things are overwhelming, ‘the less sensitive person or partner may pick up the load’ (2020: 9). Greater understanding of the value and challenges of the trait in conflict resolution work could improve self-care among mediators high in SPS.

All of the above suggestions focus on individual practitioners. We are not proposing that organisations routinely test for high sensitivity. The HSP questionnaire was designed in the context of efforts to support individuals attempting to live and work with their own traits. Ney’s excoriating (2015) critique of mental health professionals in custody evaluations cautions against using tests developed for therapeutic purposes in other contexts. Whether or not a practitioner discloses high sensitivity, or any other trait, must remain a matter for them. We offer the following link to Elaine Aron’s website for those who would like to learn more: <https://hsperson.com>. It contains a great deal of supportive material including the original HSP questionnaire.

Limitations

First, we recognise the relatively distant date of Aron's original work (the 1990s). However, her original HSP hypothesis and its accompanying SPS trait have since been validated by numerous later studies (Benham 2006; O'Rourke and Walsh 2012; Acevedo et al 2014; Acevedo et al 2018; Greven et al 2019; Meyerson et al 2020; Redfearn et al 2020; though see Evans and Rothbart 2008 for a more critical perspective). This body of work offers further evidence of SPS as a phenomenon with neural underpinnings.

Social desirability (Joinson 1999) may play a role in mediators' responses, particularly to those questions implying qualities that will be useful in their work: for example, Q.2 'Do you seem to be aware of subtleties in your environment?' (Appendix 1). However, other questions could suggest an inability to cope with the stresses of mediation: for example Q.11 'Does your nervous system sometimes feel so frazzled that you just have to get off by yourself?' On balance, a simple social desirability reading of the data seems unreliable.

With regard to procedure and tools, while 'snowballing' is a non-probability convenience methodology useful for reaching dispersed populations, the representativeness of the sample cannot be assured. We are also conscious of the relatively low number of respondents and their self-selecting nature.

Suggestions for further research

A central question, which our study did not set out to answer, is this: does the trait of high sensory processing sensitivity make any difference to mediators' outcomes?

Mediators high in SPS may extract more data from a conflict interaction, but does that help? Using that information constructively is likely to require significant additional skills and experience. Given the emphasis on party self-determination, and mediator minimalism, in some models (Dana 2001; Bush and Folger 2005) the awareness of more data could equally be a hindrance.

In the field of negotiation, Schlegel et al (2018) identify improved outcomes from those high in Emotional Intelligence. Elfenbein, Curhan, Eisenkraft, Shirako and Baccaro (2008) applying an array of personality measures, claim that individual differences account for 46% of variance in objective outcomes and 19% of subjective outcomes. Further research could examine outcomes and effectiveness in mediators with both high and low SPS scores (while acknowledging the difficulty in agreeing, let alone measuring, what effective mediation is, Menkel-Meadow 2006). Elfenbein et al's (2008) study also highlighted a substantial effect on the negotiation counterpart. Future studies could consider the interplay between HSP mediators and their clients, as well as between HSP clients and their mediators.

A recent strand of scholarship, noted above (**Discussion**), has investigated the relationship between the SPS trait and a range of harms experienced by those in frontline people work. These include burnout, compassion fatigue and stress. Pérez-Chacón and colleagues (2021) found two of the three SPS dimensions identified by Smolewska et al (2006) (ease of excitation and aesthetic sensibility) increased risk for burnout for teachers and nurses, while the third (low sensory threshold) was a protective factor. Future research could examine these issues for mediators and consider the relationship of SPS to mediator longevity.

The HSP measure could be combined with other constructs such as the Big Five Dimensions of Personality (Barrick and Mount 1991) or the Myers-Briggs Type Indicator, already used by Lisle Baker (2004). Mediation training programmes often employ a conflict style questionnaire (Kilmann and Thomas 1977; Kraybill 2011). Researchers could utilize data already being gathered to investigate correlations between conflict styles and SPS among mediators.

Empirical studies might also examine case outcomes, and whether these differ between HSP and non-HSP practitioners. Control groups would need to take account of the wide variety of case matters that are mediated, even within specific areas of practice.

Finally, our research into the prevalence of the SPS trait could be applied to other professions, particularly those from which mediators are commonly drawn. Law, social work, education and psychology would all provide important context and address a key question: is the large percentage of HSPs we found among mediators an outlier, or typical of people-facing professions?

Conclusion

This study's relatively modest sample was largely drawn from two English-speaking locations in the developed world. Nonetheless the possession of such a distinctive trait by nearly two thirds of a selection of 181 mediators ought to provoke our curiosity. We have highlighted two possible explanations: HSPs are drawn to mediation, or SPS is advantageous for the work itself.

We recognise the unappealing implications of the latter. We did not set out to suggest that some individuals are ill-suited to mediation practice, nor that HSP individuals are especially well-equipped for this work. The more recent generation of SPS researchers has tended to temper some of Aron's claims about the unique qualities of highly sensitive people. Acevedo states: 'all levels of sensitivity are needed as they have advantages that vary by the circumstance' (2020: 9). Our own experience as mediators and teachers has brought home the wide range of traits and qualities among mediators. In a conference workshop using the HSP questionnaire (Scottish Mediation 2017) we found a similar spread to our online survey. We could see a number of highly skilled and experienced practitioners in the low SPS group and invited their comments. One participant said: 'I realise the outside world has very little impact on me.'

From the authors' perspective, as self-identified HSPs, this response revealed a remarkable capacity for clarity of thought amidst the turbulence of interpersonal conflict. Jagiellowicz et al describe the evolutionary origins of two distinct responses to novel stimuli, acting or pausing, and explain that: 'each can succeed under different but normal variations in habitat' (2011: 38). Further research is required fully to understand the implications of both high and low sensory processing sensitivity for mediators, and for the 'different but normal variations' in their work. What might the mediation community learn from 25 years of SPS research?

We cannot confirm a sighting of the born mediator. Rather, our research leads to the more modest claim that a surprising number of mediators appear to share a common trait. Our hope is to stimulate debate within the mediation field

about the value of trait-based research. These findings provide insight into the people who choose the work, and the blend of qualities and weaknesses most mediators in our sample appear to possess. Further trait-based studies will enhance our understanding of both.

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^{iv} One participant contacted us to say she had noticed we were using the HSP questionnaire. Because the survey was anonymous we were unable to exclude her answers from the total.

^v $\chi^2(1, n = 178) = 16.91, p < .001, \phi = .31$. Skewness = $-.64$. (Note: the negativity of the skew is meaningless in cases where there are only two groups, such as with gender, and is an artefact of numerical labelling of the gender groups.)

^{vi} $\chi^2(1, n = 111) = 31.36, p < .001$.

^{vii} However, males were not more likely not to be categorised as non-HSPs than females, $\chi^2(1, n = 67) = .37, p = .54$.

^{viii} There was a trend towards higher scorers on the HSP questionnaire having less experience for those categorised as HSP individuals, $r_s = -.15, p = .13$, although this relationship did not reach statistical significance.

^{ix} A significant relationship was found for individuals classified as non-HSPs whereby as score on the HSP questionnaire increased their experience decreased, $r_s = -.27, p < .03$.

^x Spearman's rho correlation indicated that as HSP score increased the number of years as a mediator decreased, $r_s = -.15, p < .05$.

^{xi} $\chi^2 (7, n = 178) = 3.61, p = .82$

^{xii} $\chi^2 (1, n = 55) = 6.56, p < .01$.

^{xiii} Spearman's rho correlation indicated a marginally significant relationship suggesting a trend towards higher HSP scores leading to fewer cases in the previous year, $r_s = -.12, p = .10$.

Appendix 1

Aron's HSP questionnaire [online]. Retrieved on 2 February 2013 from <http://hsperson.com/test/highly-sensitive-test/>

Qs. 1 – 27 are exactly as published in the above.

Supplementary Qs 28 – 33 were added to provide demographic data for our research.

1. Are you easily overwhelmed by strong sensory input?
2. Do you seem to be aware of subtleties in your environment?
3. Do other people's moods affect you?
4. Do you tend to be more sensitive to pain?
5. Do you find yourself needing to withdraw during busy days into bed or into a darkened room or any place where you can have some privacy and relief from stimulation?
6. Are you particularly sensitive to the effects of caffeine?
7. Are you easily overwhelmed by things like bright lights, strong smells, coarse fabrics, or sirens close by?
8. Do you have a rich, complex inner life?
9. Are you made uncomfortable by loud noises?
10. Are you deeply moved by the arts or music?
11. Does your nervous system sometimes feel so frazzled that you just have to get off by yourself?
12. Are you conscientious?
13. Do you startle easily?
14. Do you get rattled when you have a lot to do in a short amount of time?
15. When people are uncomfortable in a physical environment do you tend to know what needs to be done to make it more comfortable (like changing

the lighting or the seating)?

16. Are you annoyed when people try to get you to do too many things at once?
17. Do you try hard to avoid making mistakes or forgetting things?
18. Do you make a point to avoid violent movies and TV shows?
19. Do you become unpleasantly aroused when a lot is going on around you?
20. Does being very hungry create a strong reaction in you, disrupting your concentration or mood?
21. Do changes in your life shake you up?
22. Do you notice and enjoy delicate or fine scents, tastes, sounds, works of art?
23. Do you find it unpleasant to have a lot going on at once?
24. Do you make it a high priority to arrange your life to avoid upsetting or overwhelming situations?
25. Are you bothered by intense stimuli, like loud noises or chaotic scenes?
26. When you must compete or be observed while performing a task, do you become so nervous or shaky that you do much worse than you would otherwise?
27. When you were a child, did parents or teachers seem to see you as sensitive or shy?

Supplementary demographic questions:

28. Are you male or female?
29. How many years have you been practising as a mediator?
30. What is your profession of origin?
31. What area(s) of mediation practice do you work in?
32. Which geographical area do you work in?
33. How many mediation cases did you complete last year?

Appendix 2

Additional tables of unanalyzed data

Table 1: Areas of mediation by highly sensitive person (HSP) category (%)

Areas of mediation	HSP	Non-HSP
Community	24.35	10.86
Commercial	8.24	8.24
Family	21.35	14.48
Work	19.48	13.48
place/employment		
Environment	2.25	> 1.00
Large group facilitator	9.36	6.74
International	1.50	3.37
Other	13.48	5.99

Note. A total of 267 responses were collected for this measure due to many respondents selecting more than one area of mediation. As we were unable to identify from respondents with multiple areas of mediation which was their primary area we did not analyse the data but report the percentage breakdown by group for interested readers.

Table 2: Geographical location by highly sensitive person (HSP) category (%)

Geographical location	HSP	Non-HSP
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UK	40.54	19.82
Ireland	6.31	4.51
Rest of Europe	1.00	2.70
US	47.75	27.03
Canada	> 1.00	> 1.00
Australia and New Zealand	1.80	> 1.00
Rest of world	1.80	> 1.00

Note. Only 111 participants responded to this question. Given the likelihood of response or sampling bias (e.g., availability or differences in population use of the internet across regions of the world) we did not analyse the data but provide it for interested parties.