RESEARCH PAPER



Hikikomori from the Perspective of Overuse, Underuse, and Optimal Use of Character Strengths: Case Reports

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Abstract

Hikikomori, or social withdrawal youth has become one of the most pressing social issues in Japan and this phenomenon is increasing in other countries as well. While there is a movement to pathologize this phenomenon as a new psychological disorder, these case reports provide a fresh perspective of hikikomori using the lens of character strengths in the scientific field of positive psychology. These case reports illustrate how the hikikomori phenomenon can be understood, at least in part, using the framework of character strengths overuse, underuse, and optimal use by conducting the character strengths intervention for hikikomori youth. The authors offer examples of combinations of overuse and underuse of character strengths, with particular attention to the unique signature strengths, among hikikomori youth. Future directions of research include an empirical investigation of the relationship between the hikikomori phenomenon and the notion of overuse, underuse, and optimal use of character strengths, potentially using research methodology.

 $\textbf{Keywords} \ \ Character \ strengths \cdot Strengths \ underuse \cdot Strengths \ overuse \cdot Strengths \ optimal \\ use \cdot \ Character \ strengths \ intervention \cdot \ Hikikomori$

1 Hikikomori Phenomenon

Hikikomori, or social withdrawal youth has become one of the most acute social issues in Japan (Teo 2010). Hikikomori is characterized as 1) staying at home for most of the day, 2) avoidance of social participation (e.g. working and schooling), and 3) continuation of these conditions for at least 6 months (Saito 2010). In addition, significant functional impairment or distress must be associated with the social

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isolation (Kato et al. 2019). Signs of hikikomori typically start presenting during adolescence or early adulthood, although onset in older adults has also been reported (Kato et al. 2020). The number of hikikomori aged between 15 and 39 years is estimated at approximately 541,000 in Japan (Cabinet Office 2016), with increasing international reports of this phenomenon (Pozza et al. 2019).

The cause of hikikomori is diverse. Although there is no exact and proper categorization for hikikomori in the most updated diagnostic manual, the DSM-5, clinicians and psychiatrists claim that some forms of hikikomori are caused by psychiatric disorders such as schizophrenia (Kondo et al. 2013), personality disorder (Teo et al. 2015), a severe form of social anxiety disorder (Nagata et al. 2013), or Internet addiction (Wong 2009). Therefore, it should be regarded as an illness and treated through pharmacotherapy (Nagata et al. 2013) or hospitalization (Kato et al. 2012) to address these psychological disorders. Conversely, non-clinicians such as social workers and educators claim that hikikomori represents one aspect of the diversity present among youth (Wong 2009) and resist regarding hikikomori as medically or psychologically abnormal (Borovoy 2008; Chan and Lo 2014). Instead of pathologizing youth, they provide various training programs such as social skills training (Borovoy 2008; Teo 2010), emotional management (Hattori 2006), and interpersonal skills (Wong 2009) to overcome their difficulties with social interaction.

Regarding the evidence for efficacy of treatment for hikikomori, and despite the growing number of research on the topic, to date, peer-reviewed published evidence is scarce (Wong et al. 2019). One empirical study of an intervention is a five-session home visitation program mainly consisting of person-centered psychotherapy. The result indicated that Global Assessment Functioning (GAF) scores and social activities had improved somewhat in 68.3% of participants, but 48.8% of them showed no change in GAF score, and 51.2% reported no changes from the intervention (Lee et al. 2013). Although there are many forms of help and support available for hikikomori especially in Japan, many of their efficacies have yet to be assessed (Chan and Lo 2014). Therefore, it is important and necessary to keep exploring more effective interventions for this unique population.

In this paper, we attempt to introduce a strengths-based approach and conceptualize the hikikomori state as overuse or underuse of specific strengths. Since hikikomori itself is a state, not a disease categorized in the DSM-5, it is rational to attempt examining hikikomori not only from a pathological point of view but also from the principles of positive psychology in order to explore a new possibility for facilitating their reintegration into society.

2 Positive Psychology and Character Strengths

Positive psychology is a scientific study of what makes life worth living (Seligman et al. 2005), which attempts to establish the theory and practice of well-being and human strengths. Seligman (2011) proposes the theory of PERMA, an acronym that stands for five central areas of well-being – positive emotions, engagement, positive relationships, meaning, and accomplishments – and explains it is character strengths that are pathways to each as a new framework of well-being. Recent research has supported this crucial role of character strengths in well-being theory (Gander et al. 2016; Wagner et al. 2019).



Character strengths are defined as positive personality traits that are part of our core identity which when expressed lead to positive outcomes for ourselves and others and contribute to the collective good (Niemiec 2020). In the early years of positive psychology, a large group of distinguished scientists set about an exploration across cultures, countries, and beliefs to understand what is best about human beings. Their research over 3 years led to the identification of 24 character strengths, which met a number of criteria such as: being personally fulfilling, do not diminish others, are ubiquitous and valued across cultures, and generally stable over time (Peterson and Seligman 2004). Researchers found them to be present across cultures even in some of the most remote places on our planet (Biswas-Diener 2006; McGrath 2014; McGrath 2015) and across nations (McGrath 2015; Park et al. 2006). Human personality, according to the VIA model has 24 core character strengths, in varying degrees. Each person has what has been termed "signature strengths," which refer to the person's top 5 (approximately, as each person is different) strengths that are essential to who they are, can be expressed effortlessly, and are energizing to them (known as the 3 E's, Niemiec 2018). A number of studies indicate that people who use their signature strengths have higher life satisfaction, self-esteem, self-efficacy, less depression, less anxiety, and less hopelessness (Ghielen et al. 2017; Quinlan et al. 2012; Schutte and Malouff 2019). Since the 24 strengths are universal positive traits within human beings, they can be viewed as inner resources and areas of potential in all youth, regardless of whether one is socially withdrawn or not. Furthermore, since character strengths are inner positive personality traits, they can be expressed not only in real life settings but also in video games. For example, the strength of teamwork can be expressed when players cooperate each other during online matches, or the strength of creativity can be used when they come up with new strategies to achieve their goals (see Matsuguma et al. 2018 for an example). Therefore, once hikikomori identify their character strengths in video games, they might be able to more easily apply them in the real world setting to reintegrate into society.

3 Overuse, Underuse, and Optimal Use of Character Strengths

When it comes to utilizing the concept of strengths in the hikikomori context, possessing strengths is not enough. Strengths should be used and developed in daily life (Seligman et al. 2005; Niemiec 2018). One of the ways to develop strengths comes from the concept of overuse, underuse and optimal use of character strengths. This notion was first introduced by Peterson, who attempted to provide some thoughts for a complementary DSM by proposing a classification of psychological disorders using the language of strengths with dimensions, which he named strength exaggeration, absence, and opposite (Peterson 2006; Seligman 2015). Rashid and Seligman (2018) also attempted to reframe psychological disorders, referring to them as a symptom of strengths, such as lack and excess of strengths. Furthermore, Niemiec (2014, 2019) simplified the Peterson framework to overuse, underuse, and optimal use of strengths to apply not only to psychopathology but to any problem, conflict, or struggle. This notion of overuse and underuse offers a unique viewpoint to problems through reframing and provides potential ways to manage them, such as through the regulation of an overused strength (referred to as the tempering effect) or the use of other strengths to boost up an underused strength (referred to as the towing effect; Niemiec 2019).



Research is now analyzing psychological disorder through the lens of the notion of overuse and underuse. A recent study revealed that social anxiety disorder might be reframed as the combinations of strengths overuse and underuse. A particular combination of six overuse/underuse phenomena correctly sorted 87.3% of people as either having or not having social anxiety disorder. This combination was the overuse of social intelligence and humility, and the underuse of humor, social intelligence, self-regulation, and zest (Freidlin et al. 2017). A second empirical study examined obsessive compulsive disorder (OCD) and found that the combination of the overuse of judgment, social intelligence, appreciation of beauty and excellence, fairness, and prudence, as well as the underuse of forgiveness and self-regulation, correctly sorted 89.3% of people into those that have or do not have clinical levels of OCD (Littman-Ovadia and Freidlin 2020). From this perspective, the hikikomori phenomenon or being socially withdrawn might also be related to the underuse and overuse of character strengths in a unique constellation.

4 Character Strengths Interventions

To facilitate the reintegration of hikikomori into society, we will introduce strengthsbased approaches. Strengths-based approaches involve focusing on what is right while managing negativity or weaknesses (Clifton and Harter 2003). Instead of sticking to fixing weaknesses, strengths-based development helps clients to optimize their unique set of character strengths dependent on the contexts, while avoiding both overuse and underuse of strengths (Biswas-Diener et al. 2011). To facilitate their reintegration, the lead author implemented the Aware-Explore-Apply (AEA) framework of strengths intervention to hikikomori youth. This framework was proposed by Niemiec (2014, 2018a) based on his observation of what occurs when any practitioner takes a thorough strengths-based approach. Several studies revealed that the strengths intervention based on this process increased well-being, strengths use, work performance, passion, level of thriving and decreased negative emotions (Bu and Duan 2019; Dubreuil et al. 2016). In following the AEA framework, clients follow three steps: 1) become aware of their strengths by taking free, validated measure of character strengths, the VIA Survey (https://www.viacharacter.org/) and strength-spotting, 2) explore and appreciate their strengths by connecting them with their successes in video games or their own personal positive experiences in the past, and 3) apply their strengths in daily life by taking new strengths-based action involving lifting up underused strengths as well as moderating their overused strengths. Moreover, in order to manage their negativity, mindfulness practice was implemented secondarily as an adjunct to the strengths work to support the youth in decentering from their crippling negative emotions and thoughts; character strengths were closely woven into each mindfulness practice (Niemiec 2014).

5 Method

In order to introduce a strengths-based approach for hikikomori youth and conceptualize the hikikomori state from the perspective of overuse and underuse of character



strengths, we utilized a series of case reports as a methodology. Case reports are prepared to describe novel, unusual, or atypical features identified in three or fewer clients, which will potentially create new research questions that may contribute to the acquisition of additional knowledge in the literature (Sayre et al. 2017). Although case reports have limitations such as the lack of generalizability and implications in clinical practice, they can provide clues about a recognition of previously unrecognized phenomenon (Sayre et al. 2017). Biswas-Diener (2009) applied this approach to illustrate personal coaching as positive intervention to introduce a development of a hybrid psychotherapy-coaching practice, highlighting the distinction and synergy of personal coaching and psychotherapy. Since the perspective of hikikomori phenomenon from the concept of overuse, underuse, and optimal use of character strengths is very new, the authors utilize case reports as a presentation method to explore and delineate this notion in a realistic way, so that they can highlight the details and distinction of the strengths-based approach from the traditional medical model of treatment of hikikomori, which intends to treat their distress and misery.

The following includes two case reports of character strengths interventions for hikikomori youth to facilitate them in stepping out of their current environment into the outside world, with the notion of overuse and underuse of character strengths. Consent was gained from the participants to describe their cases.

6 Case Report 1

6.1 Client Information

The client is a 16-year-old Japanese male who resides with his parents and grandmother in the Kanto region. As a 13-year-old junior high school student, he experienced overwhelming psychological stress after being assigned as a leader of his class. The anxiety caused him to hyperventilate several times during group activities. Afraid to embarrass himself again in front of his classmates, he started refusing to go to school and stayed at home for the rest of the school year. In addition, feelings of guilt at not going to school and perceived notions of other people judging him for being an out-ofschool youth caused him to fear going out of the house unless accompanied by his mother. At the age of 15, he reentered an alternative correspondence high school, and began to attend classes with fresh resolve; however, he again hyperventilated while in class and ended up dropping out a few months after enrollment due to the fear of panic attacks. This resulted in him reverting to being a hikikomori again. Even though he wanted to take the Certificate for Students Achieving the Proficiency Level of Upper Secondary School Graduates, he could not concentrate on studying at home, as he was consumed by distress and regret for his past. Although he went outside while wearing a mask to hide his face once a week with his mother to engage in his hobby of taking train photos, he was susceptible to panic attacks which he often experienced at the station. At home, feelings of agony and self-deprecation surfaced as he continuously compared himself with other students, by whom he felt left behind. He spent most of his time watching television, gathering information about trains on the Internet, or alone with his thoughts.



6.2 Diagnostic Assessment

On the initial assessment, we examined the client's psychological distress using the Japanese version of Kessler Psychological Distress Scale (K6) (Mewton et al. 2016; Furukawa et al. 2008). His score was 17, which indicated higher psychological distress. Regarding the use of his strengths, he scored 33 on the Strength Use Scale (SUS) (Govindji and Linley 2007). While this test does not offer normative cut-off data, we interpreted this middle range score to indicate the client's moderate potential for strengths use. His self-esteem and self-efficacy were measured by the Rosenberg Self-Esteem Scale (RSES) (Rosenberg 1965) and the General Self-Efficacy Scale (GSES) (Schwarzer and Jerusalem 1995) respectively, and both scores were quite low (20 and 15, respectively). During the initial interview, the client claimed that he had no idea what to do next, but showed his desire to overcome his situation and regain confidence to go outside by himself and reintegrate into society.

6.3 Treatment Plan and Intervention

The treatment plan and intervention focused on helping the client notice and appreciate his character strengths to restore his self-esteem in tandem with guiding him toward becoming more aware of his automatic thoughts and feelings of anxiety prior to developing a panic attack. Therefore, we initially provided the instruction of brief mindfulness meditation with the client which he practiced for 3 min every day. He was also instructed to take the VIA Survey to assess his character strengths. Surprisingly, even though he was at the time isolated from social interaction, his results revealed that many of his signature strengths were related to human relationships such as kindness, social intelligence, and gratitude. Rounding out his signature strengths were prudence and perspective. Indeed, he was empathetic in nature, always sensitive of the lead author's needs when he visited him in his room. In addition, he was very polite, showed some shyness when asked to show his train drawings, and often said "Thank you." Following the AEA framework, he explored his past through the lens of strengths, connecting his experiences with the expression of strengths and appreciating each of them, followed by intentional application of his strengths in daily life. He attempted to reappraise his past and current situations with the notion of overuse, underuse, and optimal use of strengths to find a way to overcome his predicament. The lead author encouraged him to identify and articulate which of his strengths was overused, underused, or optimally used each time he struggled including the time when he hyperventilated in class and made him reassess whether he was using his signature strengths optimally in the current hikikomori state.

6.4 Outcomes

Through the process of the AEA framework, the lead author listened to his stories and realized that he had exercised his character strengths optimally in the past. For example, when he was in elementary school, he belonged to the student council and led the team as a leader. He often customized his approach according to his team members' unique traits and adapted his communication style accordingly so that he was able to manage them in a harmonious manner. In addition, whenever he engaged in his hobby of taking



photos of trains, he was always considerate of others' perspectives and was cautious (i.e., prudent) about whether he was an obstacle for others shooting photos. Through the exploration of his past experiences through the lens of strengths, he realized how he optimized his strength of social intelligence successfully during elementary school and during his hobby hours. At the same time, he also realized that when he hyperventilated in junior high school, he was overusing his strength of social intelligence, as he become highly sensitive of other students' emotions to the detriment of his own, resulting in him bearing excess responsibility on his shoulders for other students, and thus pressure build up leading to a panic attack. Furthermore, he also noticed that his current hikikomori state restricted him from using his signature strengths of kindness and social intelligence, thus making himself feel like a fish out of water. This realization helped him to make sense of his current state of stagnation. We therefore made a plan to apply his relational strengths more optimally to regain his sense of authenticity. Since he had a tendency to overuse his social intelligence when in a group setting with strangers because he overly focused on other people's facial expressions, body language, and tone of voice, his keen social observational skills ultimately backfired and produced anxiety over other people's views of him. Due to this, he was initially encouraged to practice utilizing his strengths in the psychologically safe environment of home. He began utilizing his strengths of kindness and gratitude with his family members by doing household chores and practicing counting blessings at the end of the day. Also, whenever he went outside, he was encouraged to use his strengths such as expressing gratitude if someone gave him a seat on the train or using his kindness to give his seat to others. As part of his homework, he was invited to use his signature strengths at home such as utilizing his kindness and gratitude to help his mother with housework and keeping a journal of things that he was grateful for before he went to bed. The more time he spent doing these activities, the more he felt authentic and true to himself. Furthermore, daily mindfulness practice helped him to develop his strength of prudence, which allowed him to make a careful plan of action for his anxiety; when he noticed feelings of anxiety during the early stages of an oncoming hyperventilation episode, he paused and counteracted the narrowing effect of anxiety by using his strength of perspective to see the larger picture of himself, his situation, his safety, and his new strengths-based coping skills. He would also observe himself and the crowd as it naturally passed by. This resulted in him greatly reducing his incidents of hyperventilation.

One month later, he began to attend a private cram school once a week to take an individual tutoring session in preparation for the certificate examination. In the cram school, he began to activate his social intelligence and prudence to read the non-verbal communication clues of the tutor while interacting with him, and expressed gratitude to his tutor for teaching. The more he used his relational strengths, the more he felt energized and as a result, his psychological distress decreased (K6 score was 5), and the frequency of his strengths use increased significantly (SUS score was 41). Furthermore, his self-esteem and self-efficacy also improved (RSES score was 26; GSES score was 22).

Two months later, he began to increase his attendance frequency and joined several cram school activities such as volunteering, utilizing his strength of kindness while activating his social intelligence to make friends. Looking back, he realized that during his hikikomori period, he was underusing his relational strengths while staying alone at



home and overusing his prudence out of fear of a panic attack. By optimizing his character strengths, he successfully took a first step out of his formerly closed environment.

7 Case Report 2

7.1 Client Information

The second client is a 19-year-old Japanese male, who is in his first year of university in Tokyo. His parents live in a suburb 3 h away, while he lives in a condo unit by himself. He devoted his life to judo in childhood and with his strong presence and playful character was assigned the role of leader of the judo club in his junior high school. At the age of 15, he was offered a scholarship from a high school which had one of the most powerful judo clubs; however, he stumbled with his relationship with his team members and consequently lost his passion for judo. Feeling at a loss in life, he ended up dropping out and changing schools. The majority of his new classmates were very introverted and loved to watch anime. Since he was used to being surrounded by a group of masculine, extroverted people, he felt out of place in his new school and could not make friends. He thus stayed quiet, and eventually lost confidence in his ability to build relationships. He gradually went to school less often and stayed in his room, suffering from self-hatred and mental agony with feelings of isolation, lamenting about not being able to make friends and find meaning in his life. Even worse, he blamed his parents for giving birth to him. For the rest of his high school life, he suffered from mental anguish while isolating in his room. After completing the minimum requirements for graduation, he entered a university with minimum requirements, where he attempted a fresh start. However, he remained troubled and became hikikomori again less than 1 month after entering university. He often lamented that there was no meaning in life and contemplated suicide. He planned to do job interviews to work part-time and drop out of university once he was able to get a job; however, he backed out at the last minute. Feeling that something was wrong with him, he asked his father to let him see a counselor.

7.2 Diagnostic Assessment

On the initial assessment, he demonstrated high psychological distress with a K6 score of 16. His SUS score was 46. His self-esteem and self-efficacy were also quite low (RSES score was 25, and GSES was 26, respectively). During the initial interview, even though he looked distressed while talking about his hopelessness about his future, he also showed interest in finding his own strengths to regain his self-confidence.

7.3 Treatment Plan and Intervention

The initial plan was to provide mindfulness practice to help the client become more aware of his automatic thoughts and feelings, but since he was eager to know his strengths as soon as possible, we skipped the practice of mindfulness and dove straight into assessing his character strengths with the VIA Survey. His signature strengths were curiosity, social intelligence, judgment, humor and gratitude. Following the AEA



framework, we explored these strengths and learned that he was genuinely curious and interested in how people think and behave. During judo practice, the moments he enjoyed most occurred when he was successfully able to fake out opponents based on his assumption of how they were thinking and behaving. He often studied and attempted to read their minds using his strengths of curiosity, judgment and social intelligence. In addition, in online video games, he often won battles, utilizing again his strengths of social intelligence and judgment to sense his opponents' intentions during the match. Therefore, as homework, the lead author encouraged him to utilize at least one of his signature strengths intentionally and in new ways in daily life. This mirrors the evidenced based approach of using signature strengths in new ways for longer-term happiness, life satisfaction, and less depression (Gander et al. 2016; Schutte and Malouff 2019; Seligman et al. 2005). Since he was losing self-confidence, learning about his character strengths was empowering in itself. He showed some excitement to use his strengths, especially curiosity, since he identified it as his innermost, core identity. Thus, at home, he sought out something new via the Internet at least once a day, which was energizing to him because he was expanding and activating his curiosity with intentionality.

7.4 Outcomes

Since the client wanted to regain his confidence in his ability to build relationships, he began to participate in offline meeting events for his favorite game, which elicited his strength of curiosity relatively easily. At the event venue, he intentionally utilized his strengths of humor and gratitude to make friends by attempting to crack jokes and saying thanks to the people he played with. This small success made him reflect on his past experience through the lens of strengths, and made him realize that when he was in the high school, he was underusing his strength of humor because of his sense of being out of place, which made him stay quiet in the classroom. Moreover, as he further considered strengths overuse and underuse, he realized an important moment in his life; he stated that the reason he lost his passion for judo was that he over-sympathized with his opponent's grandmother who was watching the game when he beat his opponent during a match. He witnessed the grandmother crying because of her grandson's loss. He felt deeply sorry about what he did and could no longer find value in sports. During the session, he articulated that he was overusing his strength of social intelligence and underusing his strength of judgment at that time.

Throughout the process, he was able to conduct a reappraisal of his past stumbles by examining various points of his life in a similar way, using the phenomena of overuse and underuse of character strengths. This gave him new insights into his struggles and helped him to stabilize his emotions. Then, he made an attempt to utilize his strength of curiosity by exposing himself to the things that interested him in order to find a direction for the future. On his 20th birthday, he attempted to visit a cigar bar because he had been curious about it since the time he saw a gentleman smoking a cigar in a manga when he was a child. When he attempted to go, he was seized by anxiety, but he examined this from different angles as to why he felt that way. He dealt with each causative factor in his mind, one by one, by optimizing his strength of judgment and critical thinking. Furthermore, one 0of his old friends from junior high school contacted him for the first time in ages to ask him to become a committee member of a local



coming-of-age ceremony. He first hesitated, but again he utilized his strength of judgment to analyze his anxiety and maximize his curiosity to accept this offer, so that he was able to attend the committee meeting successfully later on. Two months later, after examining every possibility for his future, he decided to work part-time to save money to study abroad with the motivation of developing his strength of curiosity and learning about how other people think and behave. He is now working part-time twice a week as a host at a restaurant.

Similar to the client in Case Report 1, he also reflected on his hikikomori state and realized that he was underusing most of his signature strengths. He also realized that he could move his life forward by optimizing the use of his curiosity and judgment as a key constellation of his strengths. By reframing his hikikomori state through the lens of strengths, and practicing his strengths optimally, he was also able to reintegrate into society. As a result, his psychological distress significantly decreased (K-6 score of 6), and his self-esteem and self-efficacy also increased as well (RSES score was 35, and GSES was 29, respectively). The frequency of his strengths use also increased substantially (SUS score of 61).

8 Future Professional and Research Directions

This case series illustrates the possibility of character strengths interventions, reframing the hikikomori state from the lens of their strengths and facilitating their reintegration into society with a sense of their unique identity. Instead of psychopathologizing them as another psychological disorder by assessing their negative aspects, psychologists, psychiatrists, and other mental health professionals should access not only negative aspects, but also positive psychological aspects, especially with the notion of overuse, underuse, and optimal use of character strengths. This offers the promise to understand their hikikomori state from another point of view and to offer an authentic and healthy way forward. Furthermore, understanding the hikikomori state from the lens of character strengths might help hikikomori find a way to reintegrate into society more easily since optimizing character strengths is action-oriented, which could provide them opportunities to not only take new steps forward but also to behave in a productive and energizing way.

Although these two case reports give us a hint at seeing hikikomori from a different perspective, further research is needed to clarify and solidify the approach of treating hikikomori from a strengths based perspective. Future directions of research include an empirical investigation of the relationship between the hikikomori phenomenon and the notion of overuse, underuse, and optimal use of character strengths, potentially using research methodology such as the Overuse, Underuse, and Optimal Use Survey (OUOU) of character strengths. It is important to conduct such studies with a large number of subjects since the etiology and phenomenon of hikikomori is varied and diverse. Moreover, testing the effect of integrating character strengths into a school curriculum for the prevention of hikikomori is a relevant point of investigation as the buffering, reappraisal, and resilience functions of character strengths at times of adversity may be relevant to developing social withdrawal (Niemiec 2020).

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Compliance with Ethical Standards

Conflict of Interests None.

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