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The Impact of Social Anxiety on Occupational Participation in College Life

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ABSTRACT

Social anxiety is a reality for many college students. This study explored the impact of social anxiety on the occupational participation in daily life of six Irish students. Semi-structured interviews were used to explore participants’ daily routines, coping mechanisms, and interaction with the environment. The study aims to inform occupational therapists, academics, and other health-care professionals of the impact of the condition on the daily life of college students. Qualitative data analysis showed that participants described negative beliefs about themselves and concerns about how they were perceived by others. This affected their ability to fully participate in the student role.

KEYWORDS Social anxiety, occupational therapy, participation, college, students
Social anxiety disorder (SAD) is characterized by a persistent fear of social or performance situations (American Psychiatric Association, 2013). It is a diagnostic category about which there has been some debate. Lifetime prevalence rates described in the literature are variable, with one study reporting a difference in lifetime prevalence rates of up to 20%, with prevalence rates in literature cited as 0.4%, 2%, and 20.4% (Fehm, Beesdo, Jacobi, & Fiedler, 2008; Shah & Kataria, 2009). Prevalence rates for the diagnosis may reflect cultural differences about what is understood by social anxiety (Fehm, Pelissolo, Furmark, & Wittchen, 2005; Russell & Shaw, 2009; Wittchen, Stein, & Kessler, 1999). However, the publication of guidelines (American Psychiatric Association, 2013) has made the difference between shyness and SAD clearer. Social anxiety disorder is more acute than the personality trait of shyness and can be considerably disabling (American Psychiatric Association, 2013).

The age of onset of SAD is typically in late adolescence and early adulthood (Fehm et al., 2008). It is often present in college students at a time when there may be a normal increase in self-consciousness (Bella & Omigbodun, 2009). One’s college years are a period of substantial transition, where young people are required to develop skills for maintaining independence and self-sufficiency (Bowman, 2010). Academic, financial and social stressors add to the challenges faced by students, and people can vary greatly in their ability to cope with these transitions and challenges (Mahmoud, Staten, Hall, & Lennie, 2012). In one US study of over 80,000 students, anxiety was ranked as having the sixth largest impact on academic performance (American College Health Association, 2009). Of those with anxiety, a considerable proportion will experience social anxiety. High levels of social anxiety have also been seen in undergraduate students in a range of studies from various countries (Bella & Omigbodun, 2009; Russell & Shaw, 2009; Tillfors & Furmark, 2007).
Occupational therapists are concerned with the participation of individuals in meaningful and valued activities. This is known as occupational participation, where “occupation” refers to “everything that people do during the course of everyday life” (World Federation of Occupational Therapy, 2013, p. 11). For occupational therapists who are educators or healthcare providers to students, there are two main areas of concern regarding SAD; the impact of the disorder on well-being, participation and performance in college activities, and the interaction between the person and the social and physical environment.

Firstly, SAD has been found to affect students’ daily routine in college, particularly because students with SAD tend to engage in avoidance behaviors (Book & Randall, 2002; Russell & Shaw, 2009; Shah & Kataria, 2010). They may avoid coursework which involves giving an oral presentation, leading to a reduction in their grades (Russell & Shaw, 2009). They may also use unhealthy coping strategies such as alcohol over-use, which in turn can affect their academic performance (Book & Randall, 2002). Secondly, students with SAD have particular difficulties with physical and social environments on campus. While it is only an emerging area in the literature, one study has shown that aspects of the physical college environment e.g. packed lecture halls and busy dining rooms, can cause an increase in social anxiety, and students may engage in avoidance behaviors to cope (Russell & Shaw, 2009). Stressors in the social environment are more recognized in the literature. People with SAD can over-estimate the risk of criticism, rejection or embarrassment, and under-estimate their ability to cope with these things (Damer, Latimer, & Porter, 2010). Thus, they may have difficulty forming social and trusting relationships while in college (Shah & Kataria, 2010).

In the Irish context, a recent epidemiological study has found a frighteningly high lifetime rate of mental disorders among young adults in this country. It was estimated that 56% of young people in Ireland will have experienced a mental disorder by the age of 24 years and 1 in 14 will experience social phobia (Cannon, Coughlan, Clarke, Harley, &
Kelleher, 2013). This coincides with a period of intense strain in Irish colleges. This strain is because the number of full-time undergraduate students in Ireland has increased 14% in the last five years, but the number of support staff in services such as counselling and student health has decreased by 17% (Patterson, Carroll, & Harvey, 2013). There is a clear need to prioritize the mental health of young people in colleges in Ireland, and therefore, this study sought to encourage the development of interventions for social anxiety that are focused on the college student population.

The Model Of Human Occupation (MOHO) provides a framework for understanding how daily activities are motivated, performed and patterned, particularly for those who have difficulties in this area (Forsyth et al., 2005). The MOHO was used in this study to guide the semi-structured interviews with the purpose of exploring the perceived impact of social anxiety on the participation in daily life activities of undergraduate students, with particular emphasis on the following areas:

- How does social anxiety affect the ability to participate in life roles?
- How does social anxiety affect routines and daily habits?
- How do students with social anxiety cope with their condition during daily life on campus?
- Is there a perceived relationship between the physical/social environment and social anxiety for students?

**Method**
This study used a qualitative descriptive design to address the phenomenon of social anxiety from the point of view of those experiencing it (Bourgealt, Dingwall, & deVries, 2010). Qualitative descriptive studies can contain elements of other qualitative methods such as phenomenology, ethnography or narrative, but are primarily focused on gathering rich descriptions of events and experiences (Sandelowski, 2000). Clear, rich descriptions are particularly important in qualitative research as they establish rigour, which was traditionally lacking in this type of research (Neergaard, Olesen, Andersen, & Sondergaard, 2009). The phenomenon of interest in this study was the occupational participation of college students in daily life, and an occupational therapy semi-structured interview tool was used to gather students’ perspectives.

**Procedure**

**Data Collection**

The Liebowitz Social Anxiety Scale (LSAS) (Liebowitz, 1987) is a screening tool with 24 items reflecting a range of social interaction and performance situations e.g. talking to people in authority. The person rates their fear of these 24 situations on a 3-point Likert scale, and then rates their likelihood of avoiding these same situations, again on a 3-point scale. Scores under 30 indicate that SAD is unlikely, scores between 30 – 60 indicate that SAD is probable, scores between 60 – 90 indicate that SAD is very probable and indicate a level of the disorder that merit clinical intervention (Rytwinski et al. 2009). The LSAS has excellent internal
consistency, reliability, validity and shows good correlation with other self-report and clinician rated measures of social anxiety (Heimberg et al., 1999; Rytwinski et al., 2009). In this study, the LSAS was used as a screening tool with participants when they contacted the researcher. Those scoring over 65 were recruited, indicating that these individuals would likely have social anxiety disorder (Liebowitz, 1987). Some individuals contacted the researcher but did not score higher than 65 on the LSAS. In these cases, the individual was contacted personally and given full details on the counselling services available in the college.

Semi-structured interviews were used to gather the qualitative descriptive data for this study. The Occupational Circumstances Assessment Interview and Rating Scale (OCAIRS) (Forsyth et al., 2005) was used to guide the interview. The OCAIRS was chosen because it allows the interviewer to gather detailed information about the factors which underpin participation in activities; roles, values, motivations, interests, skills and the perceived impact of the physical/social environment, while still allowing the interview to be client-driven and personalised. The OCAIRS is a widely-used occupational therapy interview tool, and it has reasonable inter-rater reliability, good concurrent validity and reliable construct validity (Haglund & Henriksson, 1994; Hemphill-Pearson, 2008; Lai, Haglund, & Kielhofner, 1999). The interviews were completed by the first author, at that time a final year occupational therapy student, under the clinical and academic supervision of the second author. Interviews were audio-recorded and transcribed prior to data analysis.

Participants
The study received ethical approval from the Research Ethics Committee of the college in which this research took place. With the support of the onsite student counselling service and the college administration services, posters inviting participation were placed in the counselling centre and across the campus. An email was also sent to all registered undergraduate students. To be eligible to participate, students must have been 18 years or older, registered in an undergraduate course in the college, and must have scored 65 or more on the Liebowitz Social Anxiety Scale (LSAS) (Liebowitz, 1987).

Interested participants contacted the researcher and received an information pack, including the LSAS. They were asked to read the information, and to complete the LSAS and return it to the researcher if they wished to proceed with the study. Consent was implied during this process, and written consent was given prior to the interview.

Participants in this study were six undergraduate students currently enrolled in a large Irish college. There were three males and three females aged between 19 and 22 years old. All the students’ experienced clinically significant levels of social anxiety, with scores between 65 and 116 on the LSAS. Participants varied as some had previously sought professional help for their social anxiety. All participants were provided with full details of the on-campus counselling service.

*Qualitative Data Analysis*

Thematic analysis as outlined by Robson (2011) was the data analysis method used in this study. In this method, codes emerge from the data, but predetermined codes and terms can also be used when research is carried out from a particular point of view, as in this case, where the researcher was exploring the phenomenon from an occupational therapy standpoint.
(Robson, 2011). The interviews were transcribed, read and re-read to obtain a general sense of the participants’ perspectives (Creswell, 2009). The participants’ accounts were organized into segments of text (codes) that reflected distinct ideas or viewpoints. The development of the codes was an iterative process with codes being drawn from the data, the research questions and concepts taken from the Model of Human Occupation and the OCAIRS. An example of a code derived from the occupational therapy standpoint is; “daily routine”. The Model of Human Occupation states that having meaningful routines is an important aspect of functioning satisfactorily in daily life, and is part of one’s personal identity (Cole & Tufano, 2008). Further, the codes were continually revised as new data emerged (DeCuir-Gunby, Marshall, & McCulloch, 2011). The researcher utilised clinical and academic supervision throughout the process to ensure objectivity in development of the codes. This process involved the second author examining portions of the coding to ensure that the codes accurately reflected the qualitative data. The codes were then organized into subthemes and finally into some overarching themes.

**Results**

Participants interviewed varied in age, year in college, degree of SAD, and subjects studied – see Table 1.

The overarching theme which emerged from the data was “the influence of perception of self and perception of others”. Perception of self, included all references as to how participants viewed themselves. Perception of others included all references to what participants believed about how other people viewed them. These two concepts were interwoven throughout the entire narrative of all participants. For the purposes of
organization, two sub-themes were created which organized the findings: 1) perception of self and others influences participation on daily life activities and 2) perception of self and others influences on environmental interactions.

**Perception of self and others influences participation on daily life activities**

Participants in this study often felt inferior to their peers and tended to judge themselves and their abilities, leading to low levels of confidence and self-esteem. Many displayed a tendency to assume failure, and avoided engaging in daily activities in which they thought they would not succeed. As one participant said, “I don’t like the thought of people thinking bad things about me” (Participant E). All participants believed that their peers would judge them and think they were inferior. When they interacted with others, they assumed that their own negative self-image was also how peers viewed them. This directly influenced the students’ ability to participate in daily activities:

I just don’t think there’s any good reason for me to do it if there’s going to be people there that are better than you, you know? You get ideas that you aren’t good enough or you’re a bit worthless. (Participant A)

This continuous preoccupation with their own performance and with how they were perceived by others led participants to over-think situations. Simple activities like entering a lecture hall were anxiety-provoking, and were sometimes avoided. For some participants, a strict daily routine was maintained as an anxiety-minimizing measure, as there was a degree of fear about being seen as late, or lazy. For one participant with particularly high levels of social anxiety, being in the lecture hall with a large number of people even affected her levels of concentration and learning ability in the class:
Sometimes if it’s early in the morning I know there won’t be many people there so I don’t feel that anxious, and I can concentrate better as well. . . . I get so focused on what other people are thinking of me that I just get completely distracted. (Participant E)

Similar to previous studies involving college students (Book & Randall, 2002; Shah & Kataria, 2010), participation in academic activities was affected in these participants with social anxiety. Many courses required students to give presentations and participate actively in small group work and tutorials. Some participants were able to continue to engage in these activities, despite a high level of anxiety. For example, Participant A said that “it does get bad, but I’d never miss something”. In contrast, another student stated “I don’t go at all” (Participant E); despite the impact it could have on her academic grade. This could be a reflection of the differing levels of social anxiety that these students presented with on the LSAS.

Again, a perception of what other people are thinking about them in the academic environment was an important influence on how students participated in these kinds of activities, particularly not wishing “to be singled out by the lecturer” (Participant A). Fear of being viewed negatively even encouraged one student to participate in group activities, despite a high level of anxiety about the experience. They indicated that they would “feel terrible if I promise someone something and then don’t turn up” (Participant F).

Life outside academia was also affected for these students. Leisure activities such as societal involvement and meeting friends were particularly mentioned. Four participants attended group social events such as a writing group regularly; however, all were unhappy with their level of involvement, and wanted to be more involved. Leisure activities were often the first activities to be dropped when students felt particularly anxious and their future
participation in activities was similarly affected. Participant F stated “I feel more comfortable not doing them. I’d like to try new things and meet new people, I’m just afraid of doing it”.

Participants reported that they had trouble sleeping when they were anxious. It was a self-perpetuating cycle. If participants were feeling anxious about an issue, they found that sleep was affected. The resulting tiredness from less sleep meant that participants found themselves to be more anxious the next day. This in turn affected how they would engage in their occupations. Participant F reflected this negative cycle when she stated, “if I’m worrying about one thing, that’ll keep me awake . . . [and] if I didn’t sleep much the night before, little situations that wouldn’t normally make me that anxious would make me more anxious”.

Coping with social anxiety, utilising support services and taking steps to avoid anxiety-provoking situations were all mentioned by participants as being part of their daily routine at the college, as in the remark “if I’m late or if there’s a lot people there [in a lecture] already sitting down, I wouldn’t go in, so I’d go there early to make sure I got a seat or whatever” [Participant B]. Half of the participants had sought professional help for their condition. Of these, however, only one found any benefit from the cognitive-behavioral therapy-focused approach. Avoidance was identified by all participants as the most effective method of minimizing their anxiety. As Participant E noted; “I just avoid it at all costs”.

Similar to students in previous research, the use of alcohol and drugs helped to relieve anxiety (Book & Randall, 2002). Participant B said “I don’t drink much. I wouldn’t like to rely on it”, and this reflected a sense of awareness among the participants that this was not a long-term solution to the problem. One or two students identified more adaptive coping strategies such as deep breathing or distraction techniques such as counting.

Thus, the descriptions gained through the interviews increased our understanding of SAD, including the influence SAD has on the life roles, routines, and occupational
participation of undergraduate college students, as well as how these people learn to cope with these difficulties.

**Perception of self and others influences on environmental interactions**

As in the study by Russell and Shaw (2009), the physical and social environments in the college were seen to both inhibit and facilitate the participation of these students in daily activities in various ways. From an occupational therapy point of view, the environment relates to the physical and social features of a specific context. This affects what one does; how it is done; and a person’s motivation and performance in daily activities (Kielhofner, 2008). Participants were very preoccupied by their notions about how other students perceived them as they navigated the college environment. This preoccupation meant that carrying out many normal activities around the campus augmented their social anxiety levels.

The physical environment includes space, objects and noise (Kielhofner, 2008). These could facilitate and inhibit participation, depending on the activity in question. Participants usually ate in smaller, quieter locations e.g. their own homes and small cafes in the city and on campus. With regards to studying, many participants studied in the library as a way of filling their time during breaks in the college day. The large library facilitated anonymity for many participants. Two participants found, however, that their anxiety levels increased on entering the library because of its size and capacity. There were also differing opinions about the location of classes for participants. Two participants reported that they liked large lecture halls as they then felt anonymous. These same participants reported they were also more likely to skip tutorials (classes with few people) because of the lack of anonymity. Other participants, however, felt tutorials encouraged participation because of the fewer people.
This suggests that the size of a physical place can facilitate and inhibit participation depending on the activity in question, and, crucially, how a person perceives the situation. This preoccupation about other people was reflected in Participant C’s comment; “I like tutorials because there are less people, but lectures because you’re not noticed as much”.

Participants’ acute awareness of self and their perceptions of how others viewed them also affected how they interacted with their social environment. All participants felt less anxious when they were with close friends and family members. The presence of a trusted person made it easier for them to participate in social activities. Participant E said that social situations were made much easier by the presence of a parent; “My mum had a New Years’ Eve party and there were loads of people I didn’t know there but I didn’t mind”.

In many cases however, even these close friends and family members were not made fully aware of the extent of the social anxiety experienced by the person. Participants feared judgement most from those closest to them, and this led to not being completely honest about the levels of anxiety they experienced. Participant A admitted that his family would “know about it, but they wouldn’t know the extent of it”. Overall, participants identified having few trusted friends who they could be honest with about their anxiety.

The nature of the social environment in college settings added to the social anxiety for some participants. Meeting new people, going to social occasions, and spending time with people that they didn’t know well were all found to be difficult. There were high levels of insecurity and fear about how others would perceive them in these situations. Participant B said that he negatively anticipated “going to social events. . . I want to go, but I won’t really enjoy it”. All students in the study found that they avoided social activities, resulting in them spending more time alone than they would like. Participant A reflected this sense of isolation when she stated “I would be alone quite a bit, but if I had the chance to be with other people then I’d definitely go for that”.

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Overall, participants disliked being the center of attention (or perceiving themselves as such) because of insecurity regarding their own abilities. A desire for anonymity strongly influenced how participants interacted with their social environment. Thus, they tended to favor locations and situations which enabled anonymity. Whether this was a feature of social anxiety, or as all participants mentioned, a feature of being shy from childhood, was unclear. Physical and social environments were seen to be both facilitators and inhibitors for participants in their ability to participate within their environments.

**Discussion**

The results of this study, and that of previous research (Russell & Topham, 2012; Shah & Kataria, 2010), would indicate that students with social anxiety are significantly influenced in their daily functioning, both in academic and social activities while at the college. Social anxiety has the potential to reduce concentration and attention in the academic environment, as found in previous research (Palmer et al., 2014; Vassilopoulos, 2004), and confirmed by one of the most socially anxious participants in this study. Students in this study all identified avoidance as their primary coping method. This was similar to findings in other studies (Tillfors & Furmark, 2007). This had the potential to cause them to miss out on, or perform poorly in, small-group teaching, presentations and even important aspects of academic life such as studying in the library.

A crucial factor undermining successful performance of daily activities in the college, such as concentrating in class, was the high degree of self-awareness and preoccupation with the perceptions of others that these people experience. Cognitive models suggest that during social interactions, socially anxious people direct their attention to internal cues of arousal
and use this information to erroneously infer how they appear to others (Taylor & Alden, 2011; Wild, Clark, Ehlers, & McManus, 2008). The participants in the current research, as in the above studies, assumed that other people would react negatively to them. By focusing primarily on these internal cues, people with SAD can appear to others as being disinterested or detached from the social situation at hand (Wild et al., 2008). This can sometimes cause others to disengage from building relationships with this group. This, therefore, affirms the socially anxious person’s negative social expectations and feelings of inferiority (Taylor & Alden, 2011). Although this was not explicitly found in this study, participants did report difficulty making friends and felt that others were better than they were. These thoughts and feelings reaffirmed their own beliefs.

Other researchers have reported that people with SAD believe that avoidance of the stimulus is necessary to reduce the fear, and continued avoidance was then necessary to maintain this fear reduction (Book & Randall, 2002; Damer et al., 2010; Russell & Topham, 2012; Tillfors & Furmark, 2007). As a result, participants engaged in anxiety-avoiding situations e.g. not attending or engaging in presentations where possible, which is in concert.

The literature suggests that universities can be ‘toxic environments’ for those with social anxiety disorders, and many students’ lives are dictated by social fears (Book & Randall, 2002; Russell & Shaw, 2009). The link between the social and physical environments on campus and the social anxiety of students has not been examined in depth. Further the current study does not point to a definitive conclusion about how people with social anxiety interact with their physical environment. Some preferred large, busy environments where they could be anonymous. Others preferred smaller locations where there were fewer people. The key issue again appeared to be how the environment was perceived by the person.

Environments were evaluated by participants as to their potential to cause an increase in anxiety. This thinking bias is the process by which socially anxious people base their
judgement about a situation on self-observation of physical anxiety cues, and how they process their fears and the information available (Button, Browning, Munafò, & Lewis, 2012; Eysenck, 2000). A person may therefore find the library environment pleasant until they misinterpret a social cue from another student, at which point they may experience a high degree of anxiety. The relationship between the environment and the cognitive processes of people with SAD indicates a research gap which has previously been identified (Russell & Shaw, 2009; Russell & Topham, 2012). Further research on how cognitive biases affect occupational performance could assist occupational therapists and academic staff working with socially anxious students who are attempting to navigate the college environment.

**Implications**

The possible link between these cognitive processes of negative self-evaluation and fear of judgement and the performance of daily activities and routines has not been studied in detail to date. For the participants in this study however, performance was affected both at an occupational performance component level, such as a reduction in concentration levels during lecture; and also at an occupational participation level, where students were unable to fully participate in the student role. This could point to a role for occupational therapy in working with students who have social anxiety disorder. Some developments in one Irish college could suggest an occupational therapy intervention for the treatment of students with this disorder. This intervention utilizes theory from the Recovery Model, the Person-Environment-Occupation Model, and the Social Model of Disability (Nolan, 2012). In this occupational therapy service (Nolan, 2012), efforts are made to assist students with mental health disorders, including anxiety, as well as other disabilities, to function to the best of their
ability, throughout their college lives. Therapists based on campus work with students to problem-solve around difficulties with occupational performance in student activities, and teach coping strategies including self-management. This service uses a person’s satisfaction with their participation in daily activities as its outcome measurement (Nolan, 2012).

Despite the significant impact that social anxiety had on the participation of these students in college activities, only three participants in this study had previously sought psychological support; of which two found it was not beneficial. SAD has previously been associated with the lowest remission rate of all the anxiety disorders and low rates of treatment seeking (Lampe, 2009). Many who access treatment have not found this to be effective (Fehm et al., 2008; Rodebaugh, Holaway, & Heimberg, 2004; Shah & Kataria, 2010).

There are very few identified occupational therapy interventions for those with anxiety disorders, and social anxiety in particular. Emerging evidence would point to using a lifestyle redesign approach for those with anxiety. An RCT in the United Kingdom used an occupational therapy-led lifestyle treatment on an individual basis with people with panic disorder over 16 weeks. This intervention comprised lifestyle review, reduction of caffeine, alcohol, and nicotine and improving diet and exercise routines. Compared to GP care as usual, those receiving occupational therapy showed significantly lower Beck Anxiety Inventory scores after 20 weeks (p<0.001) (Lambert, Harvey & Poland, 2007). Another RCT in Sweden used a lifestyle redesign approach in a 16 week group intervention for women with stress-related disorders. This intervention showed positive results for the women returning to work following sick leave (Eklund & Erlandsson, 2011) but also showed promise in reducing the numbers of women measuring above clinical cut-off levels for anxiety disorders (Eklund, 2013).
Wider research points to the effectiveness of cognitive-behavioral interventions for individuals with social anxiety, and for students with the condition in particular (Andersson, Carlbring, Ljótsson, & Hedman, 2013; Berry & Lai, 2014; Carlbring et al., 2007; Hedman et al., 2014; Hedman, Mörtberg, et al., 2013; Yen et al., 2012). Since the current study indicated that the negative cognitive appraisals of participants had a particular impact on their functioning, occupational therapists could consider incorporating some cognitive-behavioral techniques into existing evidence-based occupational therapy interventions for those with social anxiety.

**Limitations and Strengths**

It is important to identify the limitations of this study and the measures taken to minimise their impact. Firstly, while small samples are usual in qualitative research when an in-depth view of a phenomenon is needed (DePoy & Gitlin, 2015), the recommendation is to sample until “saturation” has been reached. Saturation means that no new information is emerging from the interview data (Cutcliffe, 2000). Saturation did not occur in this because of time limitations, and is acknowledged as a study limitation. The demographics of the participants was a further limitation – the majority of the participants were female, aged 19 and in their early years in college. Further research should focus on completing in-depth interviews, comparing students with SAD at each stage in college, to determine if students develop more effective coping methods for SAD as they go through college. Thirdly, the study was completed by a novice researcher. Dependability and reliability of the study was improved in several ways; an expert in qualitative analysis was consulted throughout the coding process (Holloway, 1997), a clear audit trail was kept of the research process, and the coding process
was subject to objective review to reduce bias (Thomas & Magilvy, 2011). A strength of the study which should be mentioned was a commitment to support all participants who self-identified as having social anxiety. All those who contacted the researcher were given details of counselling services, and the results of this study have allowed college support services to plan specific social anxiety support interventions for the future.

**Conclusions**

The results of this study demonstrated that perception of self and others was an over-arching theme which influenced all areas of the participants’ lives. During daily activities, participants had a tendency to focus on what others might be thinking about them, and this, in turn, influenced their participation in and performance of these activities. Participants judged themselves harshly, and were found to have low levels of self-esteem and self-belief. They assumed that their peers were better than they were. This, in turn, affected how participants interacted in their environments. Coping strategies were not effective for these participants. As a result of this, it is necessary to explore how we can help students in college to enable them to perform to the best of their ability, perhaps exploring evidence-based practices already highlighted. Students with SAD often recognize the exaggerated nature of their fears, but their lives are significantly disrupted nonetheless (Damer et al., 2010). Since positive psychological well-being, social interaction skills and strong interpersonal relationships are seen as crucial to successfully navigating college life, the mental health of students, particularly those with anxiety disorders, is of concern to academic and healthcare staff alike.
References


http://dx.doi.org/10.1016/j.jbtep.2012.05.004


http://dx.doi.org/10.1177/1525822X10388468

http://dx.doi.org/10.2753/IMH0020-7411420402

http://dx.doi.org/10.1080/03630242.2011.618215


http://dx.doi.org/10.1007/s00127-007-0299-4


http://dx.doi.org/10.1111/j.1471-6712.1994.tb00248.x

http://dx.doi.org/10.1016/j.brat.2013.12.007

http://dx.doi.org/10.1016/j.brat.2013.07.006


http://dx.doi.org/10.1111/j.1471-6712.1999.tb00550.x


Neergaard, M. A., Olesen, F., Andersen, R. S., & Sondergaard, J. (2009). Qualitative description - the poor cousin of health research? *BMC Medical Research Central, 9*(52), 1-5.


http://dx.doi.org/10.1016/j.cpr.2004.07.007


http://dx.doi.org/10.3109/09638237.2012.694505

http://dx.doi.org/10.1002/da.20503

http://dx.doi.org/10.1002/1098-240X(200008)23:4<334::AID-NUR9>3.0.CO;2-G


http://dx.doi.org/10.1037/a0022127


