Title: The Relationship between Fear of Negative Evaluation and Depression in Young Adults across a Range of Self-Reported ASD Symptomatology

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Introduction: Prior research has found that adults with autism spectrum disorder (ASD) are at a significantly greater risk of depression and social anxiety than the general population (Seltzer, Shattuck, Abbeduto, & Greenberg, 2004). Further, research indicates that depression and social anxiety are each associated with concerns of being negatively evaluated by others (APA, 2013). Fear of Negative Evaluation (FNE) operationalizes the cognitive symptoms of social anxiety, but there are limited empirical studies examining individuals with ASD in this domain (Capriola, Maddox, & White, 2017). However, there is evidence that self-awareness of social difficulties is associated with both anxiety and depression in individuals with ASD (Seltzer et al., 2004). Additionally, depression may be a secondary consequence of these social difficulties in those with high-functioning ASD (Wigham, Barton, Parr, & Rodgers, 2017), and an acute awareness of their impairments may result in heightened anxiety (Capriola et al., 2017). Considering the role of self-awareness and perception in depression and social anxiety and the need for further study of FNE in individuals with ASD, and given this population’s vulnerability to depression and social anxiety, the current study seeks to examine the relationship between FNE and depression in this vulnerable population. Study aims include investigating (1) whether individuals with increased self-reported ASD symptoms show higher levels of depression and FNE, (2) whether there is a relationship between depression and FNE, and (3) whether the correlation between depression and FNE varies based on ASD symptom severity. We hypothesized that increased ASD symptoms would be associated with increased FNE and depression.

Methods: Participants included 119 young adults, (73.9% male; mean age=22.52, SD=3.987) presenting for social skills treatment through the UCLA Program for the Education and Enrichment of Relational Skills (PEERS®; Laugeson, 2017). PEERS® is an evidence-based, caregiver-assisted social skills program for young adults with ASD and other social challenges (Laugeson et al., 2015). ASD symptoms were measured using self-report scores on the Social Responsiveness Scale-Second Edition (SRS-2; Constantino & Gruber, 2012), and individuals were divided into three groups based on their scores. Those with scores ranging from 0-59 were categorized as the “Within Normal Limits” group; those with scores ranging from 60-66 were categorized as the “Mild ASD” group; and those with scores above 66 were categorized as the “Moderate-Severe ASD” group. FNE was measured using self-report scores on the Social Anxiety Scale (SAS) Fear of Negative Evaluation subscale (La Greca, 1999). Depressive symptoms were measured using self-report scores on the Major Depression Inventory (MDI; Olsen et al., 2003). All assessments were conducted at baseline prior to treatment. An analysis of variance (ANOVA) was conducted to examine whether individuals with higher self-reported ASD symptomatology would also show greater FNE and symptoms of depression. Pearson correlation coefficients were calculated to examine the relationship between self-reported FNE and depression for each ASD symptom profile.

Results: Results from the ANOVA reveal significant variation in FNE and MDI scores across each of the three symptom profiles [FNE (F(2,116)=14.657, p<.001), MDI (F(2,116)=23.509, p<.001)]. The “Within Normal Limits” group scored the lowest [FNE (M=19.32, SD=7.84), MDI (M=11.05, SD=9.29)], while the “Moderate-Severe ASD” group scored the highest [FNE (M=27.42, SD=6.56), MDI (M=25.38, SD=10.43)]. Further, results show a significant positive correlation between FNE and depression for all three groups [“Within Normal Limits” group (r(119)=.522, p<.01), “Mild ASD” group (r(119)=.467, p<.01), and “Moderate-Severe ASD” group (r(119)=.352, p<.05)]. The post-hoc comparisons of the correlations revealed that the strength of the correlations did not differ across groups.

Discussion: Results indicate that as self-reported ASD symptoms increase, FNE and depression also increase, which supports prior research findings that increased awareness of social difficulties results in heightened anxiety (Capriola et al., 2017) and depression (Wigham et al., 2017). Moreover, results show that FNE and depression are related in all ASD symptom profiles, suggesting that if an individual is high in self-reported FNE, they are also likely to endorse depression regardless of their ASD symptom severity. Accordingly, the associated fear of being negatively evaluated by others that manifests within social anxiety is universalized in depression (APA, 2013). Given the nature of this comorbidity, and considering our findings on the strength of the relationship between FNE and depression, we believe there is potential for development of new treatment methodologies in this area. Theoretically, targeting FNE through treatment has the potential to affect comorbid social anxiety and depression.
Additionally, this could be effective for all individuals with ASD, independent of symptom severity. Further research is needed to validate these theoretical assertions and to determine the viability of development of these targeted treatment strategies.

References: