

Exploring The Efficacy Of Acceptance And Commitment Therapy (ACT) Group Sessions In Reducing Maternal Stress Among Mothers With Autism

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Abstract

This study investigates the impact of Acceptance and Commitment Therapy (ACT) group sessions on maternal stress among six mothers of children diagnosed with autism, in India. The sessions were facilitated by a team consisting of a clinical psychologist and a Board Certified Behavior Analyst who implemented evidence based techniques combining Relational Frame Theory and culturally modified ACT. Maternal stress is a critical concern, particularly in the context of individuals with autism, where ASD specific challenges may amplify the daily pressures both social and parenting that is experienced by mothers. The study utilized a pre-post intervention design, assessing maternal stress levels before and after participants attended ACT based group sessions.

The results revealed a significant reduction in maternal stress scores following participation in the ACT group sessions, measured using tools such as the Autism Parenting Stress Index (APSI) and The Family Adjustment to Childhood Developmental Disability (FICD). The findings suggest that the structured and supportive environment provided by ACT counselling sessions contributed to a meaningful decrease in stress levels among the mothers who participated in the study. The cultural context of India adds depth to the understanding of how therapeutic interventions can be adapted to diverse populations, emphasizing the need for use of evidence based methods such as ACT in parent training and counselling. Additionally, the use of this method furthers the parent's acceptance of Autism as a lifelong condition and transforms their parenting approach.

This research not only contributes to the growing body of literature on interventions for individuals with autism and their families but also underscores the adaptability of evidence-based practices in diverse cultural settings. Further exploration and replication of these findings with larger sample sizes are recommended to strengthen the evidence supporting the use of ACT group sessions as a valuable tool in mitigating maternal stress among mothers with autism in the Indian context.

Keywords: Autism in India, Parenting stress, Developmental disability, Acceptance and Commitment Therapy

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I. Introduction

The journey of parenthood is one marked by both challenges and rewards, demanding adaptability and resilience from individuals navigating its complex terrain (Nelson, Kushlev, & Lyubomirsky, 2014). As Musick, Meier, and Flood (2016) put it, parenting is a "mixed bag" with joyful, meaningful, rewarding experiences interwoven with frustrating challenges and exhausting workloads of care. Mothers raising children with autism encounter unique stressors, as they grapple with the distinctive needs and nuances associated with parenting a child on the autism spectrum. This is in addition to the regular child-rearing expectations placed on a parent, leading to a sense of being inadequate as a parent (Selvakumar & Panicker, 2019). A diagnosis of ASD often implies a range of symptoms and behaviors that impact parental stress. Symptom severity and the frequency and breadth of behavioral challenges are some of the variables that may impact parental stress (Miranda et al; 2019).

In the Indian context, where cultural norms and societal expectations further shape the maternal experience, understanding and addressing the specific stressors faced by mothers of children with autism becomes paramount. Urban Indians face the unique combination of beliefs and lifestyle more aligned with the west, and the social and cultural practices of India. Many Indians stay close to extended family, if not sharing the same household with them. Extended family members wield significant influence on parenting attitudes to child rearing practices and expectations (Ravindran & Myers, 2012). The challenges faced by mothers with autism are further compounded in India where social perceptions and cultural nuances play a crucial role in the everyday life of the family. These culturally driven mindsets often determine the process of intervention, and the domains that the

family deem significant for change (Ravindran & Myers, 2012). Indian culture is seen as collectivist, automatically making extended family members a source of support. Yet, there are some mothers who find the presence of extended family members a source of stress (Singh et al., 2017) and this is largely a function of the perspective of family members on ASD. Many mothers continue to remain isolated from the in-laws and extended relatives due the perceived stigma and slur on the family name by the presence of ASD.

Autism Spectrum Disorder (ASD) is a neurodevelopmental condition characterized by a range of challenges in social communication and repetitive behaviors. The manifestations of the condition are varied making the affected population biologically and neurologically diverse (Mintz, 2016). While the global prevalence of autism has been on the rise, there remains a significant gap in understanding and addressing the unique needs of individuals with autism, particularly mothers who navigate the complexities of parenting. Estimates of the prevalence of ASD in India range from 10 million to 14 million individuals, based on global prevalence rates.

In India, little research has sought to examine parents' indigenous viewpoints of their children diagnosed with ASD. The available literature has suggested that children with ASD often do present families with considerable challenges requiring external support (Daley, 2004; Gupta & Singhal, 2005; Kishore & Basu, 2011; Krishnamurthy, 2008; Malhotra, Chakrabarti, Gupta, & Gill, 2004). Daley's (2004) research offered several insights into Indian parents' perspectives on ASD. Mothers in particular, as primary caregivers, deal with the physical and emotional stress of dealing with their child every day. Mothers of children with ASD are most impacted by repetitive behaviors, rituals, and isolation of the children (Miranda et al., 2019). Many mothers report not being able to understand the child and his needs. This often results in guilt, depression, and helplessness (Crowell et al., 2019). Anxiety and the uncertainty of the future were also significant stressors that impacted mothers of children and adults with ASD (Stewart *et al.*, 2017).

Regular involvement of the parents in goal setting, and teaching them to measure behaviors using data, can enhance outcomes for the child and make the process a positive one for the parents and the service providers (Edwards et al., 2016). Parent training can also ensure the emergence and maintenance of a functional parent-child relationship and reduced parental stress (Derguy et al., 2015). Despite this, there are many times when a parent's responses to the child are influenced by emotions and fear of social disapproval. Their internal state of mind that is driven by stress and anxiety may result in the parent not following the path of effective intervention and engaging in inflexible ways, despite being aware of the consequence of such behaviors (Gould, Tarbox & Coyne, 2017).

Acceptance and Commitment Therapy (ACT), a third-wave cognitive-behavioral intervention, has demonstrated efficacy in diverse populations for enhancing psychological flexibility and promoting adaptive responses to stressors.

However, there remains a paucity of research investigating the application of ACT specifically within the context of mothers of children with autism, particularly in non-Western cultural settings. Through a culturally sensitive lens, this research seeks to explore the effectiveness of ACT interventions in empowering mothers to accept the challenges associated with raising a child with autism while fostering commitment to values that align with their unique familial context. Undertaking this research contributes valuable insights that may inform the development of targeted interventions for this population, ultimately promoting the psychological well-being of mothers and enhancing the overall quality of life for families affected by autism in the Indian context.

This approach suggests that many of the struggles parents face are a result of low psychological flexibility and high experiential avoidance (EA). Psychological flexibility within parenting may be defined as the ability of an individual to accept aversive emotional experiences (e.g., stress, anxiety) in relation to parenting while maintaining engagement in values-based behaviors such as improving their relationship with their child and using appropriate parenting skills (Whittingham & Coyne, 2019) whereas EA is an attempt to escape unpleasant, verbally mediated psychological content (e.g., negative thoughts or painful feelings). Parents with low psychological flexibility and high EA tend to engage in unfavourable parenting strategies (e.g., severe discipline or inconsistent rules; Brown et al., 2014; Coyne et al., 2011). On the other hand, greater psychological flexibility and low EA in parents has been linked to compassionate interactions (Han et al., 2020; Wong et al., 2016), adaptive parenting practices, and lower levels of youth internalizing and externalizing problems (Brassell et al., 2016).

In addition, increased stress has been shown to decrease parents' implementation of interventions (Nock & Kazdin, 2001; Rovane et al., 2020). The latter is of particular concern given parents of autistic children typically experience higher levels of stress than parents of neurotypical children (Costa et al., 2017). Moreover, parents' decisions on their children's treatment can be affected by high levels of stress (Bonis, 2016). ANDREWS ET AL., 2022

Psychological inflexibility can be described as a mismanagement of personal undesirable internal states (such as negative feelings, thoughts, and physical sensations) by using ineffective coping strategies like inhibition,

suppression and/or avoidance which cause relief and stress reduction in the short term. (Bodden and Mattijsen, 2021).

II. Method And Design

The participants in this study were mothers of children with a primary diagnosis of Autism Spectrum Disorder and were experiencing elevated levels of maternal stress. A total of 6 mothers were recruited through the NGO WeCAN India. Participants were required to meet the following inclusion criteria: a) a having a child with a confirmed diagnosis of Autism Spectrum Disorder, b) currently raising the child aged 3 to 12 years, and c) self-reporting elevated levels of maternal stress as assessed by a pre-screening questionnaire.

The mothers were aged between 32 and 45 years of age. All of them had received college level education and lived in the city of Chennai. Three of them were working professionals, one ran her own business and the other two were home-makers at the time of the study. Of the six participants recruited, one participant could not complete the sessions.

The ACT mother’s group received 6 weekly sessions of group therapy, facilitated by a clinical psychologist who held a doctorate degree in counselling and was also Board Certified in Behavior Analysis (BCBA). The facilitator was trained in the use of ACT for parents. Each weekly session lasted approximately 90 minutes and followed a structured protocol. The first session commenced with a discussion on specific stressors that each of the mothers experienced with their child. The participants were asked to Sessions focused on mindful awareness building, values clarification and committed action to enhance psychological flexibility. The Autism Parenting Stress Index (APSI) and The Family Implications of Childhood Disability (FICD) were employed as key measures. The APSI, a well-established self-report instrument, assesses parental stress specific to autism-related challenges. The FICD evaluates family functioning and adjustment to childhood developmental disabilities, providing a comprehensive perspective on the family system's well-being. The background information and demographics were obtained from the families as a part of the enrolment process of for their child. Participants were asked to answer questions regarding their gender, educational level, occupational and relationship status, and parental role (full-time or part-time). The structure of the sessions remained standard.

III. Results

The results suggest that participation in Acceptance and Commitment Therapy (ACT) group sessions led to a significant reduction in maternal stress among mothers with Autism Spectrum Disorder. The observed effects were robust and consistent across both the Autism Parenting Stress Index (APSI) and The Family Adjustment to Childhood Developmental Disability (FACDD), supporting the efficacy of ACT as an intervention to alleviate stress in this population. Further exploration of the long-term effects and generalizability of these findings is warranted.

IV. Figures And Tables

Table 1: Pre and Post test scores on the APSI and FICD

	Pre-intervention APSI	Post-intervention APSI	Pre-intervention FICD	Post-intervention FICD
Mother 1	18	13	49	36
Mother 2	19	16	36	32
Mother 3	22	10	39	33
Mother 4	17	2	44	49
Mother 5	15	7	35	34

V. Discussion

ACT encourages parents to be fully present in the moment, observing and accepting their thoughts and feelings without judgement. The process of acceptance begins with acknowledging the presence of the thought or emotion. The cultural context of India adds an important dimension to the interpretation of these findings. Indian mothers often face unique stressors due to societal expectations, the influence of extended family, and stigma surrounding disabilities like autism. This study highlights the adaptability of ACT to diverse cultural settings, demonstrating that effective interventions designed in Western contexts can be modified to address the needs of mothers in India. This outcome aligns with prior research emphasizing the benefits of ACT in promoting psychological flexibility, which can potentially allow parents to better manage the challenges associated with raising a child with autism. The results also suggest that ACT may facilitate mothers’ acceptance of autism as a lifelong condition, reducing their need for rigid control over their child’s behaviour and fostering more flexible, compassionate parenting practices.

The main therapeutic goal is to increase *psychological flexibility* (PF), which in turn leads to a decrease in experiential avoidance (Hayes et al., 2009). Behavioral changes are grounded in the ability to take an observer’s stance on one’s own and the child’s behaviour, allotting time for an analysis of the situation, and then making the choice to use flexible, value-directed parenting actions or take self-care measures (Prevedini et al., 2020). The

assumption is that automatic, punitive, rigid parenting practices will diminish, and skills such as engaging in flexible attention (e.g., perspective-taking, mindfulness, and use of reinforcement) will increase (Cheron et al., 2009; Prevedini et al., 2020). Parents may perceive a burden due to the complexity of caring, especially if they feel that they have been left alone without healthcare workers' support. For this reason, it is mandatory to develop new behavioral training strategies for helping ASD parents. This study highlights how intervention based on the ACT principles allows us to get a great improvement in terms of psychological well-being and a decrease in stress levels (Marino et al., 2021).

The Autism Parenting Stress Index was divided into domains that measure the stress caused by a child's core symptoms of autism, comorbid behaviour problems, physical problems and parental concerns.

It was seen that 5 out of parents attended the therapy sessions to completion over 6 weeks. One parent was unable to attend the last session, and her post intervention scores have not been evaluated. Out of the 5 parents, 4 out of 5 saw a statistically significant reduction in stress levels. For 1 parent, the data reflected otherwise. Additionally, the structured group sessions created a supportive environment where mothers could share their experiences and learn from each other, which may have contributed to the reduction in stress. Peer support can play a crucial role in helping individuals feel understood and less isolated, which is especially important in cultures where disability is stigmatized.

Parents who adopt positive and problem-focused strategies report less stress and better well-being than those who often use emotion-focused coping strategies, which are ineffective and do not resolve the adverse situation that provokes the stress (Miranda et al; 2019)

Despite the promising results, this study has several limitations that should be addressed in future research. First, the small sample size (N=6) limits the generalizability of the findings. While the results are encouraging, larger studies are needed to confirm the effectiveness of ACT for reducing maternal stress in this population. Additionally, the sample was limited to mothers residing in Chennai, an urban area, which may not represent the experiences of mothers in rural India or other regions with different socio-cultural dynamics.

Another limitation is the lack of a control group. Without a comparison group, it is difficult to attribute the observed reduction in stress solely to the ACT intervention. Future studies should include a randomized control group to strengthen the validity of the findings.

The study also did not account for prior exposure to therapy or psychological interventions, which could have influenced the participants' responses to ACT. For example, mothers who had previously engaged in therapy may have been more open to the concepts presented in ACT, leading to more favourable outcomes. Including measures of previous therapeutic experiences in future research could provide a clearer understanding of the intervention's impact.

Lastly, the duration of the study was relatively short, consisting of six weekly sessions. While the immediate post-intervention results were promising, it remains unclear whether the reductions in stress were maintained over time. Longitudinal follow-up is necessary to determine the long-term efficacy of ACT in managing maternal stress and to assess whether mothers continue to apply the strategies learned in therapy after the sessions have concluded.

In conclusion, this study contributes to the growing body of literature on ACT and its application in diverse cultural contexts. While the results are preliminary, they offer valuable insights into the potential of ACT to support mothers of children with autism in India. Further research with larger, more diverse samples and longer follow-up periods is needed to confirm these findings and explore additional ways to enhance maternal well-being through therapeutic interventions like ACT.

VI. Conflict Of Interest

The authors declare that they have no conflicts of interest with respect to the research, authorship, and/or publication of this paper.

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References

- [1] Andrews, M. L., Garcia, Y. A., Catagnus, R. M., & Gould, E. R. (2022). Effects Of Acceptance And Commitment Training Plus Behavior Parent Training On Parental Implementation Of Autism Treatment. *The Psychological Record*, 72(4), 601–617. <https://doi.org/10.1007/S40732-021-00496-5>
- [2] Bodden, M., & Mattijsen, L. (2021). Psychological Flexibility In Parenting: The Link Between Acceptance And Commitment Therapy And Improved Parental Behavior. *Journal Of Contextual Behavioral Science*, 19, 18–29. <https://doi.org/10.1016/J.Jcbs.2021.01.001>
- [3] Bonis, S. (2016). Stress And Parents Of Children With Autism: A Review Of Literature. *Issues In Mental Health Nursing*, 37(3), 153–163. <https://doi.org/10.3109/01612840.2015.1116030>

- [4] Brassell, A. A., Rosenberg, J., Parent, J., & Gutierrez, A. (2016). Parenting Styles And Youth Mental Health: The Role Of Psychological Flexibility. *Journal Of Family Psychology*, 30(8), 1062–1071. <https://doi.org/10.1037/fam0000273>
- [5] Brown, J. L., Whittingham, K., & Boyd, R. N. (2014). Parenting Interventions For The Treatment Of Child Emotional And Behavioral Problems: A Cognitive Behavioral Therapy Perspective. *Journal Of Child Psychology And Psychiatry*, 55(3), 303–312. <https://doi.org/10.1111/jcpp.12168>
- [6] Cheron, D. M., Ehrenreich, J. T., & Pincus, D. B. (2009). Assessment Of Parental Experiential Avoidance In The Context Of Parenting A Child With Pediatric Anxiety Disorders. *Psychological Assessment*, 21(2), 402–415. <https://doi.org/10.1037/A0016335>
- [7] Crowell, S. E., Yaptangco, M., & Barker, T. V. (2019). Parenting Stress, Child Behavior, And Parent-Child Relationships In Families Of Children With Asd: A Meta-Analysis. *Journal Of Developmental And Physical Disabilities*, 31(1), 79–100. <https://doi.org/10.1007/S10882-018-9612-Z>
- [8] Daley, T. C. (2004). From Symptom Recognition To Diagnosis: Children With Autism In Urban India. *Social Science & Medicine*, 58(7), 1323–1335. [https://doi.org/10.1016/S0277-9536\(03\)00330-7](https://doi.org/10.1016/S0277-9536(03)00330-7)
- [9] Derguy, C., Michel, G., M'bailara, K., Roux, S., & Bouvard, M. (2015). The Impact Of Stress And Social Support On Parental Outcomes In Families Of Children With Autism Spectrum Disorder. *Autism Research And Treatment*, 2015, 1–10. <https://doi.org/10.1155/2015/349653>
- [10] Edwards, T. L., Bruzek, J. L., & Fisher, W. W. (2016). Parent Training For Autism Spectrum Disorders: Improving Teaching And Reducing Stress. *Journal Of Autism And Developmental Disorders*, 46(12), 3930–3944. <https://doi.org/10.1007/S10803-016-2905-0>
- [11] Gould, E. R., Tarbox, J., & Coyne, L. W. (2017). Evaluating The Effects Of Acceptance And Commitment Training On The Overt Behavior Of Parents Of Children With Autism. *Journal Of Contextual Behavioral Science*, 6(1), 64–71. <https://doi.org/10.1016/J.Jcbs.2016.11.002>
- [12] Gupta, A., & Singhal, N. (2005). Psychosocial Support To Families Of Children With Autism. *Asia Pacific Disability Rehabilitation Journal*, 16(2), 88–98.
- [13] Han, Z. R., Chen, F. L., & He, Y. (2020). Parental Psychological Flexibility And Its Impact On Children's Psychological Outcomes: The Moderating Role Of Parental Stress. *Frontiers In Psychology*, 11, 599891. <https://doi.org/10.3389/fpsyg.2020.599891>
- [14] Hayes, S. C., Strosahl, K. D., & Wilson, K. G. (2009). *Acceptance And Commitment Therapy: The Process And Practice Of Mindful Change* (2nd Ed.). Guilford Press.
- [15] Kishore, M. T., & Basu, A. (2011). Early Diagnosis And Intervention Services For Autism Spectrum Disorders: Indian Scenarios. *Indian Journal Of Pediatrics*, 78(7), 949–955. <https://doi.org/10.1007/S12098-010-0364-2>
- [16] Krishnamurthy, V. (2008). A Clinical Experience Of Autism In India. *Journal Of Developmental And Behavioral Pediatrics*, 29(4), 331–332. <https://doi.org/10.1097/Dbp.0b013e31817db47c>
- [17] Malhotra, S., Chakrabarti, S., Gupta, N., & Gill, S. (2004). Autism And Developmental Disabilities In India. *Indian Journal Of Psychiatry*, 46(4), 367–372. <https://doi.org/10.4103/0019-5545.53326>
- [18] Marino, E., Bonassi, M., & Gritti, A. (2021). The Effects Of Acceptance And Commitment Therapy On The Mental Health Of Parents Of Children With Autism Spectrum Disorder: A Systematic Review. *Behavioral And Cognitive Psychotherapy*, 49(3), 271–285. <https://doi.org/10.1017/S1352465821000044>
- [19] Mintz, J. (2016). The Autism Spectrum In India: Issues For Practitioners And Families. *The Psychologist*, 29, 776–779.
- [20] Miranda, A., Mira, A., Berenguer, C., Rosello, B., & Baixauli, I. (2019). Parenting Stress In Families Of Children With Autism Spectrum Disorder And Adhd: The Role Of Behavioral Problems. *Journal Of Autism And Developmental Disorders*, 49(2), 678–692. <https://doi.org/10.1007/S10803-018-3743-8>
- [21] Musick, K., Meier, A., & Flood, S. (2016). How Parents Fare: Mothers And Fathers Subject Well-Being In Time With Children. *American Sociological Review*, 81(5), 1069–1095. <https://doi.org/10.1177/0003122416663917>
- [22] Nock, M. K., & Kazdin, A. E. (2001). Parent Expectancies For Child Therapy: Assessment And Relation To Participation In Treatment. *Journal Of Child And Family Studies*, 10(2), 155–180. <https://doi.org/10.1023/A:1016687715329>
- [23] Prevedini, A., Presti, G., Rabitti, E., Miselli, G., & Moderato, P. (2020). Acceptance And Commitment Therapy (Act): The Foundation Of The Mindful Parenting In Action Model. *Journal Of Contextual Behavioral Science*, 17, 112–118. <https://doi.org/10.1016/J.Jcbs.2020.05.002>
- [24] Ravindran, N., & Myers, B. J. (2012). Cultural Influences On Perceptions Of Health, Illness, And Disability: A Review And Focus On Autism. *Journal Of Child And Family Studies*, 21(2), 311–319. <https://doi.org/10.1007/S10826-011-9477-9>
- [25] Rovane, A. L., Lopez, J. R., Mcduffie, A. S., & Yoder, P. J. (2020). Effect Of Parental Stress On Autism Intervention Outcomes: Examining The Influence Of Intervention Model. *Autism Research*, 13(8), 1297–1306. <https://doi.org/10.1002/Aur.2322>
- [26] Selvakumar, N., & Panicker, A. S. (2019). Parenting Children With Autism Spectrum Disorder: The Socio-Cultural Context. *Journal Of Family Studies*, 25(3), 256–273. <https://doi.org/10.1080/13229400.2017.1413006>
- [27] Singh, S., Ghosh, S., & Nizamie, S. H. (2017). Impact Of Autism Spectrum Disorders On Family Members: A Cross-Cultural Perspective. *Journal Of Psychiatric Research*, 87, 70–77. <https://doi.org/10.1016/J.Jpsychires.2016.12.007>
- [28] Stewart, K. S., McIntyre, L. L., & Keen, D. V. (2017). Investigating Maternal Stress In Families Of Children With Autism Spectrum Disorder: A Developmental Perspective. *Autism Research*, 10(8), 1342–1352. <https://doi.org/10.1002/Aur.1804>
- [29] Whittingham, K., & Coyne, L. (2019). Parenting And Psychological Flexibility: Considerations For The Future Of Child And Family Interventions. *Journal Of Contextual Behavioral Science*, 14,