

A STUDY ON QUALITY TEACHING-LEARNING ENVIRONMENT ON SOCIAL AND EMOTIONAL DEVELOPMENT OF PRESCHOOLERS

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ABSTRACT

A research study examining the quality of teaching and learning environments and their effects on the social and emotional growth of preschool children was carried out in Dharwad taluk, Karnataka, from 2018 to 2020. The research included a sample of 208 children, aged between 3 and 6 years, who were enrolled in various Early Childhood Care and Education (ECCE) centers located in both rural and urban regions of Dharwad taluk. The results conferred that children in centers characterized by medium-quality teaching-learning environments achieved significantly higher scores, averaging 36.13 ± 4.14 , in social and emotional development compared to their peers in low-quality centers, regardless of whether they were in rural or urban areas. Notable differences were observed in specific areas, including emotional expression (5.23 ± 0.87), emotional adaptability (5.19 ± 0.97), emotion regulation arousal states (5.15 ± 0.99), behavioral regulation (5.19 ± 0.86), sense of self (4.90 ± 0.77), emotional themes in play (5.00 ± 0.65), and social interaction (5.46 ± 0.93), all of which were influenced by the quality of the teaching-learning environment in both settings.

INTRODUCTION

Quality in Early Childhood Care and Education (ECCE) pertains to various environmental aspects that are linked to beneficial outcomes for children in academic and social areas. The assessment of ECCE quality typically revolves around two primary dimensions: the program's infrastructure features and the direct classroom experiences of children. The call for quality in Early Childhood Education is widely recognized, asserting that every child is entitled to a 'Quality start,' which is a duty shared by both parents and educators. In defining 'quality' in the context of Early Childhood Education, it is important to include all elements that contribute

to enriching experiences for young children. (The Early Childhood Education Handbook. Linda Dunlap, 2020).

The effectiveness of early childhood care and education settings is crucial for young children, who have unique needs for physical and emotional nurturing, as well as careful guidance. They require adequate time and space for social play, exploration, and learning. This principle is applicable in both home environments and early childhood education services. The United Nations Convention on the Rights of the Child emphasizes that every child has the right to an education that establishes a foundational basis for their future, enhances their capabilities, and acknowledges

their family, cultural, and linguistic identities. (Quality in Early Childhood Education. Nancy Freeman, 2019).

In the context of quality assurance, it is vital to acknowledge the various stakeholders engaged in different services and sectors within Early Childhood Education (ECE). In an ECE setting, both educators and children originate from diverse backgrounds, fields, and experiences. Teachers hold the important responsibility of providing care and education to these young individuals. While a high-quality ECE program should be adaptable, it is imperative for teachers to conduct comprehensive planning to ensure that the program is balanced, appropriate, and responsive to the needs, interests, and abilities of the children.

The United Nations Convention recognizes the right of children, including very young ones, to voice their perspectives on issues that affect their lives. This right is applicable in both family settings and other early years contexts.

The Early Childhood Care and Education Programme (ECCE) in the Republic of Ireland provides children with access to free early childhood care and education, commonly referred to as 'free preschool,' prior to their entry into primary school. The quality of ECCE environments, where young children spend considerable time both at home and in external settings, plays a crucial role in their overall wellbeing, learning, and development. (Early Childhood Education: An International Perspective.

In light of this background, there arose a necessity to examine the effects of the teaching-learning environment's quality on the social and emotional growth of preschool children within the local community.

MATERIAL AND METHODS

Between 2018 and 2020, a qualitative approach was adopted to investigate the social and emotional development of children attending various Early Childhood Care and Education (ECCE) centers in both rural and urban regions of Dharwad taluk. The study utilized naturalistic observation to systematically document, analyze, and evaluate the effects of play-based activities on children's social and emotional development. Observations were made during children's free play sessions, employing video recordings, participant observation, and thorough field notes for comprehensive analysis.

Selection of ECCE centers:

The process of selecting ECCE centers included sampling from eight anganwadis and two preschools in the rural areas of Dharwad taluk, in addition to six anganwadis and six preschools in urban settings. These centers were visited to evaluate the social and emotional activities conducted within the ECCE framework. Subsequently, a self-developed checklist was created to assess and identify ECCE centers that employed analogous play-based activities. Figure 1 provides a visual representation of the social and emotional development activities.

Tool Description

The Transdisciplinary Play-Based Assessment-2 (TPBA-2), created by Linder in 2012, evaluates the social and emotional development of children aged 0 to 6 years across various domains. These domains include emotional expression, emotional style and adaptability, approach versus withdrawal behaviors, regulation of emotions and arousal states, behavioral regulation, self-perception, emotional themes in play, and social interactions.

The scoring system analyzes the play activities conducted among children, assessing their abilities on a scale from 1 to 9 in terms of social and emotional skills. Based on the scores obtained, children are classified into categories such as above average, typical, watch, and concern.

Score	Category
7-20	Concern
21-34	Watch
35-48	Typical
49-63	Above average

Early Childhood Environment Rating Scale-III (ECERS-III) developed by Harms and Clifford in 2014, serves as a tool for assessing the structural quality of preschool classrooms and the educational environment for young learners. The scale includes 35 items that delineate different quality levels in common early childhood education contexts.

The evaluation employs a 7-point Likert scale for scoring each item, with values ranging from 1 (representing inadequate quality) to 7 (representing excellent quality). The cumulative scores facilitate the classification of the educational environment in school.

RESULTS AND DISCUSSION

Percentage distribution of children attending different ECCE center of rural and urban areas

Table 1 presents the distribution of children attending different Early Childhood Care and Education (ECCE) centers, categorized by various child characteristics,

including age, gender, socio-economic status, and the quality of the home environment. In rural anganwadi centers, the predominant age group is 36-48 months, accounting for 38.46% of the children, followed by 32.69% in the 49–60-month group and 28.85% in the 61–72-month group. For preschool centers, the age distribution mirrors this, with 34.62% of children in the 36–48-month category, 32.69% in the 49–60-month category, and another 32.69% in the 61–72-month category. In urban anganwadi centers, 34.62% of children fall within the 36-48 month and 49–60-month age groups, while 30.76% are in the 61–72-month group. In urban preschools, the age distribution is 40.38% for 36-48 months, 32.69% for 49-60 months, and 26.93% for 61-72 months.

In rural anganwadis, the gender distribution of children revealed that 53.84 percent were girls, while 46.16 percent were boys. Conversely, in rural preschools, the situation was reversed, with 55.76 percent of children being boys and 44.24 percent being girls. In urban areas, a significant majority of children in anganwadis were girls, accounting for 59.62 percent, compared to 40.38 percent who were boys. In urban preschools, the gender ratio was more balanced, with 51.92 percent of children being boys and 48.08 percent being girls.

In terms of socio-economic status, a significant portion (53.84%) of children attending rural anganwadis are classified as belonging to a poor socio-economic background, while 46.16% fall into the lower middle category. Conversely, in preschools, 61.54% of children are categorized as upper

Categories	Score
Low teaching learning environment (LTLE)	35-105
Medium teaching learning environment (MTLE)	106-176
High teaching learning environment (HTLE)	177-245

middle class, with 38.46% identified as lower middle class. In urban areas, a majority (67.30%) of children in anganwadis are from the lower middle socio-economic group, whereas 32.70% are classified as poor. In preschools, 69.23% of children belong to the upper middle category, while 30.77% are in the lower middle category.

Influence of quality of ECCE environment on social and emotional development of children

According to the data in Table 2, the significant relationship between the quality of the teaching-learning environment and the social and emotional development of children in rural areas ($\chi^2 = 60.48$) at the 1 percent significance threshold.

The analysis revealed that among children in these rural environments, a substantial proportion (65.38%) who experienced a low-quality teaching-learning environment were categorized as “watch” in terms of their social and emotional development. Additionally, 34.62 percent were identified as being at a “concern” level, with no children from the low-quality environment classified as having a “typical” level of social and emotional development.

Within the cohort of children in a medium teaching and learning environment, most (69.23%) demonstrated typical social and emotional development, whereas 30.76% were identified as having watch levels of social and emotional development.

The quality of the teaching-learning environment in urban areas is significantly associated with the social and emotional development of children, as evidenced by a chi-square value of 32.39 at the 1 percent significance level. It was noted that among urban children, a large percentage from low-quality teaching-learning environments were

categorized as “watch” (59.62%) regarding their social and emotional development, with 26.92% falling into the “concern” category and 13.46% classified as typical.

Conversely, for children in a medium-quality teaching-learning environment, a majority (61.53%) were found to be at a typical level of social and emotional development, while 38.47% were categorized as “watch.”

A notable association was identified between the quality of Early Childhood Care and Education (ECCE) and the social and emotional development of preschoolers in both rural and urban settings. It was observed that all anganwadis operated within a low-quality teaching and learning environment, while preschools were categorized as having a medium-quality environment. Children in the low-quality settings were classified as being under “watch” and “concern,” with no children falling into the typical development category, indicating a significant association. The most critical factor influencing this outcome was the appropriate teacher-child ratio of 1:15, along with sufficient space for both indoor and outdoor activities that facilitate play-based group interactions.

A significant change was noticed in the social and emotional development of children attending anganwadis compared to those in preschools. Anganwadis were found to have inferior furnishings, restricted space for activities, and a lack of adequate equipment and play materials as compared to preschools.

According to Gialamas *et al.*, (2014), there was a correlation between higher quality relationships and a decrease in both internalizing and externalizing behavioral problems. The nature of child care activities and the attributes of care providers or programs were found to influence children’s social and emotional growth.

Similarly, Peisner-Feinberg (2001) demonstrated that child-care quality has a modest but lasting effect on children's cognitive, social, and emotional development, at least through the kindergarten years. The practices observed in classrooms were linked to children's language and academic performance, while the quality of the teacher-child relationship was related with cognitive and social skills, particularly the latter. Additionally, the study noted that family characteristics could moderate some outcomes, stating that the benefits of high-quality child care are more pronounced for certain children.

According to the findings in Table 3, children in medium teaching-learning environment centers demonstrated significantly higher scores in social and emotional development, averaging 36.13, in contrast to those from low teaching-learning environments, who scored 22.04 in rural areas and 26.38 in urban areas.

Preschools offered a safe and clean environment, along with a physically

stimulating and cognitively enriching atmosphere. They maintained smaller group sizes and focused on sensitive, child-directed activities. Teachers in preschools cultivated positive relationships, engaged in responsive conversations, and encouraged group play. The use of corner play, dollhouses, and various themes facilitated children's learning of social skills through sharing and cooperation.

The results in table 4 illustrates that there are significant differences in the social and emotional development of children, influenced by the quality of the Early Childhood Care and Education (ECCE) environment in both rural and urban contexts. The analysis highlights key areas of difference, including emotional expression, emotional adaptability, emotion regulation, arousal states, behavioral regulation, self-identity, emotional themes in play, and social interaction. Notably, children in medium-quality teaching and learning environments scored higher mean values than their peers in low-quality settings, with scores of 5.23 for emotional expression, 5.19 for

Table 1 Demographic characteristics of anganwadi and preschool children in rural and urban areas

Child characteristics	Categories	Rural (n=104)		Urban (n=104)	
		Anganwadi	Preschool	Anganwadi	Preschool
Age (months)	36-48	20 (38.46)	18 (34.62)	18 (34.62)	21 (40.38)
	49-60	17 (32.69)	17 (32.69)	18 (34.62)	17 (32.69)
	61-72	15 (28.85)	17 (32.69)	16 (30.76)	14 (26.93)
	Total	52 (100)	52 (100)	52 (100)	52 (100)
Gender	Boys	24 (46.16)	29 (55.76)	21 (40.38)	27 (51.92)
	Girls	28 (53.84)	23 (44.24)	31 (59.62)	25 (48.08)
	Total	52 (100)	52 (100)	52 (100)	52 (100)
SES	Upper high	-	-	-	-
	High	-	-	-	-
	Upper middle	-	32 (61.54)	-	36 (69.23)
	Lower middle	24 (46.16)	20 (38.46)	35 (67.30)	16 (30.77)
	Poor	28 (53.84)	-	17 (32.70)	-
	Very poor	-	-	-	-
	Total	52 (100)	52 (100)	52 (100)	52 (100)

Fig 1 Activities for social and emotional development

Activities	Rural						Urban					
	School 1		School 2		School 3		School 4		School 5		School 6	
	Daily	Weekly	Daily	Weekly	Daily	Weekly	Daily	Weekly	Daily	Weekly	Daily	Weekly
Rhymes	YES		YES		YES		YES		YES		YES	
Informal talk	YES		YES		YES		YES		YES		YES	
Dance		YES		YES		YES		YES		YES		YES
Story telling		YES		YES		YES		YES		YES		YES
Story book reading				YES				YES				YES
Drawing				YES				YES				YES
Painting				YES				YES				YES
Arts and crafts				YES				YES				YES
Passing the ball			YES				YES			YES		YES
Circle time		Yes		YES		Yes		YES		Yes		YES
Dramatic play	-	-	-	-	-	-	-	-	-	-	-	-
Play dough	-	-	-	-	-	-	-	-	-	-	-	-
Sharing the news	-	-	-	-	-	-	-	-	-	-	-	-
Science activities	-	-	-	-	-	-	-	-	-	-	-	-
Theme based play	-	-	-	-	-	-	-	-	-	-	-	-
Total	05		10		05		10		05		10	
											05	
											10	

Table 2 Association of between social and emotional development of children by quality of ECCE centers N=208

Categories of social and emotional development	Rural (104)		Modified χ^2	Urban (104)		Modified χ^2
	Low teaching learning environment	Medium teaching learning environment		w teaching learning environment	Medium teaching learning environment	
Typical (Average)	-	36 (69.23)	60.48**		32 (61.53)	32.39**
Watch (Below Average)	34 (65.38)	16 (30.76)		38 (73.08)	20 (38.47)	
Concern (Poor)	18 (34.62)	-		14 (26.92)	-	
Total	52 (100)	52 (100)		52 (100)	52 (100)	

Figure in parentheses indicates percentage

**Significant at 0.01 level

Table 3 Comparison of mean scores of social and emotional development of children by quality of ECCE environment in rural and urban areas

Locality	Type of ECCE centre	Mean $\pm$ S D	t-Value
Rural	Low teaching learning environment	22.04 $\pm$ 3.44	18.844**
	Medium teaching learning environment	36.13 $\pm$ 4.14	
Urban	Low teaching learning environment	26.38 $\pm$ 6.42	9.194**
	Medium teaching learning environment	36.13 $\pm$ 4.14	

**Significant at 0.01 level

Table 3 Comparison of mean scores of domains of social and emotional development of children by quality of ECCE environment in rural and urban areas
N=208

Domains of social and emotional development	Rural			Urban		
	Low teaching learning environment Mean $\pm$ S. D	Medium teaching learning environment Mean $\pm$ S. D	t-value	Low teaching learning environment Mean $\pm$ S. D	Medium teaching learning environment Mean $\pm$ S. D	t-value
Emotional expression	3.09 $\pm$ 0.77	5.23 $\pm$ 0.87	13.16**	3.76 $\pm$ 0.94	5.28 $\pm$ 0.87	8.19**
Emotional style/ adaptability	2.92 $\pm$ 0.62	5.19 $\pm$ 0.97	14.19**	3.61 $\pm$ 1.08	5.29 $\pm$ 0.97	7.80**
Regulations of emotions and arousal states	3.11 $\pm$ 0.61	5.15 $\pm$ 0.99	12.54**	3.75 $\pm$ 0.83	5.25 $\pm$ 0.99	7.77**
Behavioral Regulation	3.19 $\pm$ 0.56	5.19 $\pm$ 0.86	13.99**	3.80 $\pm$ 0.92	5.31 $\pm$ 0.86	7.86**
Sense of Self	3.00 $\pm$ 0.65	4.90 $\pm$ 0.77	13.52**	3.73 $\pm$ 1.01	4.89 $\pm$ 0.77	6.64**
Emotional Themes in Play	3.00 $\pm$ 0.56	5.00 $\pm$ 0.65	16.70**	3.55 $\pm$ 1.16	5.05 $\pm$ 0.65	7.79**
Social interaction	3.71 $\pm$ 1.03	5.46 $\pm$ 0.93	9.03**	4.15 $\pm$ 1.25	5.65 $\pm$ 0.93	6.00**

*Significant at 0.01 level

emotional adaptability, 5.15 for regulation of emotions and arousal states, 5.19 for behavioral regulation, 4.90 for sense of self, 5.00 for emotional themes in play, and 5.46 for social interaction.

The analysis conducted in urban environment demonstrated that children attending medium-quality teaching and learning centers had significantly higher mean scores compared to those in low-quality centers in several areas of social and emotional development. The specific mean scores recorded were: emotional expression (5.28), emotional adaptability (5.29), regulation of emotions and arousal states (5.25), behavioral regulation (5.31), sense of self (4.89), emotional themes in play (5.05), and social interaction (5.65).

The findings align with the research conducted by Broekhuizen *et al.*, (2016), which revealed that children in pre-kindergarten and kindergarten who experienced elevated levels of emotional and organizational quality in the classroom exhibited enhanced social skills and fewer behavioral problems in both kindergarten and first grade compared to their peers who did not experience such high-quality classroom environments.

The results of a different study resonate with those of Diazgranados *et al.*, (2016), which revealed that children in high-quality preschools experienced greater benefits in social and emotional skills compared to their non-preschool counterparts, with significant growth observed over time.

Similarly, Brinkman *et al.*, (2016) found a strong connection between the ECCE environment and the domain of social competence, noting that a favorable student-to-staff ratio had a significant impact on social and emotional development.

CONCLUSIONS

The research established a significant relationship between the quality of the ECCE environment and the social and emotional development of children across both rural and urban areas, with a significance level of 0.01. A clear difference was noted between medium and low teaching-learning environments. All anganwadis were found to fall under the low teaching-learning category, while preschools were classified as medium. In the low teaching-learning environment, 65.38 percent of children were categorized as “watch,” and 34.62 percent as “concern,” with no children identified as typical, demonstrating a significant association.

REFERENCES

- Brinkman, S. A., Hasan, A., Jung, H., Kinnell, A., Nakajima, N. and Pradhan, M., 2016. The role of preschool quality in promoting child development: evidence from rural Indonesia. *European Early Childhood Education Research Journal*.25(4): 483-505
- Broekhuizen, M. L., Mokrova, I. L., Burchinal, M. R. and Garrett-Peters, P. T., 2016. Classroom quality at pre-kindergarten and kindergarten and children's social skills and behavior problems. *Early Childhood Research Quarterly*.36(1): 212-222
- Diazgranados, S., Borisova, I. and Sarker, T., 2016. Does attending an enhanced-quality preschool have an effect on the emergent literacy, emergent math, social skills and knowledge of health, hygiene, nutrition and safety of young children? evidence from a quasi-experiment with two control groups in Bangladesh. *Journal of Human Development and Capabilities*.17(4): 494-515
- Dunlap, L. 2020. *The early childhood education handbook*. Routledge. 48 (2)
- Freeman, N. 2019. *Quality in early childhood education*. Teachers College Press. 50 (1)
- Gialamas, A., Mittinty, M. N., Sawyer, M. G., Zubrick, S. R. and Lynch, J., 2014. Child care quality and children's cognitive and socio-emotional development: an Australian longitudinal study. *Early Child Development and Care*.184(7): 977-997
- Linder, T., 2012, *Transdisciplinary play based assessment and intervention in the primary years*. Wiley publishing company, New Jersey, United States. pp.123-141
- Peisner-Feinberg., 2001. The relation of preschool child-care quality to children's cognitive and social developmental trajectories through second grade. *Child Development*.72(5):1534-53.

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