

Maternal Support Systems and Maternal Cognition: Determinants of Cognitive Development of Young Children

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ABSTRACT The aim of the present study was to examine the impact of maternal support networks and maternal cognition on young children's cognitive development. Pre-school children ($n = 30$) and their mothers constituted the sample. The instruments used were self-structured social network list, adapted Analogous Instrument (Ladd and Price, 1986) and McCarthy Scale of Children's Abilities. The results indicated that maternal support systems and maternal cognition played positive role in developing cognitive abilities in children. Mothers with high cognition had children with average and above average cognitive abilities. It was also observed that majority of mothers with wide support systems had high cognition and mothers with small support systems had poor cognition. Maternal support system may indirectly influence children's cognitive abilities. Thus, results reveal that these systems may influence maternal cognition which in turn may help to improve cognitive abilities of children. Mothers get new information and knowledge about child rearing practices from neighbourhood, grandparents and early childhood teachers. Among all maternal support systems like neighbours, grandparents, hired aide and preschools, the most influential is preschool. This study has implications for early childhood teachers and field functionaries.

"Child shows the man, as the morning shows the day". Children are the world's greatest and most precious resource. They are sure future of nation or community. The instance the child comes to the earth when the umbilical cord is being cut and he comes out of womb. Then, he is entirely dependent upon his mother. At the age of two years, he begins to interact with the environment. This period begins at the age of two, is prescribed period which constitute a crucial period of an individual's life. It is necessary to give him/her stimulation and encouragement by parents as well as teachers to learn at this stage, because a strong foundation holds a strong building. According to Piaget, these years are considered as pre-operational stage of cognitive development and it lasts from about the age of

two to six or seven years. Cognition is perception, sensation and knowledge of various things around the child. All societies want their children to develop properly the knowledge and abilities, they would require as adults. Whereas cognitive development is the natural flowering of the child's persona, education has been described as deliberate process aimed at creating social changes in the child. Besides, heredity or inborn cognition many and more factors affect it, environment is one of them. There are so many things, living as well as non-living in environment which stimulates learning in children. As soon as he interacts with more and more persons, his cognitive abilities are improved. Mother is one who lives around the child most of the time.

It is a well known fact that maternal cognition is related to child's cognitive as well as social development. Mother is the child's first teacher. Many more hours of the child is spent at home with mother and she knows her child better than anyone else could ever get to know about him. Educated mothers feel less difficulty in child rearing. But, sometimes informal education of mother proved to be more useful in child rearing skills compared to those who have formal education but not aware of parenting roles. The mothers who are aware of child rearing practices, they are known as mothers with high cognition and *vice-versa*. For instance, if mother is well educated, she may feel less difficulties with rearing of children.

Being a mother, parenting is not an easy role. Sullivan and Thompson (1990) stated that in terms of recent changes a major development has been the changing role of women and men. Women have been encouraged to pursue employment outside the home. But women are still larger and solely responsible for child care. So,

many mothers need help to become effective caregivers. Larger the support system of the mother, the better the care of the child. Goodnow et al. (1990) found network support related with maternal attitudes, beliefs, or feelings regarding parenting and children's development.

An attempt has been made to see the impact of maternal support networks, and maternal cognition on the young child's cognitive development.

An effort has been made to prove the Null Hypothesis

- (a) Maternal Support systems do not have any positive effect on maternal cognition.
- (b) Maternal cognition is not directly related with child's cognition.
- (c) There is no relation between maternal support networks and child's cognition.

MATERIAL AND METHODS

Locale of Study and Sample Size: The study was conducted at Hisar city. The sample size was 30 children taken from two different preschools and their mothers (30) were also interviewed to see the effect of their support systems and cognition on children's abilities. The data were collected through door to door survey with the help of following tools.

Tools

Cognitive Abilities of Children: The cognitive abilities of children were tested with McCarthy Scales of Children's Ability. The categories were Above Average, Average and Below Average on the basis of scores obtained by children.

Maternal Cognition: The mothers who felt less difficulty in child rearing or parenting roles were having good cognitive abilities. They were interviewed for perceived difficulty at parenting tasks with the help of checklist of these tasks adapted from an analogous instrument developed by Ladd and Price (1986). The categories on the basis of difficulty felt in performing roles like helping children in studies, puzzles, other cognitive tasks were mothers who felt more difficulty, less difficulty and no difficulty.

Maternal Support Systems: The mothers

were also interviewed to know the size and quality of their support system by using a self structured list which contained qualities of support. The list was pretested on ten mothers of other preschoolers and necessary modifications were made and screened by a group of five penalists.

Data Analysis: Descriptive analysis was done and correlation coefficient was also found to draw valid inferences from the data.

RESULTS AND DISCUSSION

Effect of Maternal Support Systems on Maternal Cognition: Maternal support systems had positive effect on maternal cognition as the correlation coefficient was 0.96.* The mothers were seeking support from neighbours, schools grandparents and many other parent surrogates; Descriptive analysis was also done to see the impact of maternal support systems on maternal cognition (Table 1).

Table 1: Effect of size of maternal support system on maternal cognition

Maternal cognition	Maternal Support System			
	Small	Medium	Large	Total
More difficulty	9 (69.2)	3 (27.2)	1 (16.6)	13
Less difficulty	2 (15.3)	5 (15.4)	1 (16.6)	8
No difficulty	2 (15.3)	3 (27.2)	4 (67.0)	9
Total	13	11	6	30

Figures in parentheses denote the percentages $r = 0.96^*$

Table 1 reveals that majority of the mothers with large support systems had high cognition (67%) whereas majority of the mothers with small support systems had poor cognition (69%). Besides support in child rearing, mothers got much more new information knowledge and sometimes they seek advice for their children which resulted in good cognition. Dentrech et al. (1988) supported that with good social support systems, women sought information in anticipation of new things and used it to construct identities incorporating motherhood and child care. Even if the mother is a housewife, she can seek information from various networks like neighbours, teachers of her child, friends and relatives.

Effect of Maternal Cognition on Child's Cognition: Maternal cognition also had positive

relation with child's cognition i.e. 0.95*. How the mother performs her role as a parent caregiver and what difficulties she feels in child rearing is the outcome of her cognitive abilities in this regard.

Table 2: Effect of maternal cognition on child's cognition

Child's cognition	Maternal Cognition			Total
	Much difficulty	Less difficulty	No difficulty	
Below Average	8 (62)	3 (37.5)	-	11
Average	5 (38)	2 (25.0)	3 (33)	10
Above Average	-	3 (37.5)	6 (67)	9
Total	13	8	9	30

Figures given in parentheses denote the percentages, $r = 0.95^*$

Table 2 reveals that the majority of mothers with high cognition had children with high cognitive abilities (67%) whereas the majority of mothers with poor cognition had children who were below average in their cognitive abilities. Caldwell (1970) studied that organisation of home environment, provision of appropriate play materials and maternal involvement are related to child's development.

Thus it is clear that mother plays a vital role in upbringing of child. It is the responsibility and duty of the mother to rear the child in a good and healthy manner and her cognitive abilities help her to perform much better.

Effects of Maternal Support Systems on Child's Development: There was positive relation i.e. 0.92* between maternal support system and children's cognition. Larger networks may directly or indirectly expose children to the cognitively rich environment when children are

Table 3: Effect of size of maternal support system on child's cognition

Child's cognition	Maternal Support System			Total
	Small	Medium	Large	
Below Average	5 (38.4)	4 (36.3)	2 (33.3)	11
Average	5 (38.4)	4 (36.3)	1 (16.6)	10
Above Average	3 (23.0)	3 (27.2)	3 (50.0)	9
Total	13	11	6	30

Figures in the parentheses show the percentages $r = 0.92^*$

experiencing some difficulties, parents may turn more frequently to network contacts for support.

The table 3 reveals that almost half of the mothers with large support system had their children's cognition in above average category and majority of mothers with small support systems i.e. 38.4 per cent had children in average and 38.4 per cent were in below average category. Brassard et al. (1989) investigated that maternal support networks directly provide children with cognitive and social stimulation through the opportunity to observe social models and participate in diverse social relations.

Effect of Quality of Support Networks on Mothers: The table 4 shows that all the mothers seek support from preschools, 57 per cent mothers go to neighbours for help, only 20 per cent mothers seek support from grandparents of children and there was no mother who took help from hired aide.

Table 4: Frequency of mothers seeking support from various support systems

Maternal Support System	Seeks Support	Does not seek support
Preschools	30 (100)	-
Neighbours	17 (57)	13 (43)
Grandparents	6 (20)	24 (80)
Maids	-	30 (100)

Figures in the parenthesis denote percentages

The table 5 indicates the level of satisfaction of mothers from various support systems. The quality of support system was assessed in terms of level of satisfaction achieved by mothers whereas the satisfaction was measured in terms of the help these networks provide the mothers and their children with their direct or indirect effect on mother's as well as children's cognitive abilities.

The results show that among all the support

Table 5: Level of satisfaction achieved by various support system

Level of satisfaction	Support systems		
	Preschools	Grandparents	Neighbours
	(30)	(6)	(17)
Satisfied	22 (73.3)	4 (67)	11 (65)
Dissatisfied	8 (26.6)	2 (33)	6 (35)

Figures in parentheses denote percentages

networks, mothers achieved maximum satisfaction (73.3%) from preschools. Hence, the null hypothesis was rejected.

Therefore, by concluding the discussions, it can be said that maternal support networks had positive effect on maternal cognition which in turn influenced the children's cognitive abilities. The size of maternal support systems also affected the children's development directly or indirectly. Among all the networks, preschools proved to be most influential, as majority of the mothers were satisfied by the quality.

In the present era of technological advancements, it has become a dire need to upbringing the valuable assets of our country. This can be done by imparting education to mothers as well as the caregivers of the children. Now-a-days, the culture of private schools is developing like mushrooms and this abrupt growing of such schools have declined the quality of schools. So there is a need for licencing only those preschools who fulfil the optimum requirements human and non-human resources and are having good quality. Mothers should also be made aware of support systems and their role in improving child rearing practices. The awareness can be created by homescientists by teaching rural as well as urban uneducated masses. They can help the parents in improving their role in child development and encourage the community participa-

tion in the preschool education. The parents of these preschoolers should be made aware of the help they can provide to the schools. Even the uneducated and poor parents can make contribution in preschools by using their varied talents. The extension workers as well as child development personnels can persuade the parents to seek support from various referral systems through home visits, surveillance and counseling method.

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