

**Classroom Culture
and
Positive Attributes of Children

A Comparative Analysis**

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THE BASELINE AND THE INTERVENTIONS STUDY : A COMPARATIVE ANALYSIS OF POSITIVE ATTRIBUTES OF CHILDREN AND CLASSROOM CULTURE

A study of positive attributes of children and classroom culture was made at two points of time in five government schools in Jaipur. The first was Baseline study conducted prior to the intervention by Boder (1996), and the second after two years of the Bodh programme (1997). The report on 'Classroom Culture and Positive Attributes of Children: Unfolding the Processes of Development' (November 1996) presents the Baseline study. The present report is a comparative analysis of data at the two points of time, the baseline and the early period of Intervention. Data clearly reveal distinct patterns of development of positive attributes of children in qualitatively different classroom culture environment.¹

Children's Observations

Children's Observations were divided into four categories² - positive attributes of children's development, children's response to pedagogic practices, the nature of classroom management and children's response to management practices. As can be seen in Table 1, children's responses to pedagogic practices comprise around 50 to 60 percent of the observations of children in the two studies. These include activities that are related to learning as well as those that are unrelated to learning. The proportion of children's observations that are unrelated to learning are significantly higher (38 percent) in the Baseline as compared to the Bodh classrooms (24 percent). However, the proportion of observations that are related to learning are around the same in both classrooms. This is mainly because a significantly large number of observations that are related to learning in the Bodh classroom also reflect positive attributes among children. In accordance with the methodology of using only mutually exclusive categories, observations related to learning which predominantly reflect positive attributes of children have been include in the latter category.

Table (1) : Children's Observations (%)

	Baseline N = 1586	Baseline N = 2088
Positive Attributes of Children's Development	16	38
Response to Pedagogic Practices	60	50
(a) activities related to learning	22	25
(b) activities unrelated to learning	38	24
Classroom Management	07	04
(a) negative strategies	07	00**
(b) positive strategies*	---	04
Children's Response to Management Practices	17	08
(a) fear, escape, doubt	06	00**
(b) positive emotions*	---	04
(c) response to teacher expectations	11	04
Total	100	100

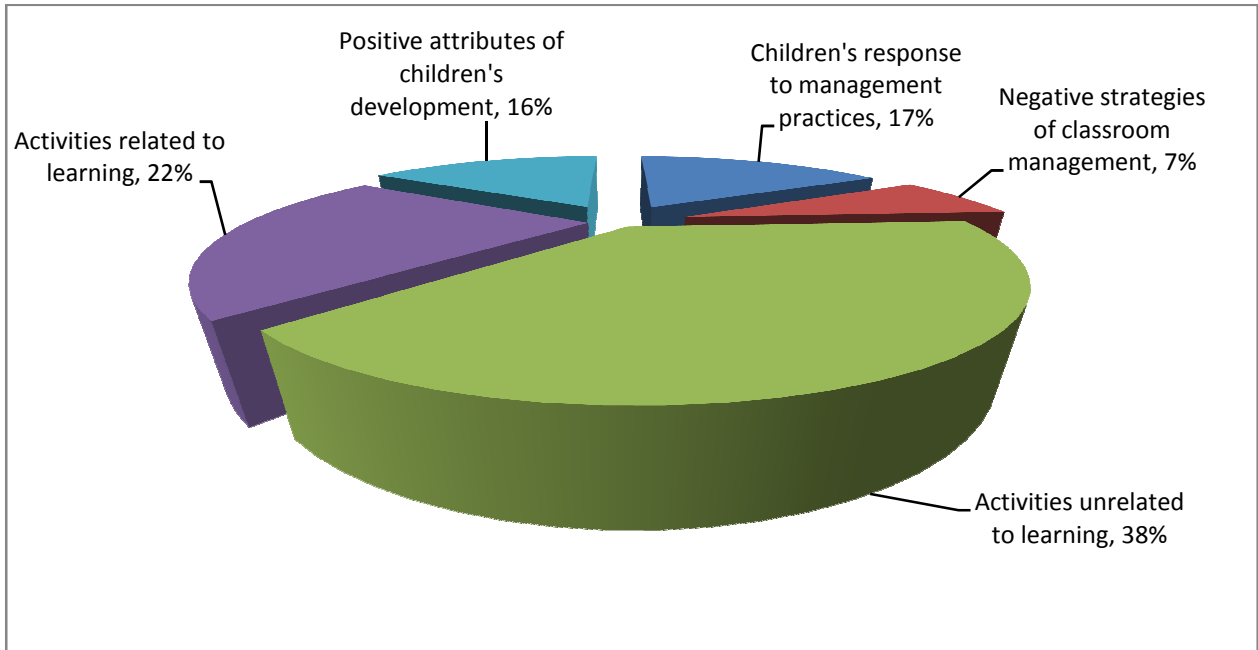
Source : Children's Observations : Baseline and Intervention Study.

** Instances of negative strategies of management (physical punishment) and children's responses to pedagogic practices (fear, escape and doubt) are both 0.4 percent and hence have been rounded off to 0.

* These are categories that have emerged out of the data from Both Classroom.

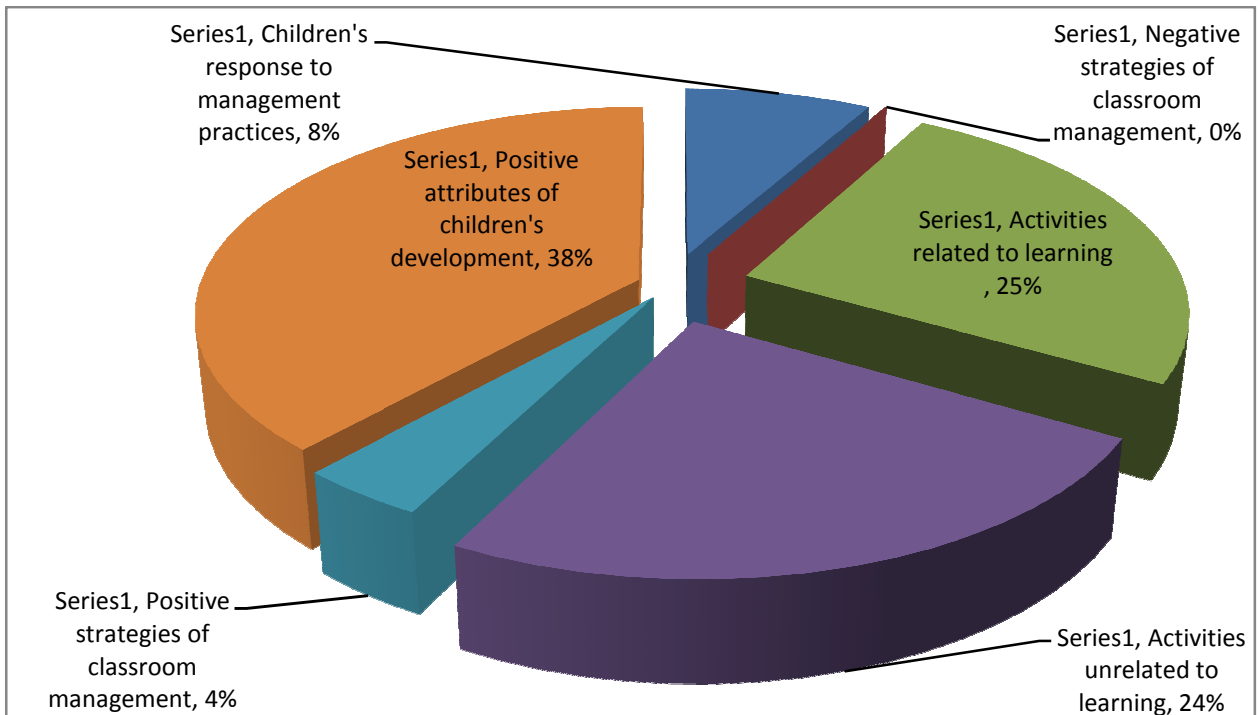
Children's Observations (%)

Baseline N = 1586



Children's Observations (%)

Both N = 2088



A striking difference is observed in the proportion of positive attributes in the two studies (Table 1). While in the Baseline study positive attributes account for a mere no percent of children's observations, in the Intervention study these account for as much as 38 percent of the total observations. These following aspects need to be highlighted. The quality of positive attributes of children differ in the two studies Baseline and Intervention. These are reflected in the subcategories within each positive attribute (See Appendix 1). For instance in the Baseline study, any attempt by the child to offer to perform a classroom task was classified under the category of curiosity and initiative and accounted for 4 percent of the total observations of positive attributes. In the Intervention study children were seen to take initiative in answering teachers' questions, showing their work to teacher and making suggestions for classroom activity and expressing curiosity. These observations which fall in the category of curiosity and initiative account or 17 percent of the total observations of positive attributes in the Interventions study.

Positive Attributes : Curiosity And Initiative	
Baseline :	“पाँच दहाई कौन बताएगा?” लौ लड़के-लड़कियाँ हाथ खड़ा करते हैं। (J2.3.11) तबस्सुम बोली “सर हम पडाएंगे” और खड़ी हो गई। (R2.3.19)
Intervention :	एक छात्रा, “दीदी जनवरी, फरवरी वाला खेल दुबारा खेलें”। (R2.5.13) छात्रा, दीदी कूदने की जगह मेंढक की तरह फुदकना लिखे दो। (R2.5.13)

In the Intervention study, children asking questions, seeking and giving clarification as well as making spontaneous remarks relating to learning were identified as attributes of articulation and questioning. On the other hand, "clarifications usually mechanical and 'algorithmic' in nature were taken as reflections of articulation and questioning in the Baseline study".³

Positive Attributes : Articulation and Questioning	
Baseline :	‘लिख लिया मास्टर साब, एक लड़का। अगली संख्या पर यही लड़का बोलता है, “कितने मास्टर साब”।(J2.3.18) अब सर संख्या बोलते है, बच्चे लिखते हैं ‘4046’ एक संख्या बच्चा दोहराकर बोलता है, “मास्टर साब छिचालीस न”। (J2.3.18)
Intervention :	एक विद्यार्थी, “दीदी, थैला भी पेड से मिलता है”। (K2.5.12) एक छात्रा,“ दीदी, हमारे यहाँ एक कम्पाउंडर है वो नीम की पत्तियाँ तोड़ता है। (K2.5.12)

It is important to note that positive attributes in the Baseline study related largely to instances that were no essentially part of classroom learning. Typical instance of co-operation and sharing were of children sharing pencils, rubbers etc. The Bodh classroom reflected many instances of shared learning. Peer learning emerged as an essential part of a co-operative classroom structure evolved by Bodh. Children were observed to learn in groups, discussing and sharing their knowledge and ideas. This facilitates a positive learning environment.

Positive Attributes : Cooperation and Sharing	
Baseline :	एक लड़के ने अपनी रबर मुँह से काटकर दूसरे को दी। (D2,3.9) एक लड़की एक लड़के को पेंसिल देती है। (D.2.3.18)
Intervention :	तीन-चार बच्चियाँ कौन-सी संख्या कम व कौनसी ज्यादा, इस पर बातचीत कर रहे हैं। (J2.2.14) दो-तीन बच्चे मिलकर सवाल हल कर रहे हैं। (J2.5.16)

Classroom management practices account for a small proportion, 4-7 percent of children's observations (Table 1). The Baseline observations within this category are in the nature of negative classroom management strategies such as discipline through physical punishment. In the Intervention study instances of physical punishment were negligible. The Bodh classroom appears to use positive strategies of management. Management in Bodh classroom was mainly by making children aware of norms and rules, through conflict resolution and so on. These were hence included as positive strategies of classroom management. What was also important was the nature of children's response to management practices. While fear, escape or self doubt were observed among children in the Baseline study, classrooms, Bodh children responded to classroom management practices with positive emotions.

Classroom Management Strategies	
Baseline :	Negative Strategies एक अन्य लड़के को 'अमरम' लिखने को कहते हैं। वह सही नहीं लिख पाता। दो लड़कियों को बताने के लिए मारते हैं और उस लड़के को बाहर कर देते हैं। (J2.3.1) टीचर ने कान खींचकर थप्पड़ मारे। दो लड़की + दो लड़के + दो लड़के + दो लड़के + दो लड़की। कारण चार के पास बुक नहीं। दो बातें कर रहीं हैं, दो इधर-उधर देख रहे हैं। (R2.3.11)
Intervention :	Positive Strategies अध्यापिका, "चलो सामान इकट्ठा करो"। (R2.5.20) अध्यापक, (ऊंट समूह को) "अरे बात मत करो।" (R2.5.10)

In quantitative terms the Baseline study classrooms and the Bodh classroom differ in terms of the amount of teaching and learning and the development of positive attributes among children. However, what is important is that the two contexts appear to reflect qualitatively different learning environments as well. The nature of frequency of positive attributes, their intermeshing with learning activities as well as strategies of management in Bodh classroom are indicative of a positive learning environment.

Children's Activities

As mentioned in the Baseline study, children were given a number of activities in order to understand the extent of creativity and diversity in children's expressions. The activities included problem solving, free drawing, line drawing as well as rhyming.⁴

Childrens performance on problem solving in the Baseline and Bodh classrooms in given in Table 2. As can be seen Baseline Study children and Bodh Children differ mainly in terms of the proportion of children who cannot comprehend the task given to them. Only 17 percent of Bodh as compared to 24 percent of the Baseline Study children cannot comprehend the given task. This indicates that Bodh has been able to bring a relatively larger number of children within the fold of learning. This is likely to facilitate success in formal schooling for a greater number of children.

Table (2) : Children's Performance on Problem Solving Activities (%)

Categories of Children's Response	Baseline N=1586	Bodh N = 2088
cannot comprehend	24	17
cannot solve	22	27
solved as required	54	56
Total	100	100
Source : Problem Solving Activity : Baseline and Intervention Study.		

Drawing as an activity is a significant indicator of children's expressions. Children's free drawing in the Baseline and Intervention study in terms of the items drawn in represented in Table 3. There appears to be a higher tendency among Bodh children to draw 'natural' items which account for 39 percent of drawings from the Intervention study as compared to 13 percent in the Baseline study. Also the number of items drawn on a single sheet are many more in the drawings made by Bodh children.

Table (3) : Children's Free Drawings (%)

Items Drawn	Baseline N = 297	Bodh N = 400
Flower/Plant	28	09
Natural Things	13	39
Design	03	07
House	16	17
Figure	21	13
Flag	06	01
Objects/Others	14	14
Total	100	100
Source : Free Drawing Activity. Baseline and Intervention Study		

Free drawings have been analysed in terms of movement, number of ideas and details. As can be seen in Table 4 drawings by Bodh children are more dynamic in nature (37 percent) as compared to those by Baseline study children (07 percent). Even in terms of the number of ideas (Table 5), Bodh children's drawings reveal greater diversity and creativity. As many as 71 percent of drawings by Bodh children depict more than two ideas as compared to 48 percent of drawings by children in the Baseline study (Table 6). Drawings of Bodh children thus project a dynamism both in idea and expression.

Table (4) : Characteristics of Free Drawing (%)

Categories of Drawings	Baseline N = 125	Bodh N - 101
Dynamic	07	37
Static	93	63
Source : Free Drawing Activity : Baseline and Intervention Study.		

Table (5) : Number of Ideas In free Drawing (%)

No. of Ideas	Baseline N = 125	Bodh N - 101
One	27	08
Two	25	21
> Two	48	71
Source : Free Drawing Activity : Baseline and Intervention Study.		

Table (6) Details in Free Drawing (%)

Rating on Details	Baseline N = 125	Bodh N - 101
1 and 2	77	76
3 and 4	23	24
Source : Free Drawing Activity : Baseline and Intervention Study.		

For the line drawing activity, the Baseline study children were given a number of abstract lines, curves and a enclosed figure. The Bodh children were given only stwo kinds of lines. Give this difference in the tasks in both studies, the results may not be strictly comparable. However, data indicates that bodh children have drawn a far greater variety of things as compared to the Baseline study children despite the fact that the former were gives only two kinds of lines. A comparison of children's drawings in the Intervention and Baseline study suggests that there is greater opportunity and scope for self expression for the Bodh children, in this case, through the medium of drawing in the classroom.

A number of issues were raised in the Baseline study report (1996) in relation to the importance of problem solving and drawing as tasks that encourage divergent thinking, creativity and self expression among children. A comparison of children's activities in the Baseline and Bodh study suggests the following:

PROBLEM SOLVING

Curriculum

- Problem solving tasks allow for creative and divergent thinking among children. There is need to consciously structure such activities within the primary school curriculum to create this space for children.
- Teachers need to understand that the nature of the task itself can set limits to possibilities for divergent thinking. Hence, the kind of tasks given to children has significant pedagogic implications for primary schooling. However the Bodh study clearly suggests that children naturally innovate. When provided with opportunities their natural capacity to create and innovate unfolds to a greater extent than what manifests in the daily routine of classroom learning.
- It is important to strengthen the base of learning among children. This is firstly in terms of enhancing abilities of comprehension and communication which in themselves lay the foundation for further learning. There is also need to democratise learning thereby bringing within the ambit of classroom instruction all pupils rather than a select few.

Pedagogy and Evaluation

- Classroom pedagogy as well as evaluation must necessarily be based on the reality that children are at different stages of development and that they think divergently as well as innovatively.
- It is necessary hence necessary provide learning experiences for children to help them transit from one 'stage' of development to another and to allow for guided teaching and learning at the primary stage. There is need not only to appreciate and provide space for individual styles of learning, but it is also important that evaluation is redesigned to capture dynamic processes of learning. This is dealt with in greater detail in the report on cognitive Attainment : A glimpse of Process' 1997.

DRAWING

Curriculum

- Drawing is an activity that provides opportunities for creativity and self expression among children. It kindles and sustains their interest. It is hence important that drawing activities pervade that primary school curriculum by :
 - (a) specifically allocation time where children are given this important medium to express themselves facilitating the development of creativity and imagination. More important is the insight which this study provides about the role of drawing in school. Drawing must be treated as a medium of expression for the child rather than a skill to be taught and evaluated.
 - (b) using drawing as a visual medium to facilitate understanding and sustain interest among children in different subject areas.

Pedagogy

- Primary school teachers should be trained to understand the above mentioned functions of drawing in the primary school curriculum. For children, drawing should be viewed as a medium for individual self expression and in that sense should not be structured as a learning outcome.
- The use of drawing as an aid to teaching and learning of specific content areas must also be appreciated. It facilitates the visual representation of concepts, processes and interlinkages, and thereby aids understanding in specific subject areas.

Evaluation

- Evaluation that aims at setting mechanical standards of comparison between self expression of children or leads to standardization of outcomes defeats the very purpose of drawing at the stage of primary schooling. Drawing must encourage free expression which is critical for creativity and thereby the overall development of children.

CLASSROOM CULTURE

The culture of the classroom is the larger context in which teaching and learning takes place. It is an intricate web of action and interaction. It signifies the myriad details that constitute the day-to-day classroom lives of teachers and children. It is the tangible-intangible location of pedagogy. It is a dynamic unit difficult to capture in its fluidity of process and wealth of detail. At the outset it would be important to mention that while the Bodh classrooms reflected such a dynamism, the Baseline study classrooms were locations of more discrete and straight-jacketed situations of formal learning.

The Baseline study suggested that the relatively small magnitude of the development of positive attributes among children was not merely due to the lack of opportunity for the expression of such attributes but were integrally linked to a learning environment that constrained the overall development of children. Hence the significant development of positive attributes among the Bodh children as well as the nature of children's activities point to a qualitatively different learning environment as reflected in the culture of the classroom. This section discusses the culture of the Bodh classroom in terms of (a) pedagogic practices of teachers (b) children's response to pedagogic practices (c) classroom management and (d) teacher routine activities.

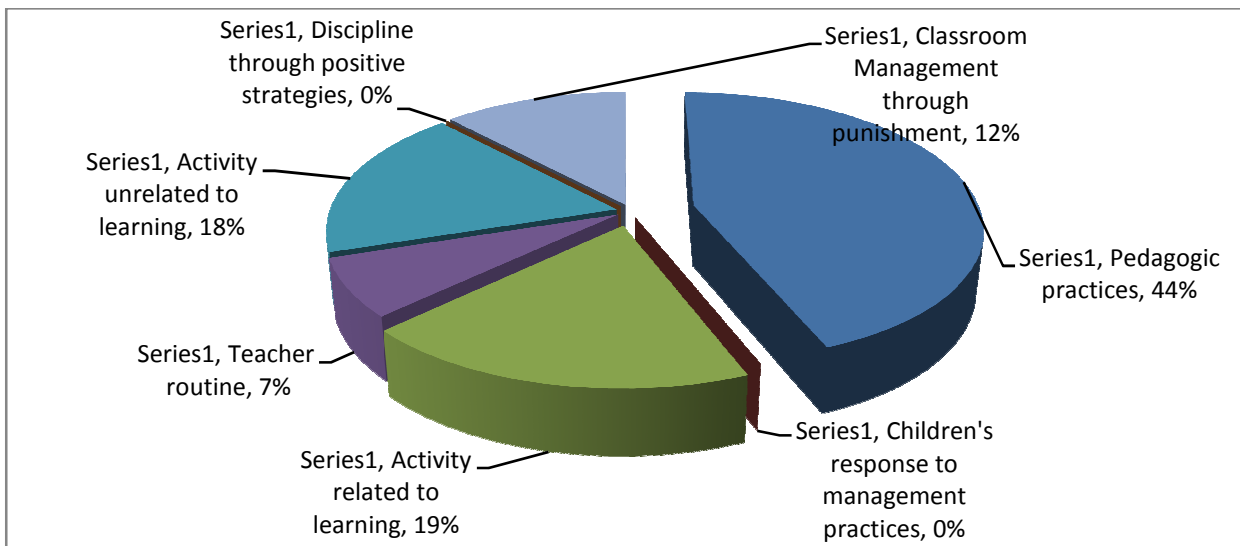
Table (7) : Classroom Culture Observations (%)

Categories of Observation	Baseline N = 1888	Bodh N = 2619
Pedagogic Practices	44	38
Children's response to Pedagogic Practices	37	43
(a) activity related to learning	19	33
(b) activity unrelated to learning	18	10
Classroom Management (discipline through punishment)	12	----
Discipline through positive strategies	---	08

Children's response to management practices	---	09
Teacher routine activities	07	02
Total	100	100
Source : Classroom Culture Observation : Baseline and Intervention Study.		

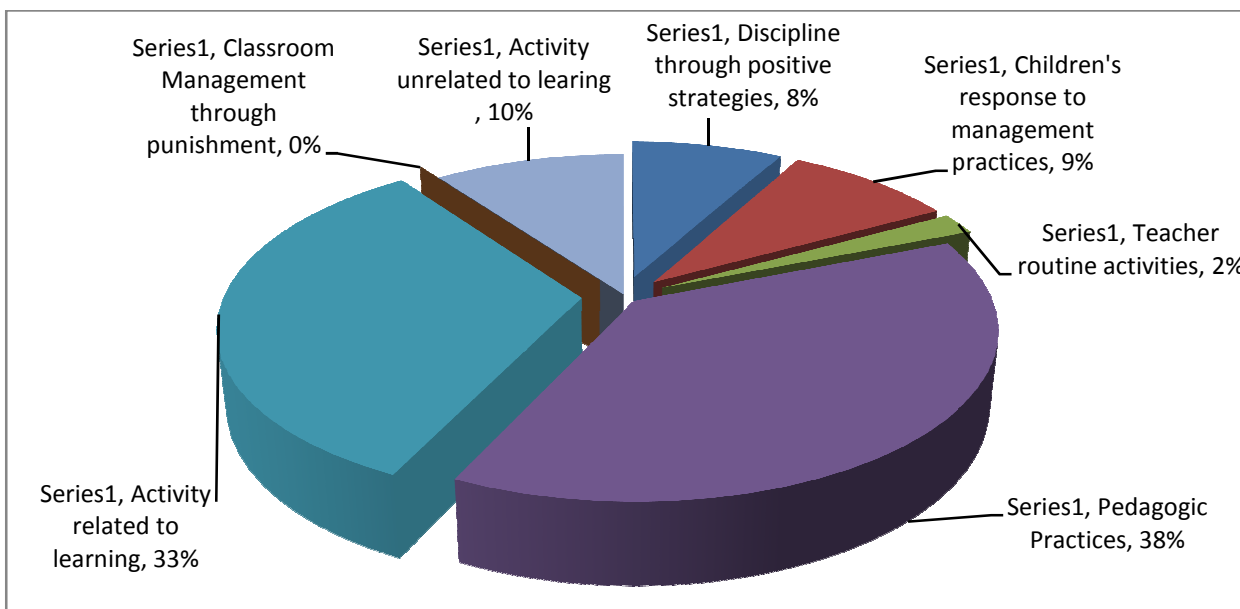
Classroom Culture observations (%)

Baseline N = 1888



Classroom Culture observations (%)

Bodh N = 2619



A glance at Table 7 suggests that the culture of the Bodh classroom differs from that of the Baseline study in a number of ways. Most significant is the difference in the magnitude as well as nature of children's response to pedagogic practices. Children's response comprise 43 percent of classroom culture observations in the Bodh study and 33 percent in the Baseline study. Whereas 33 percent of classroom culture observations relate to learning in the Bodh classroom this is true of only 19 percent of observation in the Baseline study. Activity which can be termed as unrelated to learning is

only very minimal (10 percent) in the Bodh classroom as compared to 18 percent in the Baseline study classroom.

It is also significant that the nature of classroom management differs qualitatively in the two classrooms. Whereas the Management of children in the Baseline study classroom appears to be primarily through physical punishment (12 percent of observations) such observations are virtually absent in the Bodh classroom. On the other hand, Bodh teachers seem to have evolved strategies of classroom management that create a positive environment and perhaps even point towards the development of self-discipline and control in children. This is reflected in the two new categories that relate to observations in the Bodh study data-discipline through positive strategies (08 percent) as well as children's response to management practices (09 percent). These are discussed in greater detail in the relevant sections.

It thus appears that the Bodh classroom projects a child-centered learning environment, one in which the teacher (pedagogic practices : 38 percent) and child (children's response to pedagogic practices through activities related to learning : 33 percent) form a dynamic unit of interactive teaching and learning. The Baseline study in contrast projects an obvious inclination towards a teacher-centered classroom (pedagogic practices 44 percent) wherein very few observations relate to children's learning (children's response to pedagogic practices that relate to learning : 19 percent).

PEDAGOGIC PRACTICES

Table 8 presents the type of pedagogic practices followed in the two classroom Results clearly reveal that the Baseline study classroom are dominated by a textbook oriented pedagogy. In this classroom, 23 percent of observations relate to reading aloud and completing lesson of the textbook and 29 percent relate to asking question from the text book. In contrast, the Bodh curriculum is transacted largely through activity (17 percent), by asking questions from personal experience (13 percent) and by facilitating learning through demonstration, responding to children's suggestions, attending to errors etc (38 percent). This activity-based pedagogy is discussed in detail in later section.

Table (8) : Pedagogic Practices (%)

Pedagogic Practices	Baseline N = 785	Bodh N = 988
Transacting Curriculum through the text book (read aloud/complete lesson)	23	06
Transacting curriculum through activity	---	17
Use of Blank Board	08	06
(a) for children to copy from (including book)	08	---
(b) as a teaching aid	---	06
Asking Questions	29	18
(a) from text lesson	29	05
(b) from personal experiences	---	13

Checking copies	15	14
(a) teacher checks	15	--
(b) self checking / checking each other work/teacher checks	---	14
Facilitating learning	---	38
(a) explaining / demonstrating	---	14
(b) overseeing individual children's work	---	15
(c) attending to errors/responding to children's suggestions / clarifications / questions seeking children's participation / encouraging children	---	09
Total	100	100
<i>Source : Classroom Culture Observations : Baseline and Intervention Study.</i>		

The Bodh classroom consciously uses pedagogic practices that centre on the child. The blackboard in is used as a teaching aid to demonstrate, explain, create and invite participation of children (6 percent of observations). In the Baseline study classroom the black board is used by the teacher primarily for giving instructions that are to be followed by the children in class or for direct copying of text lessons. Repetition or revision of text lessons is absent as a significant pedagogic practice in the Bodh classroom. Baseline data indicates that 26 percent of observations relate to such repetitive perhaps because of the overt emphasis on rote memorization as an aid to learning.

Pedagogic Practices : Transacting Curriculum through the text book

Baseline :

Intervention : मैडम कहती है, "गणित की किताब निकालकर कल वाले सवाल करो।" (K2.5.20)
अध्यापिका, "आप तीनों प्रश्नवाली एक के सवाल किताब से कर लो।" (R2.5.14)

Pedagogic Practices : Transacting Curriculum through activity

Intervention : अध्यापक पतीले पर ढके ढक्कन को उठा कर कहते हैं, "इस पर पानी कहां से आया।" तीन-चार बच्चे बोलते हैं, "माससाब हवा से।" (J2.4.14)
अध्यापिका ऊँट समूह के बच्चों के लिए एक बाल खेलता हुआ लड़का बनाती है और उसके पास चौकोर बनाती है। इसमें लड़के के कितने अंग दिख रहे हैं उनको गिनकर लिखो और लड़का क्या कर रहा है उसको भाषा में लिख कर बताओ और इस तरह हम एक साथ दो काम गणित और भाषा का करेंगे। (D2.4.3)

Pedagogic Practices : Use of Blackboard

Baseline : for children to copy from

Intervention : as a teaching aid

“बराबर आए इसके लिए हमें भाग करना पड़ता है। मान लीजिए आपके पास 6 टॉफी है और 3 समूह में बाँटना है तो कैसे बाँटेंगे। अध्यापिका बोर्ड पर 3 चौकोर बनाकर प्रत्येक में 2 टाफी रखती है। इस तरह 7 टॉफी से 3 भाग के बाद बची 1 टॉफी से शेष समझाती है। जो अलग से बच गयी उसे शेष कहते हैं जैसे खूब सारे दूध में थोड़ा बच्चे पर शेष बचा दूध रहेगा तो उसे शेष बचना कहते हैं। हमारे पास 20 लड्डू हैं ये थाली में रखे हुए हैं। इन लड्डूओं को 3-3 समूह में बाँटना है तो कितने समूह बन जायेंगे। (D2.4.2)

अध्यापक बोर्ड पर पाँच घड़ी बना देती है। पहली में पाँच बजाने है। दूसरी में 3.30 तीसरी में 4.00 चौथी में 6.15 तथा पांचवी में 12 बजाने हैं।” (W2.4.2)।

Pedagogic Practices : Asking Questions

Baseline : from text lessons

Intervention : from personal experiences

अध्यापिका पूछती है, “मैं बाजार गई, बाजार में एक पेन्सिल 2 रुपये की आती है तो 4 पेन्सिल कितने की आएँगी।” (R.5.13)

अध्यापिका कहती है, “कुछ और सोचते है। आपके पडोस में किस चीज का पेड़ है। (D2.4.5)

Pedagogic Practices : Checking copies

Baseline : Teacher checks

Intervention : Self checking/checking each others work, teacher checks

कुछ बच्चे सवाल करके अध्यापिका को दिखाते हैं। अध्यापिका उनके सवाल चैक करती है, गलत होने पर उन्हें समझाती है। एवं पुनः करने को कहती है। (W 2.5.14)

अध्यापक – “अच्छा अब सब ईमानदारी से अपने अपने गोले लगाना। अध्यापक बोर्ड पर लिखती जाती है बच्चे उससे अपना लिखा हुआ मिलाते जाते हैं। गलत शब्द होने पर गोला लगाते जाते हैं। (W 2.5.16)

Pedagogic Practices : Facilitating Learning

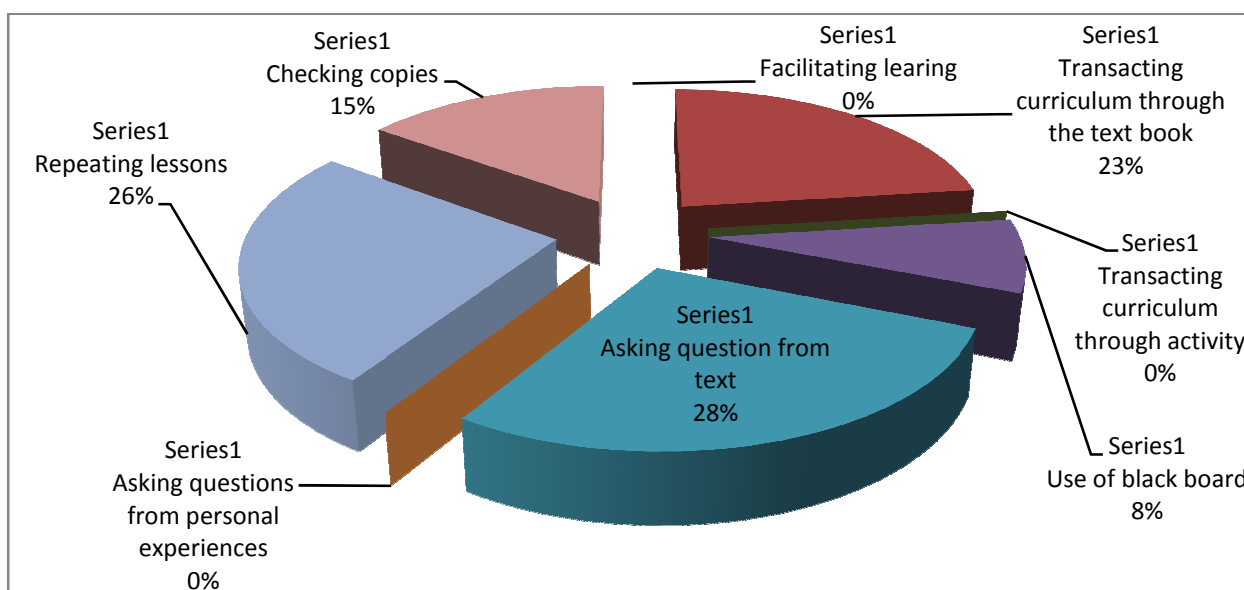
Intervention :

बच्चों द्वारा गलत उच्चारण करने पर अध्यापक पहले स्वयं बोल कर उनसे दोहराते हैं। ध्वनि की बारिकियों को उनको समझाते हैं। अध्यापक कई बच्चों से बाघ का सही उच्चारण करवाते हैं। साथ-साथ यह भी बताते जाते हैं। कि अक्षर की ध्वनि कहाँ से निकलेगी। (J2.5.16)

राम बाबू पर पेन्सिल नहीं होने के कारण अध्यापिका उठ कर अलमारी में से नई पेन्सिल देती है (R25.14)

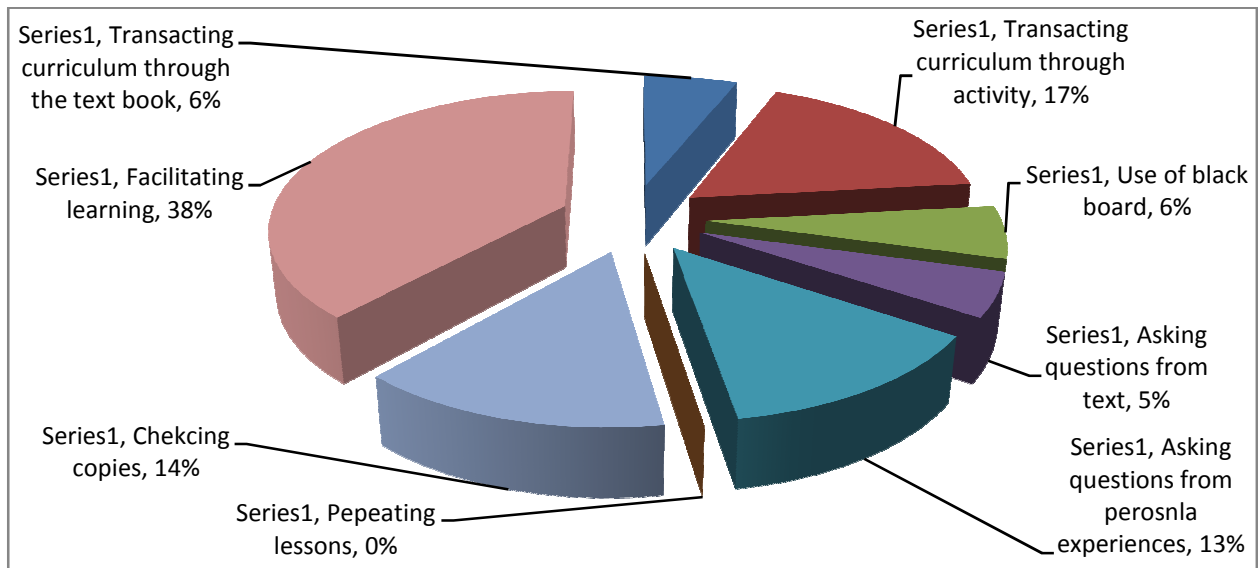
Pedagogic Practices (%)

Baseline N = 785



Pedagogic Practices (%)

Bodh N = 988



In both types of classroom teachers ask questions in class. The importance however, lies in the kind of questions asked. While Baseline data shows that questions asked are mainly based on the textbook, Bodh data reveals that children are more often asked questions that relate to and build upon knowledge from their own experiences. As is the case in the Baseline study classroom, children's written work is evaluated by the 'checking of their copies' in the Bodh classroom as well. However Bodh teachers use a variety of methods for checking in which children are also involved, such a self checking and checking by peers. The Bodh teacher also check copies but this is usually accompanied by her simultaneously explaining to the individual child and thereby facilitating understanding.

A number of methods to facilitate learning (38 percent of observations, Table 9) are observed in the Bodh classroom. These include attending to children's errors for rectifying (14 percent) overseeing each child's work and building further, explaining and demonstrating (15 percent), responding to children's suggestions, seeking and encouraging children's participation in the classroom (09 percent).

Learning through activity appears to be the major pedagogic principle underlying the Bodh classroom. Through demonstration, observation and discussion teachers are able to communicate effectively with and actively involve children in classroom activity. The conscious attempt to blur boundaries between formal knowledge' and experiential knowledge that children bring with them to school is also striking. This is quite a contrast to the clear boundary drawn between formal 'textbook knowledge' and that based on the child's experience observed in the Baseline study classroom. Bodh children are often presented examples and instances that are familiar to them. This not only increases the child's interest in what is being taught in the classroom but encourages children to articulate their own ideas and opinions. For instance, a lesson on 'Forms of Water' found the teacher using as an example, the familiar scene of clothes left out to dry. This was drawn on the board and discussed with the class and children were encouraged to freely express their views. Children subsequently drew and wrote what they understood.

Interactive teaching is also integral to the pedagogy of the Bodh classroom. This is in contrast to the Baseline study classroom in which dialogue and interaction between teacher and pupil is virtually absent. This is also visible in the very nature of the organisation of the Bodh classroom wherein children sit in a semi circle or in groups with the teacher seated in their midst on the floor.⁶ The distance between teacher and children is dramatically reduced in such a organisation of the classroom. Further, it is common to see Bodh teachers going to individual children, reaching out to them rather than expecting that children approach the teacher and that too for being evaluated as.

The study of interactive classroom such as that of Bodh poses a challenge to the researcher because it often becomes impossible and in fact meaningless to fragment data into discrete units. However, in order to compare the Bodh classroom observations with the observations of the Baseline study (where observations were more discrete in nature) an attempt has been made to divide innovative classroom observations into the most meaningful units possible. A data set of observations that together comprise what can be referred to as a 'learning episode' and thereby captures the essence of a 'pedagogic dialogue', as is common in the Bodh classroom, would hence need to be looked at holistically. An attempt has been made to present suitable examples of classroom activity which contrast the activity-based, interactive, child sensitive Bodh classroom with the textbook-based, teacher-centered Baseline study classroom.

Visual 1 : Baseline Study

हिन्दी का पीरियड चल रहा था।...

टीचर ने एक बच्चे ये कितसब मांगी और "मोर और फूल" नामक कविता पढ़ने लगी। फिर पर बच्चे अभी अपने-अपने बैगों से कॉपी किताबें निकालने में लगे थे।

टीचर लड़कियों की तरफ देखते हुए बोली " लड़कियों तुमने देखी है मोर की आवाज कभी?" उन्होंने "हाँ" बोला। और मोर की तरह आवाज करने लगीं।...

टीचर बच्चों से पक्षी और फूलों के नाम पूछने लगी।...

टीचर ने बच्चों से पूछा "पेड़ों पर फलों को देख कर कैसा लगता है?" एक बच्चा बोला "उनको तोड़ लें।"

टीचर बिना सुने आगे बताती रही। फिर एक लड़की से बोली 'लड़की तू बता। मनीषा तू बता, इसे बताने दो,

ये सबसे छोटी है तुममें।'

मनीषा ने धीरे-धीरे कुछ बोला फिर टीचर ने उसे बिठा दिया और लड़कों से बोली "अब कोई लड़का बताएगा। 5-5 फूलों के नाम बताओ।"

4-5 बच्चों से पूछने के बाद टीचर ने 5 पक्षियों व 5 फूलों के नाम लिखने को बोला और कॉपीयां चैक करने लगी।

एक लड़की अपने पास में बैठी लड़की से पूछ-पूछ कर फूलों के नाम लिखने लगीं।

Source : Classroom Culture Observations : W2.3.4

Visual 1 depicts a typical Baseline study classroom situation wherein the teacher asks questions which some children answer, the teacher then instructs the class (either verbally or using the blackboard) and children individually follow instructions, doing whatever work is given to them in their notebooks. Thereafter children take their notebooks to the teacher for checking. These are often seen piled up on the teacher's table. The virtual absence of dialogue in the pedagogic process, the lack of interaction between teacher and pupils and the individualisation of the classroom activity is clearly reflected in the visual. This is more often the rule than the exception in a traditional classroom.

Visual 2 : Interventions Study

11.25 पर अध्यापिका बोर्ड पर पर्यावरण लिखकर लिखकर यातायात के साधन लिखती है व कहती है फिर चित्र बनाना।

अध्यापिका – आवागमन का मतलब कहीं आना–जाना जैसे थाना, अजमेरी गेट जाना है तो किस–किस से जाते हैं।

छात्रा – (बैठे–बैठे) बस, टेम्पो, स्कूटर, जीप आदि।...

एक छात्र – लूना, स्कूटर।

एक छात्रा – दीदी, बजाज।...

अध्यापिका बच्चों से पूछकर बोर्ड पर लिखती है।

छात्र बैठे – बैठे बता रहे हैं।

एक छात्रा – देख साइकिल भी लिख दिया।

छात्र/छात्रा – बैलगाड़ी, ऊँठगाड़ी, घोड़ा गाड़ी आदि।..

एक छात्रा – खच्चरगाड़ी (सभी बच्चे हंसते हैं।)

अध्यापिका – खच्चर कभी देखा है। कोई घोड़ा खच्चर में फर्क बताओ।...

एक छात्रा – दीदी, श्योपुर में खच्चर लिखती है।

अध्यापिका बोर्ड पर घोड़ा गधा व खच्चर लिखती है।

कोई भी बच्चा इन तीनों में फर्क नहीं बता पाता।

अध्यापिका – घोडागाड़ी सामान वाली नहीं होती। आदमी इस पर सवारी करता है। खच्चर गाड़ी सामान ले जाने के काम आती है।

छात्रा – दीदी, गधे में कैसे पीठ पर “नूण” रखते हैं। उसकी पीठ पर बोरी बांध देते हैं।

एक छात्रा – दीदी, हाथी।

अध्यापिका – हाथी पर सवारी करते हैं पर सामान नहीं रखते। कहाँ देखा तुमने?

छात्रा – दीदी, आमेर में। तीनों सामान भी उठाते हैं।

फिर अध्यापिका पूछती है फटाफट पहुँचने के लिए?

छात्र/छात्रा – रेल, हवाई जहाज, नाव, लूना, चील गाड़ी आदि।...

बच्चे यातायात के चार्ट में से चित्र दिखकर बोल रहे हैं।...

अध्यापिका – रेलगाड़ी मालगाड़ी में क्या फर्क है?

छात्रा – दीदी, मालगाड़ी के डिब्बे गोल व रेल के चौकोर होते हैं।

एक छात्रा – रेल में चमकती है लाइट, मालगाड़ी में नहीं। रेल में खिड़की मालगाड़ी में नहीं।

अध्यापिका एक और बोर्ड लगाकर पेट्रोल से चलने वाले लिखती है।

बच्चे बैठे-बैठे बोल रहे हैं- कार, बस, स्कूटर, ट्रक....

एक छात्रा- बस इतने बहुत हैं।....

अध्यापिका – पंखा ऊपर चलता है, उड़ कर जाता है।

सोनिया – रोकिए दीदी।

अध्यापिका – तुम कितनी बार बैठे।

तीन छात्रा – दीदी, हम भी नहीं बैठे।

दीदी, नाव में – एक छात्र।...

अध्यापिका – अगर एक जगह सामान अधिक, दूसरी जगह कम तो कैसे पहुंचता है?

छात्र-छात्राएं – (बैठे-बैठे) ऊंटगाड़ी, ट्रक में, रिक्शा में।

कल्पना – रक्षा में आएंगे ही नहीं।

सोनिया – हवाई जहाज से। अध्या. पर अड्डा हर जगह नहीं होता।

एक छात्रा – दीदी, रेल गाड़ी, मालगाड़ी से? अध्यापिका – सही।

दीदी, हमने तो अंदाज से बोला।

अध्यापिका – रेलगाड़ी सबसे अच्छी व सबसे सस्ती क्यों है?

छात्रा – दीदी रेल में पैसे नहीं लगते, टिकिट लगती है।

छात्रा – दीदी, दो डिब्बों के बीच की जगह क्या होती है?

अध्यापिका-“इन-अर कन्डेक्ट” व रेल में लेट्रिन व टायलेट भी होते हैं।

छात्रा – नहीं दीदी, जिससे एक डिब्बे से दूसरे डिब्बे में जाते हैं।

अध्यापिका – बाद में बताऊंगी।

अध्यापिका – हवाई जहाज से यात्रा क्यों नहीं करते?

छात्रा-दीदी, व मिट्टी में नहीं उतरता।

अध्यापिका-अपने यहाँ हवाई अड्डा है या नहीं।

छात्रा-दीदी, है पर बहुत दूर पड़ता है थाने पर।

अध्यापिका – अपने पास कौनसा स्टेशन है? (नहीं बताते हैं)

अध्यापिका – गाँधीनगर।

छात्रा- दीदी, गाँधीनगर कौनसा पास है। हम गये थे ना वहाँ तो जीप से गये थे।...

छात्रा-दीदी, ट्रेन तो तुल के नीचे से जाती है ना?

छात्रा-दीदी, हम बस में क्यों जाते हैं ट्रक पर क्यों नहीं?

दूसरी छात्रा-धूप लगती है ना ट्रक पर छत नहीं होती है।

एक छात्रा—डुग्गा तेज चलता है ना दीदी?

परन्तु अध्यापिका डुग्गा नहीं समझती।...

11.55 पर बोर्ड से उतारना शुरू।...

बच्चे (12.05 से) कापी चैक करवाते हैं।

Source : Children's Observations : R2.13.5

A typical Bodh classroom is presented in Visual 2 where, in contrast to Visual 1 there is teacher - pupil dialogue as well as peer interaction with constant feedback into the main lesson. As can be seen, the teacher initiates a discussion which children take up sharing their own ideas. Teacher build upon and relate children's views and self expressions to the lesson and take the discussion further by asking question, giving clarifications, clearing confusion and answering children's question. The teacher then writes the essence of what is discussed on the blackboard which children copy in to their notebooks. Visual 3 presents a guilise of pedagogic processes as they unfold in a concrete instance in one of the Bodh classroom where a lesson focussing on the development of skills in reading and writing is in progress.

Visual 3 : Interventions Study

अ. — चलो कापी निकालो।

बच्चे — कायकी?

अ. — हिन्दी की। आप लिखेंगे जो मैं बोलूंगी।

1.06 पर अ. हिन्दी बोलना शुरू करती है।...

अ. — अभी नहीं, अभी रंग की बारी नहीं है।

एक छात्र — दीदी हमने तो कापी में आज की तारीख भी डाल ली।...

अ.—अच्छा, अब शुरू करो।

बच्चे—हाँ करो।

1.10 अ. — आज समूह में 20 बच्चे आये हैं लिखो। सभी बच्चे अपनी—अपनी कापी में लिखते हैं

अ. सभी के पास जा—जाकर चैक करती है।

अ. — बातर पूरी होने का निशान लगाओ।

एक छात्रा अध्यापक की बात को तेजी से दोहराती है।

छात्रा — दीदी, शॉपनर दो।

अ. — आज तो मेरे पास है ही नहीं।

अ. — अच्छा चलो आगे लिखो।

आसिफ आजकल पढ़ने की कोशिश कर रहा है।

एक छात्र को पढ़ना लिखना नहीं आता है तो अध्यापिका बोर्ड पर लिखती है। तो एक छात्र अ. से कहता है “दीदी, आपने पढ़ना को पढ़ाना लिखा है।

फिर अ. उसको ठीक करती है।

छात्र – दीदी, आसिफ रसगुल्ला को हंसगुल्ला कहता है फिर 5–6 छात्र उसे हसगुल्ला कहकर चिढ़ाते हैं।

एक छात्रा – दीदी ये खा रही है।

अ. – किसको आते ही भूख लग आई विनीता वहां जाकर खा लो।

एक छात्र लिखता है आसिफ बातें कर रहा है। एक लिखता है आसिफ आज फल खाके आया आया है।

अ. अच्छा अब आगे लिखो।

आजकल अनिल समूह में काम करने लगा है।

एक छात्रा – दीदी, हम तो ये लिखेंगे कि काम नहीं करता।

अ.–नहीं–नहीं करता है।

छात्रा – नहीं हम तो ये ही लिखेंगे।

दूसरा छात्र – हम लिखेंगे अनिल गधे पे आता है।

एक छात्र दीदी ये शब्बीर हमारी गली में अल्लाह के नाम पर पैसे मांगने आता है। हम कहते हैं जा भंगी से ले ले।

अ. – नहीं गन्दी बात नहीं बोलते जो बात हमें बुरी लगे वो बात किसी से नहीं कहनी चाहिए। उसे भी बुरी लगेगी।

एक छात्र – दीदी आप धीरे–धीरे बोलो बहुत जल्दी–जल्दी बोल रहे हो।

अ. – बोलती है तो बच्चे कहते हैं दीदी अभी मत बोलो धीरे बोलो।

अ. – अच्छा अब हम धीरे–धीरे बोलेंगे।

एक छात्र कहता है दीदी आज हम पूरा पन्ना लिखेंगे।

एक छात्रा – दीदी, देखो हमने पूरा लिख लिया।

हमने कितना सुन्दर लिखा है। 1.40 तक लिखते हैं।

दूसरी छात्रा – आज हमारा बिल्कुल भी गलत नहीं है।...

अ. सभी की कॉपिया चैक करती हैं।

Source : Classroom Culture Observations : W2.4.3

Both teacher are observed to use a variety of pedagogic styles to deal with different content areas leading to the evolving of an extremely rich learning environment. Visual 4 and 5 show two maths classes in progress. In the first, the concept of addition and subtraction are being explained using the innovative example of a tree and the blooming and shedding of leaves and fruits. In the second, children are divided into groups and with the use of charts the teacher explains problems in maths. What is interesting is that peer learning is encouraged as children work in groups, with the teacher giving clarifications to individual children and the group whenever necessary. It is also important to note there is space for children's interpersonal relations with in the formal classroom activity.

Visual 4 : Intervention Study

अ. इसको बन्द कर दो अब दूसरा काम करेंगे....

अग गणित निकालो। सभी बच्चे गणित की कापी निकालते हैं।...

8.50 अ. बोर्ड पर पेड़ का चित्र बनाती है। सभी बच्चे बोर्ड पर देख रहे हैं। अ. पत्तियाँ बनाते-बनाते पूछती है ये कितनी है?

बच्चे – 3, 4, 5, 6 बोलते हैं। अ.– हरीश गिनो भाई। 4-5 बच्चे बताते हैं। अ. – इस पर (बोर्ड) गिनकर बताओ। सभी बच्चे दीदी हम-हम, एक बच्चा बताता है।

8.54 बोर्ड पर एक ब. गिनकर अंक लिख रहा है। अ. – आप सब कापी में गिनकर बताओ कितनी पत्तियाँ हो गई। सभी बच्चे गिन रहे हैं।

एक ब.– दीदी, जोड़ करें क्या ? अ.– हाँ। बोर्ड पर कर रहे बच्चे के लिए अ. कहती है जरा चैक करो। इसने सही किया है क्या?

6. बच्चे चैक कर रहे हैं। धीरे-धीरे सभी करने लगते हैं। अध्यापिका सभी पेड़ों की पत्तियाँ जोड़कर बताओ। हरीश अंगुलियों पर जोड़-जोड़ कर गिन रहा है। और कापी में लिख रहा है। तीन बच्चे और अंगुलियों पर जोड़ रहे हैं। धीरे-धीरे सभी जोड़ने लगते हैं।

9.00 अ. – आगे करें। 2-3 बच्चे हाँ दीदी। अ. पेड़ बनाकर फल भी बनाती है और बच्चों से गिनने को कहती है। एक बच्चे को छोड़कर सभी गिनते हैं। अ. पेड़ को दो हिस्सों में करती है। पेड़ पर जामुन बनाकर गिनती है। बच्चे और अ. बाकी कराती है। कुछ जामुन नीचे गिराती है फिर बच्चों को समझाती है और सवाल रूप में कैसे लिखेंगे वो लिखती है। फिर बच्चों को कहती है कि अब आप भी अपने मन को कोई पेड़ बनाओं और उसमें से कुछ फल नीचे गिराकर बाकी करके बताओ।

9.10 सभी बच्चे इस काम को करने लगते हैं।....

9.15 एक ब., अ. को अपना काम दिखाता है। अ. से जो काम करते जाते हैं वो दिखाते हैं।

Source : Children's Observations : D2.6.5

Visual 5 : Intervention Study

1.26 पर अ. सभी को गणित का चार्ट देती है जिस पर जोड़, बाकी, भाग तथा घड़ी बनी हुई है। 5-6 बच्चे अध्यापक के पास बैठकर चार्ट समझ रहे हैं।

दो छात्रायें उल्टा लेट कर अपना काम कर रही हैं।....

दीदी जोड़ है या बाकी।

अं. – पढ़कर बताओ तो पहले ही एक छात्र कहता है जोड़ है नहीं-नहीं गुणा है।

एक छात्रा दूसरी छात्रा का चार्ट देखकर कहती है। (हाथ की उंगलियों से सुन्दर का इशारा करके, वाह इसका $1/2$ कितना फर्स्टक्लास है।)

इस चार्ट का कार्य कल भी करवाया था अतः एक छात्रा ने यह कार्य कल ही पूरा कर लिया था। इसलिये वह दूसरों को समझा रही है।

अ. – एक रू. में कितने पैसे होते हैं। दीदी एक।

दूसरा छात्र – दीदी नहीं 100 होते हैं।

3–4 छात्राएं एक साथ बैठकर कार्य कर रही हैं...

एक छात्र– दीदी, हमने अधूरा (आधा) कर लिया है।

अ. – आधा क्यूं पूरा करो दीदी के लिए बाकी क्यों रखा है।

अ. – एक छात्रा को बिना चैक किये कापी देती है तो वह कहती है दीदी, चैक कर दो हम ऐसे नहीं लेंगे।

एक छात्रा को सवाल नहीं आता है तो एक छात्रा कहती है उसको–हिसाब नहीं आयेगा तो तू सब्जी कैसे बेचेगी। सभी बच्चे र्चा का काम कर रहे हैं।

2–3 बच्चों ने कर लिया।

1.52 – पर अ. अर्चना से कहती है। “ अर्च ना इधर आओ तीलियों का खेल खेलेंगे।

फिर 5–6 बच्चे गोले में बैठ कर तीलियों का खेल खेलते हैं। इनमें छात्रों की तीलियों को गोले में फँकना होता है फिर बना हिलाये तीलियाँ उठानी पड़ती है तीलियों पर रंग के द्वारा 5 भाग बने है छात्र जितनी तीलियाँ बिना हिलाए उठाता है उसे 5 से गुणा करना पड़ता है। इस तरह वे बच्चे गोले में बैठ कर तीलियों से खेलते हैं। तीन बच्चों का दूसरा समूह दूसरे गोले में बैठकर यह खेल खेलते हैं। तथा तीसरा बाकी बच्चों का समूह अ. सेचार्ट समझ रहा है।

एक छात्र सभी को समझा रही है कि तीलियों का कार्य कैसे करना है तो एक छात्रा कहती है मुझे मत समझा मुझे तो आता है।

2.07 तक समूह में बच्चे ये खेल खेलते हैं। तीसरा समूह अभी चार्ट समझ रहा है।...

छात्र बोर्ड पर सवाल लिखाकर कहता है आओ बच्चों में तुम्हे सवाल करवाता हूँ। 2.17 पर अ. सभी को अपना–अपना काम बन्द करने को कहती है ...

Source : Classroom Culture Observations : D2.4.4

An episode from the language class depicted in Visual 6 also captures the pedagogic processes highlighted above. Children listen to a story, discuss difficult words, participate in the writing of difficult words on the black board, ask questions and so on.

Visual 6 : Interventions Study

8.50 मिनट अध्यापिका चिड़िया व चूहे की कहानी पुस्तक से पढ़ा रही है। अध्यापिका “आश्चर्य वाचक चिन्ह” बोर्ड पर लिख देती है। दो–तीन इसे बार–बार पढ़ते हैं।...

अ. – कणी किसे कहते है? स्वयं ही अध्यापिका कहती है चावल के छोटे टुकड़ों को।

अं. – गृह स्वामी कौन होता है? दीपक कहता है आदमी।

एक छात्रा कहती है घर का मालिक दीदी।

अ. – शाबश।...

मैडम एक छात्रा से कहती है तेरी समझ में नहीं आ रहा है छात्रा – आ रहा है।

अ. – तो उसकी कापी में क्या देख रही है?

9.35 – पर अ. – प्रश्न का उत्तर कौन जानते हैं।

लगभग 5 विद्यार्थी हाथ रखकर देते हैं। मैडम कहती है कि मैंने प्रश्न ही नहीं पूछा है बताओं तुम किस प्रश्न का उत्तर जानते हो?

मैडम विभिन्न छात्रों में प्रश्न पूछती है—

गृहस्वामी ने चूहे से छूटकारा पाने के लिए क्या प्रयास किया?

एक छात्र – पिंजारा बनवाया।

कल्पना उपरोक्त प्रश्न का उत्तर— किसान ने मक्का, रोटी आदि पिंजरे में रख दिया और चूहे को पिंजरे में फंसा दिया।

अध्यापिका कल्पना को शाबाशी देती है और कहती है इसने (कल्पना) पूरा उत्तर बता दिया है।

अ. – चिड़िया ने चूहे को पिंजरे से कैसे निकाला?

एक छात्र सुमन से पूछे गये प्रश्न के बीच में ही पकड़ कर जवाब देता है—

चिड़िया ने पिंजरे का फाटक खोल दिया।...

Source : Classroom Culture Observations : K 2.5.12

In Visual 7 the teacher explains an EVS lesson 'Forms of Water' by demonstrating, asking questions and drawing out children's experiential knowledge. This simultaneously class for children's continuous and active participations at every stage. It is clear from the foregoing discussion that Bodh's structuring of classroom activity and pedagogic practices encourages among children the development of attributes of articulation and questioning by drawing them into the construction of classroom knowledge; co-operation and sharing through encouraging peer learning and self confidence and positive self image by respecting the child's experiential knowledge and building upon it. This is an integral part of the pedagogy that underlies the Bodh classroom.

Visual 7 : Intervention Study

अ. ने कक्षा शुरू करने से पहले ही एक बच्ची से बर्तन में बर्फ मंगवा कर रख रखी थी।

अ. ने वो बर्फ का पतीला हाथ में लेकर उसको साफ किया और एक बच्चे को खड़ा करके पूरा गीला है क्या? बच्चे ने कहा हाँ। अधिकांश बच्च देख रहे हैं। अ. पतीले को (बर्फ के) रख देते हैं व बच्चों से कहते हैं अब मेरी तरफ देखो। फिर कहते हैं। हमने कल बात की थी न (बीच में) रुमाल गीता करते हैं व उसको निचोड़ कर बच्चों से फिर पूछते हैं इसका पानी कहाँ है।

(6-7) बच्चे पानी कभी दिखता नहीं है। अ. – हवा में पानी होता है। कभी दिखता नहीं है।

अ. – पानी कौन ले जा रहा है। अ. हवा में पानी होता है तुम्हें दिखा दूँ। सब बच्चे देख व सुन रह है।

अ.— पुनः पतीले को ढक्कन से ढक्कर कहते हैं इस पर हवा करो। 3—4 बच्चे करते हैं बाकी देख रहे हैं। अ. — पतीले पर ढके ढक्कन को उठाकर कहते हैं इस पर पानी कहाँ से आया? माससाब हवा से तीन चार बच्चे बोले अ. घर जाकर ये एक काम करना। अ. बताते हैं — जब हवा ठण्डे बर्तन से टकरा रही है तो वापस पानी बन रही है। अ. ने प्लेट पर गीली मिट्टी रखकर धूप में रख दिया। फिर बच्चों से कहते हैं पानी हवा में उड़ता रहता है।...

अ. — पानी के ओले कब बन जाते है और कहते है जब पानी बिल्कुल ठण्डा हो जाता है तब बर्फ बनता है।

अ. — अब इस बात को सोचो पहले पानी था या उसकी भाप बनी...

1.12 परचित्र बनाकर एक बच्चे से पूछते है क्या हो रहा है? ब.— बर्तन में से भाग निकल रही है। अ. — क्यों निकल रही है? तीन बच्चे — ये सिगड़ी रखी है गर्म हो रही है।...

2—3 बच्चे — ओले भी गिर रह हैं।

1.15 अ. — इस बात को चित्र बनाते हुये क्या हो रहा है, कैसे हो रहा है लिखो। सब बच्चे अपनी—अपनी कापी पैसिल निकालने लगे। अ. — एक चित्र में क्या हो रहा है लिखो।

1.16 — सभी बच्चेकाम करने लगते है।...

तीसरा सवाल क्या है? अ. — पहल सवालका ठीक से जवाब लिखो।...

अ. प्लेट उठाकर जल्दी से हाथ लगाते जाओ।...

एक ब. — माससाब (कापी दिखाता है) अ. देखते हैं। एक बच्ची बोल कर लिखती है। अ. — बेटा, चित्र में क्या हो रही है। अ. जो हो रहा है वो लिखो जितना सवाल उतना जवाब लिखो।... जैनब दिखाती है अ. उसका देखते हैं। दो बच्चे और दिखाते हैं।

एक की कापी में लिखते हैं चित्र में ये सब क्यों हो रहा है।

1.35 — बच्चे धीमे—धीमे बोल—बोल कर लिख रहो हैं।...

Source : Classroom Culture Observatons : J2.14.5

It must be mentioned here that the pedagogic principles highlighted as underlying the Bodh classroom have emerged from the classroom culture data and have to be discussed with the organisation to confirm their veracity. However, transacting lesson through activity, use of the blackboard as a meaningful teaching aid, relating the childs worked to classroom instruction, and attending to children's work individually, taking care to explain, demonstrate, as well as clarify errors and respond to children's expressions, all bear testimony to a child-sensitive, interactive pedagogy.

Teachers talked to, also expressed a fairly deep understanding of and confidence in the philosophy of Bodh.⁷ In the course of the discussions, teachers appeared to be convinced about the positive benefits of Bodh's pedagogical practices for children as well as for their own development. Teachers also seem to be sensitized to the limitations of traditional pedagogy and overtly emphasize the need for children to be provided an environmental where they can learn without fear, a critical principal of the Bodh philosophy.

Teacher's Perception about Children

Baseline :

Intervention :

बच्चे होशियार हैं। सांस्कृतिक कार्यक्रमों में भाग लेते हैं। बच्चे अपने आप घर की जिम्मेदारियाँ भी साथ-साथ निभाते हैं— जैसे पिता के काम में हाथ बटाना। बोध कक्षा में पढ़ने वाले बच्चों में डर या भय नहीं है, वे मुखर हैं। बच्चों में पढ़ने का शोक पैदा हुआ है।

Teacher viewed children positively, expressing faith in their potential. They acknowledged the reality that children had to help their parents but saw this as an indication of the responsibility of the child rather than their lack of interest in their studies.

Teachers' Perceptions about Pedagogic

Baseline :

Intervention : About Traditional Pedagogic

अध्यापक के भय या डर से बच्चा शान्त बैठा रहेगा इससे उसमें नकल करने की आदत पैदा होगी लेकिन बच्चे की पूछने व जानने की इच्छा खत्म होती जायेगी। नकल कर काम करने से बच्चा उतना खुश नहीं होगा। लेकिन सवाल यह है कि इसमें बच्चा सीख कितना। किताबों से अच्छी चीजें ढूँढने की भी आदत पड़ गई है।

About Bodh Pedagogy

बोध पद्धति में करके सीखने, अनुभव से सीखने पर खास जोर है। खेल-खेल में बच्चे सीखते हैं। उनको यह महसूस नहीं होता कि वे पढ़ रहे हैं। इस पद्धति से बच्चे सीखने तो धीरे हैं पर पक्का सीखते हैं।

CHILDREN'S RESPONSE TO PEDAGOGIC PRACTICES

Children' response to pedagogic practices follows quite obviously from the nature of pedagogic practices followed in the classroom. As seen in Table 9 none of the responses typical of a 'traditional' classroom (Baseline study) such as rote memorization, copying form the blackboard and doing given work mechanically could be observed in the Bodh classroom. In Bodh classrooms children do given work (30 percent) but not mechanically. A larger proportion of children's responses in the Bodh classroom (83 percent) as compared to the Baseline study classroom (52 percent) were engaged in activities related to learning. Many more observations in the Bodh classroom (30 percent) were seen to indicate children discussing and doing work in the classroom. Children's responses that did not directly relate to learning were nevertheless significant aspects of a classroom culture that encouraged self expression and dialogue other than only in strict adherence to school subjects/ knowledge.

Children's Response to Pedagogic Practices : Seeking/giving Clarifications

Baseline :

Intervention :

एक छात्रा, " दीदी चार्ट में 59 के बाद 60 तो है ही नहीं" (W2.4.2)

एक छात्र श्यामपट्ट पर लिखे उर्दू शब्द पर अंगुली रख कर कहता है यह क्या है (J2.4.3)

Children's Response to Pedagogic Practices : Doing given work/Discussing it

Baseline :

Intervention :

छात्र गिनते हैं। 1..... 2..... 3..... जितने चिह्न है उतनी गिनती। त्रिभुज-3, आयत -14, वृत्त-9। (K2.5.20)

पाँच बच्चे अपने-अपने समूह में बैठे काम कर रहे हैं। (R2.4.2)

Children's Response to Redagogic Practices : Classroom Activity Unrelated to Learning

Baseline :

Intervention :

सबीर के पास एक खिलौना है। ललित और महेश उसके पास बैठकर उसे देख रहे हैं। (W2.4.14)

तीन बच्ची खड़ी होकर आपस में बातें कर रही हैं। (J2.4.1)

Children's Response to Redagogic Practices : Response to teacher providing space for Self Expression

Intervention :

कल्पना, "दीदी इसको हम बताएंगे 8 का पहाड़" (R2.5.15)

कुछ छात्राएं स्वयं अपने लिए पुस्तक उठाकर देखती हैं तथा अपनी जगह पर उन्हें ले जाकर पढ़ती हैं। (N2.5.13)

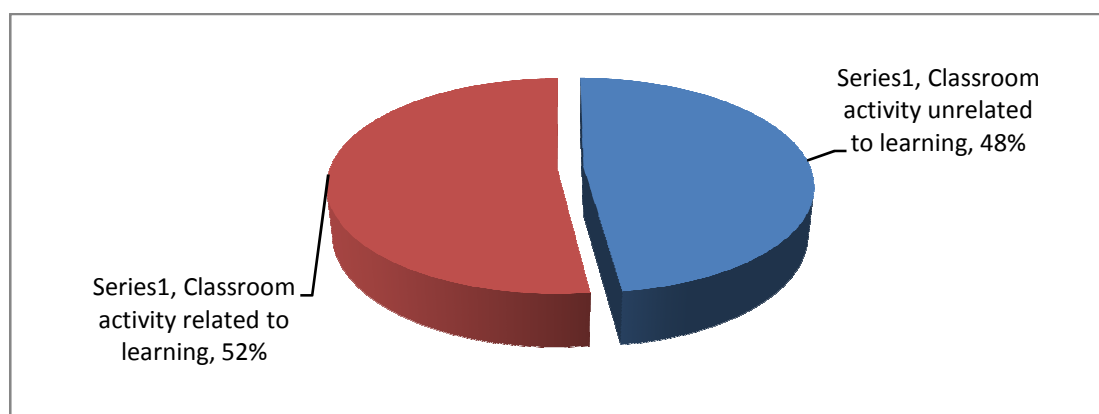
Table (9) : Children's Response to Pedagogic Practices (%)

Children's Responses	Baseline N = 668	Bodh N = 1382
Classroom activity related to learning	52	83
Copying from blackboard	05	00
Rote memorization / repeating	04	00
Answer questions / solve problems	21	19
Seeking / giving clarification	06	10
Doing given work / discussing it	15	30
Response to teachers providing space for self expression	---	24
Classroom activity unrelated to learning doing nothing / other than learning	48	17
Total	100	100

Source : Classroom Culture Observations : Baseline and Intervention Study

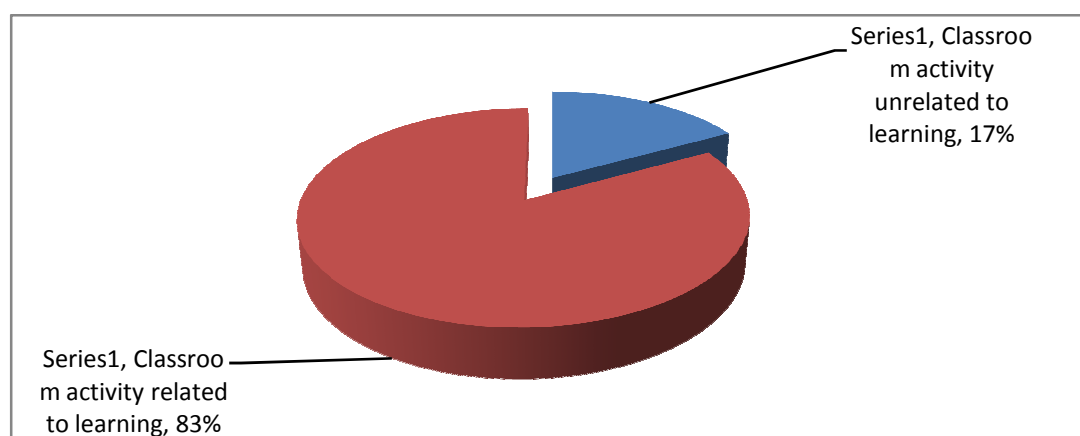
Children's Response to Pedagogic Practices (%)

Baseline N = 668



Children's Response to Pedagogic Practices (%)

Bodh N = 1382



Children are active participants in the Bodh Classroom as was seen in the discussion on pedagogic practices and depicted in the Visuals. Children from the Baseline study.

Children's Perception about teacher in the classroom

Baseline :	'कुर्सी पर बैठती है; बारह खड़ी लिखवाती है; सबसे पाठ सुनती है; पाठ की नकल करवाती है; हम साईन कराते हैं; बच्चों से प्रश्न-उत्तर पूछती है; प्रश्नों के उत्तर करवाती है; हाजरी लेती है, बोर्ड पर लिखती हैं बच्चे उसको देख-देख कर उतार लेते हैं; पहले टीचर फिर बच्चे किताब में से बोलते हैं' ।
Intervention :	“गीत सीखाती है, चित्र बनवाती है; गणित के सवाल करवाती है और समझाती है; पर्यावरण की किताब पढ़वाती है; बॉल से खिलाती हैं; खिलौने बनवाती हैं; चिकनी मिट्टी के खिलौने बनवाती है; बोर्ड पर काम डालती हैं; जो चीज़ जिनको नहीं आती बताती है; कहानी बनवाती है, सुनाती है; मीटिंग करते हैं, नाचते हैं; कहानी की किताब देकर चित्र बनवाती हैं; स्कूल की सफाई करवाती हैं; दरी बिछवाती हैं, कठपुतली का खेल खिलाती है; गणित, उर्दू, जोड़, बाकी, भाग हिन्दी पढ़ाती है; बाल-सभा करती है” ।

Community Perceptions about the school

Baseline :	अध्यापिका : “हमारा ये काम नहीं है कि हम ये पता करें कि इन बच्चों के माँ-बाप क्या काम करते हैं? हमें यह पता करने का पैसा नहीं मिलता है। हमें सरकार पढ़ाने का पैसा देती है, किताब पढ़ा देते हैं” ।
Intervention :	“.....स्कूल वाले बुलाते हैं मीटिंग होती है तब। मीटिंग में सभी के माँ-बाप आते है। राय ली जाती है प्रत्येक से उनके बच्चे के बारे में पूछते हैं। “अध्यापिका आकर इनकी पढ़ाई के बारे में, खेलने के बारे में तथा ध्यान देने के बारे में बताती है। एक दो घण्टे बैठा करती थी। एक बार यह बच्ची बोली कि मैं तो नहीं पढ़ूँगी। तब वो आई थी, पूछी : “मीनू क्यों नहीं आई” तो मैंने कहा : “ये तो कहती है मैं नहीं पढ़ूँगी इसमें पढ़ाई नहीं होती” । फिर उन्होंने कहा : “आप आओ मीटिंग में” । तब समझाया, हम अलग-अलग तरीके से पढ़ाते हैं। पहले जड़ को पक्का करते हैं। अब बच्ची रोज जाती है।”

Teacher Routine Activity : Diary/Register Work

Baseline :	
Intervention :	अध्यापिका अपना रजिस्टर खोलकर मोहर लगाती है। मोहर लगभग 5 मिनट लगाती है। (R 2.59.7) अध्यापक रजिस्टर व कागज में लिख रहे हैं। उन्हें यह कार्य करते आठ मिनट हो गये हैं। (J2.4.1)

Teacher Routine Activity : Talking to other teachers

Baseline :

Intervention :

9.37–9.40 कक्षा में प्रधानध्यापिका आती है। कया अध्यापिका से कहती है— आज खेल घंटी 10 बजे होगी और वार्तालाप करती है। (R2.A.3)

1.46 पर एच. एम अन्दर आते हैं। दोनों अध्यापक आपस में बातें करते हैं। (J2.4.1)

Teacher Routine Activity : Going out of Class

Baseline :

Intervention :

10.34 पर अध्यापिका उठ कर कमरे से बाहर चली जाती है— 10.36 तक (D2.4.4)

2.30–2.45 अध्यापक को कोई नीचे बुला रहा है। वह चली गई। (W2.44)

reported that the teacher takes attendance, asks questions from them, asks them to copy from the blackboard, read out lessons and repeats lessons. The Bodh children in contrast listed the following activities conducted by their teacher in class: activities related to maths, language and environmental studies, indoor and outdoor games, takes them out for trips, makes them draw, sing, dance and tells stories, conducts meetings and makes children clean the classroom, explains and helps when children are unable to do something. The nature of children's questions and the clarifications they seek were also found to be qualitatively different from the relatively mechanical nature of involvement of children in the Baseline study classroom.

During discussions with Bodh children it was confirmed that a relatively large number of children (60 percent) ask questions from the class teacher and around 40 percent are able to converse easily with the teacher.⁸ Baseline study children on the other hand said that only a handful of children in their classes interact with the teacher. Bodh children also said that questions asked in class are often unrelated to the text and stem from their own curiosity. On the other hand Baseline study children expressed that they usually do not ask questions that do not relate to the text. While almost all Baseline study children said that they were afraid of the teacher, only a third of the Bodh children expressed a fear of the teacher.

TEACHER ROUTINE ACTIVITY

Teacher routine activity comprises 7 percent of the Baseline study observations and 2 percent of the Bodh classroom culture observations. Table 10 reveals that the nature of such activity varies in the two classroom. In the Baseline study classroom teachers were often found talking to other teachers and going out of the class. Such routine activity of the teacher invariably disrupted the classroom teaching and learning. In the Bodh classroom the majority of teacher routine observations (51 percent) relate to teacher's administrative responsibilities such as diary and register work. Only 15 percent of these observations were of teachers talking to other teachers. Teachers going out of class accounted for a significantly smaller magnitude of observations (24 percent) in the Bodh classroom as compared to the Baseline Study classroom (54 percent). This itself reflects a major transformation in the classroom culture.

Classroom Management : Reprimand

Baseline :

Intervention :

शब्बीर, आप बस्ता लेकर घर चले जाओ। मम्मी पूछे तो कहनी दीदी को तंग किया था, इस लिए भेज दिया। (W2.5.14)

अध्यापिका बहुत दिन से नहीं आये बच्चों को खड़ा करती है और इतने दिन के बाद आने की सजा के तौर पर नाचने को कहती है। दोनों बच्चे खड़े रहते हैं। अध्यापिका ढोल व सब बच्चे तालियां बजाते हैं। उन दोनों में एक तो नाच लेता है, दूसरा खड़ा होकर सबको देख रहा है। जो बच्चा नाच लिया अध्यापिका उसको बैठने को कहती है। (D2.4.4)

Classroom Management : Positive Strategies

Baseline :

Intervention :

अध्यापक, "नहीं गन्दी बात नहीं बोलते। जो बात हमें बुरी लगे वो बात किसी से नहीं कहनी चाहिए उसे भी बुरा लगेगा।" (W2.4.3)

अध्यापक, "सीमा, क्या बात है, आप काम ही नहीं करते। किसी समूह में आपकी बाली गुम गई। बच्चे देख भी आये नीचे सब जगह। ये क्या बात हुई काम नहीं करेंगे। किस समूह में बैठोगे? अध्यापक सीमा को ले जाती है। (W2.5.14)

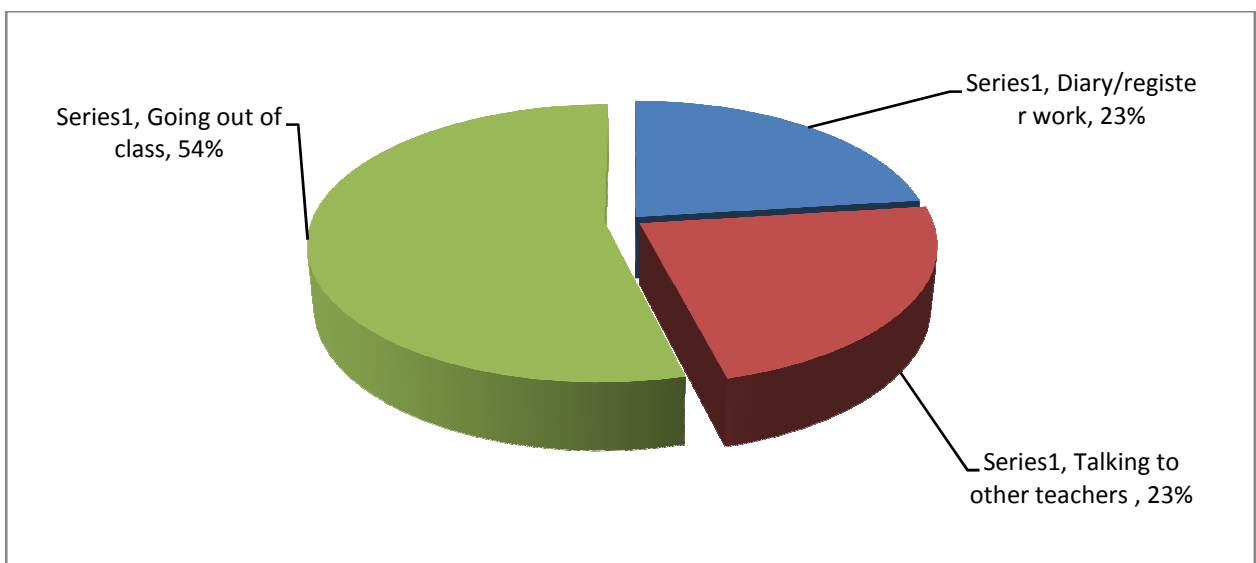
Table (10) : Teacher Routine Activity (%)

Activity	Baseline N= 133	Bodh N = 47
Diary / register work	23	51
Talking to other teachers	23	15
Going out of class	54	34
Total	100	100

Source : Classroom Culture Observations :Baseline and Interventions study.

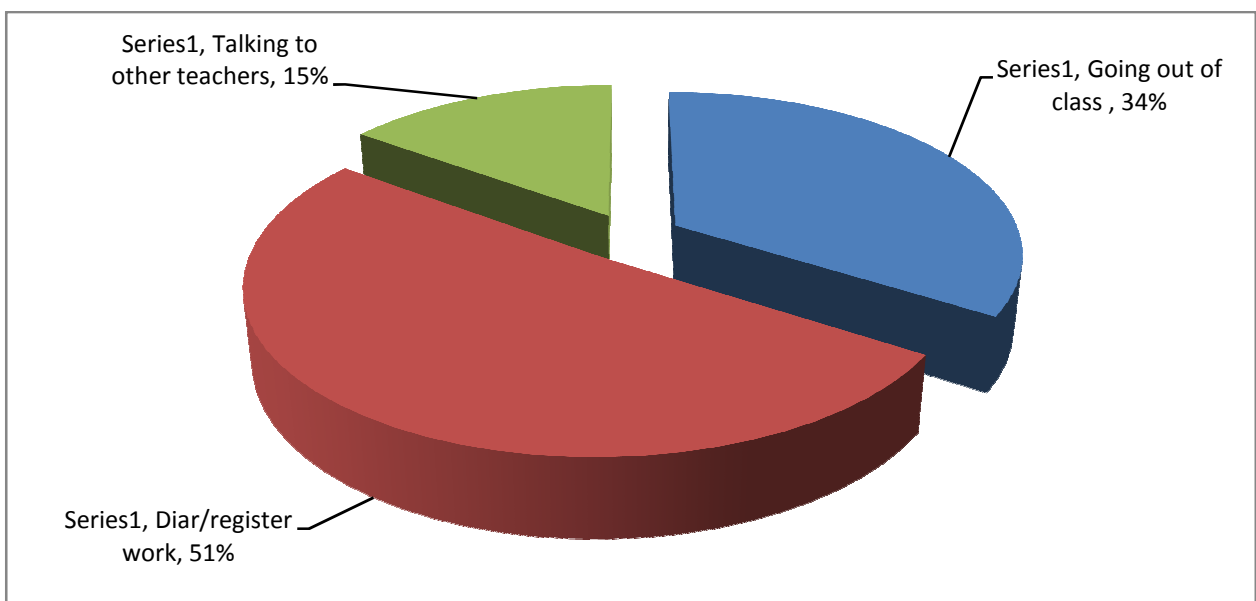
Teacher Routine Activity (%)

Baseline N = 113



Teacher Routine Activity (%)

Bodh N = 47



CLASSROOM MANAGEMENT

The Baseline study had indicated that physical punishment (61 percent) and reprimand (39 percent) were used as legitimate techniques to discipline and control children. The Bodh classroom presents a changed scenario. (Table 11) While beating (2 percent) and reprimand (12 percent) were used to the minimal extent possible, most energies appear to be directed towards evolving positive strategies to manage the classroom (86 percent). Children are for instance made aware of the rules and norms that should underline classroom behaviour. Teachers encouraged self-discipline among children, discussed children's problems with them, and had also evolved norms to accommodate children's regular basic needs such as drinking water and visiting the toilet. Reprimand when used was relatively mild in nature. This was clearly in contrast to the strategies of reprimand to in the Baseline study classroom.

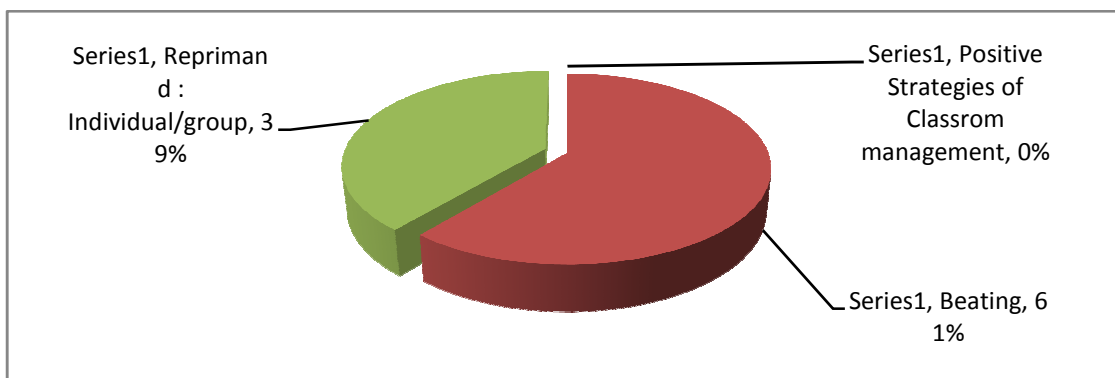
Table (11) : Classroom Management (%)

	Baseline N = 322	Bodh N = 202
Beating	61	02
Reprimand : Individual/ group	39	12
Positive Strategies	---	86
Total	100	100

Source : Classroom Culture Observations : Baseline and Intervention study

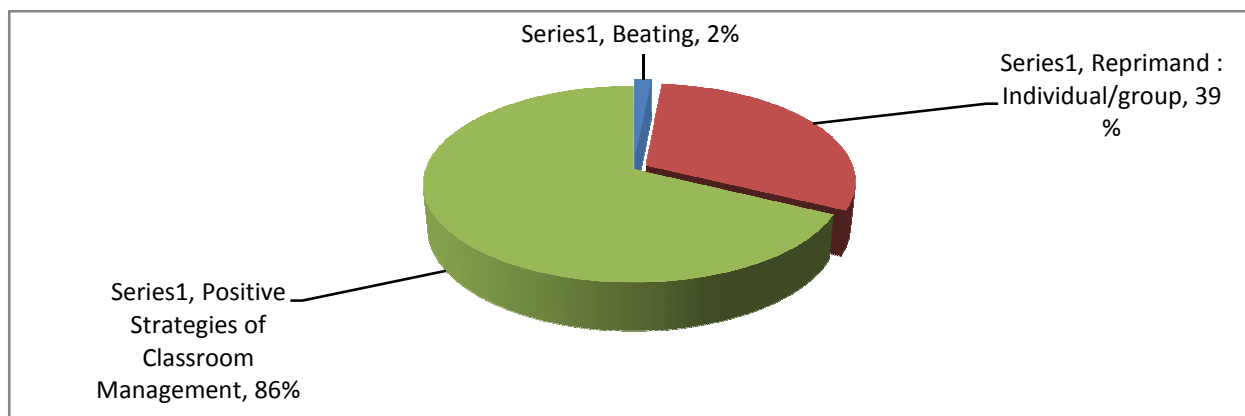
Classroom Management (%)

Baseline N = 332



Classroom Management (%)

Bodh N = 202



Children were also asked about the use of physical punishment in the classroom.⁹ The Baseline study children interviewed were emphatic that there was not a single child who had not been beaten by the teacher. Bodh children on the other hand did not deny the use of physical punishment by the teacher but clearly emphasised that it was not frequently resorted to. According to them around a fifth of children had received some sort of physical punishment. In general and as mentioned earlier the atmosphere of fear which was perceived by researchers in the Baseline study classroom was virtually absent in the Bodh classroom. This clearly underscores the qualitative difference in the culture of the two classrooms.

HOME AND SCHOOL : A BLURRING OF BOUNDARIES

As already discussed the boundaries between what is usually seen as 'legitimate school knowledge' and experiential knowledge of Bodh children is relatively blurred. Bodh teachers consciously encourage children to bring their own ideas and views to the classroom situations. It would be appropriate to say that the Bodh children are engaged in the construction and generation of knowledge through a participative and interactive pedagogic transaction. This is not the case with the Baseline study children.

The interaction between the school and the child's home through the teacher is also significantly greater for Bodh children as compared to Baseline study children. This was gauged from the community's perceptions of its relationship with the school. Around 35 of the 50 parents of the Baseline study children interviewed said that they had visited the school but mainly for administrative work.¹⁰ A larger number of parents of the Bodh children (47 of the 50 interviewed) had visited the school. Parents' visits were more in connection with matters relating to the education of their children. Parents said they attended parent-teacher meetings, discussed the progress of the child's learning as well as the strategies teachers follow to teach and discipline children. Parents of the Baseline study children noted that no teacher had ever visited the children's homes. On the other hand, the majority of parents of the Bodh children said that the teacher had visited their homes to discuss matters relating to the child, to find out why he or she was not coming to school if the child's attendance was irregular and to also encourage the enrolment of younger children. Not surprisingly only 7 of the 50 parents of the Baseline study children interviewed, knew the name of their child's teacher. The fact that even these few knew the name of their child's teacher was mainly because the teacher was known to them outside of the school. Around half the Bodh children's parents knew the name of their teacher and many even knew them in person.

It is significant that just as Bodh consciously draws the home and the community into the classroom, Bodh children carry their school experiences back home. In contrast to the Baseline study children, Bodh children talked at great length about their activities in school. Bodh children's parents said their children often discussed their school work, and their relationship with their teacher thus recreating at home the joyful atmosphere within the classroom.¹⁰ This speaks volumes of the positive self-image of children and their perception of the blurring of boundaries between home and school, also a significant indicator of the transformed primary classroom.

The attempt by Bodh teacher to strengthen links between home and school stems from the overall philosophy of Bodh to bridge the chasm that usually exists between the two. This has paid dividends in terms of enriching the learning environment of the Bodh classroom as well as in promoting a more

holistic development of children. The respect for the child's home and language as well his/her personal knowledge has been especially critical for the development of positive attributes among these children.

NOTES

1. For details of the perspective of the study and methodological approach refer Baseline study Report (1996).
2. The definition of categories for children's observations in the baseline study are given in Table 1 of the Baseline Report. Though the same broad categories have been retained in the intervention study there is a qualitative change in the nature of positive attributes of children as reflected in the sub categories. See Appendix. A.
3. Baseline study Report (1996), p. 13
4. In the Baseline Study one of the problem solving tasks allowed space for innovative response by children. However, this was not the case with the task given to class II children in Both studies