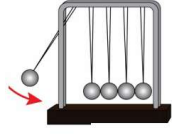


ZEAL EDUCATION



प्रयोग



Zeal Education Trust

Ahmedabad, Gujarat



Zeal Education
Ignite the genius in your child

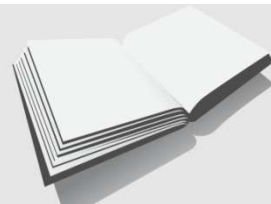


Table of Contents

Table of Contents	2
1. Executive Summary.....	3
2. Background	4
3. Rationale of the project.....	4
5. Proposed Project Activities.....	5
6. Monitoring & Documentation	6
7. Project Visibility	6
8. Project Outcome.....	7
9. Budget	7
10. Annexure: Sample Activities and Equipment.....	8



1. Executive Summary

Particulars	Description
Project Goal	The project's goal is to enable school teachers implement the activities given in the NCERT textbooks in Science, Mathematics and Social Sciences so that the process of education becomes more participatory and hands-on.
Project Objectives	• 2000 students' enthusiasm for learning improve significantly • 60 teachers find teaching fascinating through the new approach used in the textbooks
Rationale	Government school teachers find it very difficult to perform the activities prescribed in the NCERT textbooks, as they do not have the requisite materials in the school. This project aims to correct this situation by supplying and restocking all the material needed to perform the activities prescribed in the textbooks.
Target Beneficiaries	Students and teachers of targeted location.
Linkages with SDG's	• Quality Education (SDG 4) through improved access to high-quality educational resources. • Reduced Inequalities (SDG 10) by promoting inclusivity and equitable access to education. • Partnership for the Goals (SDG 17) through collaborations with educational institutions, governments, and corporations.
Geography	The proposed project will be implemented in 20 schools in a specific location (to be selected in consultation with the donor).
Concept	The project concept is to implement hands-on initiatives in schools across diverse regions, providing students with the opportunity to engage in experimental activities. Regardless of their background or location, students will have access to enriching experiences that foster curiosity and excitement about the curriculum. Teachers will find that they can do better justice to the curriculum.
Expected Outcome	A significant number of students continue education and perform superlatively, motivated by the program and its insights.
Project Duration	3 years.
Project Budget	Rs. 1,07,70,000

2. Background

All over the world, educators have been moving away from the "chalk and talk" method of education that was popular about 50 years ago. In such a school, typically, a teacher would read sentences out of a textbook, or make a student read them, go to the questions, make children mark the answers and declare that the lesson was "completed". There was little or no attempt to make sure that students understood what was being taught and more often than not, students had to go to tuitions, where (very often the same) teachers repeated what had been done in school!

Various new methodologies, like the Process Approach to Learning, Project Based Learning, Activity Based Learning, Constructivist Learning and Learner Centric Learning, have been proposed and put into practice to make learning a more enriching experience for the learner. While these methods differ in the details, all of them emphasise the active participation of the learner in the process of education. This is done through a series of activities that are ideally performed by the student or at least demonstrated by a teacher.



However, this creates a major problem, one of resources. The chalk and talk method needed only the textbook and a notebook, while an activity may require a lot more: a balloon, a glass bottle, some oil, ... Where does a teacher in a rural school procure such material?

3. Rationale of the project

The Government of Gujarat decided about 5 years ago to replace their textbooks with translations of the NCERT books. This had a surprising effect: most schools using the NCERT books are from class 1-10 or even 1-12 and have well equipped laboratories for science, maths or social sciences, as these are needed for classes 9-12. Thus, a teacher in such a school who desires to perform an activity from the textbook has no problem in procuring materials from the lab, be it a magnesium ribbon to demonstrate combustion, 3d solids to show how they can be folded from paper or a map of Europe to show the countries involved in the Second World War. Gujarat Government schools, on the other hand, are largely rural and are only from class 1-8 and teachers have no access to Laboratories. In the past, the Education Department has supplied kits to schools, but no training has been given to teachers nor has there been any attempt to restock kits to make good losses due to breakage or consumption.

This project aims to correct the situation by supplying and restocking the materials needed for the activities. It also involves training the teachers in how to perform each activity so that they can easily perform the same in their classes.

4. Profile of Zeal Education Trust

Zeal Education Trust was set up in January 2016 by **Dr. B R Sitaram** and **Ms. Sandhya Sitaram** to provide specific educational services to underprivileged schools through CSR programs sponsored by the corporates and other organizations. The main goal of the trust is to involve corporates in igniting the minds of students of the underprivileged section of the

Zeal Education Trust - પ્રયોગ Program

society so that they also get opportunities to get into mainstream professions.

Zeal Educational Trust is involved in innovative education programs, especially in science and maths. Our specially customized Maths/ Science **Teachers Training Workshops**, thoughtfully designed **Model Making and Experiments Education kits** focus to bring quality to education. Zeal's program for Corporate Social Responsibility makes education more valuable through non-traditional ways of learning. These programs bring a turning point in the perspective of students and teachers towards maths and science, which we consider a significant and noteworthy achievement!

Our programs are aimed at ensuring that children look upon science and mathematics as fascinating subjects that they want to learn. We do this by making our programs entertaining and enlightening: fun with learning!



5. Proposed Project Activities

This intervention is typically focused at **20 schools** taken as a cohort. The program will last for 3 years. The various phases of the program are:

Year 1:

1. A list of 20 schools in the specified geographical region will be identified. The local education authorities will be contacted for permissions and to fix suitable dates for the workshops. Principals of the selected schools will be informed about the purpose of the project. One teacher each from Science, Mathematics and Social Studies will be selected by the principal to attend the training workshops.
2. During the year, a total of 9 workshops will be arranged for each target class. Of these, 3 workshops of 3 days each will be devoted to Science, 3 workshops of 2 days each will be devoted to Maths and 3 workshops of 2 days each will be devoted to Social studies (a total of 21 days). Thus, if the target is classes 6-8, the workshops will last for 63 days for all three classes.
3. At the time of the workshops, two kits will be used by the teachers to try the activities. Immediately after the workshop, one set of kits will be given to each school. Each kit will consist of all the materials needed for the activities. The school kits will be of 3 kinds:

#	Description	Examples	# per kit
1	Those activities that are to be demonstrated by the teacher only	Those requiring the use of potentially hazardous chemicals, fire and delicate equipment	One
2	Those that need to be performed by groups of students	Trying to experiment with friction by pushing an object, making a simple musical instrument using a rubber band and a box and exploring simple circuits.	5 sets for 30 students
3	Those that need to be performed by every student	Making lists of shapes in geometry, making lists of states in India and making lists of crops grown in the district.	30 sets for 30 students

4. During the academic year, teachers will use the materials in the kits to perform the activities prescribed in the textbooks.

Zeal Education Trust - પ્રયોગ Program

5. Teachers will be required to maintain log books detailing what activities have been performed in the class. Random checks will be made to ensure the correctness of the records. They would also be submitting videos and photographs showing activities being performed in the class. Students will be keeping all their activity sheets till the end of the year and random checks will be made at the end of the year.
6. WhatsApp groups will be formed with all the teachers so that they can exchange experiences with each other and with us. Virtual assistance will be provided throughout the year by us.

Year 2 and 3:

1. At the beginning of the year, a survey will be made of the stocks in each school to determine which materials need to be re-supplied.
2. 3 workshops of 1 day each (3 days in all) for each target class will be arranged, where feedback about the previous experiences will be shared.
3. All the required materials will be supplied to ensure that the kits are complete.

6. Monitoring & Documentation

Project Monitoring

The program is monitored during the workshops through **observations** and **teacher feedback**. Once the teachers start the school program, a constant monitoring of activities through **videos** and **images** will be sent on the WhatsApp group. In case teachers do not appear to be active, they are contacted and asked to resume activities. In this scenario, interactions will be held with principals.



Documentation

Recordings and notes would be prepared

- Report after each workshop is completed
- Report after the academic year is completed based on teachers' log books and student activity files.
- Images and videos of the workshops and activities in the school.
- Feedback by the teachers and the students
- Case studies of the students in terms of how the intervention helped them and best practice models

7. Project Visibility

- A Banner will be designed bearing the name and logo of the corporate, along with the name and logo of Zeal Education Trust
- The banner would be displayed during the workshops
- Each box of material supplied to the schools will bear the same poster in the form of a sticker

8. Project Outcome

The success of this intervention lies mainly in terms of better learning experiences and better performance in tests and examinations. The impact of the intervention will be felt for many years after the students pass out of the target classes and we expect most students to become better learners.

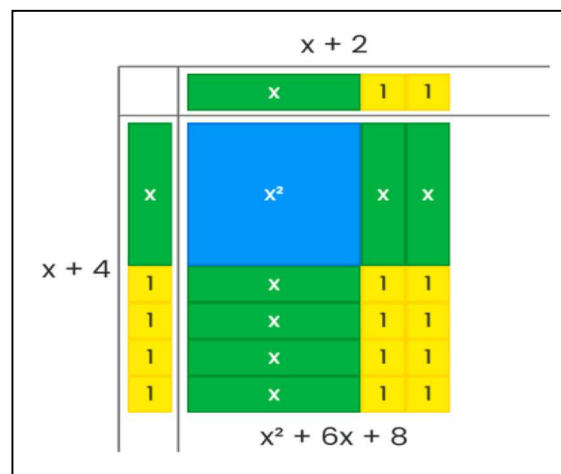
9. Budget

	Year 1		
A	Activity		Cost
1	Approval Meetings	Meeting Education Deptt officers and principals	25,000
2	Kits for Workshops and Schools	Rs. 1.5 lakhs for Science kits x 20 schools Rs. 1 lakhs for Maths kits x 20 schools Rs. 0.5 lakh for Social Studies kits x 20 schools	60,00,000
3	Resource Person Allowance	2 persons x 63 days x 5,000 per person per day	6,30,000
4	Refreshment during the Workshop	Rs 200 per person per day x 25 persons x 63 days per workshop	3,15,000
	Total Activity Cost		69,70,000
B	Human Resources		
1	Project In Charge	12 months x 30,000 per month	3,60,000
	Total Human Resources		3,60,000
	Total for Year 1		73,30,000
	Year 2		
C	Activity		
1	Approval Meetings	Meeting Education Deptt officers and principals	25,000
2	Restocked kits	20% of original cost	12,00,000
3	Resource Person Allowance	2 persons x 9 days x 5,000 per person per day	90,000
	Refreshment during the Workshop	Rs 200 per person per day x 25 persons x 9 days per workshop	45,000
	Total Activity Cost		13,60,000
D	Human Resources		
1	Project In Charge	12 months x 30,000 per month	3,60,000
	Total Human Resources		3,60,000
	Total for Year 2		17,20,000
	Year 3		
E	Activity Cost		
1	Approval Meetings	Meeting Education Deptt officers and principals	25,000
2	Restocked kits	20% of original cost	12,00,000
3	Resource Person Allowance	2 persons x 9 days x 5,000 per person per day	90,000
	Refreshment during the Workshop	Rs 300 per person per day x 25 persons x 9 days per workshop	45,000
	Total Activity Cost		13,60,000
F	Human Resources		
1	Project In Charge	12 months x 30,000 per month	3,60,000
	Total Human Resources		3,60,000
	Total for Year 3		17,20,000
	Grand Total for Year 1		73,30,000
	Grand Total for Year 2		17,20,000
	Grand Total for Year 3		17,20,000
	Grand Total for all years		1,07,70,000

10. Annexure: Sample Activities and Equipment

Class	Subject	Reference	Activity	Equipment to be supplied
6	Science	8.7	Effect of surface area on evaporation	Various containers of different surface areas
7	Science	Activity 35	Measuring a room	Scales, Measuring Tape
8	Science	11.2	Checking which liquids conduct electricity	LED, Cell, Wires, Small containers
6	Maths	Chapter 4	Representing Data	Worksheets
7	Maths	Chapter 6	Triangles	Drawings of triangles
8	Maths	Chapter 8	Algebraic expressions and identities	Algebra Tiles
6	Social Studies	Chapter 8	Diversity	Worksheets
7	Social Studies	Chapter 7	Local customs	Worksheets
8	Social Studies	Chapter 2	Land usage	Blank maps

Note: All references are to the online versions of the NCERT textbooks, downloaded from <https://ncert.nic.in/textbook.php>



Algebra Tiles