DISTRICT INSTITUTE OF EDUCATION AND TRAINING, KURUKKATHI, NAGAPATTINAM DISTRICT RESEARCH ABSTRACT 2023-2024

SL.NO	RESEARCH PROJECT NO	RESEARCHER NAME	PROJECT TITLE
			Problems Faced By The Primary
		Dr.G.KAMARAJAN	School Teachers In The
1.	TN -NGP 01	SENIOR LECTURER	Implementation Of Ennum Ezhuthum
			Programmes And Probable Solutions
			To Its
2.	TN -NGP 02	Mr.N.RAVISANKAR	The Impact of Life Skills Training On
		SENIOR LECTURER	The Emotional Intelligence Of High
			School Students
3.	TN -NGP 03	Mrs.M.RANI	Enhancing 9 th standard students
		LECTURER	understanding of the concept,
			'Photosynthesis' through ICT
4.	TN -NGP 04	Mr.S.BALAJI	To Enhance The Select Learning
		LECTURER.	Outcomes Of Mathematics Among Fifth
			Standard Students Through Ennum
			Ezuthum Classroom Approach

Project 2023-2024 Abstract

Name of the DIET : District Institute of Education and Training,

Nagapattinam

Name of the Investigator : Dr.G.Kamarajan Senior Lecturer

Title :

PROBLEMS FACED BY THE PRIMARY SCHOOL TEACHERS IN THE IMPLEMENTATION OF ENNUM EZHUTHUM PROGRAMMES AND PROBABLE SOLUTIONS TO ITS

INTRODUCTION

The implementation of Ennum Ezhtum programs poses significant challenges for primary school teachers, as they navigate complex educational landscapes. These challenges encompass diverse aspects such as curriculum alignment, pedagogical strategies, assessment methodologies, and classroom management techniques. The effective execution of these programs requires a nuanced understanding of student needs, differentiated instructional approaches, and adeptness in leveraging educational technologies. However, teachers often encounter obstacles related to limited resources, inadequate training, time constraints, and varying student readiness levels. These hurdles can impede the seamless integration of Ennum Ezhtum initiatives into everyday teaching practices, hindering the attainment of desired learning outcomes. In this study, the researcher aims to identify these challenges comprehensively, analyze their impact on teaching and learning processes, and propose viable solutions to enhance the efficacy of Ennum Ezhtum programs in primary school settings.

NEED AND SIGNIFICANCE OF THE STUDY

The need and significance of studying the problems faced by primary school teachers in implementing Ennum Ezhtum programs and finding probable solutions to these issues lie in several critical areas. Firstly, understanding these challenges is crucial for educational policymakers, curriculum developers, and teacher training programs to design targeted interventions and support mechanisms. By identifying the specific hurdles that teachers encounter, stakeholders can tailor professional development initiatives and resource allocation strategies to enhance teachers' capacity to deliver Ennum Ezhtum programs effectively. Additionally, addressing these challenges is essential for ensuring equitable access to quality education, as successful implementation of such programs directly impacts students' learning outcomes and overall educational experiences. Moreover, this study contributes to the existing literature on teacher professional development and educational reform efforts, offering insights into best practices and evidence-based strategies for improving teaching and learning in primary school settings. Ultimately, by investigating these issues and proposing viable solutions, this study aims to foster positive changes in primary education, benefitting both teachers and students alike.

OBJECTIVES

- 1. To identify Problems in teaching through Ennum Ezhuthum (EE) classroom.
- 2. To identify Problems in assessments in the implementation of Ennum Ezhuthum classroom.
- 3. To gather information on classroom management problems in the Ennum Ezhuthum classroom.
- 4. To collect possible suggestions for addressing Ennum Ezhuthum classroom problems.

.RESEARCH OUESTIONS

- 1. What specific challenges do primary school teachers encounter during the implementation of Ennum Ezhuthum programmes?
- 2. How do these challenges impact the teaching and learning processes in the classroom?
- 3. What strategies do primary school teachers currently employ to address these challenges?
- 4. What are the perceptions of primary school teachers regarding the effectiveness of Ennum Ezhtum Ezhtum programmes in enhancing student learning?
- 5. What probable solutions can be identified to mitigate the challenges faced by primaryschool teachers in implementing Ennum Ezhuthum programmes?

METHODOLOGY

Method

The present study adopted a qualitative method

Sample

The participants in the study were teachers responsible for instructing in both government and government-aided schools within the Nagappattinam block. The selection of these participants was carried out using non-random sampling techniques, specifically convenience and snowball sampling. Convenience sampling was used to simplify the selection process by involving participants already engaged in the study. These initial participants then recruited additional participants, justifying snowball sampling as the main technique. Consequently, 20 teachers from various schools, including National Primary School, PN Bank, National Primary School, Nattuvar West School, Municipal Primary School, Nagapattinam, Municipal Primary School, Palpannaicehrry, PUPS Nithanamangalam, PUPS Periyanariyankudi, PUPS Puliyur, CSI Primary School, Keeraikottai, Municipal Primary School, Melakottaivasal, PUMS Keechankuppam, MPS Nagapattinam schools, PUPS Papakoil, PUPS Thetthi, PUPS Newkallar, PUPS, Akknipettai, MMS, Kallukera street, PUPS Sellur, PUPS Ivanallur, PUPS Veernakudikadu, PUPS Pogainathur (North), participated in the semi-structured interviews.

Tool

In the study exploring the difficulties faced by primary school teachers in addressing problems with the implementation of the Ennum Ezhuthum programme, a semi-structured interview approach is employed.

Data Analysis

Thematic Analysis was used in this study

FINDINGS

The study revealed several challenges and feasible solutions related to learning and teaching activities, evaluation and classroom management within the Ennum Ezhuthum program:

Learning and Teaching Activities Challenges

- Arumpu level students require continuous training and individual attention for effectivelearning outcomes.
- Challenges include adapting activities to different levels, managing time constraints, and integrating teaching materials seamlessly.
- Students struggle with writing proficiency, spelling, and comprehension in Tamil language learning.
- Pronunciation, reading comprehension, and responding to stories pose significantchallenges.
- Specific areas like counting and writing skills in English present hurdles for students.
- Integrating teacher-controlled activities and implementing curriculum activities as perthe Ennum Ezhuthum framework are challenging.
- Sequencing activities for subtraction, changing problem types, and recognizing numberstructures are areas of difficulty in math education.
- Individual attention, heterogeneous teaching environments, and completing plannedactivities are key challenges.
- Limited time constraints, adapting activities for different learning levels, and incomplete activities are significant challenges.
- Integrating teaching materials like teacher's handbooks, students' workbooks, andtextbooks requires careful planning and execution.
- Limited phonics instruction, challenges in individualized instruction, and time constraints affect reading proficiency.
- Writing proficiency faces hurdles like insufficient time for differentiated instruction and challenges in developing specific activities.

Solutions for Learning and Teaching Activities

- Ensure regular and consistent training for students, especially at the Arumpu level.
- Provide individualized attention to cater to the specific needs of each student.
- Organize and systematically deliver instructions to aid comprehension and retention.
- Include additional content during training sessions to reinforce learning.
- Use simple sentences for reading practice and ensure regular practice sessions.
- Emphasize pronunciation and reading comprehension through continuous practice.
- Provide training in problem-solving skills and handling number patterns.
- Continuously train students in sequencing activities and recognizing number structures.
- Increase teaching time and allow flexibility in handling learning levels independently.
- Select and focus on activities that are most beneficial and feasible within the timeconstraints.
- Plan and execute teaching materials integration carefully, limiting teaching sessions.
- Use individual modules to match the learning levels of students.
- Provide continuous training in phonics and literacy, focusing on individual needs.
- Prioritize individualized learning for students at the basic level.
- Ensure continuous and extensive writing training, focusing on letter sequences and individualized attention.
- Use holidays and break times effectively to conduct additional training and activities.
- Manage EMIS registrations and work-related tasks efficiently to maximize teachingtime.
- Utilize talented students to assist in training and group coaching.
- Focus on overcoming fear and hesitation through confidence-building activities and group interactions.

Evaluation Challenges

- Intermediate-level students need more time for assessments, and evaluating Englishcourse exercises comprehensively is difficult.
- Completing standard operations during assessments and maintaining test integrity arechallenges.
- Risk aversion in assessments, delays in evaluating course notes, and overemphasis onpractice manuals are common challenges.
- Ensuring fair and comprehensive evaluations across coursework activities is a priority.
- Individual explanations for questions, unreliable internet connectivity, and difficulties for students unfamiliar with online tools are challenges.

- Ensuring smooth online assessment experiences for all students is crucial.
- Challenges include conducting directory tests effectively, managing assessments forfew students, and maintaining test confidentiality.
- Ensuring accurate assessments and providing fair feedback are key considerations.

Solutions for Evaluation Challenges

The study proposed several feasible solutions to address the identified evaluation challenges:

- Allocate additional time for intermediate-level students to complete their assessments.
- Simplify the number of activities in the English course to make evaluation moremanageable.
- Ensure practice sheets are completed and signed daily to track progress.
- Schedule separate classes dedicated to the evaluation of coursework activities.
- Encourage the use of notepads in the classroom to facilitate timely evaluation andreduce reliance on practice manuals.
- Minimize the need for online assessments and opt for written assessments wherefeasible.
- Allocate additional days for assessments to accommodate internet connectivity issues.
- Ensure students take online exams separately to maintain confidentiality and fairness.
- Conduct assessments in small groups to manage individual attention effectively.
- Take and evaluate individual students separately to prevent revealing answers to theentire class.
- Provide continuous training on understanding and responding to directory testquestions.
- Simplify directory tests to make them more accessible to students.
- Emphasize the importance of written examinations and gradually transition students from oral to written assessments.

Classroom Management Challenges:

- Arumpu level students face challenges in adapting to the classroom environment and joining school initially.
- Managing conflicts between different learning levels and fostering a conducive learning environment for all students are priorities.
- Insufficient time, student attention issues, and conflicts between learning levels impact engagement.
- Ensuring active participation and meaningful learning experiences for all students are challenges.
- Building effective teacher-student relationships, addressing s, and managing conflicts

require attention.

- Establishing a positive classroom atmosphere conducive to learning is crucial.
- Managing sports-related distractions, addressing quick task completion implementing standardized discipline interventions are challenges.
- Ensuring fair and consistent disciplinary measures and addressing effectively are priorities.
- Implementing interventions to standardize discipline and ensuring consistent disciplinary actions across all students are key challenges.
- Establishing clear guidelines and protocols for disciplinary actions is crucial for classroom management.

Solutions for Classroom Management Challenges

The study proposed several feasible solutions to address the identified classroom managementchallenges:

- Implement level-wise play and coaching to help Arumbu level students adapt.
- Teach intermediate-level students using play methods.
- Consider assigning a separate teacher for Arumbu level students to provide more focused attention.
- Schedule activities and exercises without disrupting the school day.
- If feasible, create separate classes to better manage varying learning levels.
- Design activities that are engaging and appealing to all students to maintain their attention.
- Use storytelling to teach values and ethics, which can help mitigate conflicts and build better relationships.
- Seat students according to their class levels to reduce conflicts and enhance focus.
- Foster an environment where students feel secure and fearless, encouraging open communication and engagement.
- Provide patient counseling to address behavioral issues.
- Encourage collaboration between different learning levels by having Cane and Bud stage students engage in activities with Flower stage students.
- Create structured activities that keep students occupied and reduce disruptive behaviors.
- Group students for easier management and control.
- Motivate students by organizing activities and rewarding their efforts with prizes.
- Establish and communicate clear guidelines and protocols for disciplinary actions toensure fairness and consistency.

CONCLUSION

The study on the Ennum Ezhuthum programs reveals significant challenges in curriculum implementation, instructional strategies, assessment practices, classroom management, and technology integration. Teachers demonstrated resilience and dedication in adapting to new methodologies. Key issues include managing diverse learning levels, ensuring student engagement, fostering positive teacher-student relationships, and maintaining consistent disciplinary measures. Solutions involve targeted professional development, technological support, collaborative learning communities, and increased parental involvement. Implementing effective classroom management strategies, such as level-wise play, storytelling, and patient counseling, can create a more inclusive and effective learning environment, leadingto better educational outcomes.

EDUCATIONAL IMPLICATIONS

The study's implications highlight the necessity of aligning Ennum Ezhtum programme materials with existing curriculum standards and teaching practices to ensure effective implementation. Ongoing professional development opportunities are essential to equip teachers with the skills needed for successful programme delivery, including simplifying language and providing clear instructions. Additionally, developing comprehensive resources such as handbooks, workbooks, and supplementary materials is crucial for supporting teachers and promoting student engagement. Collaborative planning sessions among teachers and strengthening partnerships with parents further enhance the programme's effectiveness and contribute to continuous improvement in primary education.









Name of the DIET: DIET Kurukkathi, Nagapattinam District

Name and Designation of The Researcher: N. RAVISANKAR, SENIOR LECTURER

TITLE: THE IMPACT OF LIFE SKILLS TRAINING ON THE EMOTIONAL INTELLIGENCE OF HIGH SCHOOL STUDENTS

1.INTRODUCTION:

The term "Life Skills" refers to a broad group of psychosocial interpersonal skills that can help an individual to make important decisions in life. Beyond reading, writing, and arithmetic, a child needs to develop a broad set of competencies cognitive, social, and practical skills to cope with the challenges of the competitive world confidently. The World Health Organization WHO (1994) identified a core set of Life Skills. They are the skills of Problem Solving, Decision Making, Goal Setting, Critical Thinking, Creative Thinking, Communication Skills, Assertiveness, Self-awareness, Empathy, and Skills for coping with stress and emotions. These skills are pivotal to leading a healthy and happy life. There are three broad categories of skills namely, Cognitive skills that help analyze and use information, Personal skills for managing oneself, and Interpersonal skills for communicating with others.

2. NEED AND SIGNIFANCE:

Life Skills Education is a participatory- learning structured program based on needs and outcomes. It aims to increase positive behavior in individuals. It is theory and evidence-based. It is imparted by competent facilitators and is learner-focused. Life Skills-based education (LSBE) encompasses specific content to achieve specific goals. This helps learners develop knowledge and also psycho-social Life Skills. Particular emphasis is laid on those skills related to Critical Thinking and Problem Solving. A combination of knowledge, values, and attitudes along with self-management and communication skills, interpersonal skills, and personal development skills is taught in a Life Skills class. Life Skills help an individual to face difficult situations in life courageously deal with adversities more effectively and live life successfully to attain personal satisfaction.

3. OBJECTIVES:

- 1. To find out the level of emotional intelligence among high school students.
- 2. To evaluate the reasons for declining emotional intelligence among high school students.
- 3. To find out the impact of the intervention on high school students in emotional intelligence.
- 4. To assess the improvement in emotional intelligence among high school students.

4.HYPOTHESIS OF THE STUDY:

- 1. There is a significant relationship between life skills and emotional intelligence among high school students
- 2. There is a significant influence of intervention activities on life skills and emotional intelligence

among high school students

3. There is a significant improvement in life skills and emotional intelligence among high school students

5.METHODOLOGY:

A) METHOD:

Design: Single group experimental design with pre-test, intervention, and post-test were adopted.

B) SAMPLE: For the present study 82 IX th standard students were selected from GHSS Thanikkottaham at Vetharanyam block in Nagapattinam district as the sample.

C) INTERVENTION:

- 1.Life skill training and motivation classes were conducted.
- 2.Life skills video content was shown.

D)Tool: Emotional intelligence questionnaire.

E) DATA ANALYSIS

Test	Number	Mean	SD	"t" value
Pre-Test	82	26.5488	5.39811	7.5095
Post – Test	82	36.0488	5.23026	

Table shows pre and post-test value of Total students

Average	26.5488	36.0488
S. D	5.39811	5.23026
t test value	7.5095	
Correlation	0.88101	

Table shows pre and post-test value of boys only

Average	46.51428571	63.88571
S. D	3.884243044	4.463758
t test value	2.7465	
Correlation	0.869967725	

Table shows pre and post-test value of girls only

Average	55.63265306	75.02041
S. D	5.587750978	4.556773
t test value	2.1101	
Correlation	0.866918606	

6.MAJOR FINDINGS

- 1.The results of the study provoked significance to impact of life skill training approach on the emotional intelligence among the IX th standard students.
- 2 Post-test value of emotional intelligence is greater than the pre-test value of Boys.
- 3. Post-test value of emotional intelligence is greater than the pre-test value of Girls.

7. EDUCATIONAL IMPLICATIONS

The study will be investigated the impact of Life Skill training on the emotional intelligence of high school students. This study will be focused on the students studying in the High school class. This may also be considered a valuable contribution to the field of research. The study will be recommending the various stakeholders in education namely parents, teachers, heads of institutions, government policymakers, and curriculum framers take the findings of this research seriously and make Life Skills a compulsory subject of study in the framework of the curriculum.

8.CONCLUSION

Life Skills enhance emotional intelligence. This is the empirical contribution that this study has made. Life Skills will shape behavior. Life Skills will influence Academic Achievement. The development of cognitive skills paves the way for higher academic achievement.

Photos



Research tool validation workshop



Life skill trainer's speech



Pre test



Rsearcher's motivational speech

- **1.Name of the DIET**: Kurukkathi Nagapattinam
- 2.Name and designation of the researcher: M.Rani Lecturer
- **3.Title**: Enhancing 9th standard students understanding of the concept, 'Photosynthesis' through ICT
- **4.Introduction:** Learning about biological concepts and processes in the Photosynthesis can be challenging since many biological processes are not tangible or visible to the naked eye. Therefore, biology education often includes models to help students visualize micro-processes. The adage 'a picture is worth a thousand words' refers to the powerful impact that static visualizations have in conveying complex phenomena. However, research has shown that these representations are not always perceived as intended. Representations have various meaning potentials, such that students themselves need to interpret and make sense of each given representation. When a static visualization presents an invisible dynamic process (e.g. related to molecular genetics), the task of interpreting and making sense of there presentation is even more demanding because students must imagine the dynamic aspect of the process.

5. Need and Significance:

In science education, animations and static visualizations are developed to display complex or abstract scientific concepts and processes. They are designed by experts in the field and come with clear meaning potentials.

Photosynthesis are crucial to life: no Photosynthesis – no life. At first glance, this connection seems both simple and straightforward, yet it is anything but.

Due to the importance of understanding mechanisms of leaf, Photosynthesis is globally regarded as a cornerstone of botany and education in the field biology.

6.Objectives:

- To find out the level of understanding the concept of 'Photosynthesis' among ninth standard students.
- To prepare videos to enhance the understanding the concept of Photosynthesis among ninth standard students.
- To find out the impact of videos in the understanding the concept of 'Photosynthesis' among ninth standard students.

7. Hypothesis

- 1. There is a significant difference between pre-test and post-test achievement score in understanding the concept of photosynthesis among the 9th standard students.
- 2. There is a significant difference between pre-test and post-test achievement score in understanding the concept of photosynthesis among the 9th standard boys students.

3. There is a significant difference between pre-test and post-test achievement score in understanding the concept of photosynthesis among the 9th standard girls students.

8. Methodology

- **1.Method**; Single group Experimental Method was adopted for this stud\y.
- **2.Sample:** Fifty students of class IX students of GHSS Girls (25)and Boys (25)Kuthalam the sample for this study.
- **3.Intervention**: The following intervention strategies are planned to implement to find out the impact of the same on the understanding of the concept Photosynthesis by ninth standard students.
 - ▶ PPT
 - Videos
 - > Animation videos
 - Static Visualization for Photosynthesis
- **4.Tool:** Achievement Test on the concept of Photosynthesis will be prepared for 25 marks (MCQs) maximum to test the level of understanding of the concept and achievement in the same.
- **5.Data analysis**: The data collected and processed by using the mean, SD,Effect size and t-test **TOTAL STUDENTS (BOYS AND GIRLS) IN PRE-TEST AND POST-TEST PERCENTAGE-Table-1**

S.NO	TEST	PERCENTAGE
1.	PRE TEST	33.44
2	POST TEST	84.48

TOTAL STUDENTS (BOYS AND GIRLS) 't' VALUE-Table-2

S.NO	TEST	N	MEAN	STANDARD	't' VALUE
			VALUE	DEVIATION	
1	PRE TEST	50	8.36	1.438	
2	POST TEST	50	21.12	1.394	45.409

TOTAL STUDENTS (BOYS AND GIRLS) IN EFFECT SIZE -Table-3

S. NO	TEST	N	MEAN VALUE	STANDARD DEVIATION	EFFECT SIZE
1	PRE TEST	50	8.36	1.438	
2	POST TEST	50	21.12	1.394	9.153

9. Major finding;

- The average achievement mark in pretest is 33.44 for total number of students and in posttest is 84,48 so there is a significance between pretest score and post test scores. so the above table revels that the post test scores(84.48) is higher than the pre test scores(33.44)
- The above table 1 reveals that the percentage score the posttest mark obtained by the total number of students in the achievement test on the concept of photosynthesis is higher than the percentage of the pretest mark obtained by the total number students in the achievement test on the concept of photosynthesis. It is therefore reveals that there is significant impact of videos and that the visuals in the understanding photosynthesis among ninth standard students.
- The above table 2 to reveals that the total students post-test mean scores 21.12 is greater than total students pre-test mean scores 8.36. The calculate 't' value 45.409 is greater than the table value 1.699 at 5% of significance. There is a significant difference between pre-test and post marks among ninth standard students in understanding concept of photosynthesis hence the hypothesis is accepted.
- The above table3 to reveals that the mean value in pretest is 8.36 and standard deviation is 1.488 and mean value in post testis 21.12 and standard deviation 1.394 hence the effect size is 9.153

10.Conclusion; The study findings suggest that using educational videos can be a more effective approach to teaching the concept of photosynthesis to 9th standard students compared to traditional lecture-based methods. The visual and interactive nature of videos appears to help students better comprehend this complex biological process.

11.Educational Implications:









- The findings of this study suggest that incorporating well-designed video-based lessons can be a valuable pedagogical approach for teaching complex science concepts, such as photosynthesis, to 9th grade students. The researchers recommend:
- Integrating video-based instruction as a complement to traditional teaching methods, rather than as a complete replacement.
- The findings suggest incorporating well-designed educational videos can be a valuable supplement or alternative to traditional lecturing when teaching complex science topics like photosynthesis.
- Videos may be particularly helpful for visually demonstrating processes that are difficult to fully convey through static diagrams or verbal explanations alone.

Name of the DIET: DIET Kurukkathi, Nagapattinam District

Name and Designation of The Researcher: S. BALAJI Lecturer

TITLE: TO ENHANCE THE SELECT LEARNING OUTCOMES OF MATHS AMONG FIFTH STANDARD STUDENTS THROUGH ENNUM EZUTHUM CLASSROOM APPROACH

1.INTRODUCTION

To monitor improvement in children learning levels and to periodically assess the health of the government education system as a whole, the NCERT has been periodically Conducting national achievement surveys since 2001, for class 3,5, and 8. This information can be used to impact polices and interventions for improving children's learning under various programs. Based on Class -V NAS District Report Card performance of student's boys (43) and girls (43) respectively. In comparison with National average percentage in Mathematics (44) the Nagapattinam district scored overall (43) respectively. In Mathematics subjects Students are scored low achievements in Lo number M512 Explores the area and perimeter of simple geometrical shapes (triangle, rectangle, square) in terms of a given shape as a unit and M506 identifies and forms of equivalent fractions of a given fraction and M 515 Identify the patterns in triangular numbers and square numbers topics respectively. The purpose of our project focus to identify low achievements learning outcomes in mathematics and enhance students perform in learning outcomes in Mathematics by adapting Ennum Ezuthum class room approach

2. NEED AND SIGNIFANCE

The study helps to identify low achievements in v standard Mathematics students and used Ennum Ezuthum class room approach. The main purpose of the study is to improve low achievement of learning outcomes in Mathematics based on Nagapattinam district report card among the v standard students. This study also examines various learning gapes in Mathematics among learners.

3. OBJECTIVES

- To identify the low achievement of learning outcomes in Mathematics among the v standard students
- To analyse the possible causes for the low achievement in Mathematics among the v standard students
- To find out the achievement level of Mathematics among v th standard students in pre-test.
- To select and use Ennum Ezuthum ICT strategy in the understanding of the subject Mathematics among the v standard students.
- To find out the achievement level of Mathematics among v th standard students in post-test.

4. HYPOTHESIS OF THE STUDY

- There is no Significant difference between pre- test and post- test scores students.
- The student's improvement of achievements in Mathematics do not differ before and after intervention strategy.
- Male and female students in pre- test score of control group do not differ significantly on Achievement of Test score
- Male and female students in pre- test score of experimental group do not differ significantly on Achievement of Test score
- Male and female students in post- test score of control group do not differ significantly on Achievement of Test score.
- Male and female students in post- test score of experimental group do not differ significantly on Achievement of Test score.

5. METHODOLOGY

A) METHOD

- Experimental method.
- Control group conventional Ennum Ezuthum Approach-Experimental Group Ennum Ezuthum ICT adopted Approach
- Two Groups Pre- Test-Intervention-Post-Test Design

B) SAMPLE

- Two schools of Nagapattinam district (PUPS valivalam and PUPS Thirukannapuram)
- 30 students from each school were selected to carry out research work

C) INTERVENTION

In Control group the researcher adopts M412 M506 M515 learning outcomes to conventional Ennum Ezuthum Approach among 5 th std students

In Experimental Group the researcher adopts same learning outcomes for various ICT adopted Approach like QR code, Animated videos and available resources in Internet.

The researcher conducts control and experimental Groups Pre- Test-Intervention-Post-Test design and find out the impact of ICT adopted Ennum Ezuthun approach compared to Ennum Ezutum conventional approach. For this purpose 30 questions taken and validated by use of present study.

D)Tool

• Mathematics Achievement Test

E) DATA ANALYSIS

Data collection made by investigator. Individual score is recorded.

The tool is validated by experts. The investigator conduct pre-test and post-test and Individual score is recorded

The collected data processed by suitable statistical measures like

Mean deviation, standard deviation, t test and F test

Group	Sex	Pre - Test		"t"value	Post- Test		"t"value
Отопр	Sex	Mean	Std. Dev		Mean	Std. Dev	
	Male	5.10	2.02		15.10	2.66	
	(15)			1.45			0.706
Control	Female	6.33	2.13	_	14.40	2.77	-
	(15)						
	Total	5.71	2.0595		14.75	2.715	
	Male	8.0	1.320		22.7	2.05	
	(15)			1.58			
Experimental	Female	8.3	1.181	_	22.2	2.40	0.998
	(15)						
	Total	8.15	1.375		22.45	2.225	-

Test	Number	Mean	SD	"t" value
Post-Test (Control Group)	30	14.75	2.715	12.10
Post – Test (Experimental Group)	30	22.45	2.225	12.10

6.MAJOR FINDINGS

- 1 The results of the study provoked significance of technology oriented Ennum Ezuthum approach among the students.
- 2. The Experimental Group Ennum Ezuthum ICT adopted Approach could significantly improve the achievement score among the 5th standard students.
- 3. The hypothesis states that male and female students in both control group and experimental group do not differ significantly on Achievement score. The t- test results shows that statistics of value 12.10 which is significant in table value. The calculated t- value was greater than the table t- value

and hence the hypothesis was rejected. The results indicate that both control and experimental group differ significantly on Achievement score among 5th Std Students.

7.CONCLUSION

The development of Maths incorporated with ICT skills could definitely offer better ways for teaching and learning. Adoption of ICT techniques and Tools for teaching learning in a regular classroom increase students' active involvement and learning. A good rich learning environment can assist students as they develop understanding, interest, self-directed learning, and curiosity. ICT adopted Ennum Ezuthum approach enhances the teacher as well as the student's ability in terms of teaching and learning. It could be surmised from the study that the Experimental group performed at a better level when compared to the Control group.

8. EDUCATIONAL IMPLICATIONS

- 1. ICT adopted Ennum Ezuthum approach is more effective compared to conventional classroom teaching.
 - 2.ICT gives a self -confident among the students
 - 3.It promotes experimental learning and self -learning among learners
 - 4. This helps reduces the wastage and stagnation to testing learning process to a considerable extent.
 - 5. This study helps to implement various school subjects like Tamil, English, Evs, in elementary level
 - 6. This study helps us to future researcher to identify the ICT skills by apply various subjects to uplift the educational aspects of social welfare

Photos

Proposal approval Meet



Post -Test conducting



Control Group Teaching



Experimental Group Teaching

