The NEW NORMAL

We are living in a world that has witnessed gigantic changes within a short span of time. The kind of disruption has been so swift that no body could even imagine a century ago.

From manual to technical, and now to digital; the transition has been fundamental and appreciable.

These changes have made not only our lives better but challenging too in the 'New Normal' world.

RENJITH SUBHASH, Research Officer, SCERT Kerala

The New Normal

- More than one and a half years after schools in the State closed in the wake of Covid 19 pandemic, when all the uncertainties regarding the spread of the Virus still exists, students were back to school on November 1, on the day of the origin of the Kerala State.

- Kerala was lauded across the world as a success story in containing the unprecedented pandemic and its exemplary activities in the field of Education. Kerala has initiated learning through Online platform and ensured quality education during this pandemic.

INITIATIVES BY THE KERALA STATE

DEPARTMENT OF GENERAL EDUCATION Leads the school education in Kerala

SCERT Kerala provides academic inputs, support and vetting of all academic documents for various agencies DIETs,SSK,SIET and other academic wings of the General Education Department

SCERT Kerala- Role in Digital Initiatives during the Pandemic Period

Online Classes – First Bell

Best Practices

Teacher Orientation Programmes

Research Activities

Programmes for CWSN

The process of making First Bell Digital Classes

From Class 1 to 12 SCERT Kerala either produced episodes or vetted the content.

The Process:

A team of Practicing Teachers were given orientation by the SCERT Kerala and were asked to develop e content from a chapter/unit.

Then the e content so developed was vetted by the experts appointed by the SCERT Kerala.
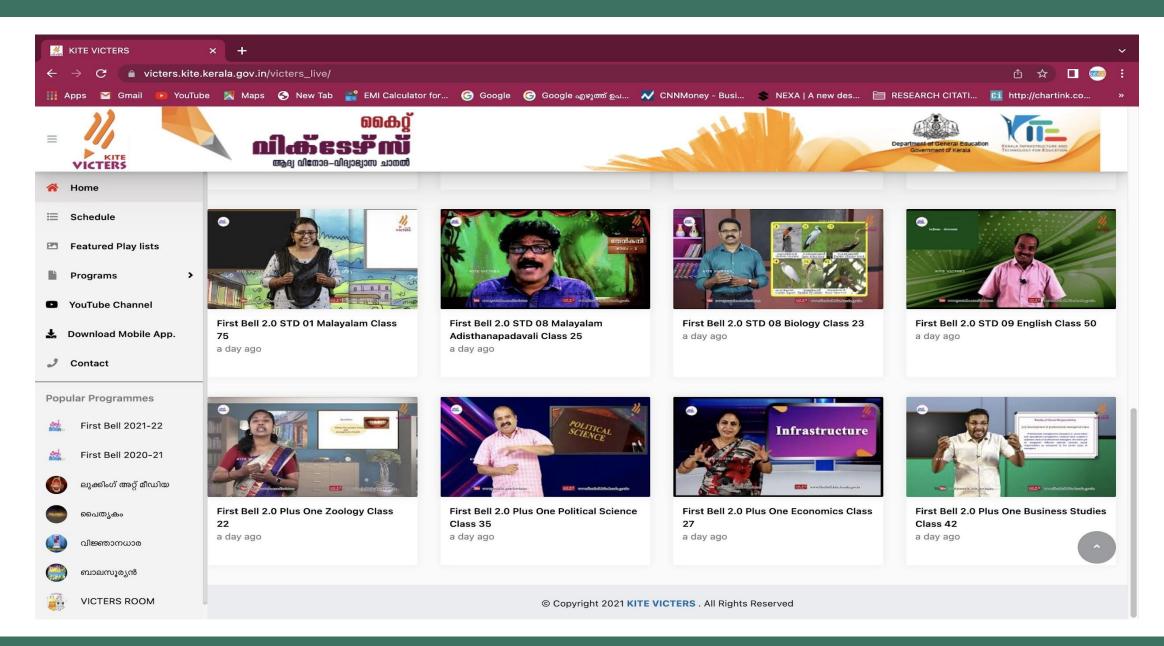
The process of making First Bell Digital Classes

- Then episodes were made and again a final scrutiny was done by the experts before airing those episodes on the KITE Victers TV Channel.

- A detailed time schedule was published well before the telecasting of episode.

- The other agencies like Samagra Shikha , SIET etc. also developed classes. The classes were telecasted through the KITE Victers TV Channel, You Tube & FB page. It was a premier attempt in India to make classes digital with the help of TV channels and Social Media.

- The subscriber base of the you tube channel of KITE Victers has increased from 50K to 33.9 lakh subscribers.
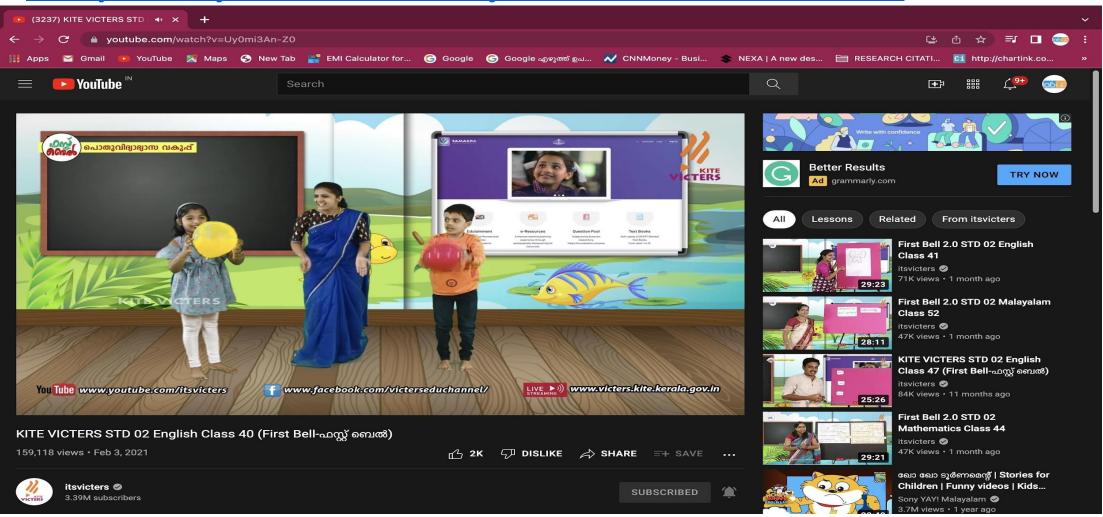
Advantage of Centralized Digital Classes

- Learners would get classes from the experienced teachers after a thorough scrutiny. It can ensure quality delivery of the content.

- Standardization of classes

- Viewing the content again on social media.

- 95.3% students get access to the First bell digital classes (Study by SCERT Kerala)

https://youtu.be/Uy0mi3An-Z0?t=29

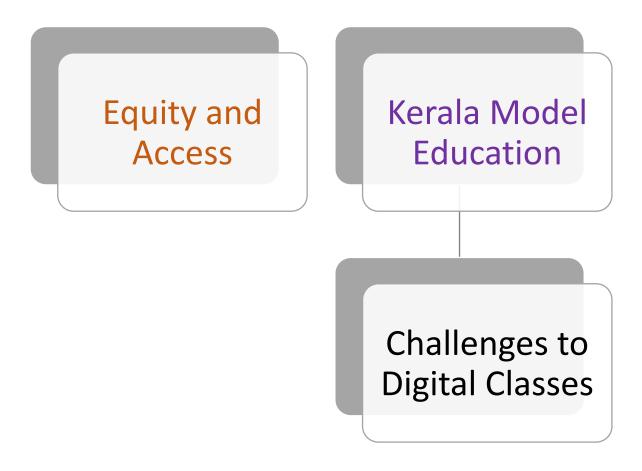RENJITH SUBHASH, Research Officer, SCERT Kerala

Whatsapp Classes

- After the telecasting of Digital classes , the students were asked to do some assignments based on the digital content and it was monitored by the teachers at the school level.

- By this way the student- teacher interaction became live. Support from parents and other organizations were immense.

Gadget Sufficiency

Equity and Access

Kerala Model Education

Challenges to Digital Classes

Challenges to Digital Classes

- The first and foremost challenge was lack of / enough digital gadgets – mobile phone, tablet, etc.

- This could overcome by the bold initiatives of the Government of Kerala. The Chief Minister Sri. Pinarayi Vijayan asked to the well wishers and the progressive organizations to contribute their share to the learning aids of the needy students.

RENJITH SUBHASH, Research Officer, SCERT Kerala

വിദ്യാകിരണം പദ്ധതിക്ക് തുടക്കം

എൽഡിഎഫ് സർക്കാർ നടപ്പാക്കുന്ന വിദ്യാകിരണം പദ്ധതി മുഖ്യമന്ത്രി പിണറായി വിജയൻ ഓൺലൈനിൽ ഉദ്ഘാടനം ചെയ്യുന്നു

സ്വന്തം ലേഖകൻ

തിരുവനന്തപുരം

പൊതുവിദ്യാഭ്യാസ രംഗത്തെ ശാക്തീകരിക്കാൻ സംസ്ഥാന സർക്കാർ നടപ്പാക്കുന്ന വിദ്യാ കിരണം പദ്ധതിക്ക് തുടക്കമായി. മുഖ്യമന്ത്രി പിണറായി വിജ യൻ ഓൺലൈനായി ഉദ്ഘാടന നം ചെയ്തു. വെബ്സൈറ്റിനും മുഖ്യമന്ത്രി തുടക്കം കുറിച്ചു. പദ്ധതിയിലൂടെ എല്ലാ വിദ്യാർ ഫികൾക്കും ഡിജിറ്റൽ പഠനോ പകരണം ലഭ്യമാക്കും.

പൊതുവിദ്യാഭ്യാസസംര ക്ഷണ യജ്ഞത്തിന് സമാന മായ ജനകീയ ഇടപെടലാണ് ലക്ഷ്യം. വ്യക്തികൾ, സംഘടന കൾ, കമ്പനികൾ തുടങ്ങിവർ ക്ക് വെബ്സൈറ്റായ https:// vidyakiranam. kerala.gov.in ലൂടെ സഹായം നൽകാം. ഒരു പ്രദേശത്തെ സ്കൂളിനെ പ്രത്യേ കമായി സഹായിക്കുന്നതിനും സംവിധാനമുണ്ട്. എത്ര കുട്ടിക ൾക്ക് പഠനോപകരണം നൽ കാൻ ഉദ്ദേശിക്കുന്നുവെന്നും രേഖപ്പെടുത്താം. കമ്പനികൾ ക്ക് സിഎസ്ആർ ഫണ്ടും സംഭാ വനയായി നൽകാം. വിദ്യാ ഭ്യാസ മന്ത്രി വി ശിവൻകുട്ടി അധ്യക്ഷനായി. ഗുണമേന്മയു ള്ള വിദ്യാഭ്യാസം കുട്ടികളുടെ അവകാശമെന്ന ലക്ഷ്യത്തോട യാണ് സർക്കാർ വിദ്യാഭ്യാസ രംഗത്ത് പദ്ധതികൾ നടപ്പിലാ ക്കുന്നതെന്ന് മന്ത്രി പറഞ്ഞു. മന്ത്രിമാരായ കെ കൃഷ്ണൻകുട്ടി, എം വി ഗോവിന്ദൻ, പി രാജീവ്, ആന്റണി രാജു, കെ രാധാകൃ ഷ്ണൻ, അഹമ്മദ് ദേവർകോ വിൽ, ചീഫ് സെക്രട്ടറി വി പി ജോയി, മുഖ്യമന്ത്രിയുടെ ചീഫ് പ്രിൻസിപ്പൽ സെക്രട്ടറി കെ എം എബ്രഹാം, പൊതുവിദ്യാഭ്യാസ സെക്രട്ടറി എ പി എം മുഹമ്മദ് ഹനീഷ് തുടങ്ങിയവരും പങ്കെടു ത്തു.

Challenges to Digital Classes

- Thousands of Mobile phones, tabs and laptops were donated by many people and organization. Moreover, A new fund was formed by the CM –Educational Empowerment Fund. The aim is to provide laptops to 4.71 lakh children across 14 districts through the Vidya Kiranam project.

Challenges to Digital Classes

- The second Challenge was lack of data or weak data transmission.

- The Kerala Fibre Optical Network (K FON) - Need for a better bandwidth
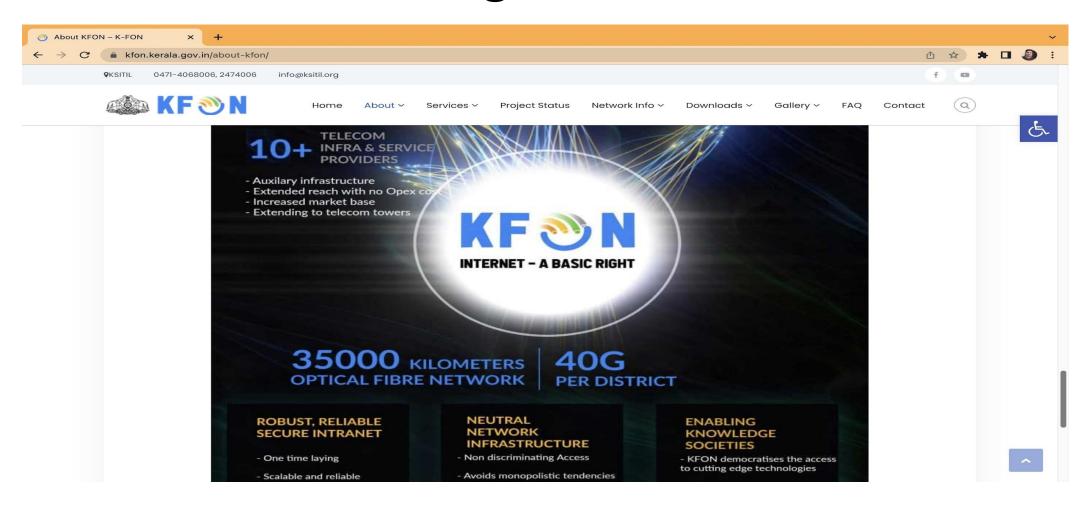
The Kerala state witnessed a frenetic pace in adopting smarter solutions such as

- video conferencing, video surveillance, smart traffic management, telemedicine, smart classrooms/e-education, e-Courts, smart meters and asset tracking

- related responsible technologies like Artificial Intelligence, Cloud Storage, Internet of Things, Machine-to-Machine (M2M)

- rise in mobility including multiple device ownerships
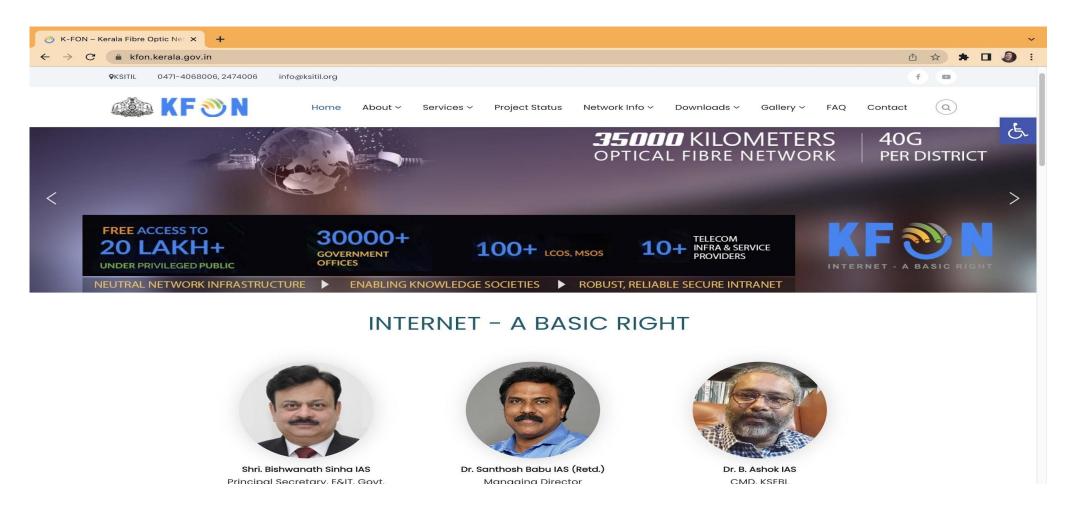
- growth in the number of internet users.

K FON – Kerala Fibre Optical Network – Internet a Basic Right

K FON – Kerala Fibre Optical Network

K FON – Kerala Fibre Optical Network

K FON has been structured to be completed as two tracks:

Track 1: Setting up of a state-wide core optical fibre network and providing connectivity to 30,000+ government institutions.

Track 2: Provide free internet to economically backward families and subsidized internet for others by leveraging KFON Infrastructure

It will aim to bridge the digital divide by making internet access a basic right to citizens and enable the state government's vision to provide free internet access to economically backward households.

Other Challenges to Digital Classes

Lack of interest among students towards digital classes.

It may be due to various reasons

No students interaction

Lack of self motivation

Too many e content spoil the mood

…….

RENJITH SUBHASH , Formerly R O, SCERT Kerala

Learning Management System (LMS)

Google Meet for Video Conferencing

Assignments

Conducting Quiz

Ease of Evaluation

Cloud storage for data

Word Processing, Presentation, Spreadsheet facilities

Google Forms

Google Classroom

Room for better interaction with students

It could replace the centralized digital classes to a great extent.

Health Issues- Physical & Mental- by Research studies

Obesity – Lack of movements – sitting in front of a device
Diabetes – no work outs, lifestyle
Short-sightedness /myopia- improper distance. Keep 20:20:20 rule
Spondylosis – wear and tear spinal code
Back pain – Sitting in wrong position
No work outs
Mental Stress
Lack of Socialisation

Best Digital Practices

- It @ Kadakkarappally GLPS Cherthala – Thanal Project- Kids become the teachers of aged people. Computer literacy. Students starts using online transaction including payment of electricity bills

- https://youtu.be/P11J YmLHYlM?t=78

Best Digital Practices

- School News Channel NEWS 19 by GHSS Puthoor.

- More proficient in English language usage.

- https://youtu.be/hbe2R_SKsW8?t=399

RENJITH SUBHASH, Research Officer, SCERT Kerala

Back to School Programme

It is an initiative by the General Education Department of Kerala. We started opening schools from November 1, 2021. the programmme was branded as BACK to SCHOOL. Around 180000 Teachers were trained through online mode .

The modules were developed jointly by SCERT , SSK , DIET ,KITE and SIET for Class 1 to 10.

For Class 11 and 12 SCERT developed the Module and conducted the Programme with the help of the Higher Secondary wing of the DGE.

Back to School Programme – HSS Level

Objectives of this Programme

To make students classroom learning ready

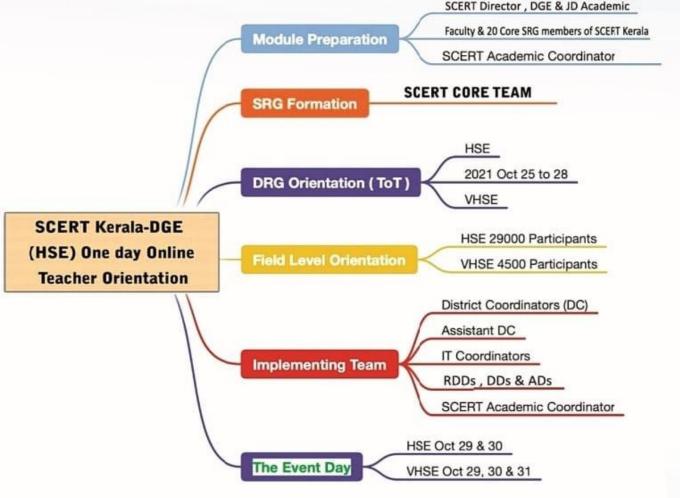After a long gap of 18 months they were coming back to school

To identity the learning gap and scaffold them to the mainstream education.

To equip the teachers to conduct both online and offline classes .
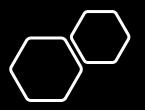
The schools were initially working on half the capacity to ensure the Covid 19 protocol.

RENJITH SUBHASH, Research Officer, SCERT Kerala

Provide online orientation to around 34000 Higher Secondary School Teachers.

Higher Secondary education scenario

- The distinctiveness of the Higher Secondary Education sector comes from various factors including public examinations in the first and second year, the adolescent students hailing from far away places, diverse subject combinations etc.

- Due to various factors like the conduct of public examination, plus one admission, evaluation etc., it has become impractical to give direct training to HSS teachers before the reopening of Schools. In this scenario, it has been decided to organize an online orientation program for the teachers.

07/03/22

This module has been prepared to equip teachers with necessary insights and adequate methods to be adopted while the schools reopen.

This includes

- the importance of adhering to the COVID 19 protocol,
- health and sanitation,
- creating a warm student-teacher environment,
- creating an academic blueprint, exploring the possibilities of blended learning in furthering educational activities, continuous evaluation, practical evaluation,
- awareness drives for parents etc.

Higher Secondary Teacher Orientation

- This module has been prepared considering the peculiarities of the higher secondary sector without compromising the guidelines issued by the Department of General Education on school reopening.

- The batches have been scheduled to attend the teachers and the Principal of a school together in the online training sessions. It helped the School Resource Group (S.R.G) to design its activities in a better way.

SCERT initiatives on CWSN

Ganiniprabha

Jyothirmayi You Tube Channel

Prathibhamayi

Suraksha

Mudrikapadam

Sameeksha

Ganiniprabha- CWSN- Teacher Empowerment Programme

- Online Teacher Empowerment Programme in Digital fitness.

- All the teachers of special schools in Kerala were trained through online in QR code generator, video shooting, editing ,sound mixing etc. In the first phase 3300 teachers were trained.

- In the second phase 250 teachers were trained in video editing. These teachers were assigned to take video and edit and send to SCERT Kerala for Scrutiny .

- The final videos are uploaded in the **JYOTHIRMAYI** -Educational You tube channel for Children in Special schools in Kerala.

RENJITH SUBHASH, Research Officer, SCERT Kerala

Prathibhamayi – CWSN - special package developed for Intellectually disabled children

- Online teacher Empowerment for introducing special package developed for Intellectually disabled children in special schools in Kerala.

- SCERT Kerala identified that there is no uniform curriculum for ID schools .

- So a package was developed and transacted for ID children in special schools. Based on this package videos were developed and uploaded in the **JYOTHIRMAYI you tube** channel.

Surakshaa- CWSN- Parental awareness

- Online teacher empowerment for teachers in Kerala. Every principals of all special schools for Intellectually disabled students were trained to conduct Parental awareness in their schools.

- Introduction of Jyothirmayi channel, Psycho-socio problems of children and the management of behavioural problems were the major content fof the module.

- 2200 teachers and 422 principals attended in this training. All schools organized virtual as well as offline parental awareness programmes in their respective schools after the training of SCERT

Mudrikapaadam - CWSN- Indian Sign Language- ISL

- Online teacher empowerment for special school teachers(HI) in Indian Sign Language.
- For the unification of signs used in special schools of HI in Kerala SCERT organized teacher empowerment in subject wise ISL.
- 6 day training was organized and implemented.
- 522 teachers and non-teachers attended the training.16 video classes developed by SCERT Kerala and it is available in **SCERTYOUTUBEKERALA** channel
- https://youtu.be/1hMmP4CFcBk?t=710

Sameeksha-CWSN-Sarada braille writer for the teachers of special schools

- Online teacher empowerment in Sarada braille writer for the teachers of special schools for visually challenged children.

- Sarada braille is a computer software developed by SCERT Kerala for supporting visually challenged students.

- All teachers were trained virtually. 97 teachers participated.

- The software implemented in schools for visually challenged.

- The video classes are available in the you tube channel of SCERT Kerala – **SCERTYOUTUBEKERALA**

- https://youtu.be/pqOC2fJ0rNc?t=2

Research on First bell Classes by SCERT Kerala

- The Covid 19 situation demands educational institutions to make advancement through unfamiliar paths. As the whole world survives with the cry 'Live with Covid' seeking alternative means in every field, the educational sector cannot remain secluded.

- The prevailing situation involving Covid has bridged this gap. Interventions made by the Government by prioritising universal education and the right to education turned out to be a role model for the entire nation.

- As compared to other states of India, the General Education Department of Kerala Government was much ahead in initiating the telecast of video classes through KITE VICTERS channel.

Objectives of the study

To find out the scope of 'First Bell' digital classes on the technical infrastructure, content/ pedagogy, extension activities etc.

To find out the limitations of 'First Bell' digital classes on the technical infrastructure, content/ pedagogy, extension activities etc.

To formulate practical suggestions to improve 'First Bell' digital classes.

RENJITH SUBHASH, Research Officer, SCERT Kerala

Sample

2652 Students belonging to classes 5,6,7,8,9,10 and 12 from 14 districts were selected as the sample for the study.

Additionally, five students of the L.P section from schools in every district were also taken as sample.

500 Parents of students studying in standard 1 to standard 12, 1275 teachers, 3 educational experts,137 monitoring members (RRD, AD,DEO, AEO, DIET, HM) etc., were also included in the sample.

RENJITH SUBHASH, Research Officer, SCERT Kerala

Tools for collection of data

Tools viz., questionnaire, interview schedule, focus group discussion etc., were used for the study. Questionnaires were given to collect data from students and teachers through online mode.

Online mode of data collection was also carried out among monitoring members such as RRD, ADs, District Education Officer, Assistant Education Officer, faculty at DIET and Headmasters.

Data collection from educational experts was conducted through interview method both directly and throgh online mode. Focus group discussion was conducted for data collection from parents.

RENJITH SUBHASH, Research Officer, SCERT Kerala

Findings of the study

- **During the lockdown period, a large proportion of students had the opportunity to attend and learn through 'First Bell' digital class**.

- But **a small percentage of students who could not meet** the facilities for the same in their house mainly depended on their neighbourhood houses.

- The gadgets/support to **access digital classes was ensured by voluntary organizations, PTA, SMC, LSG etc.**

- Majority of the students **utilised TV as the medium to get involved in the digital class**. Most of the students attended the classes without any interruptions. A very small percentage of students faced interruption while receiving classes due to failure of power supply and low internet speed.

Findings of the study

- Almost all the students were informed about the digital classes by their respective class teachers while most of the teachers received information about the same from the Headmasters/Principal.

- The communication rendered by the teachers in the digital class and the learning activities assigned by them were perceived well by majority of the students and was found to be suitable to the meet the expected learning outcomes. Most of the members of the monitoring team suggested to provide explanations required for lessons after centralised classes to ensure its effectiveness.

- A large proportion of students preferred the conventional classes conducted at schools over digital sessions. But almost all the students participate only in the 'First Bell' classes for learning. It was also found that a single teacher at a time is preferred over multiple teachers in handling classes related to the same unit.

Findings of the study

- A comparatively **large percentage of teachers always try to ensure clarification on various concepts after respective digital classes**.

- A **large proportion of students preferred the conventional classes conducted at schools over digital sessions**. But almost all the students participate only in the 'First Bell' classes for learning. It was also found that a single teacher at a time is preferred over multiple teachers in handling classes related to the same unit.

Findings of the study

48

- Nearly all the teachers provide guidelines for the timely completion of follow-up activities.

- Even though most of the students could do the activities, more than half of the students face difficulty in fulfilling the same.

- This is due to a lack of interest on the part of students.

Suggestions of the Study

Digital classes can be made more natural by the participation of at least a few students during the recording sessions.
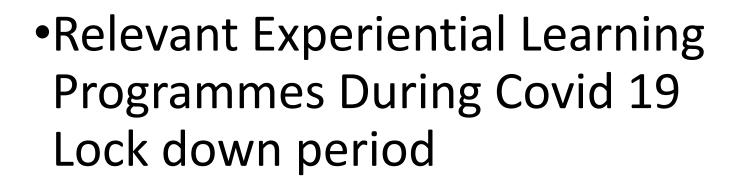
Together with sessions on academic subjects, it would be desirable to allocate time to include sessions on motivation, sports activities, art and cultural activities etc.

Suggestions of the Study

The faster pace with which teachers transact lessons causes difficulty in the acquisition of concepts among the students. Enough time should be given to students for clear assimilation of concepts.

It should be taken care that the follow-up activities assigned do not turn out to be a burden for the students.

Awareness sessions must be given frequently to parents and students to enable them to identify their respective roles in the new situation.
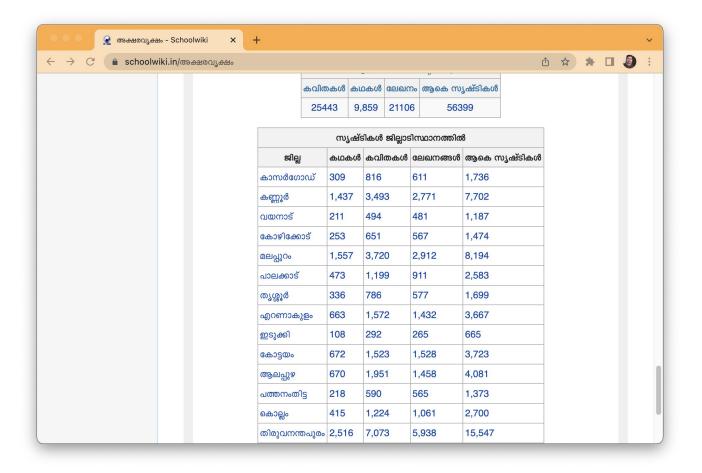
- Relevant Experiential Learning Programmes During Covid 19 Lock down period

RENJITH SUBHASH, Research Officer, SCERT Kerala

Relevant Experiential Learning Programmes During Covid 19 Lock down

AksharaVruksham – A gigantic project that help the students to publish their creative literary works in the form of poems, stories and articles in Malayalam & English created by them at home during the lock down days due to Covid 19 pandemic.

It was submitted online by the students of Kerala State to the School Wiki portal during the lock down days. 56399 works were received from 4947 schools! It was coordinated by the SCERT Kerala and released by the Honorable CM Sri. Pinarayi Vijayan in 10 Volumes and it got an entry into the **India Book of Records**.

AKSHARAVRUKSHAM
https://schoolwiki.in/
അക്ഷരവൃക്ഷം

കവിതകൾ	കഥകൾ	ലേഖനം	ആകെ സൃഷ്ടികൾ
25443	9,859	21106	56399

സൃഷ്ടികൾ ജില്ലാടിസ്ഥാനത്തിൽ				
ജില്ല	കഥകൾ	കവിതകൾ	ലേഖനങ്ങൾ	ആകെ സൃഷ്ടികൾ
കാസർഗോഡ്	309	816	611	1,736
കണ്ണൂർ	1,437	3,493	2,771	7,702
വയനാട്	211	494	481	1,187
കോഴിക്കോട്	253	651	567	1,474
മലപ്പുറം	1,557	3,720	2,912	8,194
പാലക്കാട്	473	1,199	911	2,583
തൃശ്ശൂർ	336	786	577	1,699
എറണാകുളം	663	1,572	1,432	3,667
ഇടുക്കി	108	292	265	665
കോട്ടയം	672	1,523	1,528	3,723
ആലപ്പുഴ	670	1,951	1,458	4,081
പത്തനംതിട്ട	218	590	565	1,373
കൊല്ലം	415	1,224	1,061	2,700
തിരുവനന്തപുരം	2,516	7,073	5,938	15,547

IT Maths Lab at the Higher Secondary Level

Children acquire knowledge of numbers and numerical skills in their early childhood itself through plays and other activities .

In higher classes , the way of presentation of concepts in Mathematics becomes a bit abstract and sometimes it spoils the genuine interest of students to an extent.

Now it has become easy to present an abstract concept by the use technology . NEP 2020 has also stressed the importance of Mathematics education.

IT Maths Lab at the Higher Secondary Level

IT Maths Lab is introduced in higher secondary level to make the learning process more creative and student friendly.

This opens a platform for *learning by doing* and it accelerates learning by making it joyous.

IT Maths Lab at the Higher Secondary Level

Software like GeoGebra contributed a lot in this makeover.

Activities in IT Maths Lab are regulated with the help o GeoGebra

A detailed Lab Manual is also prepared by SCERT for helping the students.

SCERT prepared a guideline in this direction and the State Curriculum Steering Committee approved the same and recommended to submit before the government.

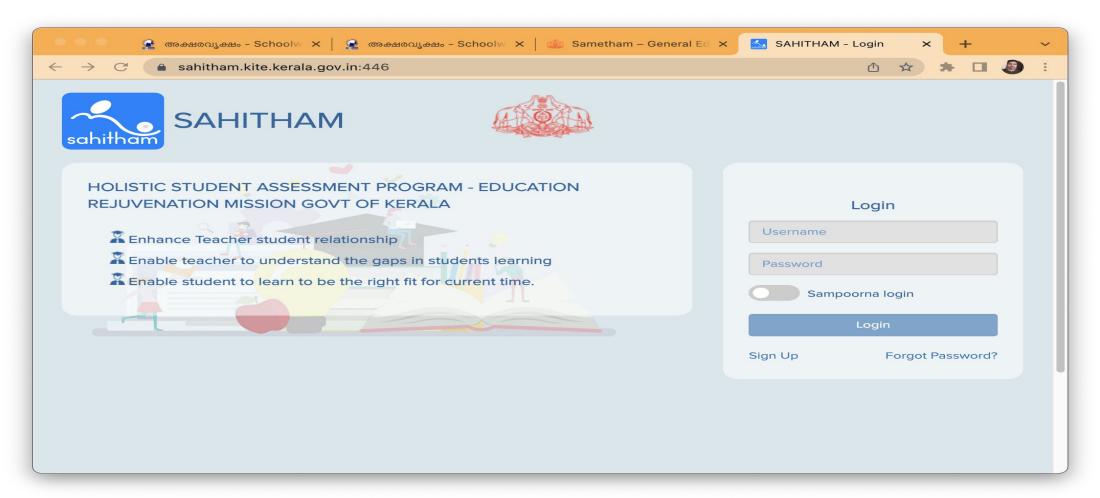# Reading Cards in English for Upper primary class – Extended Reading materials

Reading for pleasure is to be promoted from lower classes. This will prepare and engage young learners to explore new horizons of joyful learning.

Learners can independently interact with each other and the teacher, while using the cards. Initial interaction with the teacher on each card may help in better comprehension.

Methodology – Reading Cards

- *A pack of 60 cards have been designed for each class.*

- *The cards vary in difficulty level; some cards may be easy for a particular group and the same set of cards may be difficult for another group. So, the teacher may distribute the cards freely.*

- *Let the students try them without any fear or prejudice. If they can understand a card, they may be given other cards too.*

- *Gifted learners may be given as many cards as possible.*

- *No sequence or order is needed in distributing the cards among the learners.*

-

SAHITHAM PORTAL
https://sahitham.kite.kerala.gov.in/

RENJITH SUBHASH, Research Officer, SCERT Kerala

Objectives of SAHITHAM – Innovative Concept

How to identify the personal characteristics of children with the help of modern technology is the Core Theme of SAHITHAM .

IT aims to be emerged as big data on student profile. It is under the development stage.
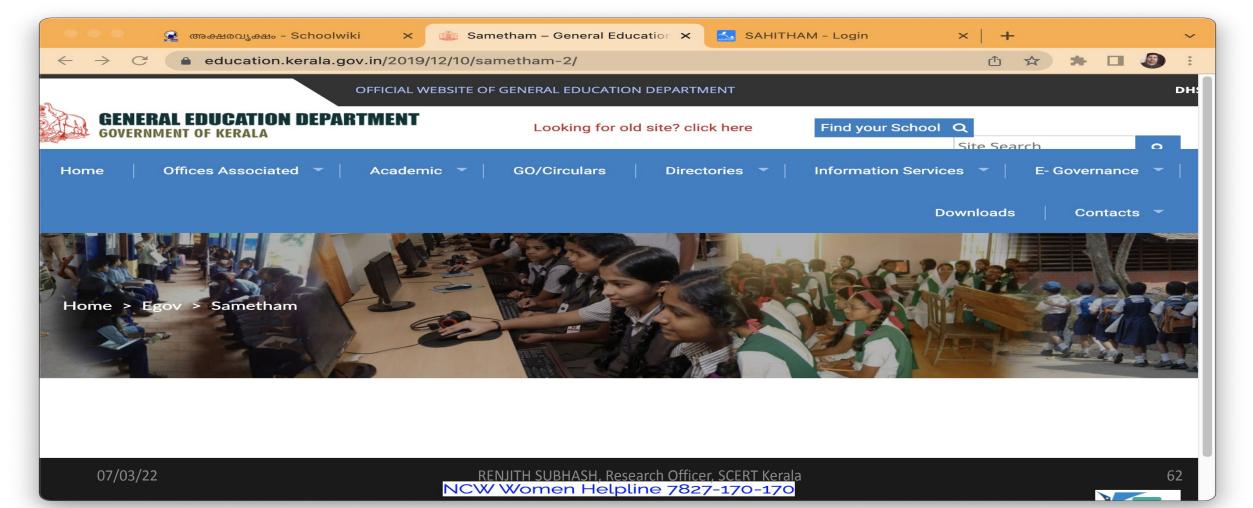
Three major components of it are:

MENTORING

Teachers should understand the socioeconomic and cultural background of students by constantly interacting with them.

Objectives of SAHITHAM

- CREATION AND UPDATING OF STUDENT PROFILE IN DIGITAL MODE.

- it includes the identification and recording of of mathematical skills logical reasoning skills scientific temper of students language skills social consciousness English competency and Pro socio competency.

- The third one is continuous evaluation of students by applying the above two aspects.

This portal can help the Teachers and policymakers take better decisions on child development programs.

SAMETHAM PORTAL- SINGLE WINDOW FOR DATA
https://education.kerala.gov.in/2019/12/10/sametham-2/

RENJITH SUBHASH, Research Officer, SCERT Kerala

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Kerala- Way Ahead

Kerala State Government Plan

Kerala : A Knowledge Society

Kerala should be transformed into a digital economy

Ensuring Higher standards in both School & Higher Education.

The knowledge created should transform into innovations.

These innovations should drive new start-ups.

New techniques should be integrated into all sectors.

Thank YOU

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