## Project Development Report

Sterling Tools Limited
Reporting Period – July to September 2021



### **About Us**

OM Foundation is a Noida-based registered, secular, gender-sensitive and humanitarian public charitable trust. Founded in the year 2002, the Foundation was set up to make significant contribution to the economically and socially disadvantaged citizens of India. Towards this, the Foundation has created, managed and supported programs aimed to bring about sustainable changes, predominantly in the field of education and employment for the underprivileged.

The Foundation's main aim is to bring about at change in the lives of the underprivileged so that they emerge as an asset not only for their immediate families but also for the Nation. The organization has been successful in reaching out to its goals while achieving the below milestones:

- 19 years with the community
- More than 1,000 direct beneficiaries
- Outreach upto 10 villages
- 3 key focus areas: Children, Education, Skill Development
- Administrative cost less than 5% since inception
- Low beneficiary attrition (around 4% over the years)

### **Vision**

OM Foundation aims to play a significant role in transforming the lives of the underprivileged children and other members of the underprivileged communities of India by empowering them with education, health care facilities and livelihood skills in the most professional, transparent and efficient manner.

### **Mission**

- To ensure all round development of children by providing them with quality education, healthcare and balanced nutrition, so that they can accomplish a better life individually and act as responsible citizens of our country.
- To empower girls and women from society by providing them with support for pursuing their educational goals and livelihood skills, so that they can become dignified, confident and positive contributors to society.
- To help shape the future of children and youth who have dropped out of schools because of various reasons.

### About the Project - Computer as a Skill (CAAS)

OM Foundation partnered with Imbue Education for this project with the objective of re-designing the Computer curriculum as a skill with practical application for the students of Grade  $4^{th}$  –  $8^{th}$ .

### **Need of the CAAS Curriculum**

### Students as Creators

- Jobs are moving towards computers
- Computational and logical thinking is skill of the future world economic forum
- Coding and programming

### Students as User

- What digital citizenship means
- How to keep self safe cyber security
- Social Engineering through web

### **Features of the Curriculum**

- Hands On
- Integrated Curriculum
- Social Skills
- Personalized Growth
- 21st Century Skills
- Real Life Projects

### **Curriculum Development**

For students in grades 4 to 8, an integrated experiential curriculum with problem-solving, creativity, teamwork, and leadership skills was developed, primarily for computer skills.

### **Teacher Training**

Our Teacher at Om Foundation implemented the program under Imbue mentorship. Our computer teacher was trained in the experiential Pedagogy.

### **Experiential Learning Program**

Project based learning helped students understand the applications of their learning.

### **Outcomes**

- Students learned computational thinking.
- Students are at par with their peers from high income schools.
- Students can create software to improve efficiency.

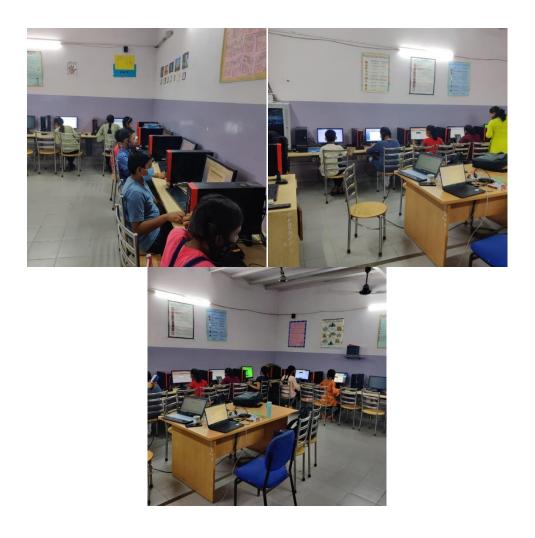
### **Curriculum (July-September)**

Class 4th & 5th

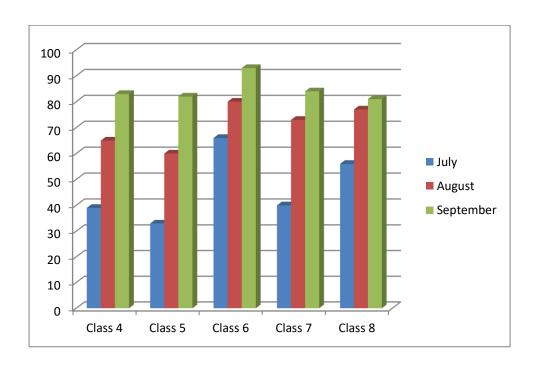
Unit Imbue Education Sub Unit Objective							
Ulit	Documenting,	Sub offit	Objective				
Revision	Reports, Data handling & Analysis Communication Writing Skills Thinking and Observation Skills Research	MS Word	Creating and saving files, file location, creating docs with formatting Inserting the hyperlink, Headers and footers, Saving documents from drive and saving them as different files				
	Computational Thinking Logic Algorithm Sequencing Decomposition Pattern Abstraction Flow Chart	Computational Thinking	Helping to solve problems, design systems, and understand human behavior, by drawing on concepts fundamental to computer science.  Computational thinking is using abstraction and decomposition when attacking a large complex task or designing a large complex systems				
Revision	Sequencing Loop Parallelism Event Condition Methodology Sound Addition or Editing Tech Decision Making Design Skills	Scratch JR MS Paint Programming	Scratch is designed to be fun, educational, and easy to learn. It has tools for creating interactive stories, games, art, simulations, and more, using block-based programming.  Scratch also has its own paint editor and sound editor built-in. also visual programming language that allows students to create their own interactive stories, games and animations.				
Story Telling	Logic Algorithm Sequencing Decomposition Pattern Abstraction Flow Chart Programming	Introduction to TYNKER Login Software Introduction Programming Introduction Application 1 - Story Telling Application 2 - Quiz Game Application 3 - Game Design	Introduction to the Environment, Pian app, Music Maker, Find the gold, Food Chase, Make a game, Tour guide and two button, Sketch and Guess, Final Project				
MS Office	Documenting, Reports, Data handling & Analysis Communication Writing Skills Thinking and observation Skills Research	Introduction and installation Make an effective presentation Format the presentation Insert various objects in the powerpoint slide Save the presentation in valid format Run the presentation slides Activity - Presentation on 1 Science topic Animation Menu - Different Effects on object Activity - Presentation on 1 Scratch/ Tynker	To convince Students of ideas, and the best way to do that is to lead them to a conclusion through persuasive organization of ideas.				

Class 6<sup>th</sup>, 7<sup>th</sup>, 8<sup>th</sup>

Uids 0 <sup>cm</sup> , / <sup>cm</sup> , 0 <sup>cm</sup>									
Unit	Imbue Education	Sub Unit	Objective						
Revision	Documenting, Reports, Data handling & Analysis Communication Writing Skills Thinking and Observation Skills Research	MS Word	Creating and saving files, file location, creating docs with formatting Inserting the hyperlink, Headers and footers, Saving documents from drive and saving them as different files						
	Computational Thinking Logic Algorithm Sequencing Decomposition Pattern Abstraction Flow Chart	Computational Thinking	Helping to solve problems, design systems, and understand human behavior, by drawing on concepts fundamental to computer science.  Computational thinking is using abstraction and decomposition when attacking a large complex task or designing a large complex systems						
Revision	Sequencing Loop Parallelism Event Condition Methodology Sound Addition or Editing Tech Decision Making Design Skills	Scratch MS Paint Integers Programming	Scratch is designed to be fun, educational, and easy to learn. It has tools for creating interactive stories, games, art, simulations, and more, using block-based programming. Scratch also has its own paint editor and sound editor built-in. also visual programming language that allows students to create their own interactive stories, games and animations.						
App Design	Logic Algorithm Sequencing Decomposition Pattern Abstraction Flow Chart	Introduction to MIT APP Inventor Login Software Introduction MIT AI2 Companion Application 1 - Talk to me Application Testing Application 2 - Walking App Application Testing Application Testing Application Testing Application Testing	Introduction to the Environment, Piano app, Music Maker, Find the gold, Food Chase, Make a game, Tour guide and two button, Sketch and Guess, Final Project						
Awareness Program	Documenting, Reports, Data Handling & Analysis Communication Writing Skills Thinking and Observation Skills Research	Design BMI Application for school to check health status and QUIZ Design	Aim of surveying is to prepare a map to show the relative positions of the objects on the surface of the earth. To collect field data. To prepare plan or map of the area surveyed. To analyze and calculate the field parameters for setting out operation of actual engineering works						



### **Attendance in Classes**



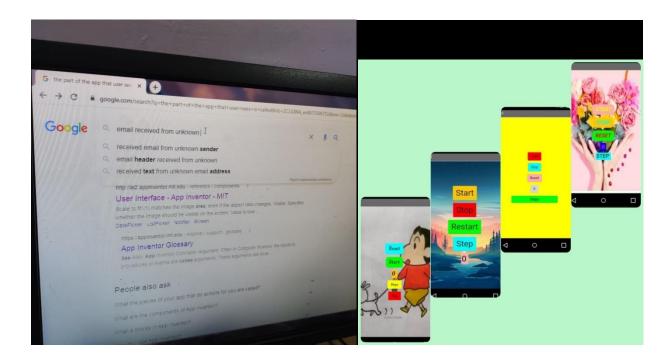
### **Students Learning & Achievements**

#### Classes 4 & 5

- The students are able to make conversation between characters in Scratch Jr.
- The students are able to create guizzes in Tynker.
- They have learnt to compose and send an E-mail.
- They have also learnt to write documents in MS Word on their mobile phones.

#### Classes 6-8

- The students are able to do coding in Scratch.
- They are making apps in MIT App Inventor.
- They have already created a Talk to me and Pedometer app.
- They are currently working on designing and coding of a simple calculator.
- They have learnt to compose, attach files in E –mail and send the E-mail.
- They have learnt to do documentations in Ms-Word.

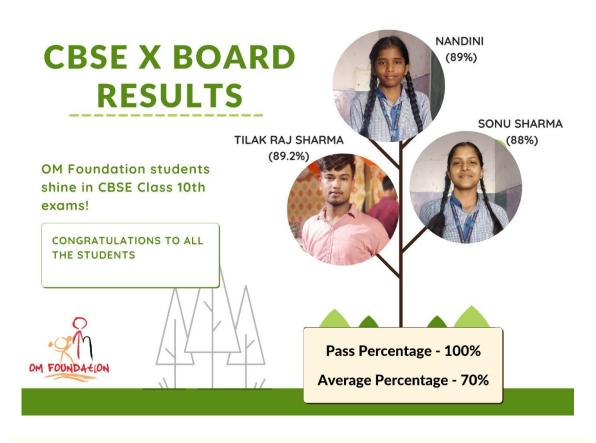


### **Challenges We Faced**

Since July, we've been teaching classes in a hybrid format, with half of the students online and half of the students offline. We are primarily confronted with two issues in online classes. The first is network issues, which have affected student attendance, particularly in Classes 4th and 5th. The second issue is that the students of Classes 4th and 5th have not been provided with tablets, they attend classes through mobile phones of their parents, and when the parents have to leave the house for work, the unavailability of device makes it difficult for the student to attend their classes online sometimes.

### **Results of 2020-21**

We are glad to showcase the results of our students who have successfully passed from Class  $10^{\text{th}}$  and  $12^{\text{th}}$  this year.





### **Skill Subject Training Program**

We have selected Data Science and Front Office Operations as the skill subjects as  $6^{th}$  subject for the students of Classes  $9^{th}$  and  $10^{th}$ . We will start the classes of these subjects from  $1^{st}$  of November.

Data Science will be taught to the students of Class 9th. The students of Class 10th have been given a choice between Data Science and Front Office Operations. The curriculum of both of the subjects includes communication skills, self management skills, information and communication technology skills, entrepreneurial skills as well as green skills. In Data Science, the students will get to learn about how to collect and arrange data, data visualization and ethics in data science. In Front Office Operations, the students will learn about tourism, major tourist destinations in India, impacts of tourism, hotels and classification of hotels.

### **Financial Statement**

## Sterling Tools Limited Utilization Statement for Q2 (July – September) of FY 2021-22 (Classes 4th to 8th)

S. No.	Line of Items	Allocation Annual	Utilized Till Now	Surplus Left	Remarks
1	Computer Program for Classes 4th - 8th	490,000.00	294,000.00	196,000.00	
Total		490,000.00	294,000.00	196,000.00	-

# Thank You!