

[TIEE - article for ITfC website](#)

Technology Integration for Equitable Education (TIEE)

[IT for Change](#) initiated the TIEE program to support inclusive learning for students in higher primary schools (HPS) in Bengaluru South district. The project focused on empowering teachers to effectively integrate technology for transacting inclusive and equitable pedagogies.

Students of grades 6-7 from select schools participated in the project, along with teachers, headmistresses, cluster/block resource persons. Students actively engaged through intensive weekly interactions and camps. We developed modules for intensive engagement based on a baseline study, focusing on foundational mathematics and language skills. We guided the program design and implementation using the [Universal Design for Learning](#) (UDL) framework. We integrated digital tools such as [Language Lab](#), [PhET](#), [GeoGebra](#), and [TuxMath](#) into the transaction. An analysis of the baseline and endline findings, along with feedback from teachers and students, indicated that the project significantly improved students' competencies in Mathematics and language, their engagement with learning, and attitudes towards peers. It also demonstrated how adopting UDL principles is essential for facilitating inclusive education

Based on our experience in the working with high schools and in-service teacher training for the last 14 years, as well as in the pilot phase of [TIEE](#), we understand that teachers need support and hand-holding to integrate technologies effectively into their practice to strengthen students' learning experience. Though there are several open educational resource (OER) repositories, accessing resources, evaluating them and using them appropriately is a skill that needs to be developed through capacity building and peer interactions.

We observed that there is inadequate awareness and understanding about 'Equitable Education' among teachers, parents, and the education support system. There is a need for teachers to be able to identify the appropriate materials and methods for catering to diverse learner conditions as are found in government schools in urban locations.

The TIEE program, over 2023-2025, aims to improve teachers' use of digital resources, promote peer learning, support technology integration, and strengthen equitable teaching. The project will publish teaching-learning materials in English and Kannada on the Karnataka Open Educational Resources ([KOER](#)) repository. The program aims to enhance digital learning and equitable pedagogies in schools by designing subject-specific open educational resources and modules, fostering digital literacy skills among students, and training teachers in inclusive and equitable teaching practices and technology integration. It will support setting up and maintenance of computer labs and promote the use of Free and Open Source Software (FOSS) tools. The program also aims to engage parents in supporting their children's learning. Communities of Practice will be established for teachers, and workshops will be organized for Head Teachers/HMs to enhance pedagogical leadership and technology integration. There will be capacity building program for academic resource persons like Block Resource Persons and Cluster Resource Persons.

This program is supported by [Cognizant Foundation](#) as part of their School Education initiative.

