Flipped Classroom Model: An Innovative Practices in Education

Ms. Mukta Tiwari¹, Dr. Sarita Dalal²

¹,²Assistant Professor (B.Ed.), IMT College of Science & Technology, Greater Noida U.P.

Abstract
In age of digital learning, educators believe that traditional classroom teaching practises, in which students are passive and the teacher has complete control in classroom activities, are insufficient. Changes in information and technology have an impact on education as well. In a new world where all the things are changing in a better way, classroom teaching is not untouched. Education, teachers, students, and the learning process are all evolving, and as a result, the expectations of students are changing as well. The requirement and expectation of number of students who complete the learning process varies. As a result, different teaching approaches are required to react to the demands of learners with differing expectations. The "Flipped Classroom Model," which has recently gained popularity, is one of these models. This flipped classroom model which become synonyms of active learning believe that lecture or direct instruction is not the best way to use classroom time. Instead, students can get information before class and make them free for more activities that involve higher order thinking in a class room time. The efficient utilisation of out-of-class time is demonstrated in this model. It is defined as doing assignments and activities that are intended to be taught outside of class since learners require teachers in the classroom. The aim of this study is to provide information about the Flipped Classroom Model's emergence, development process, foundation, and procedures, as well as to uncover unknown features of the model by addressing its impacts, advantages, and downsides in the context of literature.

Keyword: Digital Learning, Flipped Classroom, Active Learning

Introduction
There have been significant changes is going on in the educational system from last decade, and these changes are continuing. During the shift from teacher-cantered to student-cantered learning techniques, many different methodologies and models are used. With the help of today's rapid technological advances, a model that allows students to access content on their own, play an active part, and follow their own interests is originally desired. Changing living conditions, rising economic pressures, globalisation and its effects on business life, technological advancements, and the resulting ease of access to information have demonstrated that traditional teaching models are insufficient, resulting in a situation in which educational expectations differ. The current generation is known as the "millennial generation." The millennium generation has greater access to technology, information, and digital media than prior generations. As a result, unlike earlier generations, the millennium generation has less tolerance for lecturing-based learning techniques. This issue has revealed the need to build a learning environment for people that encourages them to ask questions, use technology efficiently, and think critically. In a recent year, flipped classroom is the new trend in Education field.
What is Flipped Classroom-

In a flipped classroom, learners are introduced to topic at home and then practise working through it at school. This is in contrast to the more frequent practise of teaching new subject at school and then assigning homework and projects for pupils to finish at home on their own. Face-to-face engagement is combined with individual study–usually via technology–in this blended learning strategy. In a typical Flipped Classroom situation, students might watch pre-recorded videos at home before coming to school with questions and at least some background information to complete homework.

The flipped classroom model approach was first introduced under the name of inverted classroom in the study of a group of professors at Miami University (Lage et al., 2000; 30-43). In literature, this approach was used as inverted classroom then it was used as flipped classroom. The flipped classroom concept was first used and practiced by Jonathan Bergmann and Aaron Sams working at University of Northern Colorado (Talbert, 2012; 1). These two chemistry educators realized that students need teachers more while they are doing their homework not while they are taught and they recorded course videos for the students who could not Show up in the class in order to make them watch these videos and use the classroom to discuss the subjects and do other activities. After that, this method started to be noticed (Bergman and Sams,2012).

Blended learning, inquiry-based learning, and other educational approaches and tools that combine flexible, efficient learners are all part of the flipped classroom concept. It is also a model that encourages students to take responsibility for their own learning. The aim behind the flipped classroom approach was to deliver education at home through video instead of regular classroom instruction. In the classroom, time is spent by educators using various strategies to help students absorb previously provided material. This is accomplished by the previously mentioned video recordings. Educators have the opportunity to interact with learners on a personal level. In this manner, classroom time is properly utilised.

In the flipped classroom approach, out-of-class practises take the place of classroom practises or activities. In a flipped classroom, the instructor is no longer the primary source of instruction; instead, numerous technologies are used to deliver flexible learning to students one-on-one or in groups. Teacher addresses subjects that pupils do not understand well and reinforces the subject with various activities. Students in flipped classrooms can watch lecture videos on any computer, tablet, smartphone, or other media player at any time they desire. They bring their homework to class and take an active role in the learning process. The education in the classroom is not immediately eliminated in the flipped classroom approach. Instead of spending time on all students at once, this technique maximises the time spent on each student.

A prominent pedagogical approach in science, math, and other lessons is the flipped (inverted) classroom, which is defined as altering the place of classroom practises and out of class practises. The flipped classroom paradigm provides learners with an atmosphere that includes project-based or real-world practises to help them understand the subject better in class. Instead of receiving information from the teacher during class time, the student learns through watching course videos, listening to podcasts, accessing e-books, and meeting with peers online. Learners can use these extensive resources at any time. As a result, the teacher will have more time to interact with each student. The major purpose is to give students a more authentic learning experience.
The flipped classroom is appreciated because it allows teachers to spend more time on classroom activities and correcting errors. Even in crowded classes, success can be accomplished in this manner.

So, Precisely in a flipped classroom approach model, usual learning experience is inverted in the flipped classroom. Lectures are sent as homework outside of class time, and class time is devoted for class discussion and interactive projects. The following are the primary objectives of flipping:

- To make environment of the classroom good for active learning.
- To help the students to learn in their own pace.
- To provide more time to the educator to act as a facilitator and give proper time to each student instead of the whole class.

By transferring passive lecture information to an at-home situation, students can review it whenever and wherever it is most convenient for them. They can also access all of the core knowledge ahead of time, so they feel prepared and ready to participate in interactive learning activities when they attend the classroom. During class, students are required to put the lecture materials into practise through teacher-led discussions and activities. Group work, comprehension tests, in-depth application of the subject matter, or open time for individual tasks can all be done in the classroom, with the added benefit of having a teacher and fellow students nearby for problem-solving and cooperation.

But Flipped classroom model will be effective only when proper planning and strategies for done by educator. The successfulness of this classroom model only depends on the teacher, the way s/he select and arrange teaching content in more creative and meaningful way. Then which technology should be use to give awareness and more understanding of the content. The size of the video and different kind of media being used for this purpose.

The task that is done by students at home in flipped classroom model is-
- Watch an online lecture
- View Recorded Lecture given by Teacher
- Review online course material
- Read physical or digital texts
- Participate in an online discussion
- Perform research

The task that is done by students at classroom in flipped classroom model is-
- Skill practice (guided or unguided by the teacher)
- In-person, face-to-face discussion with peers
- Debate
- Presentations
- Station learning
- Lab experiments
- Peer assessment and review

**Advantage of Flipped Classroom Model approaches-**
• Each student can follow their courses at their own pace, with the option to watch them again if necessary.
• Homework is completed in class; students are free to ask questions about things they don't understand, and instructors may offer appropriate solutions based on the students' abilities.
• Students can access the course 24/7.
• Both students and educators benefit from spending more time in the classroom.
• When compared to traditional methods, educators who have taught using this strategy have reported getting better exam outcomes.
• More time can be spent with students discussing original research
• Students can spend more time with scientific equipment that can only be used in the classroom
• Students can easily follow classes that they couldn't before due to sports or conference activities
• Method encourages students to think and study both inside and outside the classroom

The Disadvantages of Flipped Classroom Model Approach
The use of flipped classrooms has some drawbacks. The first that comes to mind is the creation of video content, which consumes the majority of teachers' time. If the teacher does not make active touch with pupils outside of class, kids may feel doomed and their motivation may suffer. Students who are habituated to the traditional paradigm may have difficulty transitioning to the new model. If the movies that professors generate for pupils to watch cause them to have trouble grasping the contents,

Conclusion-
Flipped Classroom Model, which is growing rapidly around the world and whose impact has been documented in numerous studies, there are many sources of conflict. This strategy can be practised in a variety of ways. However, key elements like as direct classroom instruction, the use of effective learning strategies, and the use of instructional technologies are included in practically all approaches. Furthermore, the number of people joining the "Flipped Learning Network" is growing every day, and the criteria for this activity are continually being developed. When educator consider today's needs and the profile of "learners," it's clear that some teaching methods other than traditional ones are required. This is the digital era in the educational field and way of teaching, method of teaching and even evaluation methods are also drastically changing.

If teachers want to teach the next generation, they should adapt their methods and materials to fit the learning styles of their students. Almost all students keep up with technology; smart phones or tablets are crucial to their lives, and they also utilise the internet to keep up with social media sites (Facebook, Twitter, Instagram, etc.). As a result, teachers use educational social networking technologies to deliver educational outputs of lesson topics that will capture students’ attention. In this approach, it is hoped to extend education outside of the classroom and boost student preparation, as well as provide additional time for classroom interaction and activities.

References-


