

# Student Perspective on Effective Mathematics Pedagogy: Stimulated Recall Approach

## Introduction

*This research is in the areas of Mathematics and Pedagogy. It examines the practices of secondary two mathematics classrooms in an integrated and comprehensive manner. Unlike most studies on mathematics classrooms, a distinguishing feature of this study is the exploration of learner practices across a sequence of lessons.*

### Objectives:

- I. To document student practices in secondary two mathematics classrooms.
- II. To identify the ways in which the practices of mathematics learners both afford and constrain specific teacher practices, and
- III. To assess the effectiveness of teacher and learner actions in promoting particular forms of student learning in mathematics classrooms.

#### **Data to be collected per school:**

- Video records of 10 consecutive lessons (4 per lesson): Whole class, Teacher, Focus group, Picture-in-picture
- Transcripts of lessons
- Teacher's questionnaires (3) and interviews (1 per week)
- Teaching materials (e.g. slides, handouts)
- Focus students' artifacts (e.g. worksheets) and interviews (2 per lesson)
- International Benchmark Test

#### **Key Characteristics of Study**

- International comparison study
- (also known as the Learner's Perspective Study)
- Documentation of sequences of lessons
- Exploration of learner's perspective
- Identification of culturally-specific teacher practices

#### **Equipment used:**

- 3 video cameras supported on tripods
- Radio mike (Teacher)
- Condenser mike (Focus students)
- Video Mixer (Produce picture-in-picture)
- Audio mixer (Mix sound from teacher and student's mikes)
- Monitor
- Recorder



#### **Other countries involved in the same study:**

Australia, China (Shanghai and Hong Kong), Germany, Israel, Japan, Korea, Philippines, South Africa, Sweden, United States,

*Website of the Learner's Perspective Study:*

<http://extranet.edfac.unimelb.edu.au/DSME/lps/>

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