

CGI Math: Enhancing a Student's Cognitive Learning of Mathematics

LAUSD Course #NA-13-841

Approved for 1 Salary Point (LAUSD-specific)

Course Objectives

- ✓ Learn to define CGI
- ✓ Explain the rationale of CGI and why it should be used
- ✓ Be able to practice CGI in the classroom to meet diverse learning needs
 - learn how to listen to students
 - practice understanding students' mathematical thinking
 - practice guiding students to build upon their own thinking



Brief Overview

This is an introductory course on a research based professional development program for teaching mathematics in elementary schools. This program seeks to enhance an instructor's ability to implement any mathematical curriculum. As a teaching professional yourself, you will learn how to master teaching mathematics by being taught how to listen to your students, understand your students' thinking, and provide support for your students' mathematical learning. This course will define CGI Math and the benefits of using it. You will be guided in your first steps of implementing CGI in your own class, in alignment with Common Core State Standards. Through CGI Math, participants will learn how to better plan for mathematical activities in their classroom and enhance their mathematical instruction.

Goal: Participants will learn how to enhance their instruction in math by learning from their students and fellow teachers. They will practice bringing CGI math into their classrooms to make mathematical learning more engaging and more effective. Participants will also find way to assess their students by aligning CGI concepts with Common Core Standards.

Outline of Course

Session 1: An Overview of CGI Math (where it came from and how it is doing) What is CGI?

Session 2: Example of CGI Math (Activities, videos and examples)

Session 3: Why use it? (Examples of its success)

Session 4: How can we use it? (Video examples of teachers and student interactions using CGI)

Session 5: Implement CGI Math (Provide you with activities you can bring to your students, colleagues or family members to familiarize you with how to implement CGI Math)

Session 6: CGI and CCSS (Articles on how they compare and select a matching point to discuss on the forum)

Final: Presentation on CGI (What have you learned and what are you planning to do with this information?)

Description of Activities

For each session please expect the following activities:

- Read through the lesson and watch videos
- Take a quiz on the material presented
- Complete the quiz and assignment for the lesson
- Post your responses on the discussion forum for interaction with other teachers

Bibliography/Course Content References

Carpenter, Thomas P., et al. *Children's Mathematics: Cognitively Guided Instruction*. Heinemann, 2015.

Have Questions?

Email our Help Desk at help.ed4equity@gmail.com