

Hawai'i APSI 2024 Agenda



Date: 15-18 July, 2024

Time: 8:00 am-4:00 pm

Damien Memorial School

Theme:

New Location, New Experience and a New Sense of Aloha!

(The Aloha Spirit - compassion and kindness to all with whom we cross paths in our everyday lives).

Course Description:

During this AP[®] Calculus AB APSI, you'll explore the course framework, the exam, and the new AP[®] resources that will help you plan and focus instruction—and give you feedback throughout the year on the areas where individual students need additional focus. You'll also learn about completing the digital activation process at the start of the school year that will give you immediate access to the new resources and will help ensure that your students can register for AP[®] Exams by the new fall deadlines. By attending this APSI, you'll gain deeper insight into the following key takeaways, among several others: Understand the Course; Plan the Course; Teach the Course; Assess Student Progress; and Engage as a Member of the AP[®] Community. In addition, specific attention will be paid to the following AP[®] Classroom resources: unit guides, personal progress checks, AP[®] teacher community, and the AP[®] question bank.

The following are some of the goals for the week:

- Detailed coverage of the current AP[®] Calculus AB syllabus including the AP[®] Calculus Framework and the Course and Exam Description (CED). Problems illustrating the concepts will be discussed and solved both in and out of class. We will also discuss new College Board resources including a detailed look at AP[®] Classroom.
- Presentations on significant topics, including some chosen by the participants. These could include the definition of the derivative, the chain rule, the recently-added L'Hospital's Rule, the fine points of locating maxima and minima and other applications of derivatives, integration by substitution, the Fundamental Theorem of Calculus, applications of definite integrals, exponential growth and other differential equations. The ability of technology to quickly compute an approximation to a definite integral has opened up easy solutions and new approaches to old problems, and this is reflected in some of the questions on recent tests.
- Application of the four AP[®] approved calculator functionalities using a TI 84+ CE calculator. Participants are expected to bring the calculator they normally use. Having a laptop with you will help the discussion with AP[®] Classroom but is not required.

- The College Board's Equity and Access statement and my Philosophy of Success will also be a focus throughout the workshop.

Expected outcomes for the 4-days:

- An understanding of the Course, Curriculum Framework, Exam Format
- How to plan your course in terms of the framework
- How to utilize AP® Classroom
- Becoming a member of the AP® Calculus Community
- Getting lots and lots of resources in my Google Drive
- Getting you and your students to say: "I love my AP® Calculus class!"

What should participants bring to the workshop?

- The graphing calculator that you will use in your classroom. (I will use a TI-84 Plus CE)
- A laptop or tablet would help (but is not required)
- An open mind!!

Agenda for Days 1-4

This schedule may change in accordance with the participant needs as determined during the first day of the workshop.

Day 1

- Understanding the Course, Curriculum Framework, Exam Format
- Limits, Derivatives: Definition and Applications, Linear Approximations

Day 2

- Course Planning and Audit Requirements
- AP® Classroom
- Motion, Integrals: Definition and Applications, Related Rates, Fundamental Theorem, Area/Volume, Accumulation

Day 3

- Sharing Session
- AP® Central
- My APSI Google Drive
- Free Response Questions with graphical stems

Day 4

- Assessing Student Progress and Becoming a member of the AP® Community
- Differential Equations and Slope Fields

There should be plenty of discussion time, both during the sessions and in the free time, to share strategies, plans and experiences with content presentation and the technologies that are available. Many, many, many resources will be handed out both as paper handouts and on my Google Drive.



Speaker
Howard Alcosser
AP[®] Calculus AB