

HS Mathematical Methods Standards and Benchmarks Confirmed

Standard 1: Use a variety of strategies in the problem-solving process

Benchmarks:

- 1.1 Use a variety of strategies to understand new mathematical content and to develop efficient solution methods or problem extensions
- 1.2 Illustrate and solve problems with diagrams

Standard 3: Use basic and advanced procedures while performing the processes of computation

Benchmarks:

- 3.1 Understand the concept of vector and the concept of scalar product
- 3.2 Use calculus to approximate definite integrals and to approximate solutions of non-linear equations by iteration

Standard 5: Understand and apply basic and advanced properties of the concepts of geometry

Benchmarks:

- 5.1 Understand the characteristics and use of vectors
- 5.2 Understand the geometrical interpretation of the derivate and integral

Standard 8: Understand and apply basic and advanced properties of functions and algebra

Benchmarks:

- 8.1 Understand the concepts of vector and scalar product
- 8.2 Understand and apply the concept of the derivative of a function
- 8.3 Understand and apply the concept of the integral of a function
- 8.4 Use applications of differential and integral calculus
- 8.5 Understand the notion of function as a unifying theme in mathematics