

THE SCIENCE ACADEMY OF SOUTH TEXAS

FOUR-YEAR COURSE SEQUENCE 2010-2011

<u>9th Grade</u>	<u>10th Grade</u>	<u>11th Grade</u>	<u>12th Grade</u>
English I	English II	English III	English IV
Algebra I or Geometry	Geometry Algebra II Pre-Calculus	Algebra II Pre-Calculus Calculus I	Pre-Calculus Calculus I or II
Integrated Physics and Chemistry Biology I	Chemistry I Environmental Systems	Physics I Chemistry II Biology II	Physics I or II Chemistry II Biology II
World History	World Geography	U.S. History	U.S. Government and Economics
Computer Science I	Spanish I or II	Spanish II or III Physical Education and Health	Spanish III or IV or Elective
* Introduction to Engineering Design	Biotechnical Engineering or *Civil Engineering and Architecture or * Computer Integrated Manufacturing or * Digital Electronics or *Principles of Engineering	Biotechnical Engineering or *Civil Engineering and Architecture or * Computer Integrated Manufacturing or * Digital Electronics or *Principles of Engineering	Engineering Design and Development (Senior Research Project) and Bio. Tech. or C.E.A. or * C.I.M or *D.E. or *P.O.E
Research/ Technical Writing (Semester Course) Foundations of Personal Fitness (Semester Course)	Art, Level I	Speech Communications (Semester Course) SAT/ACT Prep (Semester Course)	Physical Education (Semester Course) Psychology or Elective (Semester Course)

English, Math, Science, and Social Studies classes are required each of the four years.

Calculus is required prior to or concurrently with Statistics AP.

Physics I is required prior to or concurrently with Biology II AP, Chemistry II AP or Environmental Systems AP.

Advanced Placement preparation is available in:

English III; English IV; Calculus I (AB); Calculus II (BC); Statistics; Chemistry II; Biology II; Physics II and III, U.S. Government; Economics; Art II; Environmental Science; Computer Science II, U. S. History AP, Spanish II, and IV, Psychology AP.

* Transcribed College Credit is available through the Rochester Institute of Technology for Introduction to Engineering Design; Digital Electronics Computer Integrated Manufacturing , Computer Engineering and Architecture and is based upon the scores from an end of course exam, college credit exam and the submission of a qualifying course portfolio. Plans are in place to include the Principles of Engineering and Engineering Design and development courses in the near future. There is no fee to take the exams but a \$200 filing fee with the university required for each qualifying course should the student wish to activate their credit(s) through the university system.

Elective Courses will be taken within the four year course sequence. Below is a list of these courses:

P.E. Equivalent: Boys Athletics, Cross Country, Dance Golf, Band, ROTC, Soccer, Sports 1, Tennis, Swimming etc.

CATE: BCIS, Business Fundamentals, Communication Graphics etc.

Fine Arts: Music, Theatre Arts, Choir, Orchestra etc.

Foreign Language: French, Hindi, Chinese etc.

Mathematics Elective Credit: Math Lab, Math Enrichment, Math Models etc.

Medical Elective Credit: Principles of Biomed, Medical Terminology etc.

Speech: Debate

English Language Arts Elective Credit: Reading I

Technology Applications: Multi Media etc.