Career Education Options

Gavilan offers three types of career education options:

- Associate’s Degree
- Certificate of Achievement (generally requires 18 or more units)
- Certificate of Proficiency (requires fewer than 18 units)

All provide instruction in the skills and knowledge needed to enter a skilled or semi-professional occupation. Associate’s degree programs require completion of general education requirements. Certificate programs vary in the number of units required. Occupational certificate programs are developed in close cooperation with advisory committees made up of representatives from business and industry. These advisory committees review courses and make recommendations about technical content so that students will be prepared for the current technology of the job market.

Gavilan offers a number of Certificates of Proficiency, designed with 3-17 units to allow students to achieve job-market proficiencies in a variety of fields. Students must earn a “C” or better in each course for the Certificate of Proficiency, and must take 60 percent of the required courses at Gavilan College in order to earn a certificate here. Students earning certificates will have their fulfillment of requirements verified by a college counselor. Certificates of achievement will appear on the student’s transcript while certificates of proficiency will not.

Note: Certificate of Proficiency and Certificate of Achievement require a grade of 2.0 (“C”) or better in each course.

General Education

Along with the major course requirements listed in each degree major in the following pages, students must complete all general education and legal requirements described in General Education Requirements to be eligible for the associate’s degree. To complete General Education requirements a student may complete the Gavilan College AA/AS general education, the CSU-GE Breadth or the IGETC pattern. See pages 48-56 of this catalog for details.

REMINDER: Courses completed to satisfy general education requirements for an associate’s degree can also be used for the major unless otherwise specified and beyond the 18-unit minimum.

Need For Specialized Training

It is often difficult to secure employment or to advance to increased responsibility and better paying jobs without specialized training. In the early stages of one’s career it is the specific, technical skills that an employer seeks. Your college record is the best evidence that this specialized training has been secured.

Students may combine work toward a certificate or an associate’s degree with courses leading to advanced standing at a four-year college or university. Many students have thus acquired a marketable skill with which they could support themselves and their families while they continue to work for a baccalaureate degree.

Accuracy

Items in this catalog are subject to change without notice. Please visit the Gavilan College website at www.gavilan.edu/catalog for the most current information.
Below is a quick reference of degrees and certificates available at Gavilan College. For more information, call the Counseling Office at (408) 848-4723 or the related department. See program listings beginning on page 65. Regional Occupational Programs (ROP) certificates are listed on pages 223-224.

### General Education - Transfer Programs

<table>
<thead>
<tr>
<th>Program</th>
<th>Certificate of Proficiency</th>
<th>Certificate of Achievement</th>
<th>Transfer Program and/or Gavilan AA/AS Degree</th>
</tr>
</thead>
<tbody>
<tr>
<td>Administration of Justice</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Law Enforcement Opt 1</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Law Enforcement Opt 2 (Police Academy)</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Administration of Justice for CSU transfer</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Allied Health</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Nursing: Registered Nursing</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Studio Art</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Aviation Maintenance Technology</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Airframe</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Powerplant</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Biological Science</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Biotechnology</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Business</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Accounting</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Business Computer Applications</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Computerized Accounting</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Economics</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>General Business</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>General Office Skills</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Medical Office</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Real Estate</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Retail Management</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Carpentry Apprenticeship</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Child Development</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Early Childhood Education</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Early Intervention Assistant</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>School Age Child Care</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Span Language Early Childhood Edu</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Communication Studies</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Communication</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Interpersonal Communication</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Computer Graphics &amp; Design</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Comp. Graphics for Environmental Design</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Technical Desktop Publishing &amp; Graphics</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Computer Science &amp; Information Systems</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Business Computer Applications</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Computer Hardware</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Computer Networking</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Computer Programming</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Programming for the Internet</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Scientific Programming</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>UNIX Operating System</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Cosmetology</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Esthetician</td>
<td></td>
<td></td>
<td></td>
</tr>
</tbody>
</table>

- Associate’s Degree or Certificate
- Represents an option within a program

**Degree and Certificate Titles (effective fall of 2008):** All certificates previously called "Certificates of Completion" are now called "Certificates of Achievement" and certificates previously called "Certificates of Achievement" are called "Certificates of Proficiency". These are title changes only and do not affect certificate requirements nor certificates previously awarded.

*Not all courses required for these majors/certificates may be offered during this catalog cycle. Please contact a counselor for current information at (408) 848-4723.*
ADMINISTRATION OF JUSTICE

A.S. Degree
Administration of Justice for CSU Transfer

A.A. Degrees and Certificates of Achievement
Law Enforcement, Option 1
Law Enforcement, Option 2 (Police Academy)

Also see: Liberal Arts: Administration of Justice Emphasis: AA Degree page 127

Program Learning Outcomes: After completing the Administration of Justice major a student will be able to:

► define and utilize key terms, concepts, and theories in the criminal justice system.
► demonstrate knowledge of the history, structure, and processes of law enforcement, the judicial system, correctional system, and the juvenile justice system.
► reflect critically on developments in criminal justice policy and the relationship of these policies to the wider political and social environment.
► compare and evaluate diverse and competing arguments and analysis in disciplinary (justice system) and interdisciplinary contexts.
► interpret, assess and compare competing types of evidence and data.
► effectively communicate orally and in writing the results of their analysis and conclusions.

After completing the Administration of Justice major, students transferring to a four-year institution will be prepared for additional study in the following areas: Administration of Justice, Law Enforcement, Correctional Administration, Social Science, Pre-Law.

South Bay Regional Public Safety Training Consortium

As a member of the South Bay Regional Public Safety Training Consortium, Gavilan College offers courses for students who are interested in Correctional Officer, Law Enforcement, Reserve Police Officer, Dispatcher, Fire Technology, Probation Officer, or Juvenile Hall Counselor careers. The Consortium is funded by all colleges regionally to provide vocational specific training which may require special facilities, special training conditions or is presented outside of the regular schedule of college classes.

The application and registration process is completed at the South Bay Regional Public Safety Training Consortium Center located near the Evergreen Valley College campus. Although open to the public, the majority of these courses are intended to serve the “already employed”. If you have questions about these courses, or if you would like information about a career in any of these programs, please call (408) 270-6458 or visit the webpage at www.theacademy.ca.gov.

Gavilan College graduate Ramon Mendoza
Administration of Justice for CSU Transfer  A.S. Degree

REQUIREMENTS:

List A: Required Courses (6 units total):
AJ 10  Introduction to the Administration of Justice ......................... 3 units
AJ 14  Criminal Law ............................................................ 3 units

List B: Select any TWO of the following courses (6 units total):
AJ 12  Criminal Procedures (3 units)
AJ 16  Introduction to Evidence (3 units)
AJ 18  Community Policing (3 units)
AJ 19  Introduction to Investigation (3 units)
AJ 20  Juvenile Law and Procedure (3 units)
List B total ................................................................. 6 units

List C: Select any TWO of the following courses (6 units total):
SOC 1A  Introduction to Sociology (3 units)
PSYC 1A  Introduction to Psychology (3 units)
MATH 5  Introduction to Statistics (3 units)
List C total ................................................................. 6 units

Total units for the degree ........................................... 18 units

Plus completion of CSU or IGETC general education requirements: ........ 39–42 units
Total Units Required for AS-T Degree: ............................................. 60 UNITS

Students must:

- Complete a minimum of 60 CSU-transferable units.
- Maintain a minimum grade point average (GPA) of at least 2.0 in all CSU transferable coursework. While a minimum of 2.0 is required for admission, some majors may require a higher GPA. Please consult with a counselor for more information.
- Complete a minimum of 18 semester units in an “AA-T” or “AS-T” major as detailed on page 47 of this catalog. Each course in the major must be completed with a grade of C or better or a “P” if the course is taken on a “pass-no pass” basis (title 5 55063).
- Be certified as having completed the California State University-General Education - Breadth pattern (CSU-GE Breadth) (see page 55 for more information); OR the Intersegmental General Education Transfer Curriculum (IGETC) pattern (see page 52 for more information).

Students should note that no more than 60 units are required for this degree and that no additional requirements will be imposed by Gavilan College. In addition, no remedial or non-collegiate level course work will be counted in the total units for this degree.

General Education Requirements: A student may complete the Gavilan College AA/AS general education pattern (35-44 units), the CSU-GE Breadth pattern (39-52 units) or the IGETC pattern (42-48 units), plus sufficient electives to meet a 60 unit total. See pages 48-56 or see a counselor for details.

NOTE: A course may be used to satisfy both general education and major courses. See “Double Counting Rule” on page 46.
Law Enforcement, Option 1  

**A.A. Degree and Certificate of Achievement**

To receive an ASSOCIATE’S DEGREE complete:

- **REQUIREMENTS** listed below.
- **GENERAL EDUCATION REQUIREMENTS** (Gavilan, IGETC or CSU pattern), plus sufficient electives to meet a 60 unit total. See pages 48-56.

### REQUIREMENTS:

<table>
<thead>
<tr>
<th>Course Code</th>
<th>Course Title</th>
<th>Units</th>
</tr>
</thead>
<tbody>
<tr>
<td>AJ 10</td>
<td>Introduction to the Administration of Justice</td>
<td>3</td>
</tr>
<tr>
<td>AJ 12</td>
<td>Criminal Procedures</td>
<td>3</td>
</tr>
<tr>
<td>AJ 14</td>
<td>Criminal Law</td>
<td>3</td>
</tr>
<tr>
<td>AJ 16</td>
<td>Introduction to Evidence</td>
<td>3</td>
</tr>
<tr>
<td>AJ 18</td>
<td>Community Policing</td>
<td>3</td>
</tr>
</tbody>
</table>

Choose 6 units:

- AJ 5 Introduction to Modern International Terrorism *(3 units)*
- AJ 19 Introduction to Investigation *(3 units)*
- AJ 20 Juvenile Law and Procedure *(3 units)*
- AJ 21 Narcotics and Drug Abuse *(3 units)*
- AJ 32 Crime and Delinquency *(3 units)*
- AJ 173 Fundamentals of Probation and Parole *(3 units)*
- AJ 176 Criminal Street Gangs *(3 units)*
- AJ 184 Computer Forensics *(3 units)*

Total Units Required: 21 UNITS

To receive a CERTIFICATE OF ACHIEVEMENT complete:

- **REQUIREMENTS** listed below.

- **GENERAL EDUCATION REQUIREMENTS** (Gavilan, IGETC or CSU pattern), plus sufficient electives to meet a 60 unit total. See pages 48-56.

The law enforcement program provides a course of study to prepare students for employment in private security and public law enforcement agencies, including: state parks, municipal police, game wardens, probation officers, county deputy sheriffs, county and state correctional officers and the federal government.

The associate's degree program will prepare students for transfer to UC and CSU bachelors programs (if the IGETC or CSU GE pattern is chosen.)

The certificate program is an option for students whose employment objectives are with agencies who require less than an A.A. degree.

### General Education Requirements:

A student may complete the Gavilan College AA/AS general education, the CSU-GE Breadth or the IGETC pattern, plus sufficient electives to meet a 60 unit total. See pages 48-56 or see a counselor for details.

**NOTE:** A course may be used to satisfy both general education and major courses. See "Double Counting Rule" on page 46.

---

**Gainful Employment Statistics for Certificate**

<table>
<thead>
<tr>
<th>Name of Program: (if different than the CIP program description)</th>
<th>CA in Admin of Just-Law Enforc</th>
</tr>
</thead>
<tbody>
<tr>
<td>Program Length: (in years)</td>
<td>1.00</td>
</tr>
<tr>
<td># of units/credits required for program:</td>
<td>21</td>
</tr>
<tr>
<td>Total Tuition and Required Fees for the entire program completed in normal time:</td>
<td>CA Resident</td>
</tr>
<tr>
<td></td>
<td>$ 798</td>
</tr>
<tr>
<td>Total estimated costs for books and supplies for the entire program:</td>
<td>$ 1,620</td>
</tr>
<tr>
<td>Total room and board charges for living on campus:</td>
<td>College does not offer on-campus living.</td>
</tr>
<tr>
<td>Number of students completing the program: (between July 1, 2010 and June 30, 2011)</td>
<td>26</td>
</tr>
</tbody>
</table>

For more information visit the Gavilan College Gainful Employment website at http://www.gavilan.edu/gainful_employment. Fees based on fall 2011 per-unit rates.
Law Enforcement, Option 2  

**A.A. Degree and Certificate of Achievement**

To receive an ASSOCIATE’S DEGREE complete:

- REQUIREMENTS listed below.
- GENERAL EDUCATION REQUIREMENTS (Gavilan, IGETC or CSU pattern), plus sufficient electives to meet a 60 unit total. See pages 48-56.

### REQUIREMENTS:

<table>
<thead>
<tr>
<th>Course Code</th>
<th>Course Title</th>
<th>Units</th>
</tr>
</thead>
<tbody>
<tr>
<td>JLE 100</td>
<td>Basic Police Academy</td>
<td>22</td>
</tr>
</tbody>
</table>

Choose 6 units:

- AJ 5 Introduction to Modern International Terrorism (3 units)
- AJ 19 Introduction to Investigation (3 units)
- AJ 20 Juvenile Law and Procedure (3 units)
- AJ 21 Narcotics and Drug Abuse (3 units)
- AJ 32 Crime and Delinquency (3 units)
- AJ 173 Fundamentals of Probation and Parole (3 units)
- AJ 176 Criminal Street Gangs (3 units)
- AJ 184 Computer Forensics (3 units)

Additional 6 units: 6 units

Total Units Required: 28 UNITS

The law enforcement program provides a course of study to prepare students for employment in private and public law enforcement agencies.

For specific police academy information and scheduling, contact the South Bay Regional Public Safety Training Consortium. See ad on page 65.

Four-year colleges may differ in their major preparation requirements for transfer. Consult with a counselor regarding transfer requirements.

---

### General Education Requirements

A student may complete the Gavilan College AA/AS general education, the CSU-GE Breadth or the IGETC pattern, plus sufficient electives to meet a 60 unit total. See pages 48-56 or see a counselor for details.

**NOTE:** A course may be used to satisfy both general education and major courses. See "Double Counting Rule" on page 46.

---

**Gainful Employment Statistics for Certificate**

<table>
<thead>
<tr>
<th>Name of Program: (if different than the CIP program description)</th>
<th>CA in Admin of Just-Law Enforc.</th>
</tr>
</thead>
<tbody>
<tr>
<td>Program Length: (in years)</td>
<td>1.00</td>
</tr>
<tr>
<td># of units/credits required for program:</td>
<td>28</td>
</tr>
<tr>
<td>Total Tuition and Required Fees for the entire program completed in normal time:</td>
<td>CA Resident</td>
</tr>
<tr>
<td></td>
<td>$ 1,050</td>
</tr>
<tr>
<td>Total estimated costs for books and supplies for the entire program:</td>
<td></td>
</tr>
<tr>
<td>Total room and board charges for living on campus:</td>
<td>College does not offer on-campus living.</td>
</tr>
<tr>
<td>Number of students completing the program:</td>
<td>26</td>
</tr>
</tbody>
</table>

For more information visit the Gavilan College Gainful Employment website at http://www.gavilan.edu/gainful_employment. Fees based on fall 2011 per-unit rates.
The sequence of courses for students interested in careers in Allied Health is shown below. The sequence is designed to offer maximum flexibility in achieving educational goals, while providing for entry into the next level of the program.

**PREREQUISITES:**

<table>
<thead>
<tr>
<th>Course Code</th>
<th>Course Title</th>
<th>Units</th>
</tr>
</thead>
<tbody>
<tr>
<td>AH 3**</td>
<td>The Person in the Life Cycle</td>
<td>3</td>
</tr>
<tr>
<td>AH/BIO 11**</td>
<td>Nutrition</td>
<td>3</td>
</tr>
<tr>
<td>AH/BIO 15**</td>
<td>Survey of Human Anatomy and Physiology</td>
<td>5</td>
</tr>
<tr>
<td>AH 32**</td>
<td>Basic Cardiac Life Support</td>
<td>1</td>
</tr>
<tr>
<td>AH 180**</td>
<td>Fundamentals of Nursing--Convalescent</td>
<td>8</td>
</tr>
<tr>
<td>ENGL 1A**</td>
<td>Composition</td>
<td>3</td>
</tr>
<tr>
<td>PSYC 1A**</td>
<td>Introduction to Psychology</td>
<td>3</td>
</tr>
<tr>
<td>ENGL 260*</td>
<td>Preparation for College Reading</td>
<td>3</td>
</tr>
<tr>
<td>MATH 233*</td>
<td>Intermediate Algebra</td>
<td>5</td>
</tr>
</tbody>
</table>

* May be satisfied by coursework or Gavilan College Placement Test. Two year recency and a minimum grade of “C” required.

** Overall GPA of 2.5 in specified courses. Minimum of “C” in all courses.

Courses listed above and the following Clinical courses are required for Advanced Standing.

<table>
<thead>
<tr>
<th>Course Code</th>
<th>Course Title</th>
<th>Units</th>
</tr>
</thead>
<tbody>
<tr>
<td>AH 51**</td>
<td>Medical-Surgical Nursing</td>
<td>11</td>
</tr>
<tr>
<td>AH 52**</td>
<td>Medical-Surgical Nursing</td>
<td>11</td>
</tr>
<tr>
<td>AH 53**</td>
<td>Medical-Surgical - Maternal-Neonatal Nursing</td>
<td>11</td>
</tr>
<tr>
<td>AH 54**</td>
<td>Medical-Surgical/Pediatric Nursing</td>
<td>11</td>
</tr>
</tbody>
</table>

** Students completing AH 51-54 will be eligible to take the NCLEx-VN Licensing Exam and apply for Advanced Standing in the Registered Nursing Program. Additional courses must be taken to meet general education requirements for A.S. degree. Please consult a counselor. To schedule an appointment, call 408-848-4723.

** Students completing AH 51-56 will be eligible to take the NCLEx-RN Licensing Exam. Additional courses must be taken to meet general education requirements for A.S. degree. Please consult a counselor. To schedule an appointment, call 408-848-4723.
Registered Nursing  A.S. Degree and Certificate of Achievement

PREREQUISITES (Students planning to enter the Registered Nursing Program must complete the following prerequisites):

AH 3**  The Person in the Life Cycle ............................................ 3 units
AH/BIO 11**  Nutrition ............................................................. 3 units
AH/BIO 15**  Survey of Human Anatomy and Physiology
(or BIO 7 and BIO 9) ............................................................. 5 units
AH 32**  Basic Cardiac Life Support .............................................. 1 unit
AH 180**  Fundamentals of Nursing--Convalescent
or be a Certified Nurse Assistant (CNA) ..................................... 8 units
ENGL 1A**  Composition .......................................................... 3 units
PSYC 1A**  Introduction to Psychology ....................................... 3 units
ENGL 260*  Preparation for College Reading ................................ 3 units
MATH 233*  Intermediate Algebra ............................................. 5 units

* May be satisfied by coursework or Gavilan College Placement Test.
** Overall GPA of 2.5 in specified courses. Minimum of "C" required.

Total Units: 44 UNITS

Students completing AH 54 will be eligible to take the NCLEX-VN Licensing Exam and apply for Advanced Standing in the Registered Nursing Program. Advanced Standing is open to Licensed Vocational Nurses or those who have successfully completed AH 54.

** Overall GPA of 2.5 in specified courses. Minimum of "C" in all courses.

CLINICAL COURSES REQUIRED FOR ADVANCED STANDING:

AH 51**  Medical-Surgical Nursing .............................................. 11 units
AH 52**  Medical-Surgical Nursing .............................................. 11 units
AH 53**  Medical-Surgical - Maternal-Neonatal Nursing .................... 11 units
AH 54**  Medical-Surgical/Pediatric Nursing .................................. 11 units
Total Units: 44 UNITS

Program Learning Outcomes: After completing this degree or certificate a student will be able to:

- take and pass the licensure exam.
- function within the scope of practice of the registered nurse as outlined by the California Board of Registered Nursing.
- practice within professional and legal standards, ethical principles and demonstrate sensitivity to the cultural differences of clients.
- apply principles of oral, written and verbal communication to convey relevant, accurate and complete information.
- demonstrate an ability to practice safely.
- apply the nursing process by assessing, planning, implementing and evaluating nursing care and teaching the maintenance of health and prevention of disease.

At the present time, the Registered Nursing program is open to licensed vocational nurses or those who have successfully completed a vocational nursing program and are exam eligible.

After completing the Registered Nursing program and passing the National Council Licensure Examination, students will have job entry skills for registered nursing. The Associate's degree in Registered Nursing requires completion of the Allied Health clinical courses listed plus general education requirements. Students are then qualified for a Certificate of Achievement in Registered Nursing and an Associate of Science degree.

Students interested in a Bachelor of Science in Nursing program are encouraged to consult the catalog from the college they plan to attend. See a counselor regarding transfer requirements.

Gainful Employment Statistics for Certificate

Name of Program: (if different than the CIP program description)  CA in Registered Nursing
Program Length: (in years)  3.00
# of units/credits required for program:  66
Total Tuition and Required Fees for the entire program completed in normal time:
  CA Resident  Nonresident
  $2,502  $14,382
Total estimated costs for books and supplies for the entire program: $ 3,240
Total room and board charges for living on campus: College does not offer on-campus living.

For more information visit the Gavilan College Gainful Employment website at http://www.gavilan.edu/gainful_employment. Fees based on fall 2011 per-unit rates.

ASSOCIATE DEGREE: Associate Degree Registered Nursing requires completion of the clinical courses listed below together with general education requirements. Students are then qualified for a Certificate of Achievement in Registered Nursing and an Associate of Science Degree.

CLINICAL REQUIREMENTS:

AH 55**  Interactive and Mental Health Nursing  ......................... 10 units
AH 56**  Compensatory Nursing Practice .................................... 10 units

** Overall GPA of 2.5 in specified courses. Minimum of "C" in all courses.

General Education Requirements: A student may complete the Gavilan College AA/AS general education, the CSU-GE Breadth or the IGETC pattern, plus sufficient electives to meet a 60 unit total. See pages 48-56 or see a counselor for details.

NOTE: A course may be used to satisfy both general education and major courses. See "Double Counting Rule" on page 46.
Registered Nursing 30 Unit Option

Certificate of Achievement

Completion of the courses listed below will qualify students for a Certificate of Achievement in Registered Nursing. This option is available to Licensed Vocational Nurses only. Please consult a counselor. To schedule an appointment, call 408-848-4723.

CERTIFICATE OF ACHIEVEMENT REQUIREMENTS:
AH/BIO 8** General Microbiology .................. 5 units
AH/BIO 9** Human Physiology ................... 5 units
AH 55** Interactive and Mental Health Nursing ... 10 units
AH 56** Compensatory Nursing Practice .......... 10 units
Certificate Requirements: 30 UNITS

Nurse Assistant - Convalescent ROP Certificate

AH180 Fundamentals of Nursing Convalescent .... 8 units
ROP Certificate Requirements: 8 UNITS

Home Health Aide ROP Certificate

AH 180 Fundamentals of Nursing--Convalescent . . . 8 units
AH 182 Home Health Aide ............................ 2 units
ROP Certificate Requirements: 10 UNITS

Clinical Medical Assisting ROP Certificate

AH 170 Basic Clinical Medical Assisting .......... 6 units
AH 171 Advanced Clinical Medical Assisting .... 6 units
ROP Certificate Requirements: 12 UNITS

Completion of this course will qualify students for State Certification as a Home Health Aide. Students receiving the certificate will have job entry skills for home health aide.

Completion of these courses will qualify students for a Certificate of Completion as a Clinical Medical Assistant. Students receiving their certificate will have the job entry skills needed to apply for a clinical medical assistant position.
Apprenticeships

A.A. Degrees and Certificates of Achievement

Carpentry
Drywall/Lathing

These apprenticeship programs are cooperative efforts between the Joint Apprenticeship Training Committee (JATC) and the college. The JATC is composed of representatives from both labor and management from each apprenticeship area and their purpose is to oversee apprenticeship training. The Gavilan College apprenticeship program is approved by the Division of Apprenticeship Standards of the California Department of Industrial Relations.

Enrollment in an apprenticeship course is limited to registered apprentices. However, anyone meeting the apprenticeship requirements can apply for acceptance. Information on admission to apprenticeship programs can be obtained by going to www.ctcnc.org.

Drywall/Lathing Apprenticeship  
A.A. Degree or Certificate of Achievement

To receive an ASSOCIATE’S DEGREE complete:
- REQUIRED COURSES listed below.
- GENERAL EDUCATION REQUIREMENTS, (Gavilan, IGETC or CSU pattern), plus sufficient electives to meet a 60 unit total. See pages 48-56.

To receive a CERTIFICATE OF ACHIEVEMENT complete the:
- REQUIRED COURSES listed below.

REQUIREMENTS:
DRLT 200  Introduction to the Trade .................................. 2.0 units
DRLT 202  Basic Applications ....................................... 1.5 units
DRLT 205  Mathematics for Drywall/Lathing ............................ 2.0 units
DRLT 210  Residential Metal Framing  ................................ 1.5 units
DRLT 212  Doors, Windows, Exterior Systems/Building Documents 1.5 units
DRLT 220  Blueprint Reading I ...................................... 1.5 units
DRLT 221  Blueprint Reading II ...................................... 1.5 units
DRLT 222  Blueprint Reading III ..................................... 1.5 units
DRLT 230  Welding I ........................................... 1.5 units
DRLT 231  Welding II ........................................... 1.5 units
DRLT 240  Exterior/Advanced Fire Control System and Partitions 1.5 units
DRLT 242  Exterior Systems and Trims ............................... 1.5 units
DRLT 250  Interior Metal Lathing System and Sound Control 1.5 units
DRLT 260  Ceilings, Shaft Protection and Demountable Partitions 1.5 units
DRLT 262  Arches, Furring and Advanced Systems ...................... 1.5 units
DRLT 270  Advanced Construction Techniques ........................ 1.5 units

And a minimum of 16 units from the following:
DRLT 290  Occupational Work Experience/Drywall-Lathing 16 units

Total Units Required: 41 UNITS

Gavilan College, in cooperation with the Carpenter Training Committee for Northern California, conducts a Drywall/Lathing Apprenticeship Program which can lead to a Certificate of Achievement and/or Associates of Arts Degree. An apprenticeship program is a formal system of occupational training lasting from two to five years that combines paid employment, on-the-job training and job-related college level instruction in order to develop highly skilled workers.

The Dry Wall/Lathing Apprenticeship program concentrates on training apprentices to the specific levels required for the construction industry and has been approved by the State of California Department of Apprenticeship Standards. Training emphasis includes safety, metal framing, blueprint reading, exterior/interior wall finishes, welding, residential and commercial construction process, building codes, estimation and various construction topics.

Gainful Employment Statistics for Certificate

<table>
<thead>
<tr>
<th>Name of Program: (if different than the CIP program description)</th>
<th>CA in Drywall-Lathing Apprentice</th>
</tr>
</thead>
<tbody>
<tr>
<td>Program Length: (in years)</td>
<td>2.0</td>
</tr>
<tr>
<td># of units/credits required for program:</td>
<td>41</td>
</tr>
<tr>
<td>Total Tuition and Required Fees for the entire program completed in normal time:</td>
<td></td>
</tr>
<tr>
<td>CA Resident</td>
<td>$1,560</td>
</tr>
<tr>
<td>Nonresident</td>
<td>$8,940</td>
</tr>
<tr>
<td>Total estimated costs for books and supplies for the entire program:</td>
<td></td>
</tr>
<tr>
<td>$3,240</td>
<td></td>
</tr>
<tr>
<td>Total room and board charges for living on campus:</td>
<td></td>
</tr>
<tr>
<td>College does not offer on-campus living.</td>
<td></td>
</tr>
<tr>
<td>For more information visit the Gavilan College Gainful Employment website at <a href="http://www.gavilan.edu/gainful_employment">http://www.gavilan.edu/gainful_employment</a>. Fees based on fall 2011 per-unit rates.</td>
<td></td>
</tr>
</tbody>
</table>

Contact:
(408) 848-4719
cte@gavilan.edu
Carpentry Apprenticeship  
*A.A. Degree or Certificate of Achievement*

To receive an ASSOCIATE’S DEGREE complete:
- **REQUIRED COURSES** listed below.
- **GENERAL EDUCATION REQUIREMENTS**, (Gavilan, IGETC or CSU pattern), plus sufficient electives to meet a 60 unit total. See pages 48-56.

**REQUIREMENTS:**

<table>
<thead>
<tr>
<th>Course Code</th>
<th>Course Title</th>
<th>Units</th>
</tr>
</thead>
<tbody>
<tr>
<td>CARP 201</td>
<td>Worker Safety and Tool Skills</td>
<td>1.5</td>
</tr>
<tr>
<td>CARP 202</td>
<td>The Apprentice Carpenter and the Trade</td>
<td>2.0</td>
</tr>
<tr>
<td>CARP 203</td>
<td>Construction Math and Introduction to Working Drawings</td>
<td>2.0</td>
</tr>
<tr>
<td>CARP 204</td>
<td>Foundations and Floors</td>
<td>1.0</td>
</tr>
<tr>
<td>CARP 205</td>
<td>Residential Blueprint Reading</td>
<td>2.5</td>
</tr>
<tr>
<td>CARP 206</td>
<td>Structural Framing</td>
<td>1.0</td>
</tr>
<tr>
<td>CARP 207</td>
<td>Form Detailing, Construction and Erection</td>
<td>1.0</td>
</tr>
<tr>
<td>CARP 208</td>
<td>Exterior Finish</td>
<td>1.0</td>
</tr>
<tr>
<td>CARP 209</td>
<td>Blueprint Reading - Commercial and Industrial</td>
<td>2.0</td>
</tr>
<tr>
<td>CARP 210</td>
<td>Concrete - Precast and Prestressed</td>
<td>1.0</td>
</tr>
<tr>
<td>CARP 211</td>
<td>Interior Finish</td>
<td>1.0</td>
</tr>
<tr>
<td>CARP 212</td>
<td>Level and Layout Instruments</td>
<td>1.0</td>
</tr>
<tr>
<td>CARP 213</td>
<td>Engineered Structural Systems</td>
<td>1.0</td>
</tr>
<tr>
<td>CARP 214</td>
<td>Interior Systems</td>
<td>1.0</td>
</tr>
<tr>
<td>CARP 215</td>
<td>Stair Building</td>
<td>1.0</td>
</tr>
<tr>
<td>CARP 216</td>
<td>Roof Framing</td>
<td>1.0</td>
</tr>
<tr>
<td>CARP 217</td>
<td>Introduction of Welding and Cutting</td>
<td>1.0</td>
</tr>
<tr>
<td>CARP 298</td>
<td>Occupational Work Experience/Carpenter</td>
<td>16.0</td>
</tr>
</tbody>
</table>

And a minimum of 16 units from the following:
- **Carpenter Apprenticeship**

Total Units Required: 38.00 UNITS

The Carpenter Apprenticeship Program is a state-approved four year course of study preparing apprentices for courses in specialty crafts such as carpenters, millwrights, pile drivers, hard wood floor layers, acoustical installers, scaffold erectors, insulators and shinglers. Students will acquire journey level skills including those skills necessary to build all concrete infrastructures that comprise the California transportation system.

Gavilan College, in cooperation with the Carpenters Training Committee for Northern California, conducts a Carpenter Apprenticeship Program which can lead to a Certificate of Achievement and/or Associate of Arts Degree. An apprenticeship program is a formal system of occupational training from two to five years that combines paid employment, on-the-job training and job related college level instruction in order to develop highly skilled workers.

The Carpenter Apprenticeship program concentrates on training apprentices to the specific levels required for the construction industry. Training emphasis includes safety, blueprint reading, residential and commercial construction processes, building codes, estimation and various carpentry topics.

**Program Learning Outcomes:** Upon completion of the Carpenter's apprenticeship certificate students will:
- demonstrate journey level skills, including those skills necessary to build all concrete infrastructures that comprise the California transportation system.

Gainful Employment Statistics for Certificate

<table>
<thead>
<tr>
<th>Name of Program: <strong>CA in Carpenter Apprentice</strong></th>
</tr>
</thead>
<tbody>
<tr>
<td>Program Length: 2.0 years</td>
</tr>
<tr>
<td># of units/credits required for program: 38</td>
</tr>
<tr>
<td>Total Tuition and Required Fees for the entire program completed in normal time:</td>
</tr>
<tr>
<td>CA Resident</td>
</tr>
<tr>
<td>$ 1,452</td>
</tr>
<tr>
<td>Total estimated costs for books and supplies for the entire program: $ 3,240</td>
</tr>
<tr>
<td>Total room and board charges for living on campus: College does not offer on-campus living.</td>
</tr>
</tbody>
</table>

For more information visit the Gavilan College Gainful Employment website at http://www.gavilan.edu/gainful_employment. Fees based on fall 2011 per-unit rates.

**General Education Requirements:** A student may complete the Gavilan College AA/AS general education, the CSU-GE Breadth or the IGETC pattern, plus sufficient electives to meet a 60 unit total. See pages 48-56 or see a counselor for details.

**NOTE:** A course may be used to satisfy both general education and major courses. See *"Double Counting Rule"* on page 46.
The Art Department faculty and students curate and manage the Gavilan College Gallery, which exhibits a wide range of original works by local and regional artists. Students have the opportunity to assist in organizing exhibits as well as exhibit their own artwork. Other educational activities available for students are: Arts Festivals, Art Guild (club), OJO Mural Program, Art for Service, and fieldtrips to Bay Area creative events and museums.

Artistic pursuits and careers may include: Studio artist, designer (graphic, interior, industrial), photographer, art historian, art educator, community artist/activist, muralist, museum and gallery technician, arts administrator, curator, director, art therapist, art restorer, architect, advertising and commercial artist.

Studio Art  

**A.A. Degree**

To complete the Art major program, the student must complete the minimum units specified in each category, plus a minimum of three (3) additional units of Art electives to complete a minimum total of 22 units.

**REQUIRED:**

- ART 2A Two Dimensional Design ..................................... 3 units
- ART 13 Three Dimensional Design  ................................... 3 units
- ART 3A Drawing and Composition .................................... 3 units
- ART 79 Portfolio Development ........................................ 1 unit

**ART HISTORY**  Choose 3 units:

- ART 1A Art History (3 units)
- ART 1B Art History (3 units)
- ART/HIST 21 Ancient Americas: A History through Art (3 units)
  
**DRAWING AND PAINTING**  Choose 6 units:

- ART 3A Art History (3 units)
- ART 3B Drawing and Composition (3 units)
- ART 14 Beginning Mural Painting (3 units)
- ART 15A Beginning Painting: Form and Composition (3 units)
- ART 15B Beginning Painting: Imagination and Expression (3 units)
- ART 34A Life Drawing (3 units)

**SCULPTURE**  Choose 3 units:

- ART 10A Cultural History of Ceramics (3 units)
- ART 10B Ceramics (3 units)
- ART 12A Sculpture (3 units)
- ART 12B Sculpture (3 units)


Total Units Required: 22 UNITs

Plus completion of general education requirements: units vary

Total Units Required: minimum of 60 UNITS

**General Education Requirements:** A student may complete the Gavilan College AA/AS general education pattern (35-44 units), the CSU-GE Breadth pattern (39-52 units) or the IGETC pattern (42-48 units), plus sufficient electives to meet a 60 unit total. See pages 48-56 or see a counselor for details.

**NOTE:** A course may be used to satisfy both general education and major courses. See “Double Counting Rule” on page 46.
Aviation Maintenance Technology

A.S. Degree and Certificate of Achievement
Aviation Maintenance Technology

Certificates of Achievement
Airframe
Powerplant

To receive an ASSOCIATE’S DEGREE complete:
► REQUIRED COURSES listed below.
► GENERAL EDUCATION REQUIREMENTS, (Gavilan, IGETC or CSU pattern), plus sufficient electives to meet a 60 unit total. See pages 48-56.

To receive a CERTIFICATE OF ACHIEVEMENT complete the:
► REQUIRED COURSES listed below.

REQUIREMENTS:

<table>
<thead>
<tr>
<th>Course Code</th>
<th>Course Title</th>
<th>Units</th>
</tr>
</thead>
<tbody>
<tr>
<td>AMT 100</td>
<td>General Aircraft Technology</td>
<td>7.5</td>
</tr>
<tr>
<td>AMT 101</td>
<td>General Aircraft Technology</td>
<td>7.5</td>
</tr>
<tr>
<td>AMT 110</td>
<td>Airframe Maintenance Technology</td>
<td>13.5</td>
</tr>
<tr>
<td>AMT 111</td>
<td>Airframe Structures</td>
<td>13.5</td>
</tr>
<tr>
<td>AMT 120</td>
<td>Aviation Powerplant Technology</td>
<td>14.0</td>
</tr>
<tr>
<td>AMT 121</td>
<td>Aviation Powerplant Systems Tech</td>
<td>14.0</td>
</tr>
</tbody>
</table>

Total Units Required: 70.0 UNITS

Recommended Electives: AFT 122; CSIS 1; CGD 1

General Education Requirements: A student may complete the Gavilan College AA/AS general education, the CSU-GE Breadth or the IGETC pattern, plus sufficient electives to meet a 60 unit total. See pages 48-56 or see a counselor for details.

NOTE: A course may be used to satisfy both general education and major courses. See ”Double Counting Rule” on page 46.

Gainful Employment Statistics for Certificate

<table>
<thead>
<tr>
<th>Name of Program: (if different than the CIP program description)</th>
<th>CA in Aviation Maint Tech</th>
</tr>
</thead>
<tbody>
<tr>
<td>Program Length: (in years)</td>
<td>2.50</td>
</tr>
<tr>
<td># of units/credits required for program:</td>
<td>70</td>
</tr>
<tr>
<td>Total Tuition and Required Fees for the entire program completed in normal time:</td>
<td>CA Resident: $2,625, Nonresident: $15,225</td>
</tr>
<tr>
<td>Total estimated costs for books and supplies for the entire program:</td>
<td>$4,050</td>
</tr>
<tr>
<td>Total room and board charges for living on campus:</td>
<td>College does not offer on-campus living.</td>
</tr>
</tbody>
</table>

For more information visit the Gavilan College Gainful Employment website at http://www.gavilan.edu/gainful_employment. Fees based on fall 2011 per-unit rates.
Airframe Certificate of Achievement

AMT 100 General Aircraft Technology .................. 7.5 units
AMT 101 General Aircraft Technology .................. 7.5 units
AMT 110 Airframe Maintenance Technology ............ 13.5 units
AMT 111 Airframe Structures .......................... 13.5 units
Total Units for Certificate of Achievement: 42.0 UNITS

Recommended Electives: AMT 190; AFT 122

The skills learned in the program also prepare graduates for employment in fields such as aircraft manufacturing, electronics, hydraulics, welding, sheet metal, electrical systems, pneumatics, fuel systems, automotive repair, civil and military defense.

This certificate is designed to prepare students to qualify for the airframe certificate issued by the Federal Aviation Administration. These courses include the following subjects: sheet metal structures, wood and fabric structures, aircraft airframe inspection, assembly and rigging, hydraulic and pneumatic systems, aircraft electrical systems, cabin atmosphere controls, fuel systems, ice and rain systems, fire protection systems, instrument systems, position and warning systems, landing gear systems, and navigation and communication systems. All individuals will have to complete the General Aircraft Maintenance requirements in order to receive the FAA Aircraft Airframe Certificate of completion.

Students receiving the certificate will have job entry skills for the following occupations: Aviation mechanic; aircraft serviceperson; repair or sales of aircraft accessories; airframe specialist.

Powerplant Certificate of Achievement

AMT 100 General Aircraft Technology .................. 7.5 units
AMT 101 General Aircraft Technology .................. 7.5 units
AMT 120 Aviation Powerplant Technology ............ 14.0 units
AMT 121 Aviation Powerplant Systems Technology .... 14.0 units
Total Units for Certificate of Achievement: 43.0 UNITS

Recommended Electives: AMT 190; AFT 122

The skills learned in the program also prepare graduates for employment in fields such as aircraft manufacturing, electronics, hydraulics, welding, sheet metal, electrical systems, pneumatics, fuel systems, automotive repair, civil and military defense.

This certificate is designed to prepare students to qualify for the Powerplant certificate issued by the Federal Aviation Administration. These courses include the following subjects: reciprocating engines, turbines, lubrication systems, engine fuel systems, fuel metering systems, induction systems, ignition systems, engine electrical systems, engine cooling systems, engine exhaust system, engine instrument systems, engine control systems, engine fire protection systems and propellers. Students will have the opportunity to test run the engine that they repair. Students that complete this program may apply immediately to take the exams needed to obtain FAA Powerplant mechanic certificate.

Students receiving the certificate will have job entry skills for the following occupations: Aviation mechanic; aircraft serviceperson; repair or sales of aircraft accessories; powerplant specialist.
Biological Science  A.S. Degree

REQUIREMENTS:

- CHEM 1A/B  General Chemistry ........................................ 5-5 units
- BIO 1  General Biology .............................................. 4 units
- BIO 4  General Zoology ............................................... 4 units
- BIO 5  General Botany .................................................. 4 units
- PHYS 2A/B  General Physics ........................................... 4-4 units

Total Units Required: 30 UNITS

Plus completion of general education requirements: ...................... units vary

Total Units Required: minimum of 60 UNITS

Recommended Electives:

- BIO 7, AH/BIO 8, 9, BIO 13, AH/BIO 15 (AH/BIO 15 may only be taken before BIO 7 and AH/ BIO 9), BIO 21; BIOT 105; ECOL 1; MATH 1A/B

Program Learning Outcomes: After completing the Biological Science major a student will be able to:

- Use raw experimental data to conduct statistical analysis, and present conclusions in a graphical and narrative form.
- Find, select and evaluate various types of scientific information including primary research articles, mass media sources and world-wide web information.
- Effectively communicate scientific concepts in both written and oral formats.
- Identify the evolutionary processes that lead to adaptation and biological diversity.
- Describe the relationship between life forms and their environment and ecosystems.
- Explain the basic structures and fundamental processes of life at molecular, cellular and organismal levels.
- Demonstrate the correct operating procedures in the use of common lab equipment such as compound microscopes, spectrophotometer, pH meter, electrophoresis gel apparatus, micropipetters, and centrifuges.

General Education Requirements: A student may complete the Gavilan College AA/AS general education, the CSU-GE Breadth or the IGETC pattern, plus sufficient electives to meet a 60 unit total. See pages 48-56 or see a counselor for details.

NOTE: A course may be used to satisfy both general education and major courses. See “Double Counting Rule” on page 46.
Biotechnology  
**Certificate of Achievement**

**REQUIREMENTS:**

<table>
<thead>
<tr>
<th>Course</th>
<th>Title</th>
<th>Units</th>
</tr>
</thead>
<tbody>
<tr>
<td>BIOT 103</td>
<td>Biotechnology Lab Skills and Instrumentation</td>
<td>4 units</td>
</tr>
<tr>
<td>BIOT 104</td>
<td>Seminar in Biotechnology</td>
<td>1 unit</td>
</tr>
<tr>
<td>BIO 10</td>
<td>Principles of Biology</td>
<td>4 units</td>
</tr>
<tr>
<td>CHEM 30A</td>
<td>Elementary Chemistry</td>
<td>4 units</td>
</tr>
<tr>
<td>CHEM 30B</td>
<td>Elementary Organic and Biochemistry</td>
<td>4 units</td>
</tr>
</tbody>
</table>

Total Units Required for Certificate of Achievement: 17 UNITS

This certificate program allows students to attain essential skills in biotechnology and provides opportunities to learn basic laboratory procedures, how to record data, perform basic calculations and write laboratory reports. Students also learn about careers and ethical issues in biotechnology.

**Career Options:** Careers for those with a Biotechnology Certificate of Achievement would be animal care technician, assay analyst, laboratory assistant or technician, manufacturing technician, QA/QC technician. In addition to the biotechnology industry, jobs for technicians may be found in environmental testing labs, forensic labs, hospitals, plant pathology labs, research labs and wineries.

---

Health Science  
**A.S. Degree**

**REQUIREMENTS:**

<table>
<thead>
<tr>
<th>Course</th>
<th>Title</th>
<th>Units</th>
</tr>
</thead>
<tbody>
<tr>
<td>AH 3</td>
<td>The Person in the Life Cycle</td>
<td>3 units</td>
</tr>
<tr>
<td>AH/BIO 11</td>
<td>Nutrition</td>
<td>3 units</td>
</tr>
</tbody>
</table>

Choose one of the following:

<table>
<thead>
<tr>
<th>Course</th>
<th>Title</th>
<th>Units</th>
</tr>
</thead>
<tbody>
<tr>
<td>CHEM 1A or 1B</td>
<td>General Chemistry</td>
<td>5 units</td>
</tr>
<tr>
<td>CHEM 30A</td>
<td>Elementary Chemistry</td>
<td>4 units</td>
</tr>
<tr>
<td>CHEM 30B</td>
<td>Elementary Organic and Biochemistry</td>
<td>4 units</td>
</tr>
<tr>
<td>BIO 1</td>
<td>General Biology</td>
<td>4 units</td>
</tr>
<tr>
<td>BIO 10</td>
<td>Principles of Biology</td>
<td>4 units</td>
</tr>
<tr>
<td>AH/BIO 15</td>
<td>Survey Human Anatomy and Physiology</td>
<td>5 units</td>
</tr>
</tbody>
</table>

Choose two of the following:

<table>
<thead>
<tr>
<th>Course</th>
<th>Title</th>
<th>Units</th>
</tr>
</thead>
<tbody>
<tr>
<td>BIO 7</td>
<td>Human Anatomy</td>
<td>4 units</td>
</tr>
<tr>
<td>AH/BIO 8</td>
<td>General Microbiology</td>
<td>5 units</td>
</tr>
<tr>
<td>AH/BIO 9</td>
<td>Human Physiology</td>
<td>5 units</td>
</tr>
</tbody>
</table>

Total Units Required: 19-21 UNITS

Plus completion of general education requirements: units vary

Total Units Required: minimum of 60 UNITS

**Recommended Electives:** AH/BIO 11; MATH 233 or higher; ECOL 1; PSYC 1A

---

**Gainful Employment Statistics for Certificate**

<table>
<thead>
<tr>
<th>Name of Program: (if different than the CIP program description)</th>
<th>CA in Biotechnology</th>
</tr>
</thead>
<tbody>
<tr>
<td>Program Length: (in years)</td>
<td>1.00</td>
</tr>
<tr>
<td># of units/credits required for program:</td>
<td>17</td>
</tr>
<tr>
<td>Total Tuition and Required Fees for the entire program completed in normal time:</td>
<td>CA Resident</td>
</tr>
<tr>
<td>$ 654</td>
<td>$ 3,714</td>
</tr>
<tr>
<td>Total estimated costs for books and supplies for the entire program:</td>
<td>$ 1,620</td>
</tr>
<tr>
<td>Total room and board charges for living on campus:</td>
<td>College does not offer on-campus living.</td>
</tr>
</tbody>
</table>

For more information visit the Gavilan College Gainful Employment website at http://www.gavilan.edu/gainful_employment. Fees based on fall 2011 per-unit rates.

---

**General Education Requirements:** A student may complete the Gavilan College AA/AS general education, the CSU-GE Breadth or the IGETC pattern, plus sufficient electives to meet a 60 unit total. See pages 48-56 or see a counselor for details.

**NOTE:** A course may be used to satisfy both general education and major courses. See "Double Counting Rule" on page 46.
BUSINESS

A.A. Degrees and Certificates of Achievement

Accounting
General Business
General Office Skills
Medical Office
Real Estate
Retail Management

Also see: Liberal Arts with Business Emphasis
AA degree Page 127

A.S. Degrees and Certificates of Achievement

Economics Option
Business Computer Applications**
** Business Computer Applications is an A.S. degree in Computer Science & Information Systems or a Certificate of Achievement in either CSIS or Business

Certificate of Proficiency

Computerized Accounting

ROP Certificates  see page 223

Computerized Accounting - Quickbooks
General Office Accounting
Medical Billing
Medical Coding
Medical Office Procedures
Medical Terminology
Payroll Accounting

Contact:
(408) 848-4719
cte@gavilan.edu
BUSINESS CORE COURSES

The following business core courses are required for the Accounting, General Office Skills and Medical Office Associate’s Degree and Certificate of Achievement options. Additional requirements for these options are listed alphabetically on the following pages.

BUSINESS CORE COURSES:

CSIS 8   Introduction to the Internet ............................. 1 unit
MATH 402   Pre-Algebra (or eligible for higher math) ................. 0-3 units

Choose one:
ACCT 20  Financial Accounting .......................... 4 units
ACCT 101  Occupational Accounting .......................... 4 units
ACCT 103  General Office Accounting ......................... 2 units

........................................... 2-4 units

Choose one:
CSIS 1  Computer Literacy - MS Office* ....................... 2 units
CSIS 2  Computers in Business - MS Office .................... 4 units
CSIS 2L  Computers in Business Lab - MS Office ............... 1 unit

........................................... 1-4 units

Choose one:
ECON 1  Principles of Macroeconomics ....................... 3 units
ECON 10  Fundamentals of Economics .......................... 3 units
BUS 1  Fundamentals of Business ................................ 3 units

............................................. 3 units

One of the following: BOT 191A, B, C  Work Place Skills .................... 1 unit

Choose one:
CMUN 11  Business Communication ........................... 3 units
ENGL 250  Practical Writing* .................................. 3 units
BUS 100  Business Correspondence ............................ 3 units
Eligible for English 1A (test score)

........................................... 0-3 units

Core Courses Unit Total: 8-19 UNITS

Completion of the core courses and the additional requirements in a selected area will qualify students for an Associate’s degree or Certificate of Achievement in Business.

1. Students who can provide evidence of competency in required skill areas should consult with a counselor for possible course waiver or substitution.

2. Regardless of the number of courses waived or transferred, certificate students will still need to meet the minimum “residing” unit requirements (minimum 12 units) at Gavilan College.

When required certificate courses are applied against associate’s degree general education requirements, the unit requirements for the certificate are reduced by the same number of units. However, students will still need to meet all the requirements for graduation including a minimum of 18 units in the major.

Students are expected to complete the courses or show competency in skill area. See a counselor regarding the course waiver or substitution process.

General Education Requirements: A student may complete the Gavilan College AA/AS general education, the CSU-GE Breadth or the IGETC pattern, plus sufficient electives to meet a 60 unit total. See pages 48-56 or see a counselor for details.

NOTE: A course may be used to satisfy both general education and major courses. See “Double Counting Rule” on page 46.

Computerized Accounting Certificate of Proficiency

REQUIREMENTS (Business Core is not required):
ACCT/CSIS 121  Spreadsheet - MS Excel ........................ 2 units
CSIS 2L  Computers in Business Lab - MS Office ............... 1 unit
ACCT 20  Financial Accounting ............................... 4 units
ACCT 21  Managerial Accounting ............................... 4 units
ACCT/CSIS 120  Computerized Accounting – QuickBooks ................. 2 units

Choose one:
ACCT 103  General Office Accounting .......................... 2 units
ACCT 105  Payroll Accounting ................................. 3 units
ACCT 111  Introduction to Income Tax ........................ 3 units

........................................... 2-3 units

Total Units Required for Certificate of Proficiency: 15-16 UNITS

Students receiving the certificate will have entry-level computerized bookkeeping skills for a modern office.
Accounting Option  **A.A. Degree or Certificate of Achievement**

To receive an **ASSOCIATE’S DEGREE** complete:
- **BUSINESS CORE COURSES** (listed on page 80).
- **ADDITIONAL REQUIREMENTS** listed below.
- **GENERAL EDUCATION REQUIREMENTS** (Gavilan, IGETC or CSU pattern), plus sufficient electives to meet a 60 unit total. See pages 48-56.

**BUSINESS CORE COURSES** (listed on page 80): ................... 8.0-19.0 units

**ADDITIONAL REQUIREMENTS:**
- ACCT 20  Financial Accounting ........................................ 4.0 units
- Choose one:
  - ACCT 105  Payroll Accounting  (3 units)
  - ACCT 111  Introduction to Income Tax  (3 units)
  - ACCT/CSIS 120  Computerized Accounting - QuickBooks ........ 2.0 units
  - BOT 112  Business Computation with Machines ............ 0.5 units
  - ACCT/CSIS 121  Spreadsheet - MS Excel .................... 1.0-2.0 units
  - CSIS 128  Database - MS Access .......................... 2.0 units
- Total Units Required: 20.5 - 32.5 UNITS

**Recommended Electives:** ACCT 21, ACCT 190; BUS 80; CSIS 122

Students are expected to complete the courses or show competency in skill area. See a counselor regarding the course waiver or substitution process.

**Program Learning Outcome:** After completing this degree or certificate a student will be able to apply accounting theory to accumulate and summarize financial data. Common business software will be used.

Students will have job entry skills for these occupations: accounting clerk, accounts receivable/payable, full charge bookkeeping, general ledger accounting, general office accounting.

For those who do not already have a degree, the A.A. option is preferred by employers.

### Gainful Employment Statistics for Certificate

<table>
<thead>
<tr>
<th>Name of Program: (if different than the CIP program description)</th>
<th>CA in Business-Accounting 1.00</th>
</tr>
</thead>
<tbody>
<tr>
<td>Program Length: (in years)</td>
<td>1.00</td>
</tr>
<tr>
<td># of units/credits required for program:</td>
<td>20.5-32.5</td>
</tr>
<tr>
<td>Total Tuition and Required Fees for the entire program completed in normal time:</td>
<td>CA Resident: $ 762 - $ 1,192</td>
</tr>
<tr>
<td>Total estimated costs for books and supplies for the entire program:</td>
<td>$ 1,620</td>
</tr>
<tr>
<td>Total room and board charges for living on campus:</td>
<td>College does not offer on-campus living.</td>
</tr>
</tbody>
</table>

For more information visit the Gavilan College Gainful Employment website at http://www.gavilan.edu/gainful_employment. Fees based on fall 2011 per-unit rates.
Business Computer Applications  

**CSIS A.S. Degree or Certificate of Achievement**

To receive an **ASSOCIATE’S DEGREE** in **COMPUTER SCIENCE & INFORMATION SYSTEMS** complete:

- **REQUIREMENTS** listed below.
- **GENERAL EDUCATION REQUIREMENTS** (Gavilan, IGETC or CSU pattern), plus sufficient electives to meet a 60 unit total. See pages 48-56.

**REQUIREMENTS** (Business Core is not required):

Choose **21 units** from the following list of courses:

- Choose only one of the following two courses:
  - **CSIS 1** Computer Literacy - MS Office (2 units)
  - **CSIS 2** Computers in Business - MS Office (4 units)
- CSIS/DM/LIB 6 Web Page Authoring I (2 units)
- CSIS 8 Introduction to the Internet (1 unit)
- CSIS 10 BASIC Programming (2 units)
- CSIS/DM 72 Desktop Publishing - QuarkXPress (3 units)
- CSIS/DM 73 Desktop Publishing - Adobe InDesign (3 units)
- CSIS/DM 75 PhotoShop I - Adobe PhotoShop (3 units)
- ACCT/CSIS 121 Spreadsheet - MS Excel (1-2 units)
- CSIS 124 Windows Fundamentals (1 unit)
- CSIS 126 Word Processing - MS Word (2 units)
- CSIS 128 Database - MS Access (2 units)
- CMUN/CSIS 129 Presentation Graphics - MS PowerPoint (1 unit)
- CSIS 132 Intermediate Word Processing - MS Word (2 units)
- CSIS 134 Intermediate Excel (2 units)
- CSIS 181 PC Hardware (4 units)
- CSIS 182 Operating Systems (4 units)

**Total Units Required:** ................................................ 21 UNITS

**Recommended Electives:** CSIS 7, 72, 73; DM 7, 72, 73

Students are expected to complete the courses or show competency in skill area. See a counselor regarding the course waiver or substitution process.

**Program Learning Outcome:** After completing this degree or certificate a student will be able to use a variety of business software, including word processors and spreadsheets to create business letters, reports and other business documents.

The Computer Applications Option prepares students for positions utilizing a wide variety of popular operating systems and business application software. The computer applications taught are used in most business environments including word processing, spreadsheets, databases, graphics, and desktop publishing. This degree is also appropriate for retraining and for improving promotional opportunities.

Career opportunities include general office work, document preparation, technical support, help desk training and support, word processing, administrative secretary and administrative services.

**Transfer Students:** Four-year colleges may differ in their major preparation requirements for transfer. Consult with a counselor regarding transfer requirements.

---

**Gainful Employment Statistics for Certificate**

<table>
<thead>
<tr>
<th>Name of Program: (if different than the CIP program description)</th>
<th>CA in CSIS-Bus Comp Appl</th>
</tr>
</thead>
<tbody>
<tr>
<td>Program Length: (in years)</td>
<td>1.00</td>
</tr>
<tr>
<td># of units/credits required for program:</td>
<td>21</td>
</tr>
<tr>
<td>Total Tuition and Required Fees for the entire program completed in normal time:</td>
<td>CA Resident</td>
</tr>
<tr>
<td></td>
<td>$ 798</td>
</tr>
<tr>
<td>Total estimated costs for books and supplies for the entire program:</td>
<td>$ 1,620.00</td>
</tr>
<tr>
<td>Total room and board charges for living on campus:</td>
<td>College does not offer on-campus living</td>
</tr>
</tbody>
</table>

For more information visit the Gavilan College Gainful Employment website at http://www.gavilan.edu/gainful_employment. Fees based on fall 2011 per-unit rates.
Economics  
A.S. Degree or Certificate of Achievement

To receive an ASSOCIATE’S DEGREE complete:

- REQUIREMENTS listed below.
- GENERAL EDUCATION REQUIREMENTS (Gavilan, IGETC or CSU pattern), plus sufficient electives to meet a 60 unit total. See pages 48-56.

To receive a CERTIFICATE OF ACHIEVEMENT complete:

- REQUIREMENTS listed below.

REQUIREMENTS (Business Core is not required):

ECON 1  Principles of Macroeconomics ........................................ 3 units
ECON 2  Principles of Microeconomics ........................................ 3 units

Choose one:

- MATH 5 Introduction to Statistics (3 units)
- BUS/ECON 11 Statistics for Business and Economics (4 units)

3-4 units

Choose one:

- MATH 1A Single-Variable Calculus and Analytic Geometry (4 units)
- MATH 6 Calculus for Business/Social Science (3 units)

3-4 units

Choose two:

- MATH 1B Single-Variable Calculus and Analytic Geometry (4 units)
- MATH 7 Finite Mathematics (3 units)
- ACCT 20 Financial Accounting (4 units)

7-8 units

Total Units Required: 19-22 UNITS

Program Learning Outcomes: After completing this degree a student will be able to:

- derive the appropriate profit maximizing price and quantity decisions of firms under different competitive conditions by selecting and applying the appropriate microeconomic principles.
- calculate equilibrium price and output of markets and the equilibrium GDP deflator and equilibrium real GDP of the whole economy by applying the appropriate economic tools and principles.

Students completing this option will have the necessary lower division courses for an economics major at a four-year institution. Four-year colleges may differ in their major preparation requirements for transfer. Consult with a counselor regarding transfer requirements.

Gainful Employment Statistics for Certificate

<table>
<thead>
<tr>
<th>Name of Program: (if different than the CIP program description)</th>
<th>CA in Business-Economics</th>
</tr>
</thead>
<tbody>
<tr>
<td>Program Length: (in years)</td>
<td>1.00</td>
</tr>
<tr>
<td># of units/credits required for program:</td>
<td>19-22</td>
</tr>
<tr>
<td>Total Tuition and Required Fees for the entire program completed in normal time:</td>
<td></td>
</tr>
<tr>
<td>CA Resident Nonresident</td>
<td>$ 736 - $ 834 $ 4,146 - $ 4,794</td>
</tr>
<tr>
<td>Total estimated costs for books and supplies for the entire program:</td>
<td>$ 1,620</td>
</tr>
<tr>
<td>Total room and board charges for living on campus:</td>
<td>College does not offer on-campus living.</td>
</tr>
<tr>
<td>For more information visit the Gavilan College Gainful Employment website at <a href="http://www.gavilan.edu/gainful_employment">http://www.gavilan.edu/gainful_employment</a>. Fees based on fall 2011 per-unit rates.</td>
<td></td>
</tr>
</tbody>
</table>

General Education Requirements: A student may complete the Gavilan College AA/AS general education, the CSU-GE Breadth or the IGETC pattern, plus sufficient electives to meet a 60 unit total. See pages 48-56 or see a counselor for details.

NOTE: A course may be used to satisfy both general education and major courses. See “Double Counting Rule” on page 46.

Visit the Gavilan College website to view the current Catalog www.gavilan.edu/catalog
General Business  

**A.A. Degree or Certificate of Achievement**

To receive an **ASSOCIATE’S DEGREE** complete:
- **REQUIREMENTS** listed below.
- **ELECTIVES** listed below.
- **GENERAL EDUCATION REQUIREMENTS** (Gavilan, IGETC or CSU pattern), plus sufficient electives to meet a 60 unit total. See pages 48-56.

**REQUIREMENTS** (Business Core is not required):
- ACCT 20  Financial Accounting ............................................... 4 units
- ACCT 21  Managerial Accounting ............................................... 4 units
- ECON 1  Principles of Macroeconomics ...................................... 0-3 units
- ECON 2  Principles of Microeconomics ...................................... 0-3 units

Choose one:
- MATH 5  Introduction to Statistics (*0-3 units)
- BUS/ECON 11  Statistics for Business and Economics (4 units)

Choose one:
- CSIS 2  Computers in Business - MS Office (see #4) (4 units)
- CSIS 2L  Computers in Business Lab - MS Office (1 unit)

**ELECTIVES** ........................................................................ 0-9 units

Total Units Required: 18-31 UNITS

The **Certificate of Achievement** program is designed for students desiring a broad introduction to business rather than a specialized area of concentration. It should also be considered by students who think they may continue their education as a business major.

**Certificate of Achievement Program Learning Outcomes:** After completing the Certificate of Achievement a student will be able to:
- analyze common business transactions and link them to the appropriate financial statements.
- analyze the impact of shifts in supply and demand upon equilibrium price and quantity.

**TRANSFER STUDENTS:**

Four-year colleges differ substantially in their lower division requirements for business transfer majors. Before enrolling you should refer to four-year college catalogs and consult with business faculty or counselor.

Students are expected to complete the courses or show competency in skill area. See a counselor regarding the course waiver or substitution process.

**Gainful Employment Statistics for Certificate**

<table>
<thead>
<tr>
<th>Name of Program: (if different than the CIP program description)</th>
<th>CA in Business</th>
</tr>
</thead>
<tbody>
<tr>
<td>Program Length: (in years)</td>
<td>1.00</td>
</tr>
<tr>
<td># of units/credits required for program:</td>
<td>18-31</td>
</tr>
<tr>
<td>Total Tuition and Required Fees for the entire program completed in normal time:</td>
<td>CA Resident</td>
</tr>
<tr>
<td>$690 - $1,158</td>
<td>$3,922 - $6,738</td>
</tr>
<tr>
<td>Total estimated costs for books and supplies for the entire program:</td>
<td>$1,620</td>
</tr>
<tr>
<td>Total room and board charges for living on campus:</td>
<td>College does not offer on-campus living.</td>
</tr>
</tbody>
</table>

For more information visit the Gavilan College Gainful Employment website at http://www.gavilan.edu/gainful_employment. Fees based on fall 2011 per-unit rates.
General Office Skills Option  **A.A. Degree or Certificate of Achievement**

To receive an **ASSOCIATE’S DEGREE** complete:
- **BUSINESS CORE COURSES** (listed on page 80).
- **ADDITIONAL REQUIREMENTS** listed below.
- **GENERAL EDUCATION REQUIREMENTS** (Gavilan, IGETC or CSU pattern), plus sufficient electives to meet a 60 unit total. See pages 48-56.

**BUSINESS CORE COURSES** (listed on page 80): .......................... 8-19 units

**ADDITIONAL REQUIREMENTS:**
- CSIS 112  Keyboard Speed Building ................................. 0.5 units
- CSIS 122  Computer Keyboarding ................................. 1.5 units
- CSIS 124  Windows Fundamentals ................................... 1.0 unit
- BOT 112  Business Computations with Machines ....................... 0.5 units
- CSIS 126  Word Processing - MS Word ............................... 2.0 units

Choose six units from the following list:
- ACCT 105  Payroll Accounting (3 units)
- ACCT 111  Introduction to Income Tax (3 units)
- ACCT/CSIS 120  Computerized Accounting – QuickBooks (2 units)
- ACCT/CSIS 121  Spreadsheet - MS Excel (1-2 units)
- BOT 160  Medical Terminology for the Office (3 units)
- CSIS 132  Intermediate Word Processing - MS Word (2 units)
- CSIS 134  Intermediate Excel (2 units)
- CSIS/DM/LIB 6  Web Page Authoring I (2 units)
- CSIS/DM 7  Web Page Authoring II (2 units)
- CSIS/DM 73  Desktop Publishing - Adobe InDesign (3 units)
- ART/CSIS/DM 74  Advanced Photoshop (3 units)
- CSIS/DM 75  Photoshop I - Adobe Photoshop (3 units)
- ART/CSIS/DM 85  Web Design I: Dreamweaver (2 units)
- BUS/ECON 14  Personal Finance (3 units)

........................................... 6.0 units

Total Units Required: .......................... 19.5-30.5 UNITS

Program Learning Outcome: After completing this degree or certificate a student will demonstrate the ability to solve mathematical problems involved in common business applications, using electronic calculator and/or computer.

Students will have entry-level office skills.

For those who do not already have a degree, the A.A. option is preferred by employers.

**Gainful Employment Statistics for Certificate**

<table>
<thead>
<tr>
<th>Name of Program: (if different than the CIP program description)</th>
<th>CA in Business-Genl Off Skills</th>
</tr>
</thead>
<tbody>
<tr>
<td>Program Length: (in years)</td>
<td>1.00</td>
</tr>
<tr>
<td># of units/credits required for program:</td>
<td>19.5-30.5</td>
</tr>
<tr>
<td>Total Tuition and Required Fees for the entire program completed in normal time:</td>
<td></td>
</tr>
<tr>
<td>CA Resident</td>
<td>Nonresident</td>
</tr>
<tr>
<td>$ 726 - $ 1,122</td>
<td>$ 4,146 - $ 6,522</td>
</tr>
<tr>
<td>Total estimated costs for books and supplies for the entire program:</td>
<td>$ 1,620</td>
</tr>
<tr>
<td>Total room and board charges for living on campus:</td>
<td>College does not offer on-campus living.</td>
</tr>
</tbody>
</table>

For more information visit the Gavilan College Gainful Employment website at [http://www.gavilan.edu/gainful_employment](http://www.gavilan.edu/gainful_employment). Fees based on fall 2011 per-unit rates.

Students are expected to complete the courses or show competency in skill area. See a counselor regarding the course waiver or substitution process.

**General Education Requirements:** A student may complete the Gavilan College AA/AS general education, the CSU-GE Breadth or the IGETC pattern, plus sufficient electives to meet a 60 unit total. See pages 48-56 or see a counselor for details.

**NOTE:** A course may be used to satisfy both general education and major courses. See "Double Counting Rule" on page 46.
Medical Office Option  
**A.A. Degree or Certificate of Achievement**

To receive an ASSOCIATE'S DEGREE complete:
- **BUSINESS CORE COURSES** (listed on page 80).
- **ADDITIONAL REQUIREMENTS** listed below.
- **GENERAL EDUCATION REQUIREMENTS** (Gavilan, IGETC or CSU pattern), plus sufficient electives to meet a 60 unit total. See pages 48-56.

**BUSINESS CORE COURSES** (listed on page 80): 8-19 units

*ADDITIONAL REQUIREMENTS:*
- **BOT 180** Medical Terminology for the Office 3.0 units
- **BOT 181** Medical Billing - MediSoft 2.0 units
- **BOT 182** Medical Office Procedures 3.0 units
- **CSIS 122** Computer Keyboarding 1.5 units
- **CSIS 124** Windows Fundamentals 1.0 unit
- **CSIS 126** Word Processing - MS Word 2.0 units
  
Choose one:
- **ACCT/CSIS 120** Computerized Accounting - QuickBooks (2 units)
- **ACCT/CSIS 121** Spreadsheet - MS Excel (2 units)
- **CSIS 128** Database - MS Access (2 units)
  
2.0 units

Total Units Required: 22.5-33.5 UNITS

Students are expected to complete the courses or show competency in skill area. See a counselor regarding the course waiver or substitution process.

**Program Learning Outcome:** After completing this degree or certificate a student will demonstrate the ability to perform common tasks for the medical office, such as patient record management and billing and be able to explain the meaning of common medical terms.

Students will have entry-level job skills for the medical front office. For those who do not already have a degree, the A.A. option is preferred by employers.

<table>
<thead>
<tr>
<th>Gainful Employment Statistics for Certificate</th>
</tr>
</thead>
<tbody>
<tr>
<td>Name of Program: (if different than the CIP program description)</td>
</tr>
<tr>
<td>Program Length: (in years)</td>
</tr>
<tr>
<td># of units/credits required for program:</td>
</tr>
<tr>
<td>Total Tuition and Required Fees for the entire program completed in normal time:</td>
</tr>
<tr>
<td>CA Resident</td>
</tr>
<tr>
<td>Nonresident</td>
</tr>
<tr>
<td>Total estimated costs for books and supplies for the entire program:</td>
</tr>
<tr>
<td>Total room and board charges for living on campus:</td>
</tr>
</tbody>
</table>

For more information visit the Gavilan College Gainful Employment website at http://www.gavilan.edu/gainful_employment. Fees based on fall 2011 per-unit rates.

**General Education Requirements:** A student may complete the Gavilan College AA/AS general education, the CSU-GE Breadth or the IGETC pattern, plus sufficient electives to meet a 60 unit total. See pages 48-56 or see a counselor for details.

**NOTE:** A course may be used to satisfy both general education and major courses. See “Double Counting Rule” on page 46.
Real Estate  

**A.A. Degree or Certificate of Achievement**

To receive an **ASSOCIATE'S DEGREE** complete:

- **REQUIREMENTS** listed below.
- **GENERAL EDUCATION REQUIREMENTS** (Gavilan, IGETC or CSU pattern), plus sufficient electives to meet a 60 unit total. See pages 48-56.

**REQUIREMENTS** (Business Core is not required):

RE 160  Real Estate Principles  ........................................ 3 units
RE 162  Real Estate Practice  ........................................ 3 units

Select at least twelve (12) units from the following courses:

- BUS 80  Business Law  *(3 units)*
- RE 163  Real Estate Finance  *(3 units)*
- RE 164  Real Estate Appraisal  *(3 units)*
- RE 165  Legal Aspects of Real Estate  *(3 units)*
- RE 168  Real Estate Escrow  *(3 units)*  ........................................ 12 units

Choose one:

- ACCT 20  Financial Accounting  *(4 units)*
- RE 167  Real Estate Economics  *(3 units)*  .............................. 3-4 units

Total Units Required:  21-22 UNITS

**Recommended Electives:** CSIS 1, 2; BUS 1; ECON 2; MGMT 102; MKTG 100; MATH 233

The state sets the requirements for the Real Estate Salesperson's and Broker's License. A state licensing test is required. Consult your business advisor for current state licensing requirements.

Four-year colleges may differ in their major preparation requirements for transfer. Consult with a counselor regarding transfer requirements.

<table>
<thead>
<tr>
<th>Gainful Employment Statistics for Certificate</th>
</tr>
</thead>
<tbody>
<tr>
<td><strong>Name of Program:</strong> (if different than the CIP program description)</td>
</tr>
<tr>
<td><strong>Program Length:</strong> (in years)</td>
</tr>
<tr>
<td><strong># of units/credits required for program:</strong></td>
</tr>
<tr>
<td><strong>Total Tuition and Required Fees for the entire program completed in normal time:</strong></td>
</tr>
<tr>
<td><strong>Total estimated costs for books and supplies for the entire program:</strong></td>
</tr>
<tr>
<td><strong>Total room and board charges for living on campus:</strong></td>
</tr>
</tbody>
</table>

For more information visit the Gavilan College Gainful Employment website at http://www.gavilan.edu/gainful_employment. Fees based on fall 2011 per-unit rates.

---

**General Education Requirements:** A student may complete the Gavilan College AA/AS general education, the CSU-GE Breadth or the IGETC pattern, plus sufficient electives to meet a 60 unit total. See pages 48-56 or see a counselor for details.

**NOTE:** A course may be used to satisfy both general education and major courses. See "Double Counting Rule" on page 46.
Retail Management  

**A.A. Degree or Certificate of Achievement**

**To receive an ASSOCIATE’S DEGREE** complete:

- **REQUIREMENTS** listed below.
- **GENERAL EDUCATION REQUIREMENTS** (Gavilan, IGETC or CSU pattern), plus sufficient electives to meet a 60 unit total. See pages 48-56.

**REQUIREMENTS** (Business Core is not required):

Choose one:

<table>
<thead>
<tr>
<th>Course</th>
<th>Title</th>
<th>Units</th>
</tr>
</thead>
<tbody>
<tr>
<td>ACCT 20</td>
<td>Financial Accounting</td>
<td>4</td>
</tr>
<tr>
<td>ACCT 21</td>
<td>Management Accounting</td>
<td>4</td>
</tr>
<tr>
<td>BUS 100</td>
<td>Business Correspondence</td>
<td>3</td>
</tr>
<tr>
<td>BUS 102</td>
<td>Business Mathematics</td>
<td>3</td>
</tr>
<tr>
<td>CMUN 1A</td>
<td>Introduction to Public Speaking</td>
<td>3</td>
</tr>
<tr>
<td>CSIS 2</td>
<td>Computers in Business - MS Office</td>
<td>4</td>
</tr>
<tr>
<td>MKTG 100</td>
<td>Principles of Marketing</td>
<td>3</td>
</tr>
<tr>
<td>MGMT 101</td>
<td>Introduction to Management</td>
<td>3</td>
</tr>
<tr>
<td>MGMT 102</td>
<td>Retail Management</td>
<td>3</td>
</tr>
<tr>
<td>MGMT 104</td>
<td>Leadership/Human Relations in Business</td>
<td>3 units</td>
</tr>
<tr>
<td>MGMT 120</td>
<td>Human Resource Management</td>
<td>3</td>
</tr>
</tbody>
</table>

Total Units Required: 32 UNITS

Students are expected to complete the courses or show competency in skill area. See a counselor regarding the course waiver or substitution process.

**Gainful Employment Statistics for Certificate**

- **Name of Program:** CA in Bus - Retail Mgmt (WAFC)
- **Program Length:** 1.50 years
- **# of units/credits required for program:** 32
- **Total Tuition and Required Fees for the entire program completed in normal time:**
  - CA Resident: $1,225
  - Nonresident: $6,975
- **Total estimated costs for books and supplies for the entire program:** $2,430
- **Total room and board charges for living on campus:** College does not offer on-campus living.

For more information visit the Gavilan College Gainful Employment website at http://www.gavilan.edu/gainful_employment. Fees based on fall 2011 per-unit rates.
Child Development  

A.A. Degree

Also see: Liberal Arts with Elementary Education Emphasis AA Degree  Page 128

Child Development  Certificates of Achievement
- Early Childhood Education
- Early Intervention Assistant*
- School Age Child Care

Spanish Language Early Childhood Education  Certificate of Proficiency

The Child Development and Educational Studies Program (CDES) offers students an Associate of Arts degree in two main areas:

1) Child Development: Students completing the Associate’s Degree in Child Development may apply to become a teacher, master teacher, or site supervisor within the California Child Development and School Age Matrix.

2) Liberal Arts with Emphasis in Elementary Education: The Associate’s Degree in Liberal Arts prepares students to transfer to 4-year colleges and universities, and begins a sequence of classes that leads to careers in child development, and elementary and secondary education. See page 128.

The CDES program also offers Certificates which serve as introductory sequences of classes preparing students to work in the field of early childhood education, recreation, and before and after school age care. Students completing the certificates may be employed as infant toddler, preschool, or school age professionals, as well as tutors, childcare specialists or other paraprofessionals for public and private agencies.

Contact:
408) 848-4719
tce@gavilan.edu
Child Development  **A.A. Degree**

**REQUIREMENTS**  (Core courses not required):

- **CD 1** Principles and Philosophies of Early Childhood Education  ........3 units
- **CD 2** Early Child Development  ..........................3 units
- **CD 4** Observing and Assessing Children  ................3 units

Choose one:

- **CD 5** Child/Family and Community  (3 units)
- **CD 7** Cultural Context of Child and Family in a Diverse Society  (3 units)

- **CD 9** Child Health/Nutrition and Safety  ..................3 units
- **CD 19** Introduction to Careers with Children  ............2 units
- **CD 20** Children’s Language and Literature  .................3 units

Electives - Any CD courses  .....................................6 units

Student Teaching Practicum:

- **CD 30A** Practicum 1: Curriculum in the Early Childhood Classroom  ....3 units
- **CD 30B** Practicum 2: Reflective Practice in the Classroom  ...........3 units
- **CD 190** Occupational Work Experience/Child Development ........2-4 units

Total Units Required: 34-36 UNITS

Plus completion of general education requirements:  units vary
Total Units Required: minimum of 60 UNITS

**Program Learning Outcomes:** After completing the Associate's Degree in Child Development a student will be able to:

- articulate five major child development theories and translate these theories into appropriate classroom environments that include learning centers and materials.
- plan developmentally appropriate curriculum activities in the four domains of development: Cognitive (intellectual), Affective (social-emotional), Psychomotor (physical) and Language Development.

**Graduates will:**

- function within the scope of approved state and nationally accredited early childhood and childcare competencies.
- practice within professional and legal standards, ethical principles, and demonstrate a sensitivity to language and cultural differences of the children, families, and staff where they will be working or completing their cooperative work experiences.
- apply principles of written and verbal communication, and research to communicate relevant, accurate and complete information.
- apply child development principles and sensitivity to theory and applications of working with families of children with special needs.
- demonstrate an ability to design, develop and implement curriculum, appropriate educational environments, and successful teaching practices that enhance development in children in the early years.

**Student Teaching Practicum:**

Associate Degree students are required to complete a two-semester Student Teaching Practicum in an approved child development site under the supervision of a Gavilan College instructor.

The Student Teaching Practicum consists of CD 30A & B, a two-semester curriculum course, (CD 30A - Practicum 1: Curriculum in the Early Childhood Classroom, 3 units), and concurrent enrollment in a supervised Child Development Work Experience class (CD 30B - Teaching Practicum 2: Reflective Practice in the Classroom, 3 units), and concurrent enrollment in a supervised Child Development Work Experience class (CD 190, Occupational Work Experience/Child Development, 1-4 units each semester). It is recommended that students complete CD 1, 2 and CD 5 or 7 before beginning the Student Teaching Practicum. CD 190 (Occupational Work Experience/Child Development) may also be taken as an independent class throughout the student’s program (1-4 units per semester, for a total of 4-16 units). Students enrolled in a Cooperative Work Experience class must be enrolled in at least seven units each semester.

**General Education Requirements:** A student may complete the Gavilan College AA/AS general education, the CSU-GE Breadth or the IGETC pattern, plus sufficient electives to meet a 60 unit total. See pages 48-56 or see a counselor for details.

**NOTE:** A course may be used to satisfy both general education and major courses. See “Double Counting Rule” on page 46.

The Associate Degree prepares students to transfer to four year colleges and universities and provides an introductory sequence of classes leading to careers in child development and elementary and secondary education. Students completing an A.A. degree are also eligible to apply for a California Child Development permit at the Teacher level. The Child Development Permit Matrix was developed to ensure a career pathway for child development professionals in state or federally funded programs. See page 94.

Completion of the Associate’s Degree in Child Development: Associate degree students need to complete the required courses and student teaching practicum previously listed and General Education requirements. In order to qualify for the California Child Development Permit, coursework in required classes must be completed with a letter grade of “C” or higher. A copy of the Permit Matrix may be viewed on page 94 of this catalog.
Child Development Options

Two of the following certificates of achievement - Early Childhood Education (this page) and School Age Child Care (page 93) - require a combination of CORE COURSES (listed below) and additional requirements:

**CORE COURSES:**
- CD 1  Principles and Philosophies of Early Childhood Education .......... 3 units
- CD 2  Early Child Development .................................... 3 units
- Choose one:
  - CD 5  Child/Family and Community (3 units)
  - CD 7  Cultural Context of Child and Family in a Diverse Society (3 units)
- CD 9  Child Health/Nutrition and Safety ............................. 3 units
- CD 19 Introduction to Careers with Children .......................... 2 units

Core Courses Unit Total: ............................................ 14 UNITS

Completion of the core courses and the additional requirements in a selected area will qualify students for the Certificate of Achievement in Child Development.

Although some Child Development courses are cross-listed with other departments, it is highly recommended that students enroll in coursework under the Child Development (CD) option.

---

**Early Childhood Education Certificate of Achievement**

**CORE COURSES:** ................................................ 14 units

**ADDITIONAL REQUIREMENTS:** Choose 10 units from list below:
- CD 4  Observing and Assessing Children (3 units)
- CD 5  Child/Family and Community (3 units)
- CD 7  Cultural Context of Child and Family in a Diverse Society (3 units)
- CD 10 Children with Special Needs (3 units)
- CD 12 Computer Education for Teachers (3 units)
- CD 13 Infant and Toddler Development and Care (3 units)
- CD 15 Music and Movement for Children (1 unit)
- CD 16 Exploring Mathematics with Children (1 unit)
- CD 17 Exploring Science with Children (1 unit)
- CD 18 The Outdoor Classroom (3 units)
- CD 20 Children’s Language and Literature (3 units)
- CD 21 Introduction to Curriculum (3 units)
- CD 22 Field Work and Service (.5-1 unit)
- CD 23 Independent Study (1-2 units)
- CD 97 Introduction to Service Learning with Children (3 units)
- CD 98 Special Topics (.5-3 units)

............................................ 10 units

Total Units for Certificate of Achievement: 24 UNITS

**Gainful Employment Statistics for Certificate**

<table>
<thead>
<tr>
<th>Name of Program: (if different than the CIP program description)</th>
<th>CA in CD-Early Childhood Educ</th>
</tr>
</thead>
<tbody>
<tr>
<td>Program Length: (in years)</td>
<td>1.00</td>
</tr>
<tr>
<td># of units/credits required for program:</td>
<td>24</td>
</tr>
<tr>
<td>Total Tuition and Required Fees for the entire program completed in normal time:</td>
<td></td>
</tr>
<tr>
<td>CA Resident</td>
<td>$ 906</td>
</tr>
<tr>
<td>Nonresident</td>
<td>$ 5,226</td>
</tr>
<tr>
<td>Total estimated costs for books and supplies for the entire program:</td>
<td>$ 1,620</td>
</tr>
<tr>
<td>Total room and board charges for living on campus:</td>
<td>College does not offer on-campus living.</td>
</tr>
</tbody>
</table>

For more information visit the Gavilan College Gainful Employment website at http://www.gavilan.edu/gainful_employment. Fees based on fall 2011 per-unit rates.

**Program Learning Outcomes:** After completing the Certificate of Achievement for Early Childhood Education graduates will:
- be eligible to apply for the Assistant Teacher Permit and the Associate Teacher Permit for the California Child Development Permit Matrix.
- function within the scope of approved state and nationally accredited early childhood and childcare competencies.
- practice within professional and legal standards, ethical principles, and demonstrate a sensitivity to language and cultural differences of the children, families, and staff where they will be working or completing their cooperative work experiences.
- apply principles of written and verbal communication, and research to communicate relevant, accurate and complete information.
- apply child development principles and sensitivity to theory and applications of working with families of children with special needs.
Early Intervention Assistant

Certificate of Achievement

**REQUIREMENTS** (Core courses not required):
- **CD1** Principles and Philosophies of Early Childhood Education ........... 3 units
- **CD2** Early Childhood Development ........................................ 3 units
- **CD5** Child, Family, and Community ...................................... 3 units
- **CD9** Child Health, Safety and Nutrition .................................. 3 units
- **CD10** Young Children with Special Needs .............................. 3 units
- **CD13** Infant/Toddler Development ......................................... 3 units
- **CD19** Introduction to Careers with Children ............................ 2 units
- **CD35** Positive Behavior for All Children ................................. 3 units
- **CD36** Curriculum Design for Inclusive Classrooms .................... 3 units
- **CD160** Child CPR and First Aid ........................................... 1 unit
- **CD190** Occupational Work Experience .................................. 1-4 units

Choose one:
- **CD 30A** Teaching Practicum and Techniques (3 units)
- **CD 30B** Teaching Practicum and Techniques (3 units)

Total Units Required: 31-34 UNITS

Although some Child Development courses are cross-listed with other departments, it is highly recommended that students enroll in coursework under the Child Development (CD) option.

The Early Intervention Assistant Certificate of Achievement is designed to meet the Early Intervention Assistant II requirements of the Individuals with Disabilities Education Act (IDEA) and prepares students to work as early childhood interventionists and special education paraprofessionals at the Early Childhood Intervention Assistant II level. It meets California’s Prevention and Early Intervention’s requirements for state competencies for early childhood paraprofessionals and is appropriate for students who wish to work as assistants or paraprofessionals in early intervention, early childhood special education, or related child development or special education programs serving children with special needs. Students who complete this certificate and sixteen specified units of General Education will be eligible to apply for the California Child Development Teacher Permit, which is issued by the Commission on Teacher Credentialing.

<table>
<thead>
<tr>
<th>Gainful Employment Statistics for Certificate</th>
</tr>
</thead>
<tbody>
<tr>
<td><strong>Name of Program:</strong> (if different than the CIP program description)</td>
</tr>
<tr>
<td><strong>Program Length:</strong> (in years)</td>
</tr>
<tr>
<td># of units/credits required for program:</td>
</tr>
<tr>
<td>Total Tuition and Required Fees for the entire program completed in normal time:</td>
</tr>
<tr>
<td>CA Resident</td>
</tr>
<tr>
<td>Nonresident</td>
</tr>
<tr>
<td>Total estimated costs for books and supplies for the entire program:</td>
</tr>
<tr>
<td>Total room and board charges for living on campus:</td>
</tr>
</tbody>
</table>

For more information visit the Gavilan College Gainful Employment website at http://www.gavilan.edu/gainful_employment. Fees based on fall 2011 per-unit rates.
School Age Child Care  Certificate of Achievement

CORE COURSES  (see page 91): ..................................................14 units

ADDITIONAL REQUIREMENTS:
Select 10-12 units from any of the following Child Development classes:
CD 3  Child Growth and Development During the School Years  (3 units)
CD 8A  American Education in a Changing World  (3 units)
CD 14A  Working with School Age Children  (3 units)
CD 14B  Behavior Management & Guidance of School Age Children  (3 units)
CD 31  Tutoring School-Age Children  (1 unit)
CD 97  Introduction to Service Learning with Children  (3 units)

..................................................10-12 units

Total Units for Certificate of Achievement: ........................................24-26 UNITS

The knowledge and skills in this certificate are designed to prepare students to work as leaders in programs for children aged 6-18. Work settings might include before and after school programs, youth sports activities, residential or day camps, dramatic arts programs, youth centers, and academic enrichment.

Spanish Early Childhood Education  Certificate of Proficiency

REQUIREMENTS  (Core courses not required):
CD 1  Principles and Philosophies of Early Childhood Education 3 units
CD 2  Early Child Development 3 units
CD 5  Child/Family and Community 3 units
CD 9  Child Health/Nutrition and Safety 3 units
CD 13  Infant and Toddler Development and Care 3 units
CD 160  Child Care First Aid and CPR 1 unit
CD 219  Spanish Introduction to Child Development at Gavilan College 1 unit

Total Units Required for Certificate of Proficiency: 17 UNITS

The knowledge and skills required for this certificate prepare students to work in child care and development programs in which the children speak Spanish.

Gainful Employment Statistics for Certificate

<table>
<thead>
<tr>
<th>Name of Program: (if different than the CIP program description)</th>
<th>CA in CD-School Age Child Care</th>
</tr>
</thead>
<tbody>
<tr>
<td>Program Length: (in years)</td>
<td>1.00</td>
</tr>
<tr>
<td># of units/credits required for program:</td>
<td>24-26</td>
</tr>
<tr>
<td>Total Tuition and Required Fees for the entire program completed in normal time:</td>
<td>CA Resident</td>
</tr>
<tr>
<td>$ 906 - $ 978</td>
<td>$ 5,226 - $ 5,658</td>
</tr>
<tr>
<td>Total estimated costs for books and supplies for the entire program:</td>
<td>$ 1,620.00</td>
</tr>
<tr>
<td>Total room and board charges for living on campus:</td>
<td>College does not offer on-campus living.</td>
</tr>
</tbody>
</table>

For more information visit the Gavilan College Gainful Employment website at http://www.gavilan.edu/gainful_employment. Fees based on fall 2011 per-unit rates.
<table>
<thead>
<tr>
<th>Permit Title</th>
<th>Education Requirement (Option 1 for all permits)</th>
<th>Experience Requirement (Applies to Option 1 Only)</th>
<th>Alternative Qualifications (with option numbers indicated)</th>
<th>Authorization</th>
<th>Five Year Renewal</th>
</tr>
</thead>
<tbody>
<tr>
<td>Assistant (Optional)</td>
<td>Option 1: 6 units of Early Childhood Education (ECE) or Child Development (CD)</td>
<td>None</td>
<td>Option 2: Accredited HERO program (including ROP)</td>
<td>Authorizes the holder to care for and assist in the development and instruction of children in a child care and development program under the supervision of an Associate Teacher, Teacher, Master Teacher, Site Supervisor or Program Director.</td>
<td>105 hours of professional growth *****</td>
</tr>
<tr>
<td>Associate Teacher</td>
<td>Option 1: 12 units ECE/CD including core courses**</td>
<td>50 days of 3+ hours per day within 2 years</td>
<td>Option 2: Child Development Associate (CDA) Credential.</td>
<td>Authorizes the holder to provide service in the care, development, and instruction of children in a child care and development program, and supervise an Assistant and an aide.</td>
<td>Must complete 15 additional units toward a Teacher Permit. Must meet Teacher requirements within 10 years.</td>
</tr>
<tr>
<td>Teacher</td>
<td>Option 1: 24 units ECE/CD including core courses** plus 16 General Education (GE) units*</td>
<td>175 days of 3+ hours per day within 4 years</td>
<td>Option 2: AA or higher in ECE/CD or related field with 3 units supervised field experience in ECE/CD setting</td>
<td>Authorizes the holder to provide service in the care, development and instruction of children in a child care and development program, and supervise an Associate Teacher, Assistant and an aide.</td>
<td>105 hours of professional growth *****</td>
</tr>
<tr>
<td>Master Teacher</td>
<td>Option 1: 24 units ECE/CD including core courses** plus 16GE units* plus 6 specialization units plus 2 adult supervision units</td>
<td>350 days of 3+ hours per day within 4 years</td>
<td>Option 2: BA or higher (does not have to be in ECE/CD) with 12 units of ECE/CD, plus 3 units supervised field experience in ECE/CD setting</td>
<td>Authorizes the holder to provide service in the care, development and instruction of children in a child care and development program, and supervise a Teacher, Associate Teacher, Assistant and an aide. The permit also authorizes the holder to serve as a coordinator of curriculum and staff development.</td>
<td>105 hours of professional growth *****</td>
</tr>
<tr>
<td>Site Supervisor</td>
<td>Option 1: AA (or 60 units) which includes: • 24 ECE/CD units with core courses** plus 6 administration units plus 2 adult supervision units</td>
<td>350 days of 3+ hours per day within 4 years including at least 100 days of supervising adults</td>
<td>Option 2: BA or higher (does not have to be in ECE/CD) with 12 units of ECE/CD, plus 3 units supervised field experience in ECE/CD setting; or Option 3: Admin. credential *** with 12 units of ECE/CD, plus 3 units supervised field experience in ECE/CD setting; or Option 4: Teaching credential**** with 12 units of ECE/CD, plus 3 units supervised field experience in ECE/CD setting</td>
<td>Authorizes the holder to supervise a child care and development program operating at a single site; provide service in the care, development, and instruction of children in a child care and development program; and serve as a coordinator of curriculum and staff development.</td>
<td>105 hours of professional growth *****</td>
</tr>
<tr>
<td>Program Director</td>
<td>Option 1: BA or higher (does not have to be in ECE/CD) including: • 24 ECE/CD units with core courses** plus 6 administration units plus 2 adult supervision units</td>
<td>One year of Site Supervisor experience</td>
<td>Option 2: Admin. credential *** with 12 units of ECE/CD, plus 3 units supervised field experience in ECE/CD setting; or Option 3: Teaching credential**** with 12 units of ECE/CD, plus 3 units supervised field experience in ECE/CD setting, plus 6 units administration; or Option 4: Master's Degree in ECE/CD or Child/Human Development</td>
<td>Authorizes the holder to supervise a child care and development program operating in a single site or multiple sites; provide service in the care, development, and instruction of children in a child care and development program; and serve as coordinator of curriculum and staff development.</td>
<td>105 hours of professional growth****</td>
</tr>
</tbody>
</table>

** NOTE:** All unit requirements listed above are semester units. All course work must be completed with a grade of C or better from a regionally accredited college.  
* One course in each of four general education categories, which are degree applicable: English/Language Arts; Math or Science; Social Sciences; Humanities and/or Fine Arts.  
** Core courses include child/human growth & development; child/family/community or child and family relations; and programs/curriculum. You must have a minimum of three semester units or four quarter units in each of the core areas.  
*** Holders of the Administrative Services Credential may serve as a Site Supervisor or Program Director.  
**** A valid Multiple Subject or a Single Subject in Home Economics.  
***** Professional growth hours must be completed under the guidance of a Professional Growth Advisor. Call (209) 572-6080 for assistance in locating an advisor.

* CD Core courses = Child Growth and Development, Child/Family/Community, and Programs/Curriculum.  
** SA Core courses = Child Growth and Development, Child & Youth, Family & Community, Programs/Curriculum including school-age instructional practices  
*** One course in each of four general education categories required: English, math or science, social sciences, humanities.
Communication Studies

A.A. Degrees and Certificate of Achievement

Communication Studies A.A. Degree
Communication Studies for CSU Transfer A.A. Degree
Communication Studies Certificate of Achievement
Interpersonal Communication Certificate of Achievement

Communication is a vital part of today's world, whether a skill used professionally, socially or in your personal life. We welcome you to explore one of the many areas of Communication Studies by taking a class at Gavilan College.

The Communication Studies faculty at Gavilan College is dedicated to providing students with the knowledge and skill about human communication that can be applied to various contexts in your life. Whether it be improving on your public speaking skills, working with a culturally diverse group or developing skills to better communicate your wants and needs to family and friends, our curriculum is academically structured to meet your needs based on the specific course that you choose.

COMMUNICATION STUDIES A.A. Degree

CORE COURSES:
- CMUN 1A Introduction to Public Speaking ........ 3 units
- CMUN 4 Intercultural Communication .............. 3 units
- CMUN 8 Interpersonal Communication ............. 3 units
- CMUN 10 Small Group Communication ............. 3 units
- PSYC 1A Introduction to Psychology .............. 3 units
Core Unit Total: 15 Units

Program Learning Outcomes: After completing an A.A. and/or Certificate(s), a student will be able to:

- Apply theory and research findings in communication studies to their professional and personal relationships.
- Engage in professional public discourse with application of research, organization, reasoning and oral presentation.
- This A.A. and/or certificate(s) will inform future employers, college admission offices and professional institutions that you have received specialized training in communication skills.

GENERAL EDUCATION REQUIREMENTS: A student may complete the Gavilan College AA/AS general education, the CSU-GE Breadth, or the IGETC pattern. Pattern requirements are listed on pages 48-56. See a counselor for details.

CONTACT:
(408) 848-4701
las@gavilan.edu
COMMUNICATION STUDIES for CSU Transfer

A.A. Degree

Requirements: This degree does not require the core courses:

CMUN 1A Introduction to Public Speaking ........................................... 3 units

List A: Choose two:
CMUN 5 Fundamentals of Communication Studies (3 units)
CMUN 8 Interpersonal Communication (3 units)
CMUN 10 Small Group Communication (3 units)

.......................................................... 6 units

List B: Choose two (including any List A course not used above):
CMUN 2/THEA 4 Oral Reading (3 units)
CMUN 4 Intercultural Communication (3 units)
SOC 10 Mass Media and Society (3 units)

.......................................................... 6 units

List C: Choose one (including any List A or B course not used above):
ANTH 3 Introduction to Cultural Anthropology (3 units)
ENGL 1B Composition and Literature (3 units) or
ENGL 1C Critical Reasoning and Writing (3 units)
PSYC 1A Introduction to Psychology (3 units)
SOC 1A Introduction to Sociology (3 units)

.......................................................... 3 units

Total Units Required: 18 UNITS

Plus completion of CSU or IGETC general education requirements: ....... 39-42 units
Total Units Required for AA-T Degree: 60 UNITS

Students must:

- Complete a minimum of 60 CSU-transferable units.

- Maintain a minimum grade point average (GPA) of at least 2.0 in all CSU transferable coursework. While a minimum of 2.0 is required for admission, some majors may require a higher GPA. Please consult with a counselor for more information.

- Complete a minimum of 18 semester units in an “AA-T” or “AS-T” major as detailed on page 47 of this catalog. Each course in the major must be completed with a grade of C or better or a “P” if the course is taken on a “pass-no pass” basis (title 5 55063).

- Be certified as having completed the California State University-General Education- Breadth pattern (CSU-GE Breadth) (see page 55 for more information); OR the Intersegmental General Education Transfer Curriculum (IGETC) pattern (see page 52 for more information).

Students should note that no more than 60 units are required for this degree and that no additional requirements will be imposed by Gavilan College. In addition, no remedial or non-collegiate level course work will be counted in the total units for this degree.

Upon completion of this degree, students will be prepared for pursuing a BA/BS in Communication or Communication Studies.

Program Learning Outcomes: After completing an AA-T in Communication Studies, a student will be able to:

- Apply theory and research findings in communication studies to their professional and personal relationships.

- Engage in professional public discourse with application of research, organization, reasoning and oral presentation.

- This AA-T will inform future employers, college admission offices and professional institutions that students have received specialized training in communication skills.

General Education Requirements: A student may complete the Gavilan College AA/AS general education pattern (35-44 units), the CSU-GE Breadth pattern (39-52 units) or the IGETC pattern (42-48 units), plus sufficient electives to meet a 60 unit total. See pages 48-56 or see a counselor for details.

NOTE: A course may be used to satisfy both general education and major courses. See "Double Counting Rule" on page 46.
Communication Studies  Certificate of Achievement

This certificate does not require the core courses.

Choose 4 classes (12 units) from the following list:

- CMUN 1A Introduction to Public Speaking (3 units)
- CMUN 2/THEA 4 Oral Reading (3 units)
- CMUN 4 Intercultural Communication (3 units)
- CMUN 5 Fundamentals of Communication Studies (3 units)
- CMUN 8 Interpersonal Communication (3 units)
- CMUN 10 Small Group Communication (3 units)
- CMUN 11 Business Communication (3 units)
- CMUN/CSIS 129 Presentation Graphics - MS Powerpoint (1 unit)

Total Units Required for Certificate of Achievement: ........................ 12 UNITS

The knowledge and skills gained by completing this Certificate of Achievement are designed to promote positive communication and increase problem-solving skills in work and personal environments. Those interested in psychology will also benefit.

Program Learning Outcomes: After completing this Certificate, a student will be able to:

- practice and analyze democratic civic engagement.
- demonstrate and evaluate relationships between local and national issues, movements, and ideas as they relate to local communities.
- demonstrate a range of skills including: research, documentation, analysis, evaluation, communication, contextualization, teamwork, observation, and cultural competency by relating social science concepts and theories to issues of importance to local communities.
- identify, develop, use, and assess tools and methods for community change and social justice.

Interpersonal Communication  Certificate of Achievement

This certificate does not require the core courses.

Choose eighteen (18) units from the following list:

- CMUN 5 Fundamentals of Communication Studies (3 units)
- CMUN/POLS/PSYC 6 Introduction to Conflict Resolution (3 units)
- CMUN 8 Interpersonal Communication (3 units)
- CMUN 11 Business Communication (3 units)
- PSYC 1A Introduction to Psychology (3 units)
- PSYC/POLS 27 Contemporary Leadership (3 units)
- SOC 1A Introduction to Sociology (3 units)

Total Units Required for Certificate of Achievement: ........................ 18 UNITS

The knowledge and skills gained by completing this Certificate of Achievement are designed to promote positive communication and increase problem-solving skills in work and personal environments.

Gainful Employment Statistics for Certificate

<table>
<thead>
<tr>
<th>Name of Program</th>
<th>Program Length (in years)</th>
<th># of units/credits required for program</th>
<th>Total Tuition and Required Fees for the entire program</th>
<th>Total estimated costs for books and supplies for the entire program</th>
<th>Total room and board charges for living on campus</th>
</tr>
</thead>
<tbody>
<tr>
<td>CA in Communication Studies</td>
<td>0.50</td>
<td>12</td>
<td>CA Resident $453</td>
<td>Nonresident $2,613</td>
<td></td>
</tr>
<tr>
<td>CA in Interpersonal Communication</td>
<td>1.00</td>
<td>18</td>
<td>CA Resident $690</td>
<td>Nonresident $3,930</td>
<td></td>
</tr>
</tbody>
</table>

For more information visit the Gavilan College Gainful Employment website at http://www.gavilan.edu/gainful_employment. Fees based on fall 2011 per-unit rates.
A.S. Degrees and Certificates of Achievement

Advanced Technical Computer Graphics Option
Computer Graphics for Environmental Design Option
Technical Desktop Publishing & Graphics Option

An AS Degree or Certificate of Achievement in Computer Graphics & Design (CGD) provides technical skills and multidisciplinary knowledge required by diverse design careers. CGD graduates can describe ways projects presented within their electronic portfolio incorporate design principles, use appropriate materials, apply sustainable practices and integrate human factors and ergonomic features. CGD learning outcomes prepare graduates for proposing, designing, engineering, manufacturing and marketing real and/or virtual products. Projects completed by CGD graduates demonstrate competencies in systematically applying graphical methods to communicate analytical solutions by using creative problem solving, sketching, drafting, 3D graphics (including animating and rendering projects) - skills expected of entry level design technicians and/or engineering, architecture, environmental planning, animation, industrial, product and other design transfer students.

Program Learning Outcomes:

After completing this degree/certificate the student will be able to:

- Describe specialized skills for entry and success in desired technical graphics careers.
- Prepare samples of work that demonstrate entry level proficiencies.
- Use design problem solving to propose an aesthetically pleasing design that satisfactorily addresses clients' needs.
- Apply design principles and color theory when developing presentations.
- Design and present consumer products using working drawings, 3D graphic models and multimedia applications (audio, video, graphics and text).
- Develop an electronic portfolio to present to potential clients/employers.

Contact:
(408) 848-4719
cte@gavilan.edu
Computer Graphics & Design Options

Completion of the core courses and the additional requirements in a selected area (below) will qualify students for a Degree or Certificate of Achievement in Computer Graphics & Design.

**CORE COURSES:**
- CGD 2 2D/3D Technical Computer Graphics I 3 units
- CGD 4 2D/3D Technical Computer Graphics II 3 units
- CGD 8 Advanced Computer Graphics for Design Application I 3 units
- CGD 9 Advanced Computer Graphics for Design Application II 3 units

Core Unit Total: 12 UNITS

Completion of the core courses and the additional requirements in a selected area (below) will qualify students for a Degree or Certificate of Achievement in Computer Graphics & Design.

Students completing Core Computer Graphics & Design (CGD) courses present real and/or virtual designed products within electronic portfolios. CGD graduates’ work samples reveal their ability to apply a creative problem-solving process to propose, develop, refine, and present products associated with their career goal. Freehand sketches combined with SolidWorks, 3D parametric BIM software or other industry-standard CAD drawings and models are used to design aesthetically pleasing functional objects, explain manufacturing processes, apply sustainable practices, and support marketing efforts. CGD graduates’ work samples of realistic rendered 3D models of innovative products help make them competitive when transferring to design schools and seeking entry level positions.

**Advanced Technical Computer Graphics Option**

*A.S. Degree or Certificate of Achievement*

To receive an ASSOCIATE’S DEGREE complete:
- **CORE COURSES** (above)
- **REQUIRED COURSES** (below)
- **GENERAL EDUCATION REQUIREMENTS**, (Gavilan, IGETC or CSU pattern), plus sufficient electives to meet a 60 unit total. See pages 48-56.

To receive a CERTIFICATE OF ACHIEVEMENT complete the:
- **CORE COURSES** (above)
- **REQUIRED COURSES** (below)

**CORE COURSES** (above): ................................. 12 units

**ADDITIONAL REQUIREMENTS:**
- CGD 6 Advanced Technical Computer Graphics ................. 4 units

Choose one:
- CGD 30 Introduction to Environmental Design (3 units)
- CGD 160 Technical Desktop Publishing/Graphics (3 units)
- CSIS 45 C++ Programming I (4 units)

..................................... 3-4 units

Total Units for Required: 19-20 UNITS

**Program Learning Outcomes:** After completing this degree/certificate the student will be able to:
- Describe specialized skills for entry and success in desired technical graphics career.
- Prepare samples of work that demonstrate entry level proficiencies.
- Use design problem-solving to propose an aesthetically pleasing design that satisfactorily addresses clients’ needs.
- Apply design principles and color theory when developing presentations.
- Design and present consumer products using working drawings, 3D graphic models and multimedia applications (audio, video, graphics and text).
- Develop an electronic portfolio to present to potential clients/employers.

This option supports students seeking careers in technical design. Graduates with this degree/certificate produce electronic portfolios that show the ability to design and develop real and virtual world products that are cost effective and functional. Demonstrating knowledge of technical design practices and specialized computer graphics skills helps graduates transfer to universities and obtain entry level technician positions in precision manufacturing, computer-aided drafting, and related technical design fields.

**Gainful Employment Statistics for Certificate**

<table>
<thead>
<tr>
<th>Name of Program: (if different than the CIP program description)</th>
<th>CA in Advanced Tech Comp Graph</th>
</tr>
</thead>
<tbody>
<tr>
<td>Program Length: (in years)</td>
<td>1.00</td>
</tr>
<tr>
<td># of units/credits required for program:</td>
<td>19-20</td>
</tr>
<tr>
<td>Total Tuition and Required Fees for the entire program completed in normal time:</td>
<td>CA Resident</td>
</tr>
<tr>
<td>$690 - $762</td>
<td>$3,930 - $4,362</td>
</tr>
<tr>
<td>Total estimated costs for books and supplies for the entire program:</td>
<td>$1,620.00</td>
</tr>
<tr>
<td>Total room and board charges for living on campus:</td>
<td>College does not offer on-campus living.</td>
</tr>
<tr>
<td>For more information visit the Gavilan College Gainful Employment website at <a href="http://www.gavilan.edu/gainful_employment">http://www.gavilan.edu/gainful_employment</a>. Fees based on fall 2011 per-unit rates.</td>
<td></td>
</tr>
</tbody>
</table>

**General Education Requirements:** A student may complete the Gavilan College AA/AS general education, the CSU-GE Breadth or the IGETC pattern, plus sufficient electives to meet a 60 unit total. See pages 48-56 or see a counselor for details.

**NOTE:** A course may be used to satisfy both general education and major courses. See “Double Counting Rule” on page 46.
Computer Graphics for Environmental Design Option

A.S. Degree or Certificate of Achievement

To receive an ASSOCIATE’S DEGREE complete:
- CORE COURSES (listed on page 99).
- ADDITIONAL REQUIREMENTS listed below.
- GENERAL EDUCATION REQUIREMENTS (Gavilan, IGETC or CSU pattern), plus sufficient electives to meet a 60 unit total. See pages 48-56.

To receive a CERTIFICATE OF ACHIEVEMENT complete:
- CORE COURSES (listed on page 99).
- ADDITIONAL REQUIREMENTS listed below.

CORE COURSES (see page 99): ............................. 12 units

ADDITIONAL REQUIREMENTS:
CGD 30  Introduction to Environmental Design ................. 3 units

Choose one:
- CGD 160  Technical Desktop Publishing/Graphics (3 units)
- CSIS/DM 75  Photoshop I - Adobe PhotoShop (3 units)
- ART/CSIS/DM 76  Digital Illustration (3 units)
- ART 2A  Two-Dimensional Design (3 units)
- ART 3A  Drawing and Composition (3 units)
- ART 13  Three-Dimensional Design (3 units)

............................................. 3 units

Total Units for Required: 18 UNITS

Program Learning Outcomes: After completing this degree, or certificate a student will be able to:
- describe specialized skills for entry and success in desired environmental career and prepare samples of work that demonstrate entry level proficiencies.
- use design problem solving to propose an aesthetically pleasing sustainable environment that satisfactorily addresses clients needs.
- apply design principles and color theory when developing presentations.
- design environments that that demonstrate knowledge of human factors and ergonomic principles.
- develop an electronic portfolio to present to potential clients/employers.
- specify materials that are cost effective and environmentally sound.
- prepare drawings that are consistent with architectural standards.

This option supports students seeking careers in environmental design fields. Demonstrating knowledge of sustainable design practices and specialized computer graphics skills helps graduates transfer to universities and obtain entry level technician positions in human environment design fields such as architecture (including interior and landscape design), environmental planning, construction management, civil engineering and animation within human environments. Graduates with this degree/certificate produce electronic portfolios that include animated models of rendered facilities and LEED (“green”) design features within a set of industry standard construction documents generated using AutoCAD, 3D parametric BIM software and/or other computer aided drafting software.

Gainful Employment Statistics for Certificate

<table>
<thead>
<tr>
<th>Name of Program: (if different than the CIP program description)</th>
<th>CA in CG-Environmental Design</th>
</tr>
</thead>
<tbody>
<tr>
<td>Program Length: (in years)</td>
<td>1.00</td>
</tr>
<tr>
<td># of units/credits required for program:</td>
<td>18</td>
</tr>
<tr>
<td>Total Tuition and Required Fees for the entire program completed in normal time:</td>
<td></td>
</tr>
<tr>
<td>CA Resident</td>
<td>$690</td>
</tr>
<tr>
<td>Nonresident</td>
<td>$3,930</td>
</tr>
<tr>
<td>Total estimated costs for books and supplies for the entire program:</td>
<td></td>
</tr>
<tr>
<td>$1,620</td>
<td></td>
</tr>
<tr>
<td>Total room and board charges for living on campus:</td>
<td>College does not offer on-campus living.</td>
</tr>
</tbody>
</table>

For more information visit the Gavilan College Gainful Employment website at http://www.gavilan.edu/gainful_employment. Fees based on fall 2011 per-unit rates.

General Education Requirements: A student may complete the Gavilan College AA/AS general education, the CSU-GE Breadth or the IGETC pattern, plus sufficient electives to meet a 60 unit total. See pages 48-56 or see a counselor for details.

NOTE: A course may be used to satisfy both general education and major courses. See *Double Counting Rule* on page 46.
Technical Desktop Publishing and Graphics Option

**A.S Degree or Certificate of Achievement**

To receive an ASSOCIATE’S DEGREE complete:
- **CORE COURSES** (listed on page 99).
- **ADDITIONAL REQUIREMENTS** listed below.
- **GENERAL EDUCATION REQUIREMENTS** (Gavilan, IGETC or CSU pattern), plus sufficient electives to meet a 60 unit total. See pages 48-56.

To receive a CERTIFICATE OF ACHIEVEMENT complete:
- **CORE COURSES** (listed on page 99).
- **ADDITIONAL REQUIREMENTS** listed below.

**CORE COURSES** (see page 99): ................................................. 12 units

**ADDITIONAL REQUIREMENTS:**

CGD 160  Technical Desktop Publishing/Graphics .................................. 3 units

Choose one:

- CSIS/DM 73  Desktop Publishing - Adobe InDesign  (3 units)
- CSIS/DM 75  Photoshop I - Adobe PhotoShop  (3 units)
- ART/CSIS/DM 76 Digital Illustration  (3 units)

............................................. 3 units

Total Units for Required: 18 UNITS

This option supports students seeking careers in technical desktop publishing. Graduates with this degree/certificate produce electronic portfolios that show the ability to integrate typography, design and color theory to effectively present work customized for the target audience. Demonstrating knowledge of design and color theory and creative problem solving prepares graduates for transfer to universities and for entry level positions in technical publishing and related fields.

**General Education Requirements:** A student may complete the Gavilan College AA/AS general education, the CSU-GE Breadth or the IGETC pattern, plus sufficient electives to meet a 60 unit total. See pages 48-56 or see a counselor for details.

**NOTE:** A course may be used to satisfy both general education and major courses. See "Double Counting Rule" on page 46.

**Program Learning Outcomes:** After completing this degree/certificate the student will be able to:
- Describe specialized skills for entry and success in desired desktop publishing careers and prepare samples of work that demonstrate entry level proficiencies.
- Use design problem solving to propose an aesthetically pleasing design that satisfactorily addresses clients needs.
- Apply design principles and color theory when developing presentations
- Thoughtfully use typography to create attractive, readable text.
- Develop an electronic portfolio to present to potential clients/employers that integrates typography, design and color theories to showcase work samples.

**Gainful Employment Statistics for Certificate**

<table>
<thead>
<tr>
<th>Name of Program: (if different than the CIP program description)</th>
<th>CA in Technical Desktop Publishing and Graphics</th>
</tr>
</thead>
<tbody>
<tr>
<td>Program Length: (in years)</td>
<td>1.00</td>
</tr>
<tr>
<td># of units/credits required for program:</td>
<td>18</td>
</tr>
<tr>
<td>Total Tuition and Required Fees for the entire program completed in normal time:</td>
<td>CA Resident</td>
</tr>
<tr>
<td></td>
<td>$ 690</td>
</tr>
<tr>
<td>Total estimated costs for books and supplies for the entire program:</td>
<td>$ 1,620</td>
</tr>
<tr>
<td>Total room and board charges for living on campus:</td>
<td>College does not offer on-campus living.</td>
</tr>
</tbody>
</table>

For more information visit the Gavilan College Gainful Employment website at http://www.gavilan.edu/gainful_employment. Fees based on fall 2011 per-unit rates.
A.S. Degrees and Certificates of Achievement

Business Computer Applications
Computer Networking
Computer Programming
Programming for the Internet
Scientific Programming
UNIX Operating System

Certificates of Proficiency

Computer Hardware
Introduction to Computer Networking

ROP Certificates see page 223

Operating Systems
PC Hardware

Contact:
(408) 848-4719
cte@gavilan.edu
Business Computer Applications  

**A.S. Degree or Certificate of Achievement**

To receive an **ASSOCIATE’S DEGREE** complete:

- **REQUIRED COURSES** listed below.
- **GENERAL EDUCATION REQUIREMENTS**, (Gavilan, IGETC or CSU pattern), plus sufficient electives to meet a 60 unit total. See pages 48-56.

To receive a **CERTIFICATE OF ACHIEVEMENT** complete the:

- **REQUIRED COURSES** listed below.

**REQUIREMENTS** Choose 21 units from the following list of courses:

Choose only one of the following two courses:

- CSIS 1  Computer Literacy - MS Office (2 units)
- CSIS 2  Computers in Business - MS Office (4 units)
- CSIS/DL/DM 6  Web Page Authoring I (2 units)
- CSIS 8  Introduction to the Internet (1 unit)
- CSIS 10  BASIC Programming (2 units)
- CSIS/DL/DM 72  Desktop Publishing - QuarkXPress (3 units)
- CSIS/DL/DM 73  Desktop Publishing - Adobe InDesign (3 units)
- CSIS/DL/DM 75  PhotoShop I - Adobe Photoshop (3 units)
- ACCT/CSIS 121  Spreadsheet - MS Excel (1-2 units)
- CSIS 124  Windows Fundamentals (1 unit)
- CSIS 126  Word Processing - MS Word (2 units)
- CSIS 128  Database - MS Access (2 units)
- CMUN/CSIS 129  Presentation Graphics - MS PowerPoint (1 unit)
- CSIS 132  Intermediate Word Processing - MS Word (2 units)
- CSIS 134  Intermediate Excel (2 units)
- CSIS 181  PC Hardware (4 units)
- CSIS 182  Operating Systems (4 units)

Total Units Required: ................................................ 21 UNITS

Recommended Electives:  CSIS 7, 72, 73; DM 7, 72, 73

The Computer Applications Option prepares students for positions utilizing a wide variety of popular operating systems and business application software. The computer applications taught are used in most business environments including word processing, spreadsheets, databases, graphics, and desktop publishing. This degree is also appropriate for retraining and for improving promotional opportunities.

Career opportunities include general office work, document preparation, technical support, help desk training and support, word processing, administrative secretary and administrative services.

**Transfer Students:** Four-year colleges may differ in their major preparation requirements for transfer. Consult with a counselor regarding transfer requirements.

**Program Learning Outcome:** After completing this degree or certificate a student will be able to use a variety of business software, including word processors and spreadsheets to create business letters, reports and other business documents.

**Gainful Employment Statistics for Certificate**

<table>
<thead>
<tr>
<th>Name of Program:</th>
<th>CA in CSIS-Bus Comp Appl</th>
</tr>
</thead>
<tbody>
<tr>
<td>Program Length:</td>
<td>1.00</td>
</tr>
<tr>
<td># of units/credits required for program:</td>
<td>21</td>
</tr>
<tr>
<td>Total Tuition and Required Fees for the entire program completed in normal time:</td>
<td></td>
</tr>
<tr>
<td>CA Resident</td>
<td>$ 798</td>
</tr>
<tr>
<td>Nonresident</td>
<td>$ 4,578</td>
</tr>
<tr>
<td>Total estimated costs for books and supplies for the entire program:</td>
<td>$1,620</td>
</tr>
<tr>
<td>Total room and board charges for living on campus:</td>
<td>College does not offer on-campus living.</td>
</tr>
</tbody>
</table>

For more information visit the Gavilan College Gainful Employment website at http://www.gavilan.edu/gainful_employment. Fees based on fall 2011 per-unit rates.

**General Education Requirements:** A student may complete the Gavilan College AA/AS general education, the CSU-GE Breadth or the IGETC pattern, plus sufficient electives to meet a 60 unit total. See pages 48-56 or see a counselor for details.

**NOTE:** A course may be used to satisfy both general education and major courses. See "Double Counting Rule" on page 46.

**Computer Hardware**

**Certificate of Proficiency**

**REQUIREMENTS:**

- CSIS 181  PC Hardware ........................................ 4 units
- CSIS 182  Operating Systems ................................... 4 units

Total Units Required for Certificate of Proficiency: 8 UNITS

Recommended Electives:  CSIS 122, CSIS 2 or 2L

Students receiving this certificate will have job entry skills in computer hardware repair. Students will be eligible to take the industry A+ hardware exam for certification.
Computer Networking  

**A.S. Degree or Certificate of Achievement**

To receive an **ASSOCIATE’S DEGREE** complete:
- **REQUIRED COURSES** listed below.
- **GENERAL EDUCATION REQUIREMENTS**, (Gavilan, IGETC or CSU pattern), plus sufficient electives to meet a 60 unit total. See pages 48-56.

To receive a **CERTIFICATE OF ACHIEVEMENT** complete the:
- **REQUIRED COURSES** listed below.

**REQUIREMENTS:**

<table>
<thead>
<tr>
<th>Course Code</th>
<th>Course Title</th>
<th>Units</th>
</tr>
</thead>
<tbody>
<tr>
<td>CSIS 48</td>
<td>UNIX/Linux Operating System</td>
<td>4</td>
</tr>
<tr>
<td>CSIS 178</td>
<td>Applied Networking</td>
<td>4</td>
</tr>
<tr>
<td>CSIS 179</td>
<td>Introduction to Information Security</td>
<td>4</td>
</tr>
<tr>
<td>CSIS 181</td>
<td>PC Hardware</td>
<td>4</td>
</tr>
<tr>
<td>CSIS 182</td>
<td>Operating Systems</td>
<td>4</td>
</tr>
<tr>
<td>CSIS 183</td>
<td>Introduction to Microsoft Servers</td>
<td>4</td>
</tr>
</tbody>
</table>

Total Units Required: 24 UNITS

Computer Networking is designed to provide entry-level skills and knowledge for students to enter the networking profession. Students will be eligible to take the industry A+ hardware exam. The program also provides a solid foundation in network technology for students who plan to pursue further education in the networking field at a four year college.

**Career Opportunities:** network technician, network maintenance, network help desk, assistant network administrator, PC/network installation.

**Gainful Employment Statistics for Certificate**

Name of Program: (if different than the CIP program description)  
CA in CSIS-Computer Networking

Program Length: (in years) 1.00

# of units/credits required for program: 24

Total Tuition and Required Fees for the entire program completed in normal time:
- CA Resident: $906
- Nonresident: $5,226

Total estimated costs for books and supplies for the entire program: $1,620

Total room and board charges for living on campus: College does not offer on-campus living.

For more information visit the Gavilan College Gainful Employment website at http://www.gavilan.edu/gainful_employment. Fees based on fall 2011 per-unit rates.

**Program Learning Outcomes:** After completing this degree or certificate of achievement a student will be able to:
- work individually and in teams.
- install and test hardware and software necessary for network connectivity.
- set up a connection with a remote host, employing appropriate commands.

**General Education Requirements:** A student may complete the Gavilan College AA/AS general education, the CSU-GE Breadth or the IGETC pattern, plus sufficient electives to meet a 60 unit total. See pages 48-56 or see a counselor for details.

**NOTE:** A course may be used to satisfy both general education and major courses. See "Double Counting Rule" on page 46.

---

**Introduction to Computer Networking**  

**Certificate of Proficiency**

<table>
<thead>
<tr>
<th>Course Code</th>
<th>Course Title</th>
<th>Units</th>
</tr>
</thead>
<tbody>
<tr>
<td>CSIS 178</td>
<td>Applied Networking</td>
<td>4</td>
</tr>
<tr>
<td>CSIS 179</td>
<td>Introduction to Information Security</td>
<td>4</td>
</tr>
<tr>
<td>CSIS 183</td>
<td>Introduction to Microsoft Servers</td>
<td>4</td>
</tr>
</tbody>
</table>

Total Units Required for Certificate of Proficiency: 12 UNITS

**Recommended courses** to be taken before starting (or concurrent with) the Networking sequence: CSIS 2L, 48, 181; MATH 205
Computer Programming  

To receive an ASSOCIATE’S DEGREE complete:

- REQUIRED COURSES listed below.
- GENERAL EDUCATION REQUIREMENTS. (Gavilan, IGETC or CSU pattern), plus sufficient electives to meet a 60 unit total. See pages 48-56.

To receive a CERTIFICATE OF ACHIEVEMENT complete the:

- REQUIRED COURSES listed below.

REQUIREMENTS:

<table>
<thead>
<tr>
<th>Course</th>
<th>Title</th>
<th>Units</th>
</tr>
</thead>
<tbody>
<tr>
<td>CSIS 46</td>
<td>C++ Programming II</td>
<td>4 units</td>
</tr>
<tr>
<td>CSIS 48</td>
<td>UNIX/Linux Operating System</td>
<td>4 units</td>
</tr>
<tr>
<td>Choose one</td>
<td></td>
<td></td>
</tr>
<tr>
<td>CSIS 45</td>
<td>C++ Programming I (4 units)</td>
<td></td>
</tr>
<tr>
<td>CSIS 5</td>
<td>C++ Scientific Programming (3 units)</td>
<td></td>
</tr>
<tr>
<td></td>
<td></td>
<td>3-4 units</td>
</tr>
<tr>
<td>Choose 10 units:</td>
<td></td>
<td></td>
</tr>
<tr>
<td>CSIS/DM/LIB 6</td>
<td>Web Page Authoring I (2 units)</td>
<td></td>
</tr>
<tr>
<td>CSIS 12/12L</td>
<td>Assembly Language Programming (4 units)</td>
<td></td>
</tr>
<tr>
<td>CSIS 24</td>
<td>Java Programming I (4 units)</td>
<td></td>
</tr>
<tr>
<td>CSIS 44</td>
<td>C#.NET Programming (4 units)</td>
<td></td>
</tr>
<tr>
<td>CSIS 51</td>
<td>Visual Basic .NET Programming (4 units)</td>
<td></td>
</tr>
<tr>
<td>CSIS 54/54L</td>
<td>Perl Programming/Perl Programming Lab (3-1 units)</td>
<td></td>
</tr>
<tr>
<td>CSIS 78</td>
<td>Web Sites with SQL and PHP (4 units)</td>
<td></td>
</tr>
<tr>
<td></td>
<td></td>
<td>10 units</td>
</tr>
</tbody>
</table>

Total Units Required: 21-22 UNITS

Recommended Electives:

For transfer majors: MATH 1A and MATH 1B  
For non-transfer majors: MATH 233

Gainful Employment Statistics for Certificate

<table>
<thead>
<tr>
<th>Name of Program:</th>
<th>CA in CSIS-Comp Programming</th>
</tr>
</thead>
<tbody>
<tr>
<td>Program Length:</td>
<td>1.00</td>
</tr>
<tr>
<td># of units/credits required for program:</td>
<td>21-22</td>
</tr>
<tr>
<td>Total Tuition and Required Fees for the entire program completed in normal time:</td>
<td></td>
</tr>
<tr>
<td>CA Resident</td>
<td>$798 - $834</td>
</tr>
<tr>
<td>Nonresident</td>
<td>$4,578 - $4,794</td>
</tr>
<tr>
<td>Total estimated costs for books and supplies for the entire program:</td>
<td>$1,620.00</td>
</tr>
</tbody>
</table>
| Total room and board charges for living on campus: | College does not offer on-campus living.

For more information visit the Gavilan College Gainful Employment website at http://www.gavilan.edu/gainful_employment. Fees based on fall 2011 per-unit rates.

**Computer Programming**

A.S. Degree or Certificate of Achievement

Computer Programming prepares students for entry-level programming in a wide variety of occupations. Many of the courses will be needed for students transferring to a university to study Computer Science. Students planning to transfer need to research lower division major requirements at the transfer destination of their choice.

Career Opportunities: computer programming, application programming, help desk technical support, data base specialist and Web programmer.

Program Learning Outcomes: After completing this degree, a student will be able to:

- create programs in three different languages that use control flow statements such as if and switch statements.
- create programs in three different languages that use loop statements such as for and while statements.

Visit the Gavilan College website to view the current Catalog www.gavilan.edu/catalog
Programming for the Internet  

**A.S. Degree or Certificate of Achievement**

To receive an ASSOCIATE’S DEGREE complete:
- **REQUIRED COURSES** listed below.
- **GENERAL EDUCATION REQUIREMENTS**, (Gavilan, IGETC or CSU pattern), plus sufficient electives to meet a 60 unit total. See pages 48-56.

To receive a CERTIFICATE OF ACHIEVEMENT complete the:
- **REQUIRED COURSES** listed below.

**REQUIREMENTS:**

<table>
<thead>
<tr>
<th>Requirement</th>
<th>Course Code</th>
<th>Course Name</th>
<th>Units</th>
</tr>
</thead>
<tbody>
<tr>
<td>CSIS/DM/LIB 6</td>
<td>Web Page Authoring I</td>
<td>2 units</td>
<td></td>
</tr>
<tr>
<td>CSIS 51</td>
<td>Visual Basic .NET Programming</td>
<td>4 units</td>
<td></td>
</tr>
<tr>
<td>CSIS 54/54L</td>
<td>Perl Programming/Perl Programming Lab</td>
<td>4 units</td>
<td></td>
</tr>
<tr>
<td>CSIS 84</td>
<td>JavaScript Programming</td>
<td>2 units</td>
<td></td>
</tr>
</tbody>
</table>

Choose one:
- CSIS 5  C++ Scientific Programming (3 units)
- CSIS 45  C++ Programming I (4 units)

Choose courses for at least 4 units:
- CSIS/DM 7  Web Page Authoring II (2 units)
- CSIS/DM 75  PhotoShop I - Adobe PhotoShop (3 units)
- CSIS 78  Web Sites with SQL and PHP (4 units)
- ART/CSIS/DM 85  Web Design I: Dreamweaver (2 units)
- ART/CSIS/DM 110  Interactive Animation: Flash (3 units)

Total Units Required: 19-20 UNITS

**Recommended Elective:** MATH 233

Programming for the Internet prepares students for entry-level positions developing and maintaining Internet and Intranet web pages. The courses prepare students to create, modify, and program web pages, such as those used in electronic commerce. Students will gain knowledge in both technical and artistic sides of this profession.

**Career Opportunities:** web page developer, web programmer, technical support, webmaster

**Program Learning Outcomes:** After completing this degree, a student will be able to:
- create, modify, and program web pages with images and forms.
- create programs in three different languages that use loop statements such as for and while statements.

<table>
<thead>
<tr>
<th>Gainful Employment Statistics for Certificate</th>
</tr>
</thead>
<tbody>
<tr>
<td><strong>Name of Program:</strong> CA in CSIS-Prog for Internet</td>
</tr>
<tr>
<td><strong>Program Length:</strong> (in years) 1.00</td>
</tr>
<tr>
<td><strong># of units/credits required for program:</strong> 19-20</td>
</tr>
<tr>
<td><strong>Total Tuition and Required Fees for the entire program completed in normal time:</strong> CA Resident $726 - $762, Nonresident $4,146 - $4,362</td>
</tr>
<tr>
<td><strong>Total estimated costs for books and supplies for the entire program:</strong> $1,620</td>
</tr>
<tr>
<td><strong>Total room and board charges for living on campus:</strong> College does not offer on-campus living.</td>
</tr>
</tbody>
</table>

For more information visit the Gavilan College Gainful Employment website at http://www.gavilan.edu/gainful_employment. Fees based on fall 2011 per-unit rates.

**General Education Requirements:** A student may complete the Gavilan College AA/AS general education, the CSU-GE Breadth or the IGETC pattern, plus sufficient electives to meet a 60 unit total. See pages 48-56 or see a counselor for details.

**NOTE:** A course may be used to satisfy both general education and major courses. See “Double Counting Rule” on page 46.
Scientific Programming **A.S. Degree or Certificate of Achievement**

To receive an **ASSOCIATE’S DEGREE** complete:
- **REQUIRED COURSES** listed below.
- **GENERAL EDUCATION REQUIREMENTS**, (Gavilan, IGETC or CSU pattern), plus sufficient electives to meet a 60 unit total. See pages 48-56.

To receive a **CERTIFICATE OF ACHIEVEMENT** complete the:
- **REQUIRED COURSES** listed below.

**REQUIREMENTS:**

**CSIS 46**  C++ Programming II ....................................... 4 units  
**MATH 1A**  Single-Variable Calculus and Analytic Geometry .............. 4 units

Choose one:
- **CSIS 5**  C++ Scientific Programming  (3 units)  
- **CSIS 45**  C++ Programming I  (4 units)  


Choose two:
- **CSIS 24**  Java Programming I  (4 units)  
- **CSIS 47**  Visual C++ Programming  (4 units)  
- **CSIS 51**  Visual Basic .NET Programming  (4 units)  
- **CSIS 54/54L**  Perl Programming/Perl Programming Lab  (3-1 units)  


Choose two:
- **MATH 1B**  Single-Variable Calculus and Analytic Geometry  (4 units)  
- **MATH 5**  Introduction to Statistics  (3 units)  
- **MATH 7**  Finite Mathematics  (3 units)  
- **CSIS-26**  Discrete Math  (4 units)  


Total Units Required: 25-28 UNITS

Scientific Programming prepares students for entry-level scientific programming in a wide variety of occupations. Many of the courses will be needed for students transferring to a university to study Computer Science. Students planning to transfer need to research lower division major requirements at the transfer destination of their choice.

**Career Opportunities:** scientific programming, computer programming, statistical programming, research.

**Program Learning Outcomes:** After completing this degree, a student will be able to:

- create programs in three different languages that use control flow statements such as if and switch statements.
- create scientific programs in three different languages that use loop statements such as for and while statements.

### Gainful Employment Statistics for Certificate

<table>
<thead>
<tr>
<th>Name of Program: (if different than the CIP program description)</th>
<th>CA in CSIS-Scientific Program</th>
</tr>
</thead>
<tbody>
<tr>
<td>Program Length: (in years)</td>
<td>1.00</td>
</tr>
<tr>
<td># of units/credits required for program:</td>
<td>25-28</td>
</tr>
<tr>
<td>Total Tuition and Required Fees for the entire program completed in normal time:</td>
<td>CA Resident</td>
</tr>
<tr>
<td></td>
<td>$ 942 - $ 1,050</td>
</tr>
<tr>
<td>Total estimated costs for books and supplies for the entire program:</td>
<td>$ 1,620</td>
</tr>
<tr>
<td>Total room and board charges for living on campus:</td>
<td>College does not offer on-campus living.</td>
</tr>
</tbody>
</table>

For more information visit the Gavilan College Gainful Employment website at http://www.gavilan.edu/gainful_employment. Fees based on fall 2011 per-unit rates.

### General Education Requirements:
A student may complete the Gavilan College AA/AS general education, the CSU-GE Breadth or the IGETC pattern, plus sufficient electives to meet a 60 unit total. See pages 48-56 or see a counselor for details.

**NOTE:** A course may be used to satisfy both general education and major courses. See “Double Counting Rule” on page 46.
UNIX Operating System

A.S. Degree or Certificate of Achievement

To receive an ASSOCIATE’S DEGREE complete:

- REQUIRED COURSES listed below.
- GENERAL EDUCATION REQUIREMENTS. (Gavilan, IGETC or CSU pattern), plus sufficient electives to meet a 60 unit total. See pages 48-56.

To receive a CERTIFICATE OF ACHIEVEMENT complete the:

- REQUIRED COURSES listed below.

REQUIREMENTS:

CSIS 48  UNIX/Linux Operating System ........................................ 4 units
CSIS 49  UNIX/Linux Shell Programming ......................................... 4 units
CSIS 52  Linux/UNIX System Administration ..................................... 4 units

Choose one:

- CSIS 18/18L UNIX/C++ Programming and UNIX/C++ Programming Lab (3-1 units)
- CSIS 45  C++ Programming I (4 units)
- CSIS 5  C++ Scientific Programming (3 units)

.................................................. 3-4 units

Choose two:

- CSIS 24  Java Programming I (4 units)
- CSIS 46  C++ Programming II (4 units)
- CSIS 54/54L Perl Programming/Perl Programming Lab (3-1 units)
- CSIS 175A Networking Essentials (4 units)

.................................................. 8 units

Total Units Required: 23-24 UNITS

If you are using the web, you are using UNIX, since most large web servers are UNIX systems. The UNIX Operating System Option prepares students for entry-level positions working with UNIX/Linux operating systems. Many of the courses will be needed for students transferring to a 4-year college to study computer science. Students planning to transfer need to research lower division major requirements at the transfer destination of their choice.

Career Opportunities: UNIX/Linux system administration, webmaster, C/C++ programming

Program Learning Outcomes: After completing this degree, a student will be able to:

- use UNIX editors to create and modify files.
- modify, move, and rename files and directories. They will be able to use UNIX email and FTP commands.

Gainful Employment Statistics for Certificate

Name of Program: (if different than the CIP program description) CA in CSIS-UNIX
Program Length: (in years) 1.00

# of units/credits required for program: 23-24

Total Tuition and Required Fees for the entire program completed in normal time:

<table>
<thead>
<tr>
<th>CA Resident</th>
<th>Nonresident</th>
</tr>
</thead>
<tbody>
<tr>
<td>$ 870 - $ 906</td>
<td>$ 5,010 - $ 5,226</td>
</tr>
</tbody>
</table>

Total estimated costs for books and supplies for the entire program: $ 1,620

Total room and board charges for living on campus: College does not offer on-campus living.

For more information visit the Gavilan College Gainful Employment website at http://www.gavilan.edu/gainful_employment. Fees based on fall 2011 per-unit rates.

General Education Requirements: A student may complete the Gavilan College AA/AS general education, the CSU-GE Breadth or the IGETC pattern, plus sufficient electives to meet a 60 unit total. See pages 48-56 or see a counselor for details.

NOTE: A course may be used to satisfy both general education and major courses. See "Double Counting Rule" on page 46.
Cosmetology  
**A.S. Degree or Certificate of Achievement**

**REQUIREMENTS:**
- **COS 200**  Beginning Phase  .................. 12 units
- **COS 201**  Intermediate Phase  ................ 12 units
- **COS 202**  Advanced Phase  .................. 12 units
- **COS 203**  Completion Phase ............... 2-12 units

Total Units Required: 38-48 UNITS

**Recommended Electives:**  COS 205, 206

**Gainful Employment Statistics for Certificate**

<table>
<thead>
<tr>
<th>Name of Program: (if different than the CIP program description)</th>
<th>CA in Cosmetology</th>
</tr>
</thead>
<tbody>
<tr>
<td>Program Length: (in years)</td>
<td>2.00</td>
</tr>
<tr>
<td># of units/credits required for program:</td>
<td>38-48</td>
</tr>
<tr>
<td>Total Tuition and Required Fees for the entire program completed in normal time:</td>
<td>CA Resident</td>
</tr>
<tr>
<td>$ 1,452 - $ 1,812</td>
<td>$ 8,292 - $ 10,452</td>
</tr>
<tr>
<td>Total estimated costs for books and supplies for the entire program:</td>
<td>$ 3,240</td>
</tr>
<tr>
<td>Total room and board charges for living on campus:</td>
<td>College does not offer on-campus living.</td>
</tr>
<tr>
<td>For more information visit the Gavilan College Gainful Employment website at <a href="http://www.gavilan.edu/gainful_employment">http://www.gavilan.edu/gainful_employment</a>. Fees based on fall 2011 per-unit rates.</td>
<td></td>
</tr>
</tbody>
</table>
Esthetician  Certificate of Achievement

CMUN 1A  Introduction to Public Speaking ............... 3 units
CMUN 10  Small Group Communication ................. 3 units
COS 220  Scientific Skin Care ........................... 8 units
COS 221  Advanced Scientific Skin Care ............... 8 units
Total Units for Certificate of Achievement: 22 UNITS

Gavilan College offers a comprehensive skin care program that will meet the State of California Department of Consumer Affairs, Board of Barbering and Cosmetology requirements for licensure. State Licensing requires 600 hours for the practice of Esthetics.

Two courses are offered to meet the requirements for licensure: Scientific Skin Care and Advance Scientific Skin Care. The curriculum includes, but is not limited to, the study of skin, its appendages, massage, masks and peels, use of skin care machines, product knowledge, light therapy, botanical and chemical therapy, sanitation, salon operation, and Cosmetology State Board regulations. Instruction also includes client services. Scientific Skin Care and Advanced Scientific Skin Care are offered in two consecutive semesters. An additional 6 units in electives is required to receive a Certificate of Achievement of Esthetics.

Program Learning Outcomes: After completing the Certificate of Achievement for Esthetics, students will:

- Complete the State Board of Barbering and Cosmetology examination for licensure and employment.
- Diagnose skin condition and perform skin treatments while administering facials.
- Diagnose, analyze and apply proper skin enhancing products when administering make-up designs.

Gainful Employment Statistics for Certificate

<table>
<thead>
<tr>
<th>Name of Program: (if different than the CIP program description)</th>
<th>CA in Cosmetology-Esthetician</th>
</tr>
</thead>
<tbody>
<tr>
<td>Program Length: (in years)</td>
<td>1.00</td>
</tr>
<tr>
<td># of units/credits required for program:</td>
<td>22</td>
</tr>
<tr>
<td>Total Tuition and Required Fees for the entire program completed in normal time:</td>
<td>CA Resident Nonresident</td>
</tr>
<tr>
<td>$834</td>
<td>$4,794</td>
</tr>
<tr>
<td>Total estimated costs for books and supplies for the entire program:</td>
<td>$1,620</td>
</tr>
<tr>
<td>Total room and board charges for living on campus:</td>
<td>College does not offer on-campus living.</td>
</tr>
<tr>
<td>For more information visit the Gavilan College Gainful Employment website at <a href="http://www.gavilan.edu/gainful_employment">http://www.gavilan.edu/gainful_employment</a>. Fees based on fall 2011 per-unit rates.</td>
<td></td>
</tr>
</tbody>
</table>
Digital Media is the use of computer technology in communication: to create, manipulate, and combine different media whether it be text (words, equations), graphics (photography, art and design images, charts and graphs, animation), audio (spoken words, music, sound effects) and video (motion picture/film, animation, visual effects) sometimes with links (connections) that let the user navigate, interact, create, and communicate.

Gavilan College has developed this Digital Media program complete with state of the art technology and studio to provide students with the opportunity to acquire or enhance job skills in this contemporary art, satisfy major requirements for transferring to a college or university, or for personal enrichment in an exciting technology-based field that is changing our lives on a daily basis.

Gavilan students studying Digital Media learn fundamental concepts and complex techniques applicable to digital media; related programs in multimedia, new media, digital film/video, digital art; and almost any other work situation in this technologically equipped world in which we live. A variety of degree and certificate options are provided so that one may pursue their desired specialty within this truly multidisciplinary field.

### DIGITAL MEDIA CORE COURSES

The following core courses are required for the Digital Art and Imaging, Digital Audio/Video and Interactive Media and Authoring Associate’s Degree and Certificate of Achievement options. Additional requirements for each option are listed alphabetically on the following pages.

<table>
<thead>
<tr>
<th>COURSE</th>
<th>TITLE</th>
<th>UNITS</th>
</tr>
</thead>
<tbody>
<tr>
<td>ART/CSIS/DM 77</td>
<td>Introduction to Digital Media</td>
<td>3</td>
</tr>
<tr>
<td>ART 11</td>
<td>Creativity, Imagination, and Innovation</td>
<td>3</td>
</tr>
<tr>
<td>CSIS/DM 75</td>
<td>PhotoShop I - Adobe PhotoShop</td>
<td>3</td>
</tr>
<tr>
<td>ART/CSIS/DM 107</td>
<td>Digital Media Design</td>
<td>2</td>
</tr>
<tr>
<td>ART/CSIS/DM 114</td>
<td>Digital Media Team Production</td>
<td>2</td>
</tr>
</tbody>
</table>

Choose one:

<table>
<thead>
<tr>
<th>COURSE</th>
<th>TITLE</th>
<th>UNITS</th>
</tr>
</thead>
<tbody>
<tr>
<td>CSIS/DM/LIB 6</td>
<td>Web Page Authoring I (2 units)</td>
<td></td>
</tr>
<tr>
<td>ART/CSIS/DM 85</td>
<td>Web Design I: Dreamweaver (2 units)</td>
<td></td>
</tr>
</tbody>
</table>

Total Core: 15 UNITS

**Program Learning Outcomes:** After completing the A.A. degree or Certificate of Achievement in Digital Media a student will:

- analyze the relationship of aesthetics, content, user needs and/or interactivity of projects suitable for implementing and using digital media or order to synthesize a design, produce development guidelines incorporating techniques such as storyboards and flow charts and render their design using good design principles and contemporary digital technology.

- be able to perform and communicate ideas within a team environment and contribute significant work related to their option area of study.
Digital Art and Imaging Option  

**A.A. Degree or Certificate of Achievement**

**CORE COURSES** (see page 111): .......................................................... 15 units

**ADDITIONAL REQUIREMENTS:**

Choose 9 units from the following list:

- ART 2A Two Dimensional Design (3 units)
- DM 60 3D Animation I (3 units)
- DM 61 3D Animation II (3 units)
- ART/CSIS/DM 74 Advanced Photoshop (3 units)
- ART/CSIS/DM 76 Digital Illustration (3 units)
- ART/CSIS/DM 80 Digital Photography (3 units)
- ART/CSIS/DM 110 Interactive Animation: Flash (3 units)
- ART/CSIS/DM 117 Visual Effects/Motion Graphics (3 units)

.................................................. 9 units

Elective course in any other DM option area: .................................................. 3 units

Total Units Required: 27 UNITS

This degree or certificate of achievement will enable a graduate to obtain jobs as a digital photographer, animator, or graphic designer/artist for computer games, motion graphics, the web, CD-ROMs, DVDs, and digital print.

**Program Learning Outcome:** After completing this option a student will demonstrate an ability to use Digital Media technology and concepts to design, produce, and integrate aesthetically pleasing 2D/3D visual and animated material for film, video, web pages, CD/DVDs, video games or digital print.

---

**General Education Requirements:** A student may complete the Gavilan College AA/AS general education, the CSU-GE Breadth or the IGETC pattern, plus sufficient electives to meet a 60 unit total. See pages 48-56 or see a counselor for details.

**NOTE:** A course may be used to satisfy both general education and major courses. See "Double Counting Rule" on page 46.
Digital Audio/Video Option

**A.A. Degree or Certificate of Achievement**

To receive an ASSOCIATE’S DEGREE complete:
- CORE COURSES (see page 111).
- REQUIRED COURSES listed below.
- GENERAL EDUCATION REQUIREMENTS, (Gavilan, IGETC or CSU pattern), plus sufficient electives to meet a 60 unit total. See pages 48-56.

To receive a CERTIFICATE OF ACHIEVEMENT complete the:
- CORE COURSES (see page 111).
- REQUIRED COURSES listed below.

**CORE COURSES** (see page 111). ..................................... 15 units

**ADDITIONAL REQUIREMENTS:**

Choose 9 units from the following list:

- ART 2A Two Dimensional Design (3 units)
- DM 60 3D Animation I (3 units)
- DM 111 Sound Design for Digital Media (3 units)
- ART/CSIS/DM 113 Introduction to Digital Video (3 units)
- ART/CSIS/DM 116 DVD Authoring (2 units)
- ART/CSIS/DM 117 Visual Effects/Motion Graphics (3 units)
- HUM 25A Film Production (3 units)
- MUS 21 Electronic Music/Sound Design (3 units)
- THEA/MCTV 16 Television History and Practice (3 units)
- THEA/MCTV 17A or THEA/MCTV 17B Television and Video Workshop (3 units)
- THEA 98 Special Topics: GavTV Production (1-2 units)

............................................. 9 units

Elective course in any other DM option area. ................................... 3 units

Total Units Required: 27 UNITS

This degree or certificate of achievement will enable a graduate to obtain jobs as a digital audio/video editor, web streaming media producer, podcast specialist, videographer, or sound designer for games, animation, or film/video.

**Program Learning Outcomes:** After completing this option a student will be able to:
- create and produce time-based visual art and sound.
- analyze project definitions (including scripts or storyboards) in order to (using digital technology) creatively and logically edit video; design sound and motion graphics for broadcast or to be incorporated into web sites, CD/DVDs, video/film, video games, or cell phones.

The certificate will enable a graduate to obtain entry level jobs as a digital audio/video producer/director, video or sound editor, web streaming media designer/producer.

<table>
<thead>
<tr>
<th>Gainful Employment Statistics for Certificate</th>
</tr>
</thead>
<tbody>
<tr>
<td>Name of Program: (if different than the CIP program description)</td>
</tr>
<tr>
<td>Program Length: (in years)</td>
</tr>
<tr>
<td># of units/credits required for program</td>
</tr>
<tr>
<td>Total Tuition and Required Fees for the entire program completed in normal time:</td>
</tr>
<tr>
<td>Total estimated costs for books and supplies for the entire program:</td>
</tr>
<tr>
<td>Total room and board charges for living on campus:</td>
</tr>
<tr>
<td>For more information visit the Gavilan College Gainful Employment website at <a href="http://www.gavilan.edu/gainful_employment">http://www.gavilan.edu/gainful_employment</a>. Fees based on fall 2011 per-unit rates.</td>
</tr>
</tbody>
</table>

General Education Requirements: A student may complete the Gavilan College AA/AS general education, the CSU-GE Breadth or the IGETC pattern, plus sufficient electives to meet a 60 unit total. See pages 48-56 or see a counselor for details. 

**NOTE:** A course may be used to satisfy both general education and major courses. See "Double Counting Rule" on page 46.
Interactive Media and Authoring Option  

A.A. Degree or Certificate of Achievement

To receive an ASSOCIATE’S DEGREE complete:
- CORE COURSES (see page 111).
- REQUIRED COURSES listed below.
- GENERAL EDUCATION REQUIREMENTS, (Gavilan, IGETC or CSU pattern), plus sufficient electives to meet a 60 unit total. See pages 48-56.

To receive a CERTIFICATE OF ACHIEVEMENT complete the:
- CORE COURSES (see page 111).
- REQUIRED COURSES listed below.

CORE COURSES (see page 111) .......................................................... 15 units

ADDITIONAL REQUIREMENTS:
Choose 9 units from the following:
- DM 60 3D Animation I (3 units)
- ART/CSIS/DM 110 Interactive Animation: Flash (3 units)
- ART/CSIS/DM 116 DVD Authoring (2 units)
- CSIS 24 Java Programming I (4 units)
- CSIS 45 C++ Programming I (4 units)
- CSIS 84 JavaScript Programming (2 units)
- CSIS 151 Introduction to XML Authoring (3 units)

Choose only one of the following two courses:
- ART/CSIS/DM 85 Web Design I: Dreamweaver (2 units)
- CSIS/DM 7 Web Page Authoring II (2 units)

.................................................. 9 units

Elective course in any other DM option area ........................................ 3 units

Total Units Required: ........................................................................ 27 UNITS

This degree or certificate of achievement will enable a graduate to obtain jobs as a web designer, web architect, information designer, webmaster, CD-ROM, DVD, or video game designer/developer.

Program Learning Outcomes: After completing this option a student will be able to:
- analyze requirements and proposals for an interactive project.
- describe the relationship of content elements and synthesize aesthetic interactive projects such as video games, web sites, CD/DVD, educational multimedia, or interactive TV in line with current theories in human cognition.

The certificate will enable a graduate to obtain entry level jobs as a web designer, web architect, information designer, webmaster, CD-ROM, DVD, or video game designer/developer.

Gainful Employment Statistics for Certificate

<table>
<thead>
<tr>
<th>Name of Program: (if different than the CIP program description)</th>
<th>CA in DM-Interactiv Media Auth</th>
</tr>
</thead>
<tbody>
<tr>
<td>Program Length: (in years)</td>
<td>1.00</td>
</tr>
<tr>
<td># of units/credits required for program:</td>
<td>27</td>
</tr>
<tr>
<td>Total Tuition and Required Fees for the entire program completed in normal time:</td>
<td>CA Resident $ 1,014</td>
</tr>
<tr>
<td>Total estimated costs for books and supplies for the entire program:</td>
<td>$ 1,620</td>
</tr>
<tr>
<td>Total room and board charges for living on campus:</td>
<td>College does not offer on-campus living.</td>
</tr>
</tbody>
</table>

For more information visit the Gavilan College Gainful Employment website at http://www.gavilan.edu/gainfulmployment. Fees based on fall 2011 per-unit rates.
Digital Imaging/Graphics Production Specialist  
Certificate of Proficiency

Does NOT require completion of core courses.

REQUIREMENTS:
ART 2A    Two Dimensional Design ................................. 3 units
CSIS/DM 75  PhotoShop I - Adobe PhotoShop ................... 3 units
ART/CSIS/DM 76  Digital Illustration ............................ 3 units
ART/CSIS/DM 77  Introduction To Digital Media ................. 3 units

Choose one:
ART/CSIS/DM 114  Digital Media Production (2 units)
JOUR 18A    Working on the Newspaper (2 units)

Choose one:
ART 8A    Beginning Photography from Analog to Digital (3 units)
ART/CSIS/DM 80  Digital Photography (3 units)
ART/CSIS/DM 110  Interactive Animation: Flash (3 units)
CGD 110    Computer Graphics Lab (3 units)

Total Units Required for Certificate of Proficiency: 17 UNITS

Digital Print Production Specialist  
Certificate of Proficiency

Does NOT require completion of core courses.

REQUIREMENTS:
ART/CSIS/DM 77  Introduction to Digital Media .................... 3 units
CSIS/DM 73  Desktop Publishing - Adobe InDesign ............... 3 units
CSIS 126  Word Processing - MS Word ............................ 2 units
CSIS 132  Intermediate Word Processing - MS Word ............ 2 units

Choose one:
ART/CSIS/DM 114  Digital Media Production (2 units)
JOUR 18A    Working on the Newspaper (2 units)

Choose one:
CSIS/DM 75  PhotoShop I - Adobe PhotoShop (3 units)
ART/CSIS/DM 76  Digital Illustration (3 units)

Total Units Required for Certificate of Proficiency: 15 UNITS
Digital Video Editor Specialist  Certificate of Proficiency

Does NOT require completion of core courses.

REQUIREMENTS:
ART/CSIS/DM 77  Introduction to Digital Media ........................................... 3 units
ART/CSIS/DM 113 Digital Video/Audio ................................................................. 3 units
THEA 98   Special Topics: GavTV Production ...................................................... 1-2 units

Choose one:
ART/CSIS/DM 117     Visual Effects/Motion Graphics (3 units)
ART/CSIS/DM 110    Interactive Animation: Flash (3 units)
MUS 21     Electronic Music/Sound Design (3 units)
THEA/MCTV 16    Television History and Practice (3 units)

......................... 3 units

Choose one:
THEA/MCTV 17A    Television and Video Workshop (3 units)
THEA/MCTV 17B    Television and Video Workshop (3 units)

......................... 3 units

Total Units Required for Certificate of Proficiency: 13-14 UNITS

This certificate will enable a graduate to obtain jobs working as a video/film editor's assistant, sound mixer, or visual effects assistant.

Web Page Production Specialist  Certificate of Proficiency

Does NOT require completion of core courses.

REQUIREMENTS:
CSIS/DM/LIB 6  Web Page Authoring I ............................................................... 2 units
ART/CSIS/DM 77  Introduction to Digital Media ................................................. 3 units
ART/CSIS/DM 110    Interactive Animation: Flash .............................................. 3 units
CSIS 126    Word Processing - MS Word ........................................................... 2 units

Choose one:
ART/CSIS/DM 114   Digital Media Production (2 units)
JOUR 18A   Working on the Newspaper (2 units)

......................... 2 units

Choose one:
CSIS/DM 7  Web Page Authoring II (2 units)
ART/CSIS/DM 85   Web Design I: Dreamweaver (2 units)

......................... 2 units

Choose one:
CSIS/DM 75  Photoshop I - Adobe PhotoShop (3 units)
JOUR 16A   Writing for Media (3 units)

......................... 3 units

Total Units Required for Certificate of Proficiency: 17 UNITS

This certificate will enable a graduate to obtain jobs maintaining web sites or assisting web designer/developer.

Engineering Program
See Physical Science & Engineering: pages 139-140.

Drywall Apprenticeship Program
See Apprenticeships on page 72-73.
**English as a Second Language**

**Certificates of Proficiency**

ESL Intermediate Level  
ESL Advanced Level

The credit ESL Program offers all levels of ESL courses ranging from basic to advanced in the areas of listening, speaking, grammar, reading, and composition. The program provides language skills for students with a variety of goals, from personal enrichment to academic preparation for students who want to pursue higher education in college instructional and/or vocational programs.

In learning the English language, students learn to communicate in areas important to their personal lives, interact with native English speakers, read and understand the main ideas of a text and the supporting details that illustrate them, understand the rules and use of different grammar structures, and write about a topic with support and clarity.

Students in the ESL Program come from a wide variety of educational, cultural, and native language backgrounds and contribute that richness to the study of English as a second language. Because of the multiple factors involved in language learning, progress in the learning of English varies from student to student. The program provides a sequence of courses that challenge students to review and expand skills previously learned in an atmosphere of intensity, professionalism, support, and respect. We take pride in our students and in our program.

Contact:  
(408) 848-4701  
las@gavilan.edu

---

**Overview of ESL Courses**

**Non Credit**

| ESL 777 | ESL 778 |
| ESL 779 | ESL 780 |
| ESL 781 | ESL 782 |

**Vocational**

| ESL 704/A/B |

To move from noncredit to credit ESL classes students must take an ESL assessment.

**Credit - Academic Track**

<table>
<thead>
<tr>
<th>Basic</th>
<th>DAYTIME CLASSES</th>
<th>EVENING CLASSES</th>
</tr>
</thead>
<tbody>
<tr>
<td>510A</td>
<td>521 L/S, 522R, 523GW</td>
<td>527RW, 528L/S</td>
</tr>
<tr>
<td>510B</td>
<td>531 L/S, 532R, 533GW</td>
<td>537RW, 538L/S</td>
</tr>
<tr>
<td>541 L/S, 542R, 543GW</td>
<td>547RW, 548L/S</td>
<td></td>
</tr>
<tr>
<td>Advanced I</td>
<td>552R, 553W</td>
<td>554G</td>
</tr>
<tr>
<td>Advanced II</td>
<td>561 L/S, 562R, 563W</td>
<td>564G</td>
</tr>
</tbody>
</table>

**Supplementary ESL Courses:**

- ESL 546: Intro Computers/ESL  
- ESL 556: Intro Competency/ESL  
- ESL 581: Pronunciation I  
- ESL 582: Pronunciation II  
- ESL 584: Culture through Film  
- ESL 585: Editing for ESL Writers

**Life Skills**

**Vocational Programs**

- ENGL 260  
- ENGL 250

**Academic Programs**

- ACADEMIC PROGRAMS

- VOCATIONAL PROGRAMS
ESL Certificate Options:

**ESL Intermediate Level Certificate of Proficiency**

<table>
<thead>
<tr>
<th>Course</th>
<th>Title</th>
<th>Units</th>
</tr>
</thead>
<tbody>
<tr>
<td>ESL 541</td>
<td>Intermediate Listening/Speaking II</td>
<td>4</td>
</tr>
<tr>
<td>ESL 542</td>
<td>Intermediate Reading/Vocabulary II</td>
<td>3</td>
</tr>
<tr>
<td>ESL 543</td>
<td>Intermediate Grammar/Writing II</td>
<td>5</td>
</tr>
<tr>
<td>Total units for the certificate:</td>
<td>12 UNITS</td>
<td></td>
</tr>
</tbody>
</table>

or

<table>
<thead>
<tr>
<th>Course</th>
<th>Title</th>
<th>Units</th>
</tr>
</thead>
<tbody>
<tr>
<td>ESL 547</td>
<td>Integrated Reading/Grammar III</td>
<td>6</td>
</tr>
<tr>
<td>ESL 548</td>
<td>Integrated Speaking/Listening III</td>
<td>6</td>
</tr>
<tr>
<td>Total units for the certificate:</td>
<td>12 UNITS</td>
<td></td>
</tr>
</tbody>
</table>

**Program Learning Outcomes:** After completing this certificate a student will be able to:

- demonstrate a developing an aural/oral fluency in a variety of contexts.
- demonstrate intermediate level academic/study skills.
- utilize a diversity of reading skills such as skimming, scanning and deciphering new vocabulary.
- write simple, compound and complex sentences and short paragraphs.
- manipulate sentence forms using a variety of verb tenses.
- express opinions and ideas in both oral and written form.

**ESL Advanced Level Certificate of Proficiency**

<table>
<thead>
<tr>
<th>Course</th>
<th>Title</th>
<th>Units</th>
</tr>
</thead>
<tbody>
<tr>
<td>ESL 562</td>
<td>Advanced ESL Reading/Vocabulary II</td>
<td>4</td>
</tr>
<tr>
<td>ESL 563</td>
<td>Advanced ESL Composition II</td>
<td>5</td>
</tr>
<tr>
<td>ESL 564</td>
<td>Advanced ESL Grammar II</td>
<td>5</td>
</tr>
<tr>
<td>Total units for the certificate:</td>
<td>14 UNITS</td>
<td></td>
</tr>
</tbody>
</table>

**Program Learning Outcomes:** After completing this certificate a student will be able to:

- demonstrate a strong aural/oral fluency through one-on-one communication, small group discussion, oral presentations and debates.
- demonstrate advanced level academic/study skills.
- read fiction and nonfiction prose and poetry and utilize a wide range of reading and critical thinking skills.
- write well structured academic paragraphs and essays in a variety of rhetorical patterns.
- express opinions and ideas using increasingly accurate and fluent English.
FIRE TECHNOLOGY

South Bay Regional Public Safety Training Consortium

As a member of the South Bay Regional Public Safety Training Consortium, Gavilan College offers courses for students who are interested in Correctional Officer, Law Enforcement, Reserve Police Officer, Dispatcher, Fire Technology, Probation Officer, or Juvenile Hall Counselor careers. The Consortium is funded by all regional colleges to provide specific vocational training which may require special facilities, special training conditions or is presented outside of the regular schedule of college classes.

The application and registration process is completed at the South Bay Regional Public Safety Training Consortium Center located near the Evergreen Valley College campus in San Jose. Although open to the public, the majority of these courses are intended to serve those “already employed” in these fields. If you have questions about these courses, or if you would like information about a career in any of these programs, please call (408) 270-6458 or visit the webpage at www.theacademy.ca.gov.

Contact: (408) 848-4719 or email cte@gavilan.edu.
GENERAL EDUCATION

Certificates of Achievement

CSU General Education Pattern
Intersegmental General Education Transfer Curriculum (IGETC)

Contact:
(408) 848-4701
las@gavilan.edu
California State University (CSU) General Education Pattern

Certificate of Achievement

AREA A – English Language, Communication and Critical Thinking ........................................... 9 units
Select one course from each category. All courses must be completed with a grade of “C” or better.
A-1 Oral Communication: CMUN 1A, 5, 8 or 10
A-2 Written Communication: ENGL 1A
A-3 Critical Thinking: PHIL 2, 4 or ENGL 1C

AREA B – Scientific Inquiry and Quantitative Reasoning .......................................... 9 units
Once course from each category. The Physical or Life Science course must include a laboratory section (lab courses are underlined)
B-1 Physical Science: ASTR 1; CHEM 1A, 1B, 12A, 12B, 30A, 30B; GEOG 1; GEOL 1, 13; PHYS 1, 2A, 2B, 4A, 4B, 4C;
PSCI 1, 2
B-2 Life Science: AH 8, 9, 15; ANTH 1; BIO 1, 4, 5, 7, 8, 9, 10, 12, 13, 15; ECOL 1
B-3 Laboratory Activity: Lab courses are underlined and included in B-1 and B-2
B-4 Mathematics / Quantitative Reasoning (Grade “C” or better): BUS 11; CSIS 26; ECON 11; MATH 1A, 1B, 1C, 2, 2C, 5, 6, 7, 8A, 8B, 12, 14

AREA C – Arts and Humanities ................................................. 9 units
ENGL 1B: Composition and Literature (3 units) (required)
C-1 Arts (Art, Dance, Music, Theatre) – Choose one course (minimum of two units) from the following list:
ART 1A, 1B, 2A, 3A, 6, 8A, 10A, 13, 14, 25A; CA 25A; CMUN 2; HUM 6, 10; MUS 1A, 1B, 2A, 3A, 4A, 6; THEA 1, 3, 4, 7, 12A, 20
C-2 Humanities (Literature, Philosophy, Foreign Languages) Choose one course from the following list:
ART 11; CHN 1A, B, 2B, 2C, 2E, 2F, 2J, 4A, 4B, 5A, 5B, 9A-C; FRNH 1A, 1B, 2A; HIST 1, 2, 3, 4A, 4B, 5, 6, 7A, 7B, 10, 12; HUM 3, 4, 5, 10, 12; JPN 1A, 1B; JOUR 10; PHIL 1, 3A, 3B, 6, 9; SOC 10; SPAN 1A, 1B, 2A, 2B, 12A, 12B

AREA D – Social Sciences ................................................. 9 units
Select one course from Requirement 1:
Requirement 1: HIST 1, 2; POLS 1
Note: For the baccalaureate degree, one of the following combinations is required: HIST 1 & 2, POLS 1 with either HIST 1 or 2
Select two courses from Requirement 2:
Requirement 2:
D-1 Anthropology and Archaeology: ANTH 2, 3, 5
D-2 Economics: ECON 1, 2, 10
D-3 Ethnic Studies: CMUN 4; HIST 12; HUM 12; SOC 3
D-4 Gender Studies: HIST 5, 6; SOC 4
D-5 Geography: GEOG 2
D-6 History: HIST 1, 2, 3, 4A, 4B, 5, 6, 10, 12, HUM 12
D-7 Interdisciplinary Social and Behavioral Science: AJ 5, ANTH 6, 9; CD 7; CMUN 4, 6; POLS 5, 6; PSYC 6, 7
D-8 Political Science, Government and Legal Institutions: AJ 5; POLS 1, 3, 4, 5
D-9 Psychology: CD 2, 3; PSYC 1A, 1B, 2, 3
D-0 Sociology and Criminology: JOUR 10; SOC 1A, 1B, 3, 4, 10

AREA E – Lifelong Understanding and Self-Development .................................................. 3 units
1. One unit from any Kinesiology (previously Physical Education) activity course
2. Select two units from the following list: AH 3, 11; BIO 11; CD/PSYC 2+3 (acceptable for Area E only if taken in combination); GUID 1, 6; HE 1, 2; PSYC 5; SOC 21

Total Units Required for CSU Certificate of Achievement: ........................................... 39 UNITS

Students will qualify for a Certificate of Achievement in California State University (CSU) General Education by completing the pattern listed here. A minimum of 30 general education units taken in areas A through E must be completed with a grade of “C” or better, including all units in Area A (9 units) and Area B-4 (3-5 units). Students must meet Gavilan College GPA and residency requirements.

Courses listed under more than one discipline or area may be used only once to satisfy an area.
AREA 1 – English Communication .................................. 6-9 units
CSU: Three courses required, one each from A, B, and C
UC: Two courses required, one each from A and B
A: English Composition – ENGL 1A (required)
B: Critical Thinking – ENGL 1C; PHIL 4 (required)
C: Oral Communication – CMUN 1A, 5, 8 or 10 (CSU requirement only)

AREA 2 – Mathematical Concepts and Quantitative Reasoning ............. 3 units
One course: ECON/BUS 11; MATH 1A, 1B, 1C, 2, 2C, 5, 6, 7A, 8A, 8B, 10; CSIS 26

AREA 3 – Arts and Humanities ........................................... 9 units
Three courses, at least one in the Arts and one in the Humanities
Art: ART 1A, 1B, 6; HUM 6; MUS 1A, 1B, 2, 6; THEA 1, 3, 7
Humanities: ENGL 1B, 2B, 2C, 2E, 2F, 2J, 4A, 4B, 5A, 5B; FRNH 2A; HIST 1, 2, 3, 4A, 4B, 5, 6, 7A, 7B, 10, 12; HUM 3, 4, 5, 10, 12; PHIL 1, 3A, 3B, 6, 9; SPAN 2A, 2B, 9A

AREA 4 – Social and Behavioral Sciences .................................. 9 units
Three courses from at least two disciplines or an interdisciplinary sequence:
AJ 5; ANTH 2, 3, 5, 6; CD 2, 3; CMUN 4; ECON 1, 2, 10; GEOG 2; HIST 1, 2, 3, 4A, 4B, 5, 6, 10, 12; HUM 12; JOUR 10; POLS 1, 3, 4, 5; PSYC 1A, 1B, 2, 3; SOC 1A, 1B, 3, 4, 10

AREA 5 – Physical and Biological Science ............................... 7-9 units
Two courses (minimum of 7 units), one Physical Science course and one Biological Science course, one of which must include a lab (lab courses are underlined)
Physical Science: ASTR 1; CHEM 1A, 1B, 12A, 12B, 30A, 30B, GEOG 1, GEOL 1, 13; PSCI 1, 2; PHYS 1, 2A, 2B, 4A, 4B, 4C
Biological Sciences: AH 8, 9, 15; ANTH 1; BIO 1, 4, 5, 7, 8, 9, 10, 12, 13, 15; ECOL 1

Total Units Required for IGETC Certificate of Achievement: .................. 34-39 UNITS

Courses listed in multiple areas shall not be certified in more than one area except for courses in Language Other Than English (see right column), which can be certified in both Areas 3B and 6A.

Students will qualify for a Certificate of Achievement in Intersegmental General Education Transfer Curriculum (IGETC) by completing the pattern listed here. Courses taken in areas 1 through 5 must be completed with a grade of “C” or better. Students must meet Gavilan College GPA and residency requirements.

Supplementary Notes for Transfer Students:

CSU Graduation Requirement in U.S. History, Constitution and American Ideals Not Part of IGETC (May be completed prior to transfer.)

For the baccalaureate degree, CSU requires one of the following combinations:
HIST 1 & 2 or POLS 1 with either HIST 1 or 2

CSU campuses have the discretion whether to allow courses used to satisfy the CSU US History, Constitution and American Ideals (AI) graduation requirement to count in both Area 3B or 4F and to meet the graduation requirement.

AREA 6-A Language Other Than English (UC requirement only).
Proficiency equivalent to two years of high school study in the same language:

<table>
<thead>
<tr>
<th>Language</th>
<th>Code</th>
<th>Courses and Credits</th>
</tr>
</thead>
<tbody>
<tr>
<td>CHN 1B</td>
<td></td>
<td>Elementary Mandarin</td>
</tr>
<tr>
<td>FRNH 1B</td>
<td></td>
<td>Elementary French</td>
</tr>
<tr>
<td>FRNH 2A</td>
<td></td>
<td>Intermediate French</td>
</tr>
<tr>
<td>JPN 1B</td>
<td></td>
<td>Elementary Japanese</td>
</tr>
<tr>
<td>SPAN 1B</td>
<td></td>
<td>Elementary Spanish</td>
</tr>
<tr>
<td>SPAN 2A,B</td>
<td></td>
<td>Intermediate Spanish</td>
</tr>
<tr>
<td>SPAN 12A</td>
<td></td>
<td>Spanish for Spanish Speakers</td>
</tr>
<tr>
<td>SPAN 12B</td>
<td></td>
<td>Spanish for Spanish Speakers - Intermediate/Advanced</td>
</tr>
</tbody>
</table>

Health Science

The Associate's Degree in Health Science is now listed under Biological Science.
The Kinesiology and Athletics Department provides opportunities for students to participate in activity classes, pursue a professional career, transfer and compete in intercollegiate athletics. A variety of activity courses are offered to meet the interest and needs of all students as they fulfill the general education requirements, Kinesiology graduation requirements or their desire to maintain lifetime fitness.

An Associate of Arts Degree with three options of study - Education, Sports Management and Sports Medicine - is available. The AA degree can be obtained by completing a total of 60 units, which includes the 18 - 24 unit major, general education requirements and electives. This program is also designed to allow students to transfer into baccalaureate programs in kinesiology or related areas.

Professional fields include teaching, coaching, athletic training, physical therapy, exercise physiology, motor learning, sports management, sports psychology and personal fitness training. These careers could provide employment with educational institutions, commercial health clubs, private/public fitness and sports centers, recreation departments and sports teams.

Gavilan College offers a variety of intercollegiate sports for men and women. We compete in the Coast Conference which is a member of the California Community College Athletic Association. Students participate for a variety of reasons, including the desire to compete at the intercollegiate level and for the opportunity to earn an academic or athletic scholarship at the 4-year level.

Program Learning Outcomes: After completing the Kinesiology major a student will be able to:

- List and describe 5 career options available in the field of kinesiology.
- Explain the importance of lifetime fitness in today’s society.
- Discuss the concentration area (option) that is their major emphasis of study. This may include the history, role within the work setting and skill demonstration where appropriate (athletic training and CPR).
- Select a sport and explain an appropriate tournament format or describe the basic skills required to participate in that sport.
- Identify the muscle groups and structures of the human body utilized for specific physical activities.
The Education option is for those students wishing to pursue a degree in teaching and/or coaching. It provides a core set of courses designed to allow individuals to earn an AA degree or enter a baccalaureate program leading to a teaching credential.

Students completing the major will have satisfied requirements for Biological Science List 1 and the Kinesiology activity classes in the general education requirements for the A.A. degree.

All courses listed in previous catalogs as PE (Physical Education) are now listed as KIN (Kinesiology.)

**Education Option  A.A. Degree**

All courses listed in previous catalogs as PE (Physical Education) are now listed as KIN (Kinesiology.)

AH 32   Basic Cardiac Life Support or CPR Certification .............. 0-1 unit
AH/BIO 15* Survey of Human Anatomy and Physiology ............ 5 units
HE 1   Health Education ........................................ 3 units
KIN 2   Introduction to Kinesiology .................................. 3 units

Choose one:
- KIN 5   Individual and Dual Sports  (3 units)
- KIN 8   Psychology of Coaching  (3 units)

............................................. 3 units

Choose one of the following:
- KIN 3   Introduction to Athletic Training  (4 units)
- KIN 5   Individual and Dual Sports  (3 units)
- CD/KIN 6   Games and Rhythms for Children  (3 units)
- KIN 7   Theory of Sports Management  (3 units)
- KIN 8   Psychology of Coaching  (3 units)

........................................... 3-4 units

Kinesiology Activity Courses -
A minimum of 3 units from at least 3 different activities (may include Intercollegiate Athletics). 3 units

Total Units Required for Major: 20-22 UNITS

Plus completion of general education requirements: units vary
Total Units Required: minimum of 60 UNITS

* Will satisfy major prerequisites at most 4-year institutions. Students planning to transfer should consult with a counselor.
Sports Management Option  **A.A. Degree**

All courses listed in previous catalogs as PE (Physical Education) are now listed as KIN (Kinesiology.)

<table>
<thead>
<tr>
<th>Course Code</th>
<th>Course Title</th>
<th>Units</th>
</tr>
</thead>
<tbody>
<tr>
<td>AH 32</td>
<td>Basic Cardiac Life Support or CPR Certification</td>
<td>0-1</td>
</tr>
<tr>
<td>HE 1</td>
<td>Health Education</td>
<td>3</td>
</tr>
<tr>
<td>KIN 2</td>
<td>Introduction to Kinesiology</td>
<td>3</td>
</tr>
<tr>
<td>KIN 5</td>
<td>Individual and Dual Sports</td>
<td>3</td>
</tr>
<tr>
<td>KIN 7</td>
<td>Theory of Sports Management</td>
<td>3</td>
</tr>
</tbody>
</table>

Choose one of the following:

- KIN 3 Introduction to Athletic Training (4 units)
- CD/KIN 6 Games and Rhythms for Children (3 units)
- KIN 8 Psychology of Coaching (3 units)
- KIN 80 Business Law (3 units)

Kinesiology Activity Courses: A minimum of 3 units from at least 3 different activities (may include Intercollegiate Athletics). 3-4 units

Total Units Required for Major: 18-20 UNITS

Plus completion of general education requirements: units vary

Total Units Required: minimum of 60 UNITS

**Recommended Electives:** ACCT 20, CSIS 2.

Sports Medicine Option  **A.A. Degree**

All courses listed in previous catalogs as PE (Physical Education) are now listed as KIN (Kinesiology.)

<table>
<thead>
<tr>
<th>Course Code</th>
<th>Course Title</th>
<th>Units</th>
</tr>
</thead>
<tbody>
<tr>
<td>AH 32</td>
<td>Basic Cardiac Life Support or CPR Certification</td>
<td>0-1</td>
</tr>
<tr>
<td>AH/BIO 15</td>
<td>Survey of Human Anatomy and Physiology</td>
<td>5</td>
</tr>
<tr>
<td>HE 1</td>
<td>Health Education</td>
<td>3</td>
</tr>
<tr>
<td>KIN 2</td>
<td>Introduction to Kinesiology</td>
<td>3</td>
</tr>
<tr>
<td>KIN 3</td>
<td>Introduction to Athletic Training</td>
<td>4</td>
</tr>
</tbody>
</table>

Choose one of the following:

- BIO 7 Human Anatomy (4 units)
- AH/BIO 9 Human Physiology (5 units)
- AH/BIO 11 Nutrition (3 units)
- KIN 3A Athletic Training Field Experience (2 units)
- KIN 5 Individual and Dual Sports (3 units)
- KIN 7 Theory of Sports Management (3 units)
- KIN 8 Psychology of Coaching (3 units)

Kinesiology Activity Courses: A minimum of 3 units from at least 3 different activities (may include Intercollegiate Athletics). 2-5 units

Total Units Required for Major: 20-24 UNITS

Plus completion of general education requirements: units vary

Total Units Required: minimum of 60 UNITS

* Will satisfy major prerequisites at most 4-year institutions. Students planning to transfer should consult with a counselor.

The Sports Management option is intended for those students wishing to earn an Associates of Arts Degree and/or transfer to and complete their degree option at a four year university. Career opportunities include working with college sports teams, professional sports teams, corporate and individual health facilities, and in athletic administration.

Students completing the major will have satisfied requirements for the Kinesiology activity classes in the general education requirements for the A.A. degree.

**General Education Requirements:** A student may complete the Gavilan College AA/AS general education pattern (35-44 units), the CSU-GE Breadth pattern (39-52 units) or the IGETC pattern (42-48 units), plus sufficient electives to meet a 60 unit total. See pages 48-56 or see a counselor for details.

**NOTE:** A course may be used to satisfy both general education and major courses. See "Double Counting Rule" on page 46.
Liberal Arts - Areas of Emphasis include:
- Administration of Justice
- Business
- Computer Science & Information Systems
- Elementary Education
- Expressive Arts
- Language Arts & Humanities
- Natural Science
- Social Science (two options)

Liberal Arts - Multiple Subjects

The Associate in Liberal Arts Degree includes a multidisciplinary curriculum encompassing all areas of knowledge in the arts and sciences. It is designed for students who plan to transfer to a University of California or a California State University campus.

The Liberal Arts major allows the student to select an area of emphasis and complete the prerequisite course work necessary for transfer into a particular major. Students must meet Gavilan College GPA and residency requirements.

A comprehensive updated list of the Intersegmental General Education Transfer Curriculum (IGETC) and CSU General Education Breadth Requirements are available in the Counseling Secretary's Office (SC113) or on the Gavilan College website (www.gavilan.edu/catalog/index.html)

AREAS OF EMPHASIS
- Complete a minimum of 18 units from one of the areas of emphasis listed below; where indicated, choose courses from the disciplines listed.
- Students may choose any of the three general education (Gavilan General Education, IGETC or CSU breadth) patterns.
- Courses selected can be used/double counted to fulfill GE areas.
- Students may have to complete additional elective courses to total the 60 overall units necessary for the Associate Degree.

Contact:
(408) 848-4701
las@gavilan.edu
A.A. Degrees in Liberal Arts continued...

Administration of Justice Emphasis

Choose any combination of courses for a minimum of 18 units:


Total Units for Area of Emphasis: 18 UNITS

Plus completion of general education requirements: units vary

Total Units Required: minimum of 60 UNITS

Program Learning Outcomes: Students will demonstrate an understanding of the history, structure, and processes of law enforcement, the judicial system, correctional system and the juvenile justice system.

They will reflect critically on developments in criminal justice policy and the relationship of these policies to the wider political and social environment. Students will demonstrate an ability to effectively communicate orally and in writing the results of their analysis and understanding.

General Education Requirements: A student may complete the Gavilan College AA/AS general education, the CSU-GE Breadth or the IGETC pattern, plus sufficient electives to meet a 60 unit total. See pages 48-56 or see a counselor for details.

**NOTE:** A course may be used to satisfy both general education and major courses. See "Double Counting Rule" on page 46.

Business Emphasis

Choose any combination of courses for a minimum of 6 units:

**Business:** BUS 1

**Economics:** ECON 1, ECON 2, ECON 10

Choose any combination of courses for a minimum of 12 units:

**Accounting:** ACCT 20, ACCT 21

**Business:** BUS 11, BUS 14, BUS 80

**Computer Science & Information Systems:** CSIS 1, CSIS 2, CSIS 2L

**Economics:** ECON 1, ECON 2, ECON 10, ECON 11

Total Units for Area of Emphasis: 18 UNITS

Plus completion of general education requirements: units vary

Total Units Required: minimum of 60 UNITS

The Business emphasis is designed to provide students with a broad background in business.

Program Learning Outcomes: Students will develop a solid foundation in economic theory and practice. They will examine market forces and gain financial management analytical experience. Students will learn to use technical skills to analyze, synthesize and report data so that it can be used to make informed decisions.

General Education Requirements: A student may complete the Gavilan College AA/AS general education, the CSU-GE Breadth or the IGETC pattern, plus sufficient electives to meet a 60 unit total. See pages 48-56 or see a counselor for details.

**NOTE:** A course may be used to satisfy both general education and major courses. See "Double Counting Rule" on page 46.
Computer Science & Information Systems Emphasis

Choose any combination of courses for a minimum of 18 units:

**Computer Science & Information Systems:** CD 12; CSIS 5, CSIS 6, CSIS 7, CSIS 8, CSIS 9, CSIS 10, CSIS 12, CSIS 12L, CSIS 18, CSIS 18L, CSIS 24, CSIS 26, CSIS 43, CSIS 44, CSIS 45, CSIS 46, CSIS 47, CSIS 49, CSIS 51, CSIS 52, CSIS 54, CSIS 54L, CSIS 61, CSIS 84, CSIS 88; DM 6, DM 7, LIB 6

**Digital Media:** ART 74, ART 75, ART 76, ART 77, ART 80, ART 85, ART 113, ART 114; CSIS 73, CSIS 74, CSIS 75, CSIS 76, CSIS 77, CSIS 80, CSIS 85; DM 60 or DM 61, DM 73, DM 74, DM 75, DM 76, DM 77, DM 80, DM 85, DM 113, DM 114

Total Units for Area of Emphasis: 18 UNITS

Plus completion of general education requirements: units vary

Total Units Required: minimum of 60 UNITS

Students will have the opportunity to explore several areas of computer science, including programming, web page design, system administration and desktop publishing.

**Program Learning Outcomes:** Students will develop an appreciation of both the technical and artistic sides of the profession. Students will be able to communicate ideas in a team environment.

Elementary Education Emphasis

**Area A** Complete the following required courses (6 units)
- **Child Development:** CD 8A, CD 8B

**Area B** Choose any combination of courses for a minimum of 6 units:
- **Child Development:** ANTH 9; CD 2, CD 3, CD 7, CD 14A, CD 14B, CD 31, CD 97; PSYC 2, PSYC 3, PSYC 7

**Area C** Choose any combination of courses for a minimum of 6 units:
- **Administration of Justice:** AJ 20
- **Allied Health:** AH 3
- **Art:** CD 25A or ART 25A
- **English:** ENGL 2F
- **History:** HIST 3
- **Mathematics:** MATH 12
- **Kinesiology (previously Physical Education):** CD 6 or KIN 6
- **Theater:** THEA 2A

Total Units for Area of Emphasis: 18 UNITS

Plus completion of general education requirements: units vary

Total Units Required: minimum of 60 UNITS

This emphasis recognizes that teachers play a vital role in the development of children, introducing them to numbers, language, science, and social studies. Elementary teachers facilitate student learning through interactive class discussions, educational activities, “hands-on” learning, and one-on-one assistance. This emphasis offers a core of interdisciplinary and specialized courses that provide students with the knowledge and skills necessary for communicating concepts to children, and an introduction to social, political and economic issues that influence the field of public education.

**Program Learning Outcomes:** Students who complete this emphasis will be able to use their understanding of young children's characteristics, needs and multiple interacting influences to create learning environments that are healthy, respectful, supportive, and challenging for all children. Since students will have experienced actual classrooms with actual children, they will be able to decide if a career in teaching young children is right for them.

**General Education Requirements:** A student may complete the Gavilan College AA/AS general education, the CSU-GE Breadth or the IGETC pattern, plus sufficient electives to meet a 60 unit total. See pages 48-56 or see a counselor for details.

**NOTE:** A course may be used to satisfy both general education and major courses. See “Double Counting Rule” on page 46.
A.A. Degrees in Liberal Arts  continued...

Expressive Arts Emphasis

Choose at least one course from two or more of the areas below for a minimum of 6 units:
Art: ART 1A, ART 1B, ART 6, ART/HIST 21
Music: MUS 1A, MUS 1B
Theater: THEA 1, THEA 3, THEA 7

......................................................... 6 units

Choose a minimum of 3 units from each area below:
Creativity and Innovation: ART 11

......................................................... 12 units

Total Units for Area of Emphasis: 18 UNITS

Plus completion of general education requirements: ................. units vary

Total Units Required: minimum of 60 UNITS

Language Arts & Humanities Emphasis

Choose at least 1 course from each area for a minimum of 18 units: (You may select an additional course from any of the areas to complete the 18 unit minimum requirement.)

Any Communication Course (or course crosslisted with a Communication course): CMUN 1A, CMUN 2, CMUN 4, CMUN 5, CMUN 6, CMUN 8, CMUN 10, CMUN 11, CMUN 129; CSIS 129; POLS 6; PSYC 6, THEA 4

Any Philosophy Course (or course crosslisted with a Philosophy course): PHIL 1, PHIL 2, PHIL 3A, PHIL 3B, PHIL 4, PHIL 6, PHIL 9

English: ENGL 1B, ENGL 2B, ENGL 2C, ENGL 2E, ENGL 2F, ENGL 2J, ENGL 4A, ENGL 4B, ENGL 5A, ENGL 5B, ENGL 9A

Foreign Language: FRNH 1A, FRNH 1B, JPN 1A, JPN 1B; SPAN 1A, SPAN 1B, SPAN 12A, SPAN 12B

Journalism: JOUR 10 or SOC 10, JOUR 16A

Total Units for Area of Emphasis: 18 UNITS

Plus completion of general education requirements: ................. units vary

Total Units Required: minimum of 60 UNITS

The Expressive Arts Emphasis provides the knowledge base and experiences for students interested in the study of cultural and humanistic activities as experienced through the artistic expression of human beings.

Program Learning Outcomes: Students completing this emphasis will be able to critically analyze and interpret the ways in which people through the ages have responded, to themselves and others around them, through artistic and cultural expression. Through a study of art, history and theater, this emphasis will provide students with the ability to recognize, value and nurture aesthetic understanding and incorporate these concepts when constructing value judgments. The foundation of this emphasis is to foster divergent thinking with the aim of optimizing students’ capacity for producing new and innovative ideas.

General Education Requirements: A student may complete the Gavilan College AA/AS general education, the CSU-GE Breadth or the IGETC pattern, plus sufficient electives to meet a 60 unit total. See pages 48-56 or see a counselor for details.

NOTE: A course may be used to satisfy both general education and major courses. See "Double Counting Rule" on page 46.

The Language Arts & Humanities Emphasis provides a knowledge base for students interested in the study of cultural, literary, and artistic expression of human beings. This area of emphasis develops students’ analytical and expressive skills, their ability to read, write and think clearly through coursework that spans over five different disciplines.

Program Learning Outcomes: Students completing this area of emphasis will be able to analyze and interpret the ways in which people through the ages have reflected upon themselves and their place in the world, and the communication of this reflection through language.

General Education Requirements: A student may complete the Gavilan College AA/AS general education, the CSU-GE Breadth or the IGETC pattern, plus sufficient electives to meet a 60 unit total. See pages 48-56 or see a counselor for details.

NOTE: A course may be used to satisfy both general education and major courses. See "Double Counting Rule" on page 46.
Natural Science Emphasis

Choose any combination of courses for a minimum of 18 units. You must select at least one course from Mathematics and one course from one of the Science disciplines:

**Biology:** AH 8, AH 9, AH 15, BIO 1, BIO 4, BIO 5, BIO 7, BIO 8, BIO 9, BIO 15, BIO 21

**Chemistry:** CHEM 1A, CHEM 1B, CHEM 12A, CHEM 12B

**Ecology:** ECOL 1

**Geology:** GEOL 1

**Mathematics:** MATH 1A, MATH 1B, MATH 1C, MATH 2, MATH 2C, MATH 5, MATH 7, MATH 8A, MATH 8B

**Physics:** PHYS 2A, PHYS 2B, PHYS 4A, PHYS 4B, PHYS 4C

Total Units for Area of Emphasis: 18 UNITS

Plus completion of general education requirements: .................................................. units vary
Total Units Required: minimum of 60 UNITS

The Area of Emphasis for Studies in Natural Science recognizes the integrated role that Biology, Chemistry, Physics, and Mathematics play in the description and understanding of our everyday world.

**Program Learning Outcomes:** Employing the scientific method as a basis for evaluating theoretical and laboratory derived information, students will gain an understanding of the biological and/or physical worlds. Students will also gain a working familiarity with mathematics and an understanding of mathematics as it applies to modeling in the sciences and as an elegant stand-alone discipline.

**General Education Requirements:** A student may complete the Gavilan College AA/AS general education, the CSU-GE Breadth or the IGETC pattern, plus sufficient electives to meet a 60 unit total. See pages 48-56 or see a counselor for details.

NOTE: A course may be used to satisfy both general education and major courses. See "Double Counting Rule" on page 46.

Social Science Emphasis

**Option A: Cultural and Historical Social Sciences:**

Choose any combination of courses for a minimum of 18 units:

**Administration of Justice/Political Science/Psychology:** CMUN/POLS/PSYC 6

**Anthropology:** ANTH 1, ANTH 2, ANTH 3, ANTH 5

**Art:** ART 10, ART 21

**Child Development:** CD 5, CD 6; KIN 6

**Economics:** ECON 1, ECON 2

**Geography:** GEOG 2

**History:** HIST 1, HIST 2, HIST 3, HIST 4A, HIST 4B, HIST 5, HIST 6, HIST 7A, HIST 7B, HIST 12, HIST 21; HUM 12

**Political Science:** POLS 1

**Sociology:** SOC 1A, SOC 1B, SOC 3, SOC 4

Total Units for Area of Emphasis: 18 UNITS

Plus completion of general education requirements: .................................................. units vary
Total Units Required: minimum of 60 UNITS

In this emphasis students will analyze theories and concepts related to the development of cultural and historical development of societies. Students will study social science theory and practice to analyze, compare and contrast and synthesize aspects of societies and events from different regions and eras.

**Program Learning Outcomes:** Students completing this emphasis will be able to critically examine contemporary social, economic, and political environments. Through social science methods students will explain the influences individuals, social groups, and governments have upon one another; and will document and evaluate models of social stratification based on class, ethnicity, and gender; and assess their impact.

**General Education Requirements:** A student may complete the Gavilan College AA/AS general education, the CSU-GE Breadth or the IGETC pattern, plus sufficient electives to meet a 60 unit total. See pages 48-56 or see a counselor for details.

NOTE: A course may be used to satisfy both general education and major courses. See "Double Counting Rule" on page 46.
Social Science Emphasis continued

Option B: Behavioral and Organizational Social Sciences:

Choose any combination of courses for a minimum of 18 units:

- **Administration of Justice**: AJ 10, AJ 18
- **Allied Health**: AH 3, AH 15, BIO 15
- **Biology**: AH 15, BIO 15
- **Child Development**: CD 2, CD 3; PSYC 2, PSYC 3
- **Economics**: ECON 1, ECON 2
- **Journalism**: JOUR 10
- **Mathematics**: MATH 5, MATH 6
- **Political Science**: CMUN 6; POLS 1, POLS 3, POLS 4, POLS 6; PSYC 6
- **Psychology**: ANTH 9; CD 7; CMUN 6; POLS 6, PSYC 1A, PSYC 1B, PSYC 6, PSYC 7
- **Sociology**: SOC 1A, SOC 1B, SOC 3, SOC 4, SOC 10, SOC 21

Total Units for Area of Emphasis: 18 UNITS

Plus completion of general education requirements: units vary

Total Units Required: minimum of 60 UNITS

In this emphasis students will analyze theories and concepts related to social and psychological development, and political organizations. Students will study the scientific method and use research methodologies to analyze, compare and contrast, and synthesize psychological, political and social structures.

Program Learning Outcomes: Students who complete this emphasis will be able to use their understanding of behavioral and organizational social sciences to document and evaluate models of personal, social, economic and political dynamics. In addition they will employ social sciences to propose means of resolving problems, and assess methods for making change.
Multiple Subjects

A.A. Degree

**AREA 1 - ENGLISH & COMMUNICATION SKILLS**
- ENGL 1B, 2B, 2C, 2E, 2I, 2J, 4A, 4B, 5A, 5B
- CMUN 1A, 2, 8, 10

Total: 3 units

**AREA 2 - MATHEMATICS & NATURAL SCIENCE**

- **Mathematics**: Any baccalaureate level mathematics
- **Biological Sciences**:
  - ANTH 1
  - BIO 1, 4, 5, 7, 8, 9, 10, 11, 15
  - ECOL 1; AH 8, 9, 11, 15

- **Physical Science**:
  - ASTR 1
  - CHEM 1A, 1B, 12A, 12B, 30A, 30B
  - GEOL 1
  - GEOG 1
  - PHYS 1, 2A, 2B, 4A, 4B, 4C
  - PSCI 1

Total: 3-5 units

**AREA 3 - SOCIAL SCIENCE**
- ANTH 2, 3, 5, 9
- CD 2, 3, 7
- CMUN 4
- ECON 1, 2, 10
- GEOG 2
- HIST 1, 2, 3, 5, 6, 12
- HUM 12
- JOUR 10
- POLS 1, 3, 4
- PSYC 1A, 1B, 2, 3, 7
- SOC 1A, 1B, 3, 4, 10, 21

Total: 2-3 units

**AREA 4 - HUMANITIES & FINE ARTS**
- ART 1, 11, 21
- PHIL 1, 2, 3A, 3B, 4, 6, 9
- HIST 7A, 7B, 21
- HUM 3, 4, 5, 10
- MUS 1
- THEA 1
- SPAN 1A, 1B, 2A, 2B, 12A, 12B

Total: 3-5 units

**AREA 5 - COMPUTER SCIENCE & INFORMATION SYSTEMS**
- CSIS 1, 2

Total: 2-4 units

Minimum of 19 UNITS

**Major Requirements:**
Complete one course from each area. Any remaining units needed to reach a minimum of 19 units may be completed by selecting any course from areas 1-5.

The major will prepare students for many professional programs. Students planning to transfer to a 4-year institution (such as San Jose State University) for the purpose of seeking the Multiple Subjects Teaching Credential (Elementary Education) should complete Allied Health 3 and both Child Development 2 and Child Development 3, and may expect to transfer no more than 7 additional units of Child Development lower division classes as electives. For further advice, consult with an advisor at the intended university and see the “major-to-major” articulation agreement between Gavilan College and that university.

Courses listed under more than one discipline or area may be used to satisfy only one area.

**Recommended Electives:** Any transfer course

**General Education Requirements:**
A student may complete the Gavilan College AA/AS general education, the CSU-GE Breadth or the IGETC pattern, plus sufficient electives to meet a 60 unit total. See pages 48-56 or see a counselor for details.

**NOTE:** A course may be used to satisfy both general education and major courses. See "Double Counting Rule" on page 46.
After completing the Mathematics major, students transferring to a four-year institution will be prepared for additional study in the following areas: actuarial science, applied mathematics, computer science (programming), statistics, theoretical mathematics.

Contact:
(408) 848-4701
las@gavilan.edu

Mathematics A.S. Degree

After completing this degree a student will be able to:
- identify and utilize appropriate mathematical operations in the simplification of expressions and solution of equations.
- compare and contrast various mathematical models and then apply the appropriate model to real world problems.
- describe, compare and contrast various mathematical functions using everyday language.
- describe, compare and contrast various mathematical properties and operations for real and imaginary numbers using everyday language.

Recommended Electives: MATH 5; PHYS 4A, B, C

Program Learning Outcomes:

<table>
<thead>
<tr>
<th>Course</th>
<th>Title</th>
<th>Units</th>
</tr>
</thead>
<tbody>
<tr>
<td>ENGR 5</td>
<td>C++ Scientific Programming</td>
<td>3</td>
</tr>
<tr>
<td>MATH 1A</td>
<td>Single-Variable Calculus and Analytic Geometry</td>
<td>4</td>
</tr>
<tr>
<td>MATH 1B</td>
<td>Single-Variable Calculus and Analytic Geometry</td>
<td>4</td>
</tr>
<tr>
<td>MATH 1C</td>
<td>Multivariable Calculus</td>
<td>4</td>
</tr>
<tr>
<td>MATH 2 *</td>
<td>Linear Algebra</td>
<td>3</td>
</tr>
<tr>
<td>MATH 2C</td>
<td>Differential Equations</td>
<td>3</td>
</tr>
</tbody>
</table>

Total Units Required: 21 UNITS

Plus completion of general education requirements: units vary

Total Units Required: minimum of 60 UNITS

Mathematics majors are encouraged to consult four-year college catalogs during their first semester at Gavilan College. See Gavilan General Education requirements on page 48.

General Education Requirements: A student may complete the Gavilan College AA/AS general education, the CSU-GE Breadth or the IGETC pattern, plus sufficient electives to meet a 60 unit total. See pages 48-56 or see a counselor for details.

NOTE: A course may be used to satisfy both general education and major courses. See "Double Counting Rule" on page 46.
Media Arts Options

The Broadcast TV and Journalism Media Arts Associate's Degree options require a combination of CORE COURSES (below) and additional requirements:

**CORE COURSES:**
- JOUR/SOC 10 Mass Media & Society .......... 3 units
- JOUR 16A Writing for Media ..................... 3 units
- THEA/MCTV 16 Television History and Practice .... 3 units
- THEA /MCTV 17A Television & Video Workshop .... 3 units

Core Courses Unit Total: 12 UNITS

**Broadcast Television Option A.A. Degree**

**REQUIREMENTS:**

**CORE COURSES** (above) .......................... 12 units

**ADDITIONAL REQUIREMENTS** (12 units minimum):
- THEA/MCTV 17B Television and Video Workshop .......... 3 units
- THEA 20 Introduction to Scriptwriting ..................... 3 units

Choose one:
- THEA 14 Stage Production (1-3 units)
- THEA 98 Special Topics: GavTV 18 - Producing (.5-3 units)

..................................................... 0.5-3 units

Choose six (6) units from courses below:
- CMUN 2/THEA 4 Oral Reading (3 units)
- THEA/MCTV 6 Introduction to Audio Production (3 units)
- THEA 14 Stage Production (1-3 units)
- THEA/MCTV 19 Television and Film Acting (3 units)
- ART/CSIS/DM 117 Visual Effects/Motion Graphics (3 units)

..................................................... 6 units

Total Units Required: minimum of 24.5 UNITS

Plus completion of general education requirements: ............... units vary

Total Units Required: minimum of 60 UNITS

The Gavilan College Media Arts Program educates students in multiple forms of media, such as television, print and film. In the program, the history and development of human communication is studied and explored as students critique and create media.

The Media Arts Broadcast Television Degree prepares students for transfer in Media Arts, Mass Communications, film and television studies. Students in Broadcast Television participate in learning experiences that teach skills in pre-production, production and post-production including: writing, acting, camera operation, editing, audio, directing in studio and field production scenarios for television production.

The projects created and produced by students are prepared for broadcast on GavTV-Cable Channel 18, the Gavilan Educational Channel, Blip.TV, You-tube and streaming on the Web. GavTV programming includes: music, theater, dance, arts, sports, news and special events. Original programs aired on the GavTV 18 are: News & Views Live!, Art is Essential, The Gavilan Hour, Gavilan Rams Football and Let’s Ask Alice.

**Program Learning Outcomes:** After completing a Media Arts Broadcast Television Degree a student will be able to:
- perform confidently and safely in set-up and operation of video and audio equipment in live or live to tape studio or field production.
- demonstrate knowledge and skills in digital editing for broadcast television.
- discuss and critique production values in film and television including: lighting, set design, make-up.
- demonstrate and apply best practices in working on a television/video production crew.
- describe and perform the knowledge, skills and abilities related to the production process including: pre-production, production and post-production.

**General Education Requirements:** A student may complete the Gavilan College AA/AS general education, the CSU-GE Breadth or the IGETC pattern, plus sufficient electives to meet a 60 unit total. See pages 48-56 or see a counselor for details.

**NOTE:** A course may be used to satisfy both general education and major courses. See “Double Counting Rule” on page 46.
Broadcast Television **Certificate of Achievement**

Does NOT require completion of core courses.

THEA/MCTV 16  Television History and Practice ........................ 3 units
THEA/MCTV 17A Television and Video Workshop ........................ 3 units
THEA/MCTV 17B Television and Video Workshop ........................ 3 units
THEA/MCTV 19 Television and Film Acting ............................. 3 units
THEA 20  Introduction to Scriptwriting ................................. 3 units

Choose one:

THEA 14  Stage Production  (2 units)
THEA 98 Special Topics: GavTV 18 - Producing (2 units)

Total Units Required for Certificate of Achievement: 17 UNITS

Program Learning Outcomes: After completing this certificate a student will be able to:

- Perform confidently and safely using best practices in set-up and operation of video and audio equipment in live or live to tape studio or field production projects.
- Engage in discussion and critique production values for various television genres.
- Describe and perform pre-production in story development and scriptwriting for television production.
- Perform digital editing during post production for a variety of television programs and projects.

Journalism Option **A.A. Degree**

**REQUIREMENTS:**

**CORE COURSES** (see previous page) ................................. 12 units

**ADDITIONAL REQUIREMENTS** (12 units minimum):

JOUR 18  Working on the Newspaper ................................. 6 units

Choose six (6) units from:

ART/CSIS/DM 85  Web Design I: Dreamweaver (2 units)
CSIS/DM 73  Desktop Publishing - Adobe InDesign (3 units)
CSIS/DM 75  PhotoShop I - Adobe PhotoShop (3 units)
JOUR 16B  Reporting for Media (3 units)
JOUR 18  Working on the Newspaper (2-5 additional units)

Total Units Required: 24 UNITS

Plus completion of general education requirements: ........................ units vary

Total Units Required: minimum of 60 UNITS

Program Learning Outcomes: After completing this degree a student will be able to:

- plan, formulate and compose news stories, requiring them to restate facts, describe people and conditions and explain and report on current events as well as describe and translate constitutionally guaranteed freedom of speech into practical language and define libel and best ethical journalistic practices, differentiating between standard and sub-standard ethics.
- define and apply standard journalistic practices and work with each other to appraise and revise each other’s stories as well as interpret current events, campus organizational structures and human beings to demonstrate a common understanding of news values, choosing and selecting interesting stories to cover.

Students who choose the Journalism option prepare for transfer to four-year institutions in journalism, communications and technical writing.

General Education Requirements: A student may complete the Gavilan College AA/AS general education, the CSU-GE Breadth or the IGETC pattern, plus sufficient electives to meet a 60 unit total. See pages 48-56 or see a counselor for details.

NOTE: A course may be used to satisfy both general education and major courses. See “Double Counting Rule” on page 46.
Music  A.A. Degree

REQUIRED:
MUS 3A  Harmony - Theory - Musicianship ......................................... 4 units
MUS 3B  Harmony - Theory - Musicianship ......................................... 4 units
MUS 4A  Beginning Piano ................................................................. 3 units
MUS 4B  Beginning Piano ................................................................. 2 units

Choose one:
MUS 1A  Music History and Literature (3 units)
MUS 1B  Music History and Literature (3 units)
........................................................................................................... 3 units

Choose one:
MUS 2  History of Jazz and Rock Music (3 units)
MUS 6  Introduction to World Music (3 units)
MUS 7  Songwriting and Composition (3 units)
MUS 16A  Introduction to Audio Recording Techniques (3 units)
MUS 21  Electronic Music/Sound Design (3 units)
........................................................................................................... 3 units

Choose one:
MUS 5A  Intermediate Piano (2 units)
MUS 5B  Intermediate Piano (2 units)
MUS 5C  Advanced Piano (2 units)
MUS 5D  Advanced Piano (2 units)
MUS 8A  Beginning Voice (2 units)
MUS 8B  Beginning Voice (2 units)
MUS 9B  Guitar (2 units)
MUS 12  Vocal Ensemble (2 units)
MUS 14A  Instrumental Ensemble (2 units)
........................................................................................................... 2 units

Total Units Required: 21 UNITS

Plus completion of general education requirements: 17  units vary
Total Units Required: minimum of 60 UNITS

Recommended Electives: MUS 2, MUS 6, MUS 7, MUS 16A, MUS 21

Program Learning Outcomes: After completing this degree a student will be able to:
- hear, identify, and work conceptually with the elements of music: rhythm, harmony, melody, and structure.
- demonstrate proficiency in areas of performance appropriate to his/her needs and interests, including historical and modern music
- identify styles of music, including historical periods, composers, performers, stylistic traits, cultural influences and performance practices.
- operate recording studio equipment using live and taped performance.
- demonstrate basic proficiency in reading and writing of music notation.

General Education Requirements: A student may complete the Gavilan College AA/AS general education, the CSU-GE Breadth or the IGETC pattern, plus sufficient electives to meet a 60 unit total. See pages 48-56 or see a counselor for details.

NOTE: A course may be used to satisfy both general education and major courses. See “Double Counting Rule” on page 46.
The Music Department maintains a place at Gavilan College as a subject of broad and passionate interest to performers, composers and theorists. At Gavilan College all these form a community dedicated to furthering a knowledge and love of music. The Music Department at Gavilan College offers a wide range of courses for all students. While many of our students have gone on to have professional careers in music, others have used their study as an enriching foundation for other pursuits. The Gavilan College Music Department is structured around a traditional musical foundation. Specific areas of focus are piano, guitar, vocal performance, electronic music and digital recording. The music curriculum provides a program for the students who wish to (1) pursue an advanced degree in music, (2) broaden a general knowledge of music, (3) develop performance skills, (4) become a professional musician, (5) work in a recording studio, (6) prepare for a career as music educators. Experienced instructors create an environment that both fulfills general education requirements and offers students exemplary preparation for transfer into both university and vocational level programs.

### Music Composition and Production Certificate of Achievement

**REQUIRED:**

<table>
<thead>
<tr>
<th>Course Code</th>
<th>Course Title</th>
<th>Units</th>
</tr>
</thead>
<tbody>
<tr>
<td>MUS 3A</td>
<td>Harmony - Theory - Musicianship</td>
<td>4</td>
</tr>
<tr>
<td>MUS 3B</td>
<td>Harmony - Theory - Musicianship</td>
<td>4</td>
</tr>
<tr>
<td>MUS 4A</td>
<td>Beginning Piano</td>
<td>3</td>
</tr>
<tr>
<td>MUS 7</td>
<td>Songwriting and Composition</td>
<td>3</td>
</tr>
</tbody>
</table>

Choose one:

- MUS 16A Introduction to Audio Recording Techniques (3 units)
- MUS 21 Electronic Music/Sound Design (3 units)

- 3 units

Choose one:

- MUS 1A Music History and Literature (3 units)
- MUS 1B Music History and Literature (3 units)
- MUS 2 History of Jazz and Rock Music (3 units)
- MUS 6 Introduction to World Music (3 units)

- 3 units

Total Units for Certificate of Achievement: 20 UNITS

This program prepares students for a creative career in the music industry. The program has an entrepreneurial and creative focus emphasizing an industry trend requiring artists to be responsible for complete project development. Students engaged in compositional study enjoy the freedom to explore the organization of sound and music into different structures of expression. Engaged in personal study with acclaimed composition faculty, students write works for a variety of media - from solo instrument and large ensemble works to electronic music. An emphasis is placed on the study of the various musical traditions of the world and the relevance of those traditions to personal experience.

The same skill set also prepares students for careers in specialized areas of the music industry such as digital audio workstation operator, recording engineer, producer, composer, arranger, songwriter, sound designer, artist manager, distributor, and marketing representative.
The Philosophy Discipline offers learners a unique opportunity to take a variety of courses from different philosophical perspectives, yet all rich in the voices of global cultures and religions. Philosophy concerns the investigation of the fundamental questions of the human experience, such as “Is knowledge possible?”, “Do we have free will?”, “What is the meaning of life?” to “Is social justice possible?” In attempting to answer these questions, the discipline of Philosophy has provided the foundation of many other fields of inquiry, from psychology to sociology, law, and even business. At the core, Philosophy develops critical thinking skills, but in applying those skills, learners realize that philosophical inquiry has spanned the development of science, the birth of civilizations, religious and ethical debates about when life begins and ends, principles of justice, environmental issues, animals rights, global warming, immigration, and even ideas about art, music, and the economy. Ultimately, Philosophy provides a learner pursuing any major an opportunity to enhance critical thinking skills while engaging in the analysis of arguments and theories about issues that has spanned the ages and still affect contemporary life.

Career opportunities for Philosophy majors:

Learners who have taken Philosophy courses are good candidates for jobs requiring liberal arts education. Employers often look for people who can solve problems and can write and think critically. These are skills that philosophy enhances. Examples of careers include: communications, education, journalism, law, management and business, and politics.

Program Learning Outcomes: After completing Philosophy courses, a student will be able to:

- Analyze and critique an argument
- Effectively argue in support of an opinion
- Write an argumentative essay
- Define key terms of philosophical vocabulary relevant to the course
- Distinguish different areas of philosophy
- Understand some of the diverse assumptions and the values and attitudes that shape our lives

Contact:
(408) 848-4701
las@gavilan.edu

Classical and Contemporary World Philosophies and Religions

Certificate of Proficiency

PHIL 1 Introduction to Philosophy .................... 3 units

Choose nine (9) units from the list below:

PHIL 3A Ethical Theory (3 units)
PHIL 3B Contemporary Ethics (3 units)
PHIL 6 World Religions (3 units)
PHIL 9 Philosophy of Religion (3 units)
PHIL 23 Independent Study (1-3 units)

................................. 9 Units

Total Units Required for Certificate of Proficiency: 12 UNITS

Physical Education

The Associate’s Degrees in Physical Education are now listed under Kinesiology.
The A.S. degree in Engineering and Physical Science has two options.

The **Physical Science and Engineering** option provides a broad background in the sciences. Students completing this degree will have learned to integrate math and science to solve problems, have proficiency in laboratory techniques and analysis of experimental data, and will have demonstrated an ability to communicate effectively using written, oral, electronic, and graphical means. This degree will prepare students interested in transferring to four-year colleges or universities to pursue degrees in any of the natural or physical sciences (astronomy, chemistry, geology or geophysics, general science, meteorology, oceanography, physics, etc). Students electing this major are encouraged to consult the catalogs of the four-year schools to which they plan to transfer early in their Gavilan course work as requirements for transfer vary by institution.

Engineers are responsible for designing and building everything that we use – airplanes, roads, machines, computers, buildings, artificial limbs.

The **Physical Science and Engineering: General Engineering** option constitutes the lower-division core classes suggested by the Engineering Liaison Council (ELC), an organization composed of representatives from two- and four-year colleges and universities. Students completing this degree will have learned to identify various engineering problems and integrate math and science to solve them, have proficiency in the design, execution, analysis, and interpretation of experiments, demonstrate familiarity with the engineering design process, and will have demonstrated an ability to communicate effectively using written, oral, electronic, and graphical means. This degree will prepare students to transfer to four-year colleges or universities to pursue degrees in any of the engineering disciplines (aeronautical, chemical, civil, computer, electrical, industrial, materials, mechanical, etc.). Students electing this major are encouraged to consult the catalogs of the four-year schools to which they plan to transfer early in their Gavilan course work as requirements for transfer vary by institution.

**General Education Requirements:** A student may complete the Gavilan College AA/AS general education, the CSU-GE Breadth or the IGETC pattern, plus sufficient electives to meet a 60 unit total. See pages 48-56 or see a counselor for details.

**Contact:**
(408) 848-4701
las@gavilan.edu

Please note that not all courses required for the degree are offered on a regular basis.
Physical Science and Engineering  

**A.S. Degree**

<table>
<thead>
<tr>
<th>Course</th>
<th>Description</th>
<th>Units</th>
</tr>
</thead>
<tbody>
<tr>
<td>CHEM 1A/B</td>
<td>General Chemistry</td>
<td>5-5</td>
</tr>
<tr>
<td>MATH 1A/B</td>
<td>Single-Variable Calculus &amp; Analytic Geometry</td>
<td>4-4</td>
</tr>
<tr>
<td>MATH 1C</td>
<td>Multivariable Calculus</td>
<td>4</td>
</tr>
<tr>
<td>MATH 2</td>
<td>Linear Algebra</td>
<td>3</td>
</tr>
<tr>
<td>MATH 2C</td>
<td>Differential Equations</td>
<td>3</td>
</tr>
<tr>
<td>ENGR 5</td>
<td>C++ Scientific Programming</td>
<td>3</td>
</tr>
<tr>
<td>PHYS 4A/B/C</td>
<td>Physics for Scientists and Engineers</td>
<td>4-4-4</td>
</tr>
</tbody>
</table>

43 units

**Program Learning Outcomes:** After completing this degree a student will be able to:

- demonstrate appropriate integration of math and science to solve real-world problems.
- demonstrate appropriate design and execution of experiments, as well as analysis and interpretation of the data.
- demonstrate an ability to communicate clearly using written, oral, electronic, and graphical means.

Students are strongly advised to consult the appropriate college catalogs and their counselors to determine the specific lower division requirements if you are transferring to a 4-year institution.

* There are times when a course listed as a requirement for a major or certificate cannot be offered in a reasonable timeframe. Course substitutions and waivers will be considered by the department. Please contact the department chairperson. This information is available from the Office of Instruction - (408) 848-4761

**General Education Requirements:** A student may complete the Gavilan College AA/AS general education, the CSU-GE Breadth or the IGETC pattern, plus sufficient electives to meet a 60 unit total. See pages 48-56 or see a counselor for details.

**NOTE:** A course may be used to satisfy both general education and major courses. See “Double Counting Rule” on page 46.

---

Physical Science and Engineering: General Engineering  

**A.S. Degree**

<table>
<thead>
<tr>
<th>Course</th>
<th>Description</th>
<th>Units</th>
</tr>
</thead>
<tbody>
<tr>
<td>CHEM 1A/B</td>
<td>General Chemistry</td>
<td>5-5</td>
</tr>
<tr>
<td>ENGL 1A</td>
<td>Composition</td>
<td>3</td>
</tr>
<tr>
<td>ENGR 1</td>
<td>Engineering Graphics</td>
<td>3</td>
</tr>
<tr>
<td>ENGR 2</td>
<td>Statics</td>
<td>3</td>
</tr>
<tr>
<td>ENGR 3</td>
<td>Electrical Circuits, Devices and Systems</td>
<td>3</td>
</tr>
<tr>
<td>ENGR 4</td>
<td>Properties of Materials</td>
<td>3</td>
</tr>
<tr>
<td>ENGR 5</td>
<td>C++ Scientific Programming</td>
<td>3</td>
</tr>
<tr>
<td>MATH 1A/B</td>
<td>Single-Variable Calculus &amp; Analytic Geometry</td>
<td>4-4</td>
</tr>
<tr>
<td>MATH 1C</td>
<td>Multivariable Calculus</td>
<td>4</td>
</tr>
<tr>
<td>MATH 2</td>
<td>Linear Algebra</td>
<td>3</td>
</tr>
<tr>
<td>MATH 2C</td>
<td>Differential Equations</td>
<td>3</td>
</tr>
<tr>
<td>PHYS 4A/B/C</td>
<td>Physics for Scientists and Engineers</td>
<td>4-4-4</td>
</tr>
</tbody>
</table>

58 UNITS

**Program Learning Outcomes:** After completing this degree a student will be able to:

- identify, compare and contrast engineering problems and demonstrate integration of math and science to solve them.
- demonstrate appropriate design and execution of experiments, as well as analyze and interpret the data.
- demonstrate the engineering design process by designing a system, component or process to meet a desired need.
- demonstrate an ability to communicate clearly using written, oral, electronic and graphical means.

Students are strongly advised to consult the appropriate college catalogs and their counselors to determine the specific lower division requirements if you are transferring to a 4-year institution.

* There are times when a course listed as a requirement for a major or certificate cannot be offered in a reasonable timeframe. Course substitutions and waivers will be considered by the department. Please contact the department chairperson. This information is available from the Office of Instruction - (408) 848-4761

**General Education Requirements:** A student may complete the Gavilan College AA/AS general education, the CSU-GE Breadth or the IGETC pattern, plus sufficient electives to meet a 60 unit total. See pages 48-56 or see a counselor for details.

**NOTE:** A course may be used to satisfy both general education and major courses. See “Double Counting Rule” on page 46.
Social Science with Emphasis in Community Studies Certificate of Achievement

REQUIRED:
- CMUN 10 Small Group Communication ........................................ 3 units
- SOC 1B Social Problems .......................................................... 3 units

Choose one:
- POLS 27/PSYC 27 Contemporary Leadership (3 units)
- POLS/PSYC/CMUN 6 Introduction to Conflict Resolution (3-4 units)

................................................................. 3-4 units

Choose 6 Units in Electives:
- HIST 3 History of California (3 units)
- HIST 5 Women’s Lives in Early U.S. History (3 units)
- HIST 6 Women’s Lives in Recent U.S. History (3 units)
- HIST/HUM 12 Mexican American Cultural History (3 units)

................................................................. 6 units

Total units for Certificate of Achievement: 15-16 UNITS

Program Learning Outcomes: After completing this certificate students will be able to:
- practice and analyze democratic civic engagement.
- demonstrate and evaluate relationships between local and national issues, movements, and ideas as they relate to local communities.
- demonstrate a range of skills including: research, documentation, analysis, evaluation, communication, contextualization, teamwork, observation, and cultural competency by relating social science concepts and theories to issues of importance to local communities.
- identify, develop, use, and assess tools and methods for community change and social justice.
Social Science with Emphasis in Community Studies  
**A.A. Degree**

**MAJOR REQUIREMENTS:**
ANTH 3  Introduction to Cultural Anthropology .......................... 3 units  
SOC 1B  Introduction to Social Problems ................................. 3 units  

Choose one:  
POLS/PSYC 27  Contemporary Leadership (3-4 units)  
POLS/PSYC/CMUN 6  Introduction to Conflict Resolution (3 units)  

Choose one:  
HIST 3  History of California (3 units)  
HIST/HUM 12  Mexican-American Cultural History (3 units)  

Elective Courses: Additional units (8-9) from list below to complete a total of 21 units:  
ART 14  Beginning Mural Painting (3 units)  
CMUN 4  Intercultural Communication (3 units)  
CMUN 10  Small Group Communication (3 units)  
ECOL 1  Conservation of Natural Resources (4 units)  
GEOG 2  Cultural Geography (3 units)  
GEOL 13  Environmental Geology (3 units)  
HE 2  Human Sexuality (3 units)  
HIST 2  United States History Reconstruction to the Present (3 units)  
HIST 3  History of California if not taken above (3 units)  
HIST 5  Women's Lives in Early United States History (3 units)  
HIST 6  Women's Lives in Recent United States History (3 units)  
HIST/HUM 12  Mexican American Cultural History if not taken above (3 units)  
POLS 1  Introduction to Political Science (3 units)  
POLS/PSYC/CMUN 6  Introduction to Conflict Resolution if not taken above (3 units)  
POLS/PSYC 27  Contemporary Leadership if not taken above (2-4 units)  
SOC 1A  Introduction to Sociology (3 units)  
SOC 3  Sociology of Race, Ethnicity and Cultural Identity (3 units)  
SOC 4  Sociology of Men and Women (3 units)  


!!! Total Units Required for Major: 21 UNITS !!!!

Plus completion of general education requirements: units vary  

Total Units Required: minimum of 60 UNITS

**NOTE:** A course may be used to satisfy both general education and major courses. See "Double Counting Rule" on page 46.

**General Education Requirements:** A student may complete the Gavilan College AA/AS general education, the CSU-GE Breadth or the IGETC pattern, plus sufficient electives to meet a 60 unit total. See pages 48-56 or see a counselor for details.
Social Science with Emphasis in Global Studies  A.A. Degree

Majors in Social Science with Emphasis in Global Studies gain durable tools to enrich and empower the global community by promoting social justice. By taking courses in anthropology, cultural geography, economics, history, political science, psychology, and sociology, students become competent to analyze, contextualize, and change global realities. In the process, students create linkages between local and national issues, movements, and ideas as they relate to the rest of the world, and prepare both for a variety of careers and for all-important responsibilities as global citizens.

Students completing this AA degree will be able to transfer to four-year colleges or enter professions in public service, policy, law, international relations, international business, politics, environmental policy, media, anthropology, history, economics, urban planning, political science, and more.

Program Learning Outcomes  After completing this degree students will:

► define and analyze global citizenship strategies in the context of globalization.
► demonstrate and evaluate relationships between local and national issues, movements, and ideas as they relate to the global community.
► demonstrate a range of skills including: research, documentation, analysis, evaluation, communication, contextualization, teamwork, observation, and cultural competency by relating social science concepts and theories to issues of global importance.
► identify, develop, use, and assess methods and tools to bring about social justice.

Requirements listed on following page.
MAJOR REQUIREMENTS:

Area A

SOC 1A  Introduction to Sociology 3 units

Choose one:
  ANTH 3  Cultural Anthropology 3 units
  GEOG 2  Cultural Geography 3 units
  .................................................. 3 units

Choose one:
  HIST 4A  History of World Societies, Before 1500 3 units
  HIST 4B  History of World Societies, 1500 to Present 3 units
  .................................................. 3 units

Choose one:
  POLS 3  Introduction to Comparative Politics 3 units
  POLS 4  Introduction to International Relations 3 units
  .................................................. 3 units

Area B

Choose at least five (5) units from one of the foreign languages below:

French:
  FRNH 1A  Elementary French (5 units)
  FRNH 1B  Elementary French (5 units)

Italian:
  ITAL 8A  Conversational Italian (3 units)
  ITAL 8B  Conversational Italian (3 units)

Japanese:
  JPN 1A  Elementary Japanese (5 units)
  JPN 1B  Elementary Japanese (5 units)

Spanish:
  SPAN 1A  Elementary Spanish (5 units)
  SPAN 1B  Elementary Spanish (5 units)
  SPAN 2A  Intermediate Spanish (5 units)
  SPAN 2B  Intermediate Spanish (5 units)
  SPAN 8A  Conversational Spanish (3 units)
  SPAN 8B  Conversational Spanish (3 units)
  SPAN 8C  Conversational Spanish (3 units)
  SPAN 8D  Conversational Spanish (3 units)
  SPAN 12A  Spanish for Spanish Speakers (5 units)
  SPAN 12B  Spanish for Spanish Speakers (5 units)
  .................................................. 5 units

Area C

Choose six (6) units from the following list of electives:

  ANTH 1  Introduction to Physical Anthropology (3 units)
  ANTH 3  Introduction to Cultural Anthropology (3 units)
  ANTH 5  Magic/Witchcraft and Religion (3 units)
  ART 10A  Cultural History of Ceramics (3 units)
  ART/HIST 21  Ancient Americas: A History through Art (3 units)
  CMUN 4  Intercultural Communication (3 units)
  ECOL 1  Conservation of Natural Resources (4 units)
  ECON 1  Principles of Macro Economics (3 units)
  ECON 2  Principles of Micro Economics (3 units)
  ENGL 2B  American Ethnic Literature (3 units)
  GEOG 2  Cultural Geography (3 units) if not taken in Area A
  GEOL 13  Environmental Geology (3 units)
  HIST 4A  History of World Societies, Before 1500 (3 units)
  if not taken in Area A
  HIST 4B  History of World Societies, 1500 to Present (3 units)
  if not taken in Area A
  PHIL 6  Comparative Religions (3 units)
  POLS 3  Introduction to Comparative Politics (3 units)
  if not taken in Area A
  POLS 4  Introduction to International Relations (3 units)
  if not taken in Area A
  POLS/PSYC/CMUN 6  Introduction to Conflict Resolution (3 units)
  CD 7/PSYC 7/ANTH 9  Cultural Context of Child and
  Family in a Diverse Society (3 units)
  SOC 3  Sociology of Race, Ethnicity and Cultural Identity (3 units)
  SOC 4  Sociology of Women and Men (3 units)
  .................................................. 6 units

Total Units Required for Major (Areas A-C): 23 UNITS

Plus completion of general education requirements: units vary

Total Units Required: minimum of 60 UNITS

NOTE: A course may be used to satisfy both general education and major courses. See "Double Counting Rule" on page 46.

General Education Requirements: A student may complete the Gavilan College AA/AS general education, the CSU-GE Breadth or the IGETC pattern, plus sufficient electives to meet a 60 unit total. See pages 48-56 or see a counselor for details.
The Spanish Department at Gavilan College is committed to providing an environment that makes learning Spanish fun, exciting, yet challenging at the same time. The study of Foreign Languages not only enables a person to communicate in another language but also opens new doors to different cultures. Many of our students study Spanish to fulfill general education requirements, some study because of the need to communicate at work and many simply study Spanish for the enjoyment of learning another language.

The Spanish Department at Gavilan offers a wide range of courses for all students. Our department focuses in the areas of reading, writing, speaking and listening as well as having a basic awareness of different Hispanic cultures. The Spanish curriculum provides a program for non-native and native students who wish to (1) pursue an advanced degree in Spanish, (2) broaden a general knowledge of Spanish, (3) develop listening and speaking skills, (4) prepare for a career as a Spanish educator. Our experienced instructors create an environment that both fulfills General Education Requirements and offers students exemplary preparation for transfer into both university and vocational level programs.

**Program Learning Outcomes:**

Upon completion of the program, students will demonstrate:

- basic proficiency in speaking, reading and writing in Spanish.
- ability to identify elements of Spanish: verb tenses, grammar.
- ability to identify different Hispanic cultures, including historical periods, colloquialisms, food, dress and dialects.
- ability to analyze and discuss Hispanic literature including authors from different Hispanic cultures.

**Spanish Non-Native Speakers Option 1**

**A.A. Degree or Certificate of Achievement**

To receive an **ASSOCIATE’S DEGREE** complete:

- **REQUIREMENTS** listed below.
- **GENERAL EDUCATION REQUIREMENTS** (Gavilan, IGETC or CSU pattern), plus sufficient electives to meet a 60 unit total. See pages 48-56.

**REQUIREMENTS:**

<table>
<thead>
<tr>
<th>Course</th>
<th>Title</th>
<th>Units</th>
</tr>
</thead>
<tbody>
<tr>
<td>SPAN 1A</td>
<td>Elementary Spanish</td>
<td>5</td>
</tr>
<tr>
<td>SPAN 1B</td>
<td>Elementary Spanish</td>
<td>5</td>
</tr>
<tr>
<td>SPAN 2A</td>
<td>Intermediate Spanish</td>
<td>5</td>
</tr>
<tr>
<td>SPAN 2B</td>
<td>Intermediate Spanish</td>
<td>5</td>
</tr>
<tr>
<td><strong>Total</strong></td>
<td><strong>Units Required:</strong></td>
<td><strong>20 UNITS</strong></td>
</tr>
</tbody>
</table>

**Program Learning Outcomes:** After completing this degree a student will be able to:

- converse in Spanish at the basic level.
- demonstrate proper conjugation of verbs; in the written and oral form.

**General Education Requirements:** A student may complete the Gavilan College AA/AS general education, the CSU-GE Breadth or the IGETC pattern, plus sufficient electives to meet a 60 unit total. See pages 48-56 or see a counselor for details.

**NOTE:** A course may be used to satisfy both general education and major courses. See “Double Counting Rule” on page 46.
Spanish Non-Native Speakers Option 2

**A.A. Degree or Certificate of Achievement**

Students with two years of high school Spanish are advised to take this option.

**To receive an ASSOCIATE’S DEGREE complete:**

- **REQUIREMENTS** listed below.
- **GENERAL EDUCATION REQUIREMENTS** (Gavilan, IGETC or CSU pattern), plus sufficient electives to meet a 60 unit total. See pages 48-56.

**REQUIREMENTS:**

- **SPAN 1B** Elementary Spanish ........................................ 5 units
- **SPAN 2A** Intermediate Spanish ...................................... 5 units
- **SPAN 2B** Intermediate Spanish ...................................... 5 units

Choose one course from following list:

- **SPAN 12A** Spanish for Spanish Speakers **(5 units)**
- **SPAN 12B** Spanish for Spanish Speakers - Intermediate/Advanced **(5 units)**
- **SPAN 23** Independent Study **(3 units minimum)**

Total Units Required: **18-20 UNITS**

**Program Learning Outcomes:** After completing this degree a student will be able to:

- converse in Spanish at the basic level.
- demonstrate proper conjugation of verbs; in the written and oral form.

**General Education Requirements:** A student may complete the Gavilan College AA/AS general education, the CSU-GE Breadth or the IGETC pattern, plus sufficient electives to meet a 60 unit total. See pages 48-56 or see a counselor for details.

**NOTE:** A course may be used to satisfy both general education and major courses. See “Double Counting Rule” on page 46.

---

Spanish Non-Native Speakers Option 3

**A.A. Degree or Certificate of Achievement**

Students with four years of high school Spanish are advised to take this option.

**To receive an ASSOCIATE’S DEGREE complete:**

- **REQUIREMENTS** listed below.
- **GENERAL EDUCATION REQUIREMENTS** (Gavilan, IGETC or CSU pattern), plus sufficient electives to meet a 60 unit total. See pages 48-56.

**REQUIREMENTS:**

- **SPAN 2A** Intermediate Spanish ...................................... 5 units
- **SPAN 2B** Intermediate Spanish ...................................... 5 units

Choose a minimum of 8 units from following list:

- **SPAN 12A** Spanish for Spanish Speakers **(5 units)**
- **SPAN 12B** Spanish for Spanish Speakers - Intermediate/Advanced **(5 units)**
- **SPAN 23** Independent Study **(3 units minimum)**

Total Units Required: **18 UNITS**

**Program Learning Outcomes:** After completing this degree a student will be able to:

- converse in Spanish at the basic level.
- demonstrate proper conjugation of verbs; in the written and oral form.

**General Education Requirements:** A student may complete the Gavilan College AA/AS general education, the CSU-GE Breadth or the IGETC pattern, plus sufficient electives to meet a 60 unit total. See pages 48-56 or see a counselor for details.

**NOTE:** A course may be used to satisfy both general education and major courses. See “Double Counting Rule” on page 46.
Spanish Native Speakers Option 4  

**A.A. Degree or Certificate of Achievement**

Students with native fluency can take this option

---

**To receive an ASSOCIATE’S DEGREE** complete:

- **REQUIREMENTS** listed below.
- **GENERAL EDUCATION REQUIREMENTS** (Gavilan, IGETC or CSU pattern), plus sufficient electives to meet a 60 unit total. See pages 48-56.

**REQUIREMENTS:**

- SPAN 12A  
  Spanish for Spanish Speakers ........................................ 5 units
- SPAN 12B  
  Spanish for Spanish Speakers - Intermediate/Advanced ........... 5 units
- SPAN 23  
  Independent Study ....................................................... 2 units

Choose 2 courses from following list:

- ART 14  
  Beginning Mural Painting  (3 units)
- HIST/HUM 12  
  Mexican American Cultural History  (3 units)
- THEA 3  
  El Teatro Campesino  (3 units)

... 6 units

**Total Units Required:** 18 UNITS

---

**Program Learning Outcomes:** After completing this degree a student will be able to:

- converse in Spanish at the basic level.
- demonstrate proper conjugation of verbs; in the written and oral form.

**General Education Requirements:** A student may complete the Gavilan College AA/AS general education, the CSU-GE Breadth or the IGETC pattern, plus sufficient electives to meet a 60 unit total. See pages 48-56 or see a counselor for details.

**NOTE:** A course may be used to satisfy both general education and major courses. See "Double Counting Rule" on page 46.
Students enrolled in Theatre and Television degrees gain self confidence, creativity and teamwork skills through class projects and performances.

Theatre and Television production in the college environment allows us to create and learn through a shared artistic experience. The creation of Theatre, Performance and Television is an important cultural and social link between the Gavilan Campus and the South Valley communities.

The Theatre and Television Program offers three different associate’s degrees: Acting, Technical Production and Television. Descriptions of each, including program learning outcomes, are included on the following pages.
Acting Option  

**A.A. Degree**

**REQUIREMENTS:**

**CORE COURSES** (listed on page previous page): ......................................................... 13 units

**ADDITIONAL REQUIREMENTS** (11 unit minimum):

- **THEA 13 B-D Actor’s Workshop** ................................................................. 3-9 units

Choose two of the following four courses:

- CMUN 2/THEA 4  Oral Reading  (3 units)
- THEA 2B  Children’s Theatre Repertory  (2-3 units*)
- THEA 12B  Fundamentals of Acting and Performance  (3 units)
- THEA/MCTV 19  Television and Film Acting  (3 units)

........................................... 4-6 units

Choose additional units from the courses listed below to complete the unit minimum requirement:

- MUS 8A-D  Beginning/Intermediate Voice  (2-2-2-2 units)
- THEA 7  Theatre Appreciation  (3 units)
- THEA 11  Dance and Movement for the Theatre  (2 units)

........................................... 0-4 units

**Total Units Required:**  minimum of 23 UNITS

Plus completion of general education requirements:  ............... units vary

**Total Units Required:**  minimum of 60 UNITS

**NOTE:** A course may be used to satisfy both general education and major courses. See “Double Counting Rule” on page 46.

**General Education Requirements:** A student may complete the Gavilan College AA/AS general education, the CSU-GE Breadth or the IGETC pattern, plus sufficient electives to meet a 60 unit total. See pages 48-56 or see a counselor for details.

---

The Acting Option is designed to give a sound basic knowledge in acting and public performance. Students take a variety of courses including Theatre History (THEA1) and Stage Production (THEA 14). Gavilan offers a variety of performance related courses including Acting (THEA 12 a/b), Children’s Theatre (THEA 2A/B) and Actor’s Workshop (THEA 13) – our spring production course. For those interested in educational theatre, the program also offers hands on experience through the spring Arts Back in the Classroom (ABC) Internship Program.

Acting students perfect teamwork skills and gain self confidence through projects and public performances. Acting and theatre shows one how to take risks, how to focus and concentrate, and the tremendous power of commitment to a project or a play. Studying acting allows one to change themselves, using their own personal experiences to create new characters and existences.

The Acting option prepares students for a career in the public eye, whether onstage, in front of a classroom or television camera, or making presentations for large groups or conventions. Students completing the Acting Option are also prepared to transfer to a four year B.A. program in Acting or Performing Arts. Gavilan theatre art students have recently been accepted for transfer to San Jose State, Cal State Hayward, U.C. Davis and U.C. Berkeley.

**Program Learning Outcomes:** after completing this degree the student will be able to:

- describe significant movements or genres in theatre history, and to elaborate on their social and cultural significance.
- work effectively in a team, having developed collaboration and teamwork skills through class exercises, assignments and performances.
- articulate the differences in theatrical styles and modes of creation. Students participate in both the organic creative process (in which the students participate in the creation of the performance or play) and the more traditional approaches to theatre and performance using an established or already created text.
- discuss and critique theatrical performances, articulating the playwright’s view and director’s interpretation of the text. Students can evaluate the various technical elements of the production (costume, sets, lights & sound), to determine whether they support or detract from the production and text.
- demonstrate practical knowledge regarding the responsibilities of the different technical and creative jobs related to theatre and theatre production.
- master fundamental concepts and vocabulary relating to acting through class exercises and public performances.
Technical Production Option  

**A.A. Degree**

**REQUIREMENTS:**

**CORE COURSES** (listed on page 148): ........................................ 13 units

**ADDITIONAL REQUIREMENTS:**

THEA 15  Introduction to Design for Stage, Film and Television .............. 3 units

Choose one of the classes listed below:
- CMUN 2/THEA 4  Oral Reading (3 units)
- THEA 2B  Children’s Theatre Repertory (2-3 units*)
- THEA 12B  Fundamentals of Acting and Performance (3 units)
- THEA/MCTV 19  Television and Film Acting (3 units)
- ........................................... 2-3 units

Choose eight units from classes listed below:
- ART 2A  Two Dimensional Design/Form and Color (2-3 units*)
- THEA 7  Theatre Appreciation (3 units)
- ART 8A  Photography (3 units)
- ART 10A/B  Cultural History of Ceramics/Ceramics (3/3 units)
- ART 12A/B  Sculpture (3/2 units)
- ART 13  Three Dimensional Design (3 units)
- ART 14  Stage Production (1-3 units)
- Any Music performance course or any Computer Graphics & Design course (1-3 units)
- ............................................. 8 units

**Total Units Required:**  minimum of 26 UNITS

Plus completion of general education requirements: ..................... units vary

**Total Units Required:**  minimum of 60 UNITS

---

**NOTE:** A course may be used to satisfy both general education and major courses. See "Double Counting Rule" on page 46.

**General Education Requirements:** A student may complete the Gavilan College AA/AS general education, the CSU-GE Breadth or the IGETC pattern, plus sufficient electives to meet a 60 unit total. See pages 48-56 or see a counselor for details.

---

**Program Learning Outcomes:** Students completing this degree will:

- master vocabulary and a working knowledge regarding the different technical and creative jobs related to theatre and theatre production.
- develop creative proficiency in designing sets, costumes, lights or sound for Gavilan productions.
- work effectively in a team, having developed collaboration and teamwork skills through class exercises, assignments and performances.
- describe significant movements or genres in theatre history, and to elaborate on their social and cultural significance.
- discuss and critique theatrical performances, evaluating the various technical elements of the production (costume, sets, lights & sound), to determine whether they support or detract from the production and text.

---

The Technical Production Option is designed to provide a foundation for those interested in pursuing a career in Design and Technical careers in the entertainment industry, as well as those interested in becoming involved in creating live theatre in their community.

The degree offers practical courses in stagecraft (THEA 14), Introduction to design (THEA 15) as well as many opportunities for students to become involved in creative process of mounting live theatrical productions and events at Gavilan. Hands on experience in technical production is emphasized in the Gavilan Theatre Arts Program, including experience in stage management, lights, sound, costume & makeup, as well as scenic painting and construction.

Career opportunities for a graduate of the Technical Production Option include jobs at theatre facilities as well as convention and recreational centers. While most professional companies prefer further education (BAs or MAs), there are lucrative careers with the touring companies of live performances and musical events for specialists in technical theatre.
Television Performance Option  A.A. Degree

Requirements:

Core Courses (listed on page 148): .................................................... 13 units

Additional Requirements:

THEA/MCTV 16  Television History and Practice .................................... 3 units
THEA/MCTV 17A  Television and Video Workshop .......................... 3 units
THEA/MCTV 19  Television and Film Acting .............................. 3 units

Choose one or more:

THEA/MCTV 17B Television and Video Workshop (3 units)
THEA 20  Introduction to Scriptwriting (3 units)
HUM 25A  Film Production (3 units)

.................................................. 3-9 units

Total Units Required: .................................................. 25-31 UNITS

Plus completion of general education requirements: ........................................ units vary

Total Units Required: .................................................. minimum of 60 UNITS

Program Learning Outcomes: After completing this degree/certificate a student will be able to:

- perform confidently and safely in set-up and operation of video and audio equipment in live or live to tape studio or field production.
- demonstrate knowledge and skills in digital editing for broadcast television.
- discuss and critique production values in film and television including: lighting, set design, make-up.
- demonstrate and apply best practices in working on a television/video production crew.
- describe and perform the knowledge, skills and abilities related to the production process including: pre-production, production and post-production.
- identify key movements in theatre history, and to elaborate on their social and cultural significance.
- develop teamwork skills through class exercises, assignments and performances

The Gavilan Theatre and Television Program opens the doors for students to become producers, actors, writers, editors and directors for television/video/film production.

Students in the Gavilan Television program participate in learning experiences that teach skills in pre-production, production and post-production including: writing, acting, camera operation, editing, audio, directing in studio and field production scenarios for television production.

The projects created and produced by students are prepared for broadcast on GavTV-Cable Channel 18, the Gavilan Educational Channel, Blip.TV, You-tube and streaming on the Web. GavTV programming includes: music, theater, dance, arts, sports, news and special events. Original programs aired on the GavTV 18 are: News & Views Live!, Art is Essential, The Gavilan Hour, Gavilan Rams Football and Let’s Ask Alice.

Academic pathways for an AA degree in Television Performance may lead to a Bachelor of Arts in Dramatic and Teledramatic Arts, in addition to degrees in Cinema and Film.

General Education Requirements: A student may complete the Gavilan College AA/AS general education, the CSU-GE Breadth or the IGETC pattern, plus sufficient electives to meet a 60 unit total. See pages 48-56 or see a counselor for details.

NOTE: A course may be used to satisfy both general education and major courses. See “Double Counting Rule” on page 46.

Gainful Employment Statistics for Certificate

Name of Program: (if different than the CIP program description) CA in THEA TV Performance
Program Length: (in years) 1.0
# of units/credits required for program: 17
Total Tuition and Required Fees for the entire program completed in normal time:
CA Resident  CA Nonresident
$ 654  $ 3,714
Total estimated costs for books and supplies for the entire program:
$ 1,620
Total room and board charges for living on campus:
College does not offer on-campus living.

For more information visit the Gavilan College Gainful Employment website at http://www.gavilan.edu/gainful_employment. Fees based on fall 2011 per-unit rates.