

HARTNELL COLLEGE DEGREES AND CERTIFICATES

Program	Degree Associate Certificate	Program	Degree Associate Certificate
Addiction Studies	AA	English for Multilingual Speakers	
Administration of Justice for Transfer	AS-T	Beginning	
Administration of Justice	AS	Low Intermediate	
Advanced Automotive Technology	AS	Intermediate	
Advanced Diesel Technology	AS	High Intermediate	
Agriculture Business for Transfer	AS-T	Advanced	
Agriculture Plant Science for Transfer	AS-T	Engineering	AS
Agricultural Mechatronics	AS	Engineering Fundamentals	
Foundations of Agricultural Mechatronics		English for Transfer	AA-T
Agriculture with an Emphasis	AA	Environmental Science for Transfer	AS-T
Business Emphasis		Film, Television, and Electronic Media	AS-T
Production Emphasis		First Line Supervisor	
Food Safety		General Studies: Arts and Humanities	AA
Small Farm		General Studies: Social and Behavioral Sciences	AA
Sustainable Crop Management		General Studies: STEM	AA
Astronomy	AS	Geology for Transfer	AS-T
Basic English		High School Equivalency	
Biology for Transfer	AS-T	History for Transfer	AA-T
Biology	AS	Kinesiology for Transfer	AA-T
Business Administration 2.0 for Transfer	AS-T	Kinesiology	AS
Business office Technology:		Intersegmental General Education Transfer (IGETC)	
Bookkeeping		Law, Public Policy and Society for Transfer	AA-T
Business Information Worker Level 1		Liberal Arts: Pathway to Health Sciences	AA
Business Information Worker Level 2		Mathematics for Transfer	AS-T
Information Processing	AS	Music for Transfer	AA-T
Chemistry for Transfer	AS-T	Music	AA
Chicanx Studies	AA	Nursing:	
Communication Studies 2.0 for Transfer	AA-T	Registered Nursing	AS
Computer Science for Transfer	AS-T	Vocational Nursing	AS
Computer Science and Information Systems:		Photography	AA
Computer Science Option	AS	Physics for Transfer	AS-T
Cisco Certified Network Associate		Political.R0sciencePhysics for Transfer	

ADDICTION STUDIES (AA.ADD)

ASSOCIATE OF ARTS

Required Major Courses (31 units)

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ADDICTION STUDIES (CT.ADD)

CERTIFICATE OF ACHIEVEMENT

Required Major Courses (27 units)

ADMINISTRATION OF JUSTICE

PROGRAMS

- f* Associate in Science for Transfer (ATS).
- f* Associate of Science (A.S.)
- f* Certificate of Achievement

DESCRIPTION

The Associate in Science Degree in Administration of Justice Transfer provides a clearly articulated curricular track for students who wish to transfer to baccalaureate Administration of Justice, Criminal Justice, or Criminology degree programs at a California State University (CSU) campus. This degree provides the

ADMINISTRATION OF JUSTICE (AST.ADJ)

ASSOCIATE IN SCIENCE FOR TRANSFER

Program Outcomes Upon successful completion of this program a student will be able to:

1. Analyze the legal system and its components (3 units) 2. Apply the law to the facts of a case (3 units) 3. Explain the role of the courts in the legal system (3 units) 4. Identify the sources of law (3 units) 5. Describe the legal process (3 units) 6. Explain the role of the legal system in society (3 units) 7. Apply the law to the facts of a case (3 units) 8. Explain the role of the courts in the legal system (3 units) 9. Identify the sources of law (3 units) 10. Describe the legal process (3 units) 11. Explain the role of the legal system in society (3 units)

Required Major Courses (6 units)

- F ADJ1 –Introduction to Administration of Justice 3.0
- F ADJ3 –Concepts of Criminal Law 3.0

Major Electives A (Complete 6 units)

- F ADJ2 – Community Relations & the Justice System 3.0
- F ADJ4 – Criminal Evidence 3.0
- F ADJ5 – Criminal Court Process 3.0
- F ADJ8 – Criminal Investigation 3.0
- F ADJ10 – Juvenile Procedure 3.0

Major Electives B (Complete 6 units)

- F ADJ10 –Juvenile Procedures 3.0
- F ADJ51 –Criminology 3.0
- F MAT-13 –Elementary Statistics 4.0
- F SOG1 –Introduction to Sociology 3.0
- F PSY-2 General Psychology 3.0

SUBTOTAL: 18 UNITS

General Education - Required Courses

Students must complete one of the following General Education Plans:

- CSUGE (see page 78) 39 units
- IGETC (see page 80) 37 units

Students can double-count required courses and courses for General Education

Electives (Courses Numbered 99) required when degree units plus GE units total fewer than 60.

TOTAL: 60 UNITS

ADMINISTRATION OF JUSTICE (AS.ADJ)

ASSOCIATE OF SCIENCE

Criminal Justice	Complete 3 courses from ADJ8, ADJ10, ADJ30, ADJ33, ADJ51
Paralegal/Legal Assistant	Complete ADJ25, ADJ34, and ADJ36; complete as a general elective BUS Legal Environment of Business

Required Major Courses (21 units)

F ADJ-1 -Introduction to Administration of Justice	3.0
F ADJ-2 -Community Relations & the Justice System	3.0
F ADJ-3 -Concepts of Criminal Law	3.0
F ADJ-4 -Criminal Evidence	3.0
F ADJ-5 -Criminal Court Process	3.0
F ADJ-11 -Law Enforcement Report Writing	3.0
F ADJ21A -Narcotics and Dangerous Drugs	3.0

Major Electives (Complete 9 units)

F ADJ-8 -Criminal Investigation	3.0
F ADJ-10 -Juvenile Procedures	3.0
F ADJ-25 -Introduction to Paralegal/Legal Assistantship	3.0
F ADJ-30 -Sexual Assault Investigation	3.0
F ADJ-33 -Constitutional Law for Criminal Justice	3.0
F ADJ-34 -Civil Litigation	3.0
F ADJ-36 -Legal Research and Writing	3.0
F ADJ-51 -Criminology	3.0
F ADJ-102 -PC 832 Arrest and Firearms	3.5

SUBTOTAL: 30 UNITS

General Education Required Courses

Students must complete one of the following General Education Plans:

HCCD G (See page 76)

- F English composition F Oral communication and Critical thinking
- F Mathematical Concepts and Quantitative Reasoning
- F Arts and Humanities
- F Social and Behavioral Sciences
- F Physical and Biological Sciences
- F Ethnic Studies
- F Lifelong Learning and Self Development

ADMINISTRATION OF JUSTICE (CT.ADJ)

CERTIFICATE OF ACHIEVEMENT

Required Major Courses (21 units)

ADVANCED AUTOMOTIVE TECHNOLOGY

PROGRAM

f Associate of Science (A.S.)

DESCRIPTION

The Advanced Automotive Technology Program is designed to provide students with the skills and knowledge necessary to succeed as technicians in a professional auto repair shop. The curriculum provides classroom and hands-on learning experience in a state-of-the-art laboratory which provides students with the opportunity to apply the basic theories of automotive technology. Diagnosis and repair procedures performed on vehicles enable students to develop the skill levels required for placement in the automotive technology industry. Additionally, the program also offers Snap certifications that are industry recognized.

TRANSFER PREPARATION

Courses that fulfill major requirements for an associate degree may differ from those needed to prepare for transfer. Students who plan to transfer to a four-year college or university should schedule an appointment with a Hartnell College counselor to develop a student education plan before beginning their program.

TRANSFER RESOURCES

www.ASSIST.org CSU and UC Articulation Agreements and Major Search Engine

CSU System Information
<http://www2.calstate.edu>

FINANCIAL AID

Paying for the cost of a college education requires a partnership among parents, students and the college. As the cost of higher education continues to rise we want you to know that Hartnell College offers a full array of financial aid programs, federal loan programs, and fee waivers.

<https://www.hartnell.edu/students/fa/net-price-calculator.html>

LEADS TO CAREER OPPORTUNITIES SUCH AS:

- f* Automotive Mechanic
- f* Diesel Service Technician
- f* Shop Foreman
- f* Small Engine Mechanic
- f* Tractor Engine Mechanic
- f* Transmission Specialist
- f* Truck Technician

ADVANCED AUTOMOTIVE TECHNOLOGY (AS.AAT)

ASSOCIATE OF SCIENCE

Required Major Courses (44 units)

F	AAF100– Introduction to Automotive Repair	4.0
F	AAF101– Engine Rebuild	4.0
F	AAF110– Climate Control	4.0
F	AAF120– Electrical and Electronic Systems	4.0
F	AAF121–	

ADVANCED DIESEL TECHNOLOGY

ADVANCED DIESEL TECHNOLOGY (ASADT)

ASSOCIATE OF SCIENCE

Required Major Courses (44 units)

F	ADT-100- Diesel Engine Technology	4.0
F	ADT-101- Diesel Engine Rebuild	4.0
F	ADT-110- Electrical and Electronic Systems	4.0
F	ADT-111 –Electrical Systems and Controls	4.0
F	ADT-120 –Climate Control	4.0
F	ADT-121 –Preventative Maintenance	4.0
F	ADT-130 –Brake Systems	4.0
F	ADT-131 –Steering and Suspension Systems	4.0
F	ADT-140 –Power Drivetrain	4.0
F	ADT-141 –Automatic Transmissions	4.0
F	BUS-43 – Business Information Systems and Info Literacy	4.0

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AGRICULTURAL MECHATRONICS

PROGRAMS

- f Associate of Science Degree
- f Certificate of Achievement

DESCRIPTION

The Associate's Degree in Agricultural Mechatronics will prepare students to work as a skilled mechatronics technician in agriculture. Students will learn how to install, repair, calibrate, and troubleshoot mechatronics or electromechanical systems, including automation and robotics equipment focusing on indoor value-added food processing. Students will have the opportunity to earn third-party industry certifications from OSHA, NCCER, and NC3 (Festo, Snap-On, Starrett, Greenlee, Rigid, Trane, Lincoln, 3M, and more). Additionally, students may have transfer opportunities to pursue an undergraduate degree in Ag Systems Management

The Foundations of Agricultural Mechatronics Certificate of Achievement will introduce fundamental theory and skills used to perform the tasks of a skilled maintenance mechanic who works with mechatronics, or electro-mechanical systems, including automation and robotics equipment in both indoor value-added food processing and outdoor automated farming and harvesting. Students will have the opportunity to earn third-party industry certifications from OSHA, NCCER, and NC3 (Festo, Snap-On, Starrett, Greenlee, Rigid, Trane, Lincoln, 3M, and more). Students will also be prepared to pursue the Agricultural Mechatronics Associates Degree.

LEADS TO CAREER OPPORTUNITIES SUCH AS:

- x Industrial Machinery Mechanics
- x Electro-Mechanical Technician
- x Robotics Technician

FOUNDATION OF AGRICULTURAL MECHATRONICS (CT.MECHA)

CERTIFICATE OF ACHIEVEMENT

Required Major Courses (10 units)

F	MFGT-110, Industrial Safety	2.0
F	MFGT-111A, Fundamentals of Agricultural Mechatronics A	2.0
F	MFGT-111B, Fundamentals of Agricultural Mechatronics B	2.0
F	MFGT-112A, Intermediate Agricultural Mechatronics A	2.0
F	MFGT-112B, Intermediate Agricultural Mechatronics B	2.0

Major Electives: Select 2 courses (Complete 6 u()Tj

F

AGRICULTURE BUSINESS

PROGRAM

AGRICULTURE BUSINESS TRANSFER

ASSOCIATE IN SCIENCE FOR TRANSFER

Required Major Courses (3 units)

F	ABT90 – Soil Science	3.0
F	ABT53 – Agribusiness Economics	3.0
F	ECG1 – Principles of Macroeconomics	3.0
F	MAT-13 – Elementary Statistics	4.0

Major Electives (Complete ABT5)

F	ABT49 – Introduction Agriculture Business	3.0
F	ABT52 – Sales & Service in Agribusiness	3.0
F	ABT	

AGRICULTURE PLANT SCIENCE

PROGRAM

f Associate in Science for Transfer (ATS).

DESCRIPTION

The Associate in Science in Agriculture Plant Science for Transfer degree aligns with the CSU Bachelor of Science in Plant Science. The Associate in Science in Agriculture Plant Science for Transfer degree is designed to provide students with the common core of lower division courses required to transfer and pursue a baccalaureate degree in Plant Science. For detailed requirements for individual four-year institutions students should contact the transfer institution and meet with a counselor for specific transfer course requirements in their major.

TRANSFER PREPARATION

Courses that fulfill major requirements for an associate degree may differ from those needed to prepare for transfer. Students who plan to transfer to a four-year college or university should schedule an appointment with a Hartnell College counselor to develop a student education plan before beginning their program.

TRANSFER RESOURCES

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FINANCIAL AID

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LEADS TO CAREER OPPORTUNITIES SUCH AS:

- f* Agronomist
- f* Biotechnologist
- f* Field Advisor
- f* Greenhouse Manager
- f* Soil Scientist

AGRICULTURE PLANT SCIENCE FOR TRANSFER (ST.APS)

AGRICULTURE WITH AN AREA OF EMPHASIS

PROGRAMS

- f* Associate of Science (A.S.)
- f* Certificates of Achievement

DESCRIPTION

The Associate of Science degree in Agriculture is intended students interested in a wide range of career and educational pathways. Those who are interested in farm management, harvest operations, agriculture research, and other areas of production agriculture would benefit from this degree. Several areas of emphasis

AGRICULTURE WITH AN AREA OF EMPHASIS

ASSOCIATE OF SCIENCE

Required Major Courses—Complete ALL (13-16 units)

F	ABT58 –Agriculture Laws and Regulations	3.0
F	ABT90 –Soil Science	3.0
F	ABT92 –Plant Science	3.0
F	ABT99 –Occupational Cooperative Work Experience (3 units recommended)	1.0-3.0
F	ABT57 –Agriculture Computer Applications	3.0
	OR	
	BUS43 –Business Information Systems and Information Literacy	4.0
	OR	
	BUS50 –Introduction to PC Applications	4.0

Required Major Courses—Complete ONE AREA OF EMPHASIS

AGRICULTURE BUSINESS

The Agriculture Business Emphasis is intended for students interested in entrepreneurship, or as a foundation for transfer to a four-year college or university to pursue a higher degree in agriculture or related field.

- F AGRICULTURE BUSINESS (16 units)
 - o Complete: ABT49, and ABT53, and ABT110
 - o Complete 2 courses ABT

HORTICULTURE TECHNICIAN

AGRICULTURE BUSINESS ~~ACT~~

CERTIFICATE OF ACHIEVEMENT

Required Major Courses (24 units)

F ABT110– Careers in Agriculture and Technology	2.0
F ABT49– Introduction to Agriculture Business	3.0
F ABT54 –Agriculture Marketing	3.0
F ABT58– Agriculture Laws & Regulations	3.0
F ABT90– Soil Science	3.0
F ABT92– Plant Science	3.0
F ABT99– Cooperative Work Experience	1.0-3.0
F ABT57– Agriculture Computer Applications	3.0

OR

BUS43– Business Info Systems and Info Literacy

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AGRICULTURE PRODUCTION (CT.AGRP)

CERTIFICATE OF ACHIEVEMENT

Required Major Courses (15-18 units)

F	ABT-110 – Careers in Agriculture and Technology	2.0
F	ABT-58 – Agriculture Laws and Regulations	3.0
F	ABT-90 – Soil Science	3.0
F	ABT-92 – Plant Science	3.0
F	ABT-99 – Cooperative Work Experience	1.0-3.0
F	ABT-57 – Agriculture Computer Applications	3.0
	OR	
	BUS-43 – Business Information Systems and Info Literacy	4.0
	OR	
	BUS-50 – Introduction to PC Applications	4.0

Major A Electives (Complete 6 units)

F	ABT-91 – Irrigation Practices and Materials	3.0
F	ABT-95 – Introduction to Small Fruit Science	3.0
F	ABT-96 – Vegetable Crop Production	3.0
F	ABT-97 – Vineyard Production & Management	3.0
F	ABT-98 – Fertilizers & Plant Nutrition	3.0

Major B Electives (Complete 6 units)

F	ABT-41 – Pe	
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FOOD SAFETY (A.C.F.S)

CERTIFICATE OF ACHIEVEMENT

Required Major Courses (12 units)

F	ABT58– Agriculture Laws and Regulations	3.0
F	ABT130– Introduction to Food Safety	1.5
F	ABT131– Agricultural Practices for Food Safety	1.5
F	ABT132– Food Safety Management	1.5
F	ABT133– Facility Management for Food Safety	1.5
F	ABT134– Environmental Effects on Food Borne	1.5
F	ABT135– Introduction to Food Microbiology	1.5

TOTAL: 12 UNITS

FINANCIAL AID

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SMALL FARM (CT.AGSF)

CERTIFICATE OF ACHIEVEMENT

The Small Farm Operation and Management Certificate is intended for students interested in becoming entrepreneurs in the area of crop production. Students will learn the foundation skills for farming and agriculture business from the ground up. Students will learn in an actual small farm production environment with a focus on organic production systems. Students may use this emphasis as a foundation to start their own business or obtain skills and knowledge to work in industry. This certificate contains all the required major coursework for an AS in Agriculture with an Emphasis in Agriculture Small Farm Operation and Management. Several courses in the Small Farm Operation and Management emphasis are taught at the ALBA Facility, 1700 Old Stage Road, Salinas.

Program Outcomes Upon successful completion of this program student will be able to:

- f demonstrate problem-solving techniques and critical thinking skills while engaged in a crop production environment.
- f prepare and deliver business documents and use math skills in an appropriate form, format, and language essential for career success in a crop production setting.
- f prepare a detailed business and marketing plan for an entrepreneurial agricultural business.
- f distinguish and propose inputs and controls needed to produce a consistently healthy crop in an area of study.
- f demonstrate professional and personal development of work habits and safety practices

Required Major Courses (27 units)

F	ABT58 – Agriculture Laws and Regulations	3.0
F	ABT90 – Soil Science	3.0
F	ABT92 – Plant Science	3.0
F	ABT94 – Agriculture Enterprise Project	2.0
F	ABT99 – Cooperative Work Experience	1.0-3.0
F	ABT57 – Agriculture Computer Applications	3.4
	OR	
	BUS43 – Business Information Systems and Information Literacy	
	OR	
	BUS50 – Introduction PC Applications	
F	ABT101 – Organic Vegetable Production	1.5
F	ABT102 – Organic Field Production Methods	1.5
F	ABT103 – Agriculture Whole Farm Planning and Recordkeeping for Small Farms	1.5
F	ABT104 – Agriculture Business Development for New Organic Farmers	1.5
F	ABT105 – Marketing Opportunities and Growth for Organic Farming	1.5
F	ABT130 – Introduction to Food Safety	1.5

Restricted Major Electives, Group A (units - Select two courses)

F	ABT95 – Introduction to Small Fruit Science	3.0
F	ABT96 – Vegetable Crop Production	3.0
F	ABT97 – Vineyard Production and Management	3.0
F	ABT98 – Fertilizers and Plant Nutrition	3.0

Restricted Major Electives, Group B (Complete 3 units)

F	ABT41 – Pesticide Applicator Certification Training	3.0
F	MFGT70 – Introduction to Mechanized Agriculture	3.0
F	MFGT71 – Agricultural and Industrial Equipment Operation	3.0
F	MFGT75 – Agricultural Machinery Management	3.0
F	ABT80 – Introduction to Sustainable Agriculture and Food	3.0
F	ABT81 – Integrated Pest Management Principles in Entomology	3.0
F	ABT82 – Integrated Pest Management Principles in Weed Science	3.0
F	ABT83 – Integrated Pest Management Principles in Plant Pathology	3.0
F	ABT93 – Product Processing & Cooling	3.0
F	ABT160 – Introduction to Agriculture	3.0
F	ABT131 – Agricultural Practices for Food Safety	1.5
F	ABT135 – Introduction to Food Microbiology	1.5

TOTAL 33-36 UNITS

FINANCIAL AID

Paying for the cost of a college education requires a partnership among parents, students and the college. As the cost of higher education continues to rise we want you to know that Hartnell College offers a full array of financial aid programs, federal loan programs, and fee waivers.

<https://www.hartnell.edu/students/fa/net-price-calculator.html>

SUSTAINABLE CROP MANAGEMENT (C.T.AGS)

CERTIFICATE OF ACHIEVEMENT

FINANCIAL AID

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<https://www.hartnell.edu/stud>

Required Major Courses (21-22 units)

F	ABT58 –Agriculture Laws and Regulations	3.0
F	ABT80 –Introduction to Sustainable Agriculture and Food	3.0
F	ABT83 –Integrated Pest Management Principles in Plant Pathology	3.0
F	ABT90 –Soil Science	3.0
F	ABT92 –Plant Science	3.0
F	ABT99 –Cooperative Work Experience	1.0-3.0
F	ABT57 –Agriculture Computer Applications	3-4
	OR	
	BUS43 –Business Information Systems and Information Literacy	
	OR	
	BUS50 –Introduction PC Applications	

Restricted Major Electives (Complete 6 units)

All restricted Major Electives courses are recognized by the California Department of Pesticide Regulation as qualifying toward a California state Pest Control Advisers (PCA) license.

F	ABT81 –Integrated Pest Management Principles in Entomology	3.0
F	ABT82 –Integrated Pest Management Principles in Weed Science	3.0
F	ABT93 – Product Processing & Cooling	3.0
F	ABT95 –Introduction to Small Fruit Science	3.0
F	ABT96 –Vegetable Crop Production	3.0
F	ABT97 –Vineyard Production and Management	3.0
F	ABT98 –Fertilizers and Plant Nutrition	3.0
F	ABT160 –Introduction to Agriculture	3.0
F	ABT101 –Organic Vegetable Production	1.5
F	ABT102 –Organic Field Production Methods	1.5
F	MFGT70 –Introduction to Mechanized Agriculture	3.0

TOTAL 27-28 UNITS

ASTRONOMY

PROGRAM

Associate of Science (A.S.)

DESCRIPTION

TRANSFER PREPARATION

TRANSFER RESOURCES

FINANCIAL AID

LEADS TO CAREER OPPORTUNITIES SUCH AS:

ASTRONOMY (AS.AST)

ASSOCIATE OF SCIENCE

Required Major Courses (34 units)

- F
- F
- F
- F
- F
- F
- F
- F
- F
- F

Major Electives (Complete 1 course – 4-5 units)

- F
- F
- F

SUBTOTAL: 38-39 UNITS

General Education – Required Courses

Students must complete one of the following General Education Plans:

HCCD GE (see page 76)

- F
- F

BASIC COMPUTER LITERACY

PROGRAM

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BIOLOGY

PROGRAMS

- f* Associate in Science for Transfer (ATS).
- f* Associate of Science (A.S.)

DESCRIPTION

The Biology program offers degrees that are intended to create interest and enrichment through the study of living organisms and the basic biological principles. The major courses provide a strong background in the biological sciences for students transferring to four-year institutions who are interested in the s30.6 (t)0aa

BIOLOGY FOR TRANSFER (ASTBIO)

ASSOCIATE IN SCIENCE FOR TRANSFER

RequiredMajor

BIOLOGY (AS.BIO)

ASSOCIATE OF SCIENCE

Program Outcomes Upon successful completion of this program a student will be able to:

- f apply the scientific method to problem solving, devising a research plan, and evaluating data and findings.
- f describe the structure and function of biological molecules, cells, organelles, and tissues and organ systems of plants and animals.
- f apply the principles of heredity at the molecular, cellular, and organismal levels.
- f explain the mechanism and evidence of evolution through natural selection.
- f apply taxonomic principles to the classification of organisms.
- f describe the flow of energy within organisms and within ecosystems.

Required Major Courses (33 units)

F BIO-1 – Fundamental Biological Concepts	5.0
F BIO-2 – General Zoology	5.0
F BIO-3 – General Botany	5.0
F CHM-1A – General Chemistry I	5.0
F CHM-1B – General Chemistry II	5.0
F MAT-13 – Elementary Statistics	4.0
F MAT-25 – Pre-Calculus	4.0

Major Electives (Select 1 series 8-12 units)

F PHY-2A/2B – College Physics I & II	8.0
F PHY-4A/4B/4C – General Physics I, II, III	12.0

Recommended Major Electives (None Required)

F CHM-12A – Organic Chemistry I	5.0
F CHM-12B – Organic Chemistry II	5.0
F MAT-3A – Analytic Geometry and Calculus I	4.0
F MAT-3B – Analytic Geometry and Calculus II	4.0
F MAT-3C – Analytic Geometry and Calculus III	4.0

SUBTOTAL: 41-45 UNITS

General Education – Required Courses

Students must complete one of the following General Education Plans:

CSU-GE (see page 78)	39 units
IGETC (see page 80)	37 units

Students can double-count required courses and courses for General Education Electives (Courses Numbered 1-199) required when degree units plus GE units total fewer than 60.

TOTAL: 62-66 UNITS

BUSINESS ADMINISTRATION 2.0

PROGRAM

f Associate in Science for Transfer (AST)

DESCRIPTION

The Associate in Science in Business Administration for Transfer degree (AST in Business Administration) is designed to provide students a clear transfer pathway to the CSU business administration major and completion of the business administration baccalaureate degree, to grant guarantee admission to a CSU to a similar major with junior standing, and the ability to complete their remaining requirements within 60 semester or 90 quarter units. The Associate of Science in Business Administration for Transfer degree provides a study of key business concepts. Business Administration majors will be able to analyze and interpret business scenarios using quantitative and logical reasoning to evaluate and solve business problems. Business Administration majors will be able to communicate economic effects, effectively convey financial information, and explain social, political and ethical implications of business decision making.

LEADS TO CAREER OPPORTUNITIES SUCH AS:

- f* Accounting
- f* Chief Executive
- f* Cost Estimator
- f* Customer Service Management
- f* Entrepreneur/Business Owner
- f* Financial Planner/Advisor
- f* General & Operations Manager
- f* Human Resources
- f* Insurance
- f* Marketing
- f* Sales Manager
- f* Social/Community Service Manager
- f* Supply Chain Manager

TRANSFER PREPARATION

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TRANSFER RESOURCES

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BUSINESS OFFICE TECHNOLOGY

PROGRAMS

- f* Associate in Science (A.S.)
- f* Certificates of Achievement

DESCRIPTION

The Business Office Technology programs promote the economic development of the community; provide for lifelong learning and academic excellence through course content, application, and technology; serve diverse populations; encourage positive work ethic; and meet workforce needs through skills development, training, and personal growth.

The Business Office Technology programs offer training in keyboarding, office software applications, filing and record management, accounting (Bookkeeping Certificate), customer service, and business English and math applications. Students are prepared for career opportunities in administrative support, bookkeeping and data entry, customer service and other clerical office positions.

As a result of ongoing changes in technology, the need to expand competencies, and changing transfer requirements, if a degree or certificate requirements may also change. If you note changes in degrees or certificate requirements, or if courses are not offered in a particular semester, please consult with a counselor or faculty on how best to complete the program in which you are enrolled.

LEADS TO CAREER OPPORTUNITIES SUCH AS:

- f* Account Clerk
- f* Administrative Support
- f* Bank Teller
- f* Billing Clerk
- f* Bookkeeping
- f* Customer Service
- f* Data Entry
- f* Executive Secretary/Assistant
- f* File and Records Clerk
- f* Information Clerk
- f* Office Manager
- f* Payroll Clerk
- f* Typist

TRANSFER PREPARATION

Courses that fulfill major requirements for an associate degree may differ from those needed to prepare for transfer. Students who plan to transfer to a four-year college or university should schedule an appointment with a Hartnell College counselor to develop a student education plan before beginning their program.

TRANSFER RESOURCES

www.ASSIST.org CSU and UC Articulation Agreements and Major Search Engine

CSU System Information
<http://www2.calstate.edu>

FINANCIAL AID

Paying for the cost of a college education requires a partnership among parents, students and the college. As the cost of higher education continues to rise we want you to know that Hartnell College offers a full array of financial aid programs: federal loan programs, and fee waivers.

<https://www.hartnell.edu/students/fa/net-price-calculator.html>

BUSINESS OFFICE TECHNOLOGY – INFORMATION PROCESSING (AS. BT)

ASSOCIATE OF SCIENCE

Program Outcomes Upon successful completion of this program a student will be able to:

- f demonstrate proficiency in selecting and using appropriate business software applications tools.
- f prepare and deliver business documents and presentations in appropriate form, format, and language.
- f solve problems and make decisions collaboratively or independently.

Required Major Courses (35 units)

F BUS50 –Introduction to PC Applications	4.0
F BUS110A– Beginning Keyboarding	1.0
F BUS110B– Beginning Formatting and Document Processing	1.0
F BUS111A– Intermediate Keyboarding	1.0
F BUS111B– Intermediate Document Processing	2.0
F BUS135 – Professional Office Skills	4.0
F BUS140A –Keyboarding Speed and Accuracy	0.5
F BUS140B– Keyboarding Speed and Accuracy	0.5
F BUS150.15– Word Processing	3.0
F BUS172-Business Machine Calculations	1.0
F BUS173– Filing Procedures and Records Management	3.0
F BUS175– Business Communications	3.0
F BUS177– Proofreading and Editing skills	3.0
F BUS190– Career Management	2.0
F BUS194– Human Relations in Business	3.0
F COM1 –Introduction to Public Speaking	3.0

SUBTOTAL 35 UNITS

General Education Required Courses

Students must complete one of the following General Education Plans:

HCC GE (see page 76)

- F English composition
- F Oral communication and Critical thinking
- F Mathematical Concepts and Quantitative Reasoning
- F Arts and Humanities
- F Social and Behavioral Sciences
- F Physical and Biological Sciences
- F Ethnic Studies
- F Lifelong Learning and Self Development

SUBTOTAL 21 UNITS

Students can double count required courses and courses for General Education

Electives (Courses Numbered 1499) required when degree units plus GE units total fewer than 60.

TOTAL: 60 UNITS

BUSINESS OFFICE TECHNOLOGY BOOKKEEPING BOTB

CERTIFICATE OF ACHIEVEMENT

BUSINESS OFFICE TECHNOLOGY INFORMATION PROCESSING (BST)

CERTIFICATE OF ACHIEVEMENT

h ^ / E ^ FIRST LINESUPERVISOR

PROGRAMS

f Certificates of Achievement

DESCRIPTION

This certificate prepares students with a set of soft skills recognized as crucial to performing in a supervisory role.

FIRST LINE SUPERVISOR (CT.FS)

CERTIFICATE OF ACHIEVEMENT

Required Major Courses (6 units)

F	BUS32—Introduction to Business	3.0
F	BUS42—Electronic Spreadsheet (Excel)	3.0
F	BUS43—Business Information Systems & Info Literacy	4.0
F	BUS194—Human Relations	3.0
F	COM1—	

BUSINESS INFORMATION WORKER

PROGRAMS

f Certificates of Achievement

BUSINESS INFORMATION WORKER LEVEL 1 (BIW1)

CERTIFICATE OF ACHIEVEMENT

Required Major Courses (6 units)

F	BUS50– Introduction to PC Applications	4.0
F	BUS110A– Beginning Keyboarding	1.0
F	BUS110B– Beginning Formatting and Document Processing	4.0
F	BUS135– Professional Office Skills	4.0
F	BUS172– Machine Calculations	1.0
F	BUS175– Business Communications	3.0
F	BUS190– Career Management	2.0

TOTAL:16 UNIT <0046>Tj /TT1 1 /TT1 1 /TT1 1 /TT1 1 /TT1 1 /

BUSINESS INFORMATION WORKER LEVEL-2 (CT.BIW2)

CERTIFICATE OF ACHIEVEMENT

(Complete all BIW1 courses listed) (16 credits)

F BUS50– Introduction to PC Applications 4.0

F BUS110A–

CHEMISTRY

PROGRAM

f Associate in Science for Transfer (ATS).

DESCRIPTION

ASSOCIATE IN SCIENCE FOR TRANSFER

Program Outcomes Upon successful completion of this program, student will be able to:

- f apply appropriate chemical theories, concepts, principles, methods, and laboratory skills to relevant science and engineering settings.
- f demonstrate competence in chemistry laboratory techniques and experimental methods.

Required Major Courses (36 units)

F CHM-1A- General Chemistry I	5.0
F CHM-1B- General Chemistry II	5.0
F CHM-12A- Organic Chemistry I	5.0
F CHM-12B- Organic Chemistry II	5.0
F PHY-4A- General Physics/Mechanics	4.0
F PHY-4B- General Physics/Electricity/Magnetism	4.0
F MAT-3A- Analytic Geometry and Calculus I	4.0
F MAT-3B- Analytic Geometry and Calculus II	4.0

Recommended Major Electives (None Required)

F MAT-3C- Analytic Geometry and Calculus III	4.0
F MAT-4- Linear Algebra	3.0
F MAT-5- Differential Equations	3.0
F PHY-4G- General Physics/Waves, Heat, Light	4.0

SUBTOTAL 36 UNITS

General Education - Required Courses

Students must complete one of the following General Education Plans:

IGETC or STEM (see page 80) 31 units

Students can double count required courses and courses for General Education

Electives (Courses Numbered 99) required when degree units plus GE units total fewer than 60

TOTAL: 60 UNITS

In order to earn this degree, students must complete the Associate Degree for Transfer Requirements:

1. Completion of 60 semester units or 90 quarter units that are eligible for transfer to the California State University, including both of the following:
 - a. The Intersegmental General Education Transfer Curriculum (IGETC) or the California State University Student Requirements (C4.003 Tw 0-4.7 (ra)-5.2 (n) (i)-7 (i))

CHICANX STUDIES

PROGRAM

f Associate of Arts (A.A.)

DESCRIPTION

The Chicana Studies Program provides organized studies in the heritage of Chicana culture and community to foster and expand a general understanding of this group. The Chicana degree courses give students the opportunity to develop competence in an understanding of the language, history, and culture as well as current issues affecting the community. Completion of the Chicana major enhances students' employment opportunities and careers in schools, community groups, governmental agencies, and the private sector.

TRANSFER PREPARATION

Courses that fulfill major requirements for an associate degree may differ from those needed to prepare for transfer. Students who plan to transfer to a four-year college or university should schedule an appointment with a Hartnell College counselor to develop a student education plan before beginning their program.

TRANSFER RESOURCES

www.ASSIST.org – CSU and UC Articulation Agreements and Major Search Engine

CSU System Information - <http://www2.calstate.edu>

FINANCIAL AID

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<https://www.hartnell.edu/students/fa/net-price-calculator.html>

LEADS TO CAREER OPPORTUNITIES SUCH AS:

- f* Community and Union Organizer
- f* Community Liaison
- f* Counselor
- f* Cultural Anthropologist
- f* Grant Writer
- f* Lawyer
- f* Professor/Teacher
- f* Public Health
- f* Public Policy
- f* Social Work
- f* Sociologist

CHICANX STUDIES (AA.CHCX)

ASSOCIATE OF ARTS

Program Outcomes Upon successful completion of this program a student will be able to:

- f* demonstrate knowledge of Chicana/x in the United States including an evaluation of the political experiences with respect to local and national leaders.
- f* apply critical thinking skills in reading, comprehending, and interpreting Chicana/x studies scholarship including major contributors who have influenced the course of study, policy and or culture.
- f* demonstrate knowledge of Chicana/x culture including an analysis of cultural expressions including but not limited to contemporary culture, literature or cinema.
- f* distinguish variations within the Chicana/x community with respect to class, gender, ethnicity, race, and sexuality.

Required Major Courses (14 units)

F ETH-1 – Introduction to Ethnic Studies	3.0
F ETH-3 – Introduction to Chicana/x Studies	3.0
F ETH-4 – Chicana/x Culture	3.0
F SPA-1 – Elementary Spanish 1	5.0
OR	
SPA-1X – Elementary Spanish 1 for Chicano Students	5.0
OR	
SPA-1S – Elementary Spanish 1 for Spanish Students	5.0

Major Electives (Complete 6 units)

F ETH-2 – Chicana/o/x Leadership	3.0
F ETH-5/POL-5 – Chicano Politics	3.0
F ETH-6 – La Chicana	3.0
F ETH-7 – Chicana/o/x Theatre	3.0
F ETH-12 – Chicano Cinema	3.0
F HIS-49A– Chicano History A	3.0
OR	
HIS-49B – Chicano History B	

SUBTOTAL: 20 UNITS

General Education – Required Courses

Students must complete one of the following General Education Plans:

HCCD GE (see page 76)

- F English composition F Oral communication and Critical thinking
- F Mathematical Concepts and Quantitative Reasoning
- F Arts and Humanities
- F Social and Behavioral Sciences
- F Physical and Biological Sciences
- F Ethnic Studies
- F Lifelong Learning and Self Development

SUBTOTAL: 21 UNITS

Students can double-count required courses and courses for General Education

Electives (Courses Numbered 1-199) required when degree units plus GE units total fewer than 60.

TOTAL: 60 UNITS

COMMUNICATION STUDIES

PROGRAM

f Associate in Arts for Transfer (AA.-T)

DESCRIPTION

The Associate in Arts in Communication Studies 2.0 for Transfer allows students to focus their major course work and required electives to achieve communicative competence in the areas of

COMPUTER SCIENCE FOR TRANSFER
PROGRAM

f Associate in Science for Transfer (ATS).

COMPUTER SCIENCE FOR TRANSFER (ASTCS)

ASSOCIATE IN SCIENCE FOR TRANSFER

Required Major Courses (33 units)

F	CSS-2A	Object Oriented Programming	4.0
F	CSS-2B	Data Structures and Algorithms	4.0
F	CSS-3	Computer Architecture and Assembly	4.0
F	CSS-7	Discrete Structures	4.0
F	MAT-3A	Analytic Geometry and Calculus I	4.0
F	MAT-3B	Analytic Geometry and Calculus II	4.0
F	PHY-4A	General Physics I/Mechanics	4.0
F	BIO-1	Fundamental Biological Concepts	5.0

SUBTOTAL 33 UNITS

3 B e r e

COMPUTER SCIENCE AND INFORMATION SYSTEMS
COMPUTER SCIENCE OPTION

PROGRAMS

f Associate of Science (A.S.)

f Certificate of Achievement

COMPUTER SCIENCE AND INFORMATION SYSTEMS—COMPUTER SCIENCE OPTION (AS.
ASSOCIATE OF SCIENCE

Required Major Courses (20 units)

F	CSS-1 – Introduction to Computer Science and Programming Fundamentals	4.0
F	CSS-2A – Object Oriented Programming	4.0
F	CSS-2B – Data Structures and Algorithms	4.0
F	CSS-3 – Computer Architecture and Assembly Language Programming	4.0
F	CSS-7 – Discrete Structures	4.0

SUBTOTAL: 20 UNITS

General Education – Required Courses

Students must complete one of the following General Education Plans:

CSU-GE (see page 78)	39 units
IGETC (see page 80)	37 units

Students can double-count required courses and courses for General Education

Electives (Courses Numbered 1-199) required when degree units plus GE units total fewer than 60.

COMPUTER SCIENCE AND INFORMATION SYSTEMS CISCO CERTIFIED NETWORK ASSOCIATE

PROGRAMS

f Certificates of Achievement

DESCRIPTION

This Cisco Certified Network Associate (CCNA) Certificate of Achievement combines all of the required courses needed to prepare for the CCNA exam, an industry recognized associate level certificate. This certificate is intended to be completed in one year and a half and as such prepares students for careers in Information Technology with a focus in networking. This certificate is specially designed to send students on a fast track career in IT careers related to networking.

TRANSFER PREPARATION

Courses that fulfill major requirements for an associate degree may differ from those needed to prepare for transfer. Students who plan to transfer to a four-year college or university should schedule an appointment with a Hartnell College counselor to develop a student education plan before beginning their program.

TRANSFER RESOURCES

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CSU System Information
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FINANCIAL AID

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<https://www.hartnell.edu/students/fa/net-price-calculator.html>

LEADS TO CAREER OPPORTUNITIES SUCH AS:

- f* Computer Network Specialist
- f* Network and Computer System Administration

COMPUTER SCIENCE AND INFORMATION SYSTEMS
CISCO CERTIFIED NETWORK ASSOCIATE (CT.CCN)
CERTIFICATE OF ACHIEVEMENT

FINANCIAL AID Paying for the cost of a college education requires a partnership among parents, students and the college. As d 6 (he)3(a)-2

Required Major Courses (5 units)

- F CSS-50 Introduction to Networks: CCNA 1 4.0
- F CSS-51 Switching, Routing, and Wireless Essentials: CCNA 2 4.0
- F CSS-52 Enterprise Networking, Security and Automation: CCNA 3 4.0
- F COM3 – Survey of Human Communication 3.0
- OR
- F ENG-1A College Composition and Reading 3.0

TOTAL: 15 UNITS

COMPUTER SCIENCE AND INFORMATION SYSTEMS
CYBERSECURITY

PROGRAMS

f Certificate of Achievement

DESCRIPTION

COMPUTER SCIENCE AND INFORMATION SYSTEMS
CYBERSECURITY (C.Y.S)

CERTIFICATE OF ACHIEVEMENT

Required Major Courses (20 units)

- F CSS-4 Introduction to Computer Science and Programming 4.0
- F CSS-50 Introduction to Networks: CCNA 1 4.0
- F CSS-53 – ~~RECEIVED~~

COMPUTER SCIENCE AND INFORMATION SYSTEMS DIGITAL WEB AND MOBILE DEVELOPMENT

PROGRAMS

f Associate of Science (A.S.)

f Certificates of Achievement

DESCRIPTION

COMPUTER SCIENCE AND INFORMATION SYSTEMS
 DIGITAL WEB AND MOBILE DEVELOPMENT (MSD)

ASSOCIATE OF SCIENCE

Required Major Courses (14 units)

F	BUS32 – Introduction to Business	3.0
F	CSS-25 Multimedia Integration	3.0
F	CSS-27 Project Management using Microsoft Project	4.0
F	CSS-64 HTML 5 and CSS3 Web Development	4.0

Major Electives A (Complete 8 units)

F	CSS-26 Dreamweaver	4.0
F	CSS-74 Wordpress for Websites	4.0
F	CSS-76 Android App Development Using Java	4.0
F	CSS-86 Adobe Animate	4.0

Major Electives B (Complete an additional 8 units)

F	CSS-29 Programming for Multimedia	4.0
F	CSS-76 Android App Development Using Java	4.0
F	CSS-65 Introduction to IOS App Development	4.0
F	CSS-78 Mobile Game Design	4.0
F	CSS-84 Beginning Digital Cartooning in Adobe Animate	4.0

SUBTOTAL 30 UNITS

General Education – Required Courses

Students must complete one of the following General Education Plans:

HCCD GE (see page 76)

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COMPUTER SCIENCE AND INFORMATION SYSTEMS
MOBILE DEVELOPMENT OPTION (CMD)

CERTIFICATE OF ACHIEVEMENT

Required Major Courses (4 units)

F	BUS32 – Introduction to Business	3.0
F	CSS-25 Multimedia Integration	3.0
F	CSS-27 Project Management using Microsoft Project	4.0
F	CSS-64 HTML 5 and CSS3 Web Development	3.0

COMPUTER SCIENCE AND INFORMATION SYSTEMS
WEBDEVELOPMENT OPTION (ON.WD)

CERTIFICATE OF ACHIEVEMENT

FINANCIAL AID
Paying for the cost of a college education requires a partnership among parents, C antw40. (a)-iv (a)1.er[(e)0.7 esp

Required Major Courses (4 units)

F BUS32 – Introduction to Business	3.0
F CSS-25 Multimedia Integration	3.0
F CSS-27 Project Management using Microsoft Project	4.0
F CSS-64 HTML 5 and CSS3 Web Development	4.0

Major Electives (Complete 8 units)

F CSS-6 – Dreamweaver	4.0
F CSS-74 Wordpress for Websites	4.0

TOTAL 22 UNITS

COMPUTER SCIENCE AND INFORMATION SYSTEMS
NETWORK AND SECURITY OPTION

PROGRAMS

f Associate of Science (A.S.)

f

COMPUTER SCIENCE AND INFORMATION SYSTEMS
NETWORK AND SECURITY OPTION (CT.PCN)

CERTIFICATE OF ACHIEVEMENT

Required Major Courses (40 units)

F CSS-4 Introduction to Computer Science and Programming 4.0

F CSS-50 Introduction to Networks CCNA 1 4.0

F CSS-51 Switching Routing and Wireless Essentials CCNA-0.001 2.4 (E)1.7 (s)-2.4 (s)-2.5 (e)0.7 (n)0.5 (t)1.0

COMPUTER SCIENCE AND INFORMATION SYSTEMS TECHNICAL SUPPORT

PROGRAMS

f Certificate of Achievement

DESCRIPTION

The Technical Support Certificate of Achievement combines information technology courses that provide students with the fundamental skills necessary for entry-level computer technical support careers.

COMPUTER SCIENCE AND INFORMATION SYSTEMS
TECHNICAL SUPPORT Mc 0 T 0.1.0c 3.809

CONSTRUCTION MANAGEMENT AND ARCHITECTURE PROGRAM

f Associate of Science (A.S.)

DESCRIPTION

The Associate of Science Degree in Construction Management and Architecture provides a comprehensive introduction to the construction management profession and professional practice.

CONSTRUCTION MANAGEMENT AND ARCHITECTURE CMA

ASSOCIATE OF SCIENCE

Required Major Courses (20 units)

F CMA-51– Introduction to Construction Management and Architecture	3.0
F CMA-55– Introduction to Structural Design and Codes	3.0
F CMA-57– Construction Law and Contracts	3.0
F CMA-61– Construction Field Practice: Layout, Foundations & Framing	4.0
F CMA-62– Construction Field Practice: Exterior and Interior Finish	4.0
F CMA-81– Computer Aided Drafting and Design I	3.0

Required Major Courses (Complete one emphasis 15 units)

F CONSTRUCTION MANAGEMENT CMA-52, 53, 54, 56, 91	15.0
F ARCHITECTURE CMA-70, 71, 72, 82, 83	15.0

Major Elective Courses (Complete 3 units from the same emphasis as above)

F CONSTRUCTION MANAGEMENT CMA-63, 64, 65, 66, 84, 90, EGN11	3.0
F ARCHITECTURE CMA-53, 84, 90, 91, EGN11	3.0

SUBTOTAL 38

DIGITAL ARTS

PROGRAMS

- f* Associate of Arts (A.A.)
- f* Certificate of Achievement

DESCRIPTION

The Digital Arts program offers a certificate and associate degree in Digital Arts. Classes include training in graphic design, digital graphics, 2D digital illustration, 2D digital photographic imaging, digital video and audio editing, 2D and 3D digital animation, 3D modeling, storyboard development for animation.

DIGITAL ARTS (A.DA)

ASSOCIATE ARTS

Program Outcomes Upon successful completion of this program a student will be able to:

- f demonstrate effective technical proficiency in the creation of digital artwork or projects
- f

Graphic Design	Complete 2 courses from ART12A, ART78, ART84, and PHO
Digital Photography/Video	Complete 2 courses from PHO1, PHO2, ART12A, and ART84
Digital Animation/Illustration	Complete 2 courses from ART73, ART13, ART13 and ART84

Required Major Courses (1 units)

- F ART70 – Introduction to Graphic Design/Computer Graphics 3.0
- F ART71 – Introduction to 2D Digital Illustration 3.0
- F ART72 – Introduction to Digital Arts 3.0
- F ART74 – Digital 3D Design and Modeling 3.0
- F ART76 – Introduction to 3D Digital Animation 3.0
- F ART77 – Introduction to Digital Video and Video Editing 3.0
- F ART80 – Introduction to Digital Photography and Photographic Imaging 3.0

Major Electives (Complete 6 units)

- F ART-3 – Drawing and Composition 3.0
- F ART12A – Design 3.0
- F ART13 – Three-Dimensional Design 3.0
- F ART73 – Introduction to Digital Illustration for Animation 3.0
- F ART78 – Motion Graphics and Design Principles 3.0
- F ART84 – Digital Art Portfolio and Business Practices 3.0
- F PHO-1 – Introduction to Photography 3.0
- F PHO-2 – Beginning Black and White Photography 3.0

SUBTOTAL 27 UNITS

General Education Required Courses

Students must complete one of the following General Education Plans:

HCCGE (see page 76)

- F English composition
- F Oral communication and Critical thinking
- F Mathematical Concepts and Quantitative Reasoning
- F Arts and Humanities
- F Social and Behavioral Sciences
- F Physical and Biological Sciences
- F Ethnic Studies
- F Lifelong Learning and Self Development

SUBTOTAL 21 UNITS

Students can double count required courses and courses for General Education

Electives (Courses Numbered 199) required when degree units plus GE units total fewer than

TOTAL: 60 UNITS

DIGITAL ART (STDA)

CERTIFICATE OF ACHIEVEMENT

Program Outcomes Upon successful completion of this program a student will be able to:

- f* demonstrate effective technical proficiency in the creation of digital artwork or projects.
- f* design effective visual communication for print, animation, and interactive media.
- f* structure visual information utilizing digital design aesthetic principles.
- f* appraise and analyze the influence of digital art and artists on the lives of all individuals, cultures, and societies.

Required Major Courses (21 units)

F ART70– Introduction to Graphic Design/Computer Graphics	3.0
F ART71– Introduction to 2D Digital Illustration	3.0
F ART72– Introduction to Digital Arts	3.0
F ART74– Digital Three Dimensional Design and Modeling	3.0
F ART76– Introduction to 3D Digital Animation	3.0
F ART77– Introduction to Digital Video and Video Editing	3.0
F ART80– Introduction to Digital Photographic Imaging	3.0

Major Electives (Complete 3 units)

F ART12A– Design	3.0
F ART13– Three Dimensional Design	3.0
F ART73– Introduction to Digital Illustration Animation	3.0
F ART78– Motion Graphics and Design Principles	3.0
F ART84– Digital Art Portfolio & Business Practices	1.0-3.0
F PHO-1– Introduction to Photography	3.0

TOTAL 24 UNITS

FINANCIAL AID

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<https://www.hartnell.edu/students/fa/net-price-calculator.html>

EARLY CHILDHOOD EDUCATION

PROGRAMS

- f Associate in Science for Transfer (ATS)
- f Associate of Science (A.S.)
- f Certificate of Achievement

ASSOCIATE DEGREE FOR TRANSFER

The Associate in Science degree in Early Childhood Education (ECE) for Transfer provides a clearly articulated curricular track for students who wish to transfer to a CSU campus, while also serving the diverse needs of students ~~interest~~ the breadth and depth of the field of early childhood education. Additionally, this degree exposes students to the core principles and practices of the field in order to build a foundation for their future personal, academic, or vocational paths.

The degree was designed to facilitate students' successful transfer to certain California State University (CSU) campuses that prepare them for advanced study in a variety of graduate programs, as well as a variety of careers such as teaching, Child Development Specialist, Program Directors, and Child Life Specialists. With a BA in ECE/Child Development, students are eligible for the Master Teacher and Site Supervisor levels of the CA Child Development Permit, using the Alternative Qualifications category.

ASSOCIATE DEGREE

The Early Childhood Education (ECE) program offers a comprehensive course of study to prepare students for career and job opportunities in early education and

EARLY CHILDHOOD EDUCATION FOR TRANSFER

ASSOCIATE IN SCIENCE FOR TRANSFER

Program Outcomes Upon successful completion of this program a student will be able to:

- f* plan and organize activities in a safe and healthy learning environment for optimum development of all young children in groups of 12 to 24 children.
- f* assess and evaluate all children and learning environments to write reports according to state mandated guidelines.
- f* work with families and their children to build respectful, supportive relationships for optimum growth and development of young children
- f* connect with community agencies and programs to support children, families, and the early education and care profession.

In order to earn this degree, students must complete the Associate Degree for Transfer Requirements:

1. Completion of 60 semester units or 90 quarter units

Required Major Courses (25 units)

F ECE-1 Principles and Practices of Teaching Young Children	3.0
F ECE-2 Child, Family, School & Community Relations	3.0
F ECE-4 Introduction to Curriculum	3.0
F ECE-6 Child Growth and Development	3.0
F ECE-10 Observation and Assessment	3.0
F ECE-12 Practicum: Field Teaching Experience	4.0
F ECE-19 Health, Safety, and Nutrition in Early Childhood	3.0
F ECE-53 Teaching in a Diverse Society	3.0

SUBTOTAL: 25 UNITS

General Education Required Courses

Students must complete one of the following General Education Plans:

CSU GE (see page 78)	39 units
IGET (see page 80)	37 units

Students can double count required courses and courses for General Education

Electives (Courses Numbered 100-199) required when degree units plus GE units total fewer than 60.

TOTAL: 60 UNITS

EARLY CHILDHOOD EDUCATION (AS/NCE)

ASSOCIATE OF SCIENCE

Child Development Permit issued by the Commission on Teaching Credentialing (CCTC) Educational and Experience Day Requirements	
Teacher Assistant	Requires any 6 ECE units

ECONOMICS

PROGRAM

f Associate in Arts for Transfer (AA.-T)

DESCRIPTION

The Associate in Arts degree in Economics for Transfer provides a clearly articulated curricular track for students who wish to transfer to baccalaureate Economics degree programs at California State University (CSU) campus. This degree provides the lower division economics major courses required at many CSUs while exposing students to the core principles of the economics field. Economics is

ECONOMICS OR TRANSFER (MAT.ECQ)

ASSOCIATE IN ARTS OR TRANSFER

Required Major Courses (4 units)

F	ECQ1 –Principles of Macroeconomics	3.0
F	ECQ5 –Principles of Microeconomics	3.0
F	MAT-2 –Calculus for Managerial Life, & Social Science	4.0
	OR	
	MAT-3A –Analytic Geometry and Calculus I	4.0
F	MAT-13 –Elementary Statistics	4.0

Major Electives A (Complete 1 course 34 units)

F	BUS1A –Financial Accounting	4.0
F	BUS1B –Managerial Accounting	4.0
F	BUS43 –Business Info Systems & Info Literacy	4.0
F	ECQ10 –Introduction to Economics	3.0
F	MAT-3B –Analytic Geometry and Calculus II	4.0
F	MAT-16 –Finite Mathematics	3.0

Major Electives B (Complete 1 course 34 units)

F	Any list A courses not already used	3.0-4.0
F	MAT-3C –Analytic Geometry and Calculus II	4.0
F	MAT-4 –Linear Algebra	4.0

SUBTOTAL 20-22 UNITS

General Education – Required Courses

Students must complete one of the following General Education Plans:

CSUGE (see page 78)	39 units
IGETC (see page 80)	3 () C [() -30-5.2 (I)-3.7 (T)-5.3 (4 (t)1.7 (s))

ELEMENTARY TEACHER EDUCATION

PROGRAM

f Associate in Arts for Transfer (AA.-T)

DESCRIPTION

The A.A. Degree in Elementary Teacher Education is intended for students who plan to complete a bachelor's degree at a transfer institution in preparation for a California Multiple Subject Teaching Credential. Most students pursue this credential with the goal of becoming an elementary school or special education teacher.

TRANSFER PREPARATION

Courses that fulfill major requirements for an associate degree may differ from those needed to prepare for transfer. Students who plan to transfer to a four-year college or university should schedule an appointment with a Hartnell College counselor to develop a student education plan before beginning their program.

TRANSFER RESOURCES

www.ASSIST.org CSU and UC Articulation Agreements and Major Search Engine

CSU System Information
<http://www2.calstate.edu>

FINANCIAL AID

Paying for the cost of a college education requires a partnership among parents, students and the college. As the cost of higher education continues to rise we want you to know that Hartnell College offers a full array of financial aid programs, federal loan programs, and fee waivers.

<https://www.hartnell.edu/students/fa/net-price-calculator.html>

LEADS TO CAREER OPPORTUNITIES SUCH AS:

- f* Counselor
- f* Curriculum Specialist
- f* Day Care Administrator
- f* Elementary School Administrator
- f* Elementary School Teacher
- f* Resource Teacher
- f* Special Education Teacher
- f* Speech Pathologist
- f* Training Specialist
- f* Tutor

ENGINEERING

PROGRAMS

x Associate of Science (A.S.)

DESCRIPTION

Engineering is the science and art of applying scientific and mathematical principles, experience, judgment, and common sense to design things that benefit society. Engineers are problem solvers who make things work faster, cheaper, and more efficiently. Technologies developed by engineers improve the ways that we live, communicate, work, travel, stay healthy, and entertain ourselves. From computer chips to cellphones and buildings to automobiles, engineering makes every aspect of

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ENGINEERING (AS. EGN)

ASSOCIATE OF SCIENCE

Program Outcomes

REQUIRED MAJOR COURSES:

COURSES SHARED BY ALL TRACKS

Course Name and Number	Units
EGN 1R Introduction to Engineering	2
MAT 3A Analytical Geometry and Calculus I	4
MAT 3B Analytical Geometry and Calculus I	4
PHY 4A General Physics I/Mechanics	4
PHY 4B General Physics II/Electricity and Magnetism	4
A programming class/Choice of EGN 5 or CSS 2A or CSS 1	3-4

SUBTOTAL: 22 UNITS

SELECT ONE TRACK (COMPLETE UNITS)

MECHANICAL/AEROSPACE/MANUFACTURING ENGINEERING TRACK

EGN 8 Statics	3
---------------	---

CIVIL ENGINEERING TRACK

EGN 8 Statics	3
---------------	---

ELECTRICAL ENGINEERING TRACK

EGN 6 Circuit Analysis	4
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COMPUTER/SOFTWARE ENGINEERING TRACK

EGN 6 Circuit Analysis	4
CSS 2A Object Oriented Programming	4
EGN 7L Computer Interface with the Physical World Laboratory	1

GENERAL ENGINEERING TRACK

Choose ONE of the following:

EGN 4 Materials Science and Engineering	4
EGN 6 Circuit Analysis	4
EGN 8 Statics	3

SUBTOTAL: 39 UNITS

REQUIRED MAJOR ELECTIVES COMPLETE 12 UNITS FROM SELECTED TRACK

SELECT ONE EMPHASIS TO FOLLOW

Units

Mechanical/
Aerospace/
Manufacturing

Civil



ENGINEERING FUNDAMENTALS

PROGRAMS

f Certificate of Achievement

DESCRIPTION

A student completing the Engineering Fundamentals Certificate of Achievement will gain a solid grounding in the basic principles that underlie all engineering disciplines. The certificate provides both academic preparation for and a pathway to internships. When combined with further study, it

ENGINEERING FUNDAMENTALS (EGN)

CERTIFICATE OF ACHIEVEMENT

Program Outcomes Upon successful completion of this

FINANCIAL AID

Paying for the cost of a college education requires a partnership among parents, students and the college. As the cost of higher education continues to rise we want you to know that Hartnell College offers a full array of financial aid programs, federal loan programs, and fee waivers.

<https://www.hartnell.edu/students/fa/net-price-calculator.html>

Required Major Courses (7-19 units)

F MAT-3A– Analytic Geometry and Calculus I	4.0
F MAT-3B– Analytic Geometry and Calculus II	4.0
F PHY-4A- General Physics/Mechanics	4.0
F EGN1R– Introduction to Engineering	2.0
OR	
EGN1 – Introduction to Engineering	3.0
F ENG-1A- College Composition and Reading	3.0
OR	
ENG-1AX College Composition and Reading	4.0

Major Electives (Complete 7-9 units)

F EGN5 – Programming and Problem Solving in MATLAB	3.0
F CSS-1 Intro to Computer Science & Programming Fundamentals	4.0
F CSS-2A Object Oriented Programming	4.0
F CHM-1A- General Chemistry I	5.0

TOTAL: 24-28 UNITS

ENGLISH

PROGRAM

f Associate in Arts for Transfer (AA.-T)

DESCRIPTION

The Associate in Arts in English for Transfer offers a study of composition, language, and literature designed to develop skills in reading perceptively, writing effectively, and thinking critically. The program prepares students for diverse careers in advertising, business, communications media, public relations, law, government service, and teaching. For detailed requirements for individual four year institutions, students should contact the transfer institution and/or meet with a counselor for specific transfer course requirements in their major.

TRANSFER PREPARATION

Courses that fulfill major requirements for an associate degree may differ from those needed to prepare for transfer. Students who plan to transfer to a four-year college or university should schedule an appointment with a *fa*

LEADS TO CAREER OPPORTUNITIES SUCH AS:

- f* Author
- f* Biographer
- f* Columnist
- f* Correspondent
- f* Creative Director
- f* Editor
- f* English Teacher
- f* Grant Writer
- f* Lawyer
- f* Lobbyist
- f* Playwright
- f* Public Relations
- f* Reporter
- f* Speech Writer
- f* Spokesperson
- f* Staff Writer

ENGLISH (AAT.ENG)

ASSOCIATE IN ARTS FOR TRANSFER

Required Major Courses (6 units)

- F ENG-1B- College Literature and Composition 3.0
- F ENG-2- Critical Thinking and Writings 3.0

Major Electives A (Complete 9 units)

- F ENG-22- Studies of Poetry 3.0
- F ENG-24- The Short Story 3.0
- F ENG-31- Beginning Creative Writing 3.0
- F ENG-44A- World Literature I 3.0
- F ENG-44B- World Literature II 3.0
- F ENG-46A-

ENGLISH FOR MULTILINGUAL SPEAKERS BEGINNING (NCCT.ENGM.BEG)

PROGRAM

f Certificate of Competency

DESCRIPTION

The Certificate of Competency English for Multilingual Speakers Beginning is awarded upon the successful completion of English for Multilingual Speakers (ENGM) 620, Beginning Reading and Writing, and ENGM 622, Beginning Speaking and Listening. This noncredit program provides students with reading, writing, listening, and speaking skills.
ENGM 620 is a 3-credit course (101-411) and ENGM 622 is a 3-credit course (101-411).

ENGLISH FOR MULTILINGUAL SPEAKERS INTERMEDIATE (NCCT.ENGM.LOW)

PROGRAM

f Certificate of Competency

DESCRIPTION

The Certificate of Competency English for Multilingual Speakers Low Intermediate is awarded upon the successful completion of English for Multilingual Speakers (ENGM) 630, Intermediate Reading and Writing, and ENGM 632, Intermediate Speaking and Listening. This noncredit program provides students with reading, writing, listening, and speaking skills at the intermediate level. The certificate prepares students for further academic and employment opportunities.

PROGRAM GOALS AND OBJECTIVES:

This noncredit program will provide English language learners with whole language skills at the intermediate level to prepare for further academic study and better employment opportunities. Students will gain academic English skills, which include reading comprehension of short texts, increased academic vocabulary, listening for main ideas, responding to and producing questions, and paragraph level writing. Students will be able to apply those skills to further English studies, both credit and noncredit, as well as employment opportunities in the Salinas Valley. These areas

courses include: ENGM 630 (v) (5) (8) (9) (10) (11) (12) (13) (14) (15) (16) (17) (18) (19) (20) (21) (22) (23) (24) (25) (26) (27) (28) (29) (30) (31) (32) (33) (34) (35) (36) (37) (38) (39) (40) (41) (42) (43) (44) (45) (46) (47) (48) (49) (50) (51) (52) (53) (54) (55) (56) (57) (58) (59) (60) (61) (62) (63) (64) (65) (66) (67) (68) (69) (70) (71) (72) (73) (74) (75) (76) (77) (78) (79) (80) (81) (82) (83) (84) (85) (86) (87) (88) (89) (90) (91) (92) (93) (94) (95) (96) (97) (98) (99) (100)

ENGLISH FOR MULTILINGUAL SPEAKERS INTERMEDIATE
(NCCT.ENGM.HIGH)

ENGLISH FOR MULTILINGUAL SPEAKERS ADVANCED (NCCT.ENGM.ADV)

PROGRAM

f Certificate of Competency

DESCRIPTION

The Certificate of Competency English for Multilingual Speakers Advanced is awarded upon the successful completion of English for Multilingual Speakers (ENGM) 660, Advanced Reading and Writing, and ENGM 662, Advanced Speaking and Listening. This noncredit program provides students with reading, writing, listening, and speaking skills at the advanced level. The certificate prepares students for further academic and/or employment opportunities.

PROGRAM GOALS AND OBJECTIVES:

This noncredit program will provide English language learners with whole language skills at the advanced level to prepare for further academic study and better employment opportunities. Students will gain academic English skills, which include drafting and revising critical response essays, reading comprehension of texts, group discussion and class presentation skills, and accurate note taking. Students will be able to apply those skills to transfer level coursework, as well as employment opportunities in the Salinas Valley. These are no-cost courses; however, students will pay for required textbooks.

Program Outcome Upon successful completion of this program, a student will produce and comprehend English at the advanced level. This includes participating in discussion and classroom activities as well as essay writing, sum0.7 D25 (i)-0.6 (s)-3.5 (Tw)]TJ d-3.5 0.05.443 0 Td [(w)-1.9 8 (p)-0. i4iwr.

ENVIRONMENTAL SCIENCE

PROGRAM

f Associate in Science for Transfer (ATS).

DESCRIPTION

Environmental Science is an interdisciplinary field incorporating biology, chemistry, physics, geology, math, and economics. Environmental Science examines how humans affect the global environment. Students will gain knowledge of fundamental concepts that inform society about the environment in which we live. Environmental scientists strive to protect the environment and human health by cleaning up polluted areas, advising policymakers, or working with government and industry to reduce waste and improve conditions. Other career possibilities include academia, environmental law, environmental consulting, sustainability, and resource management.

- Completion of 60 semester units or 90 quarter units of degree-applicable courses,

ENVIRONMENTAL SCIENCE

NCSE

FILM, TELEVISION, AND ELECTRONIC MEDIA
PROGRAM

FILM, TELEVISION, AND ELECTRONIC MEDIA

ASSOCIATE IN SCIENCE FOR TRANSFER

Required Major Courses (18 units)

F	TAG50 – Introduction to Film: the Classics to the 1960s	3.0
F	TAG51 – Television Studio Production	3.0
	OR	
	TAG54 – Video Production Lab Single Camera	3.0
F	TAG57 – Introduction to Electronic Media	3.0
F	TAG58 – Introduction to Media Writing	3.0
F	TAG59 – Beginning Audio Production	3.0
F	TAG53 – Playwriting and Screenwriting	3.0
	OR	
	ART78 – Motion Graphics and Design Principles	3.0

SUBTOTAL: 18 UNITS

General Education – Required Courses

Students must complete one of the following General Education Plans:

CSUGE (see page 78)

GENERAL STUDIES AND HUMANITIES (S.GAH)

GENERAL STUDIES SOCIAL AND BEHAVIORAL SCIENCES

PROGRAMS

f Associate of Arts (A.A.)

DESCRIPTION

The General Studies program with emphasis in Social and Behavioral Sciences offers students the opportunity to cultivate comprehensive understanding of concepts, theories, and methodologies within the diverse disciplines constituting the field. This program offers students a comprehensive education focused on the study of human behavior and society within cultural, economic, political, religious and historical context. This emphasis enables students to explore their own identity and the dynamics of human interaction within larger societal frameworks. By delving into cultural and social structures, students gain foundational knowledge about the complexities of their own societies, as well as, the behavioral and

GENERAL STUDIES SOCIAL AND BEHAVIORAL SCIENCES (A.B.)
ASSOCIATE OF ARTS

REQUIRED MAJOR COURSES	
For the 18 units required, select courses from at least two disciplines; from one of the disciplines select at least two courses. Students can double count General Education courses with the area of emphasis.	
F	Addiction Studies AOD 1
F	Administrative Justice: ADJ 13, 51
F	Agriculture: ABT 53
F	Anthropology: ANT 1, 2, 10, 20
F	Business BUS 32
F	Communication Studies COM 4
F	Early Childhood Education: ECE 2, 6, 53
F	Economics ECO 1, 5, 10
F	Education: EDU 1
F	Ethnic Studies:

GENERAL STUDIES STEM

PROGRAMS

f Associate of Arts (A.A.)

DESCRIPTION

The General Studies program with an emphasis in STEM allows students to develop knowledge of scientific theories, concepts, and data about both living and nonliving systems. The program emphasizes the natural sciences, which examine the physical universe, its life forms, and its natural phenomena. In addition, this emphasis will explore experimental methodology, testing hypotheses, and the power of systematic questioning. Math courses within the program will emphasize the development of mathematical and quantitative reasoning skills. This program offers students a comprehensive education that integrates critical thinking, problem solving and communication skills. Subjects will include; mathematics, biological and physical sciences.

By engaging in careful educational planning with a counselor, this degree is for students seeking to explore various disciplines in the

GENERAL STUDIES SEM(AA.GSTEM)
ASSOCIATE OF ARTS

GEOLOGY

PROGRAM

f Associate in Science for Transfer (A.S.-T)

DESCRIPTION

The Associate in Science degree in Geology for Transfer provides a clearly articulated curricular track for students who wish to transfer to baccalaureate geology degree programs at a California State University (CSU) campus. This degree provides the lower division geology major courses required at many CSUs while exposing students to the core principles and practices of the geology field. Students completing the Geology degree will have an introductory foundation through the study of the scientific method, Earth materials, Earth processes, and Earth history. They will acquire skills, knowledge, and abilities that enable students to use a scientific approach incorporating basic chemistry, physics, and mathematics to the study of the Earth; identify common minerals, rocks, and geomorphic features of Earth; describe the materials and elucidate the processes that comprise the dynamic Earth system; describe the evidence for and occurrence of major events in Earth History. Most common career opportunities with a baccalaureate degree include: entry-level field technician/geologist in industry (mining, oil, environmental consulting) and governmental agencies (Department of Natural Resources, Geological Surveys, National Parks). This Associate in Science in Geology for Transfer (AS-T) Degree is intended to meet the lower division requirements for geology for all CSU campuses. For detailed requirements for individual four-year institutions, students should contact the transfer institution and meet with a counselor for specific transfer course requirements in their major.

TRANSFER PREPARATION

A

s

f

3

LEADS TO CAREER OPPORTUNITIES SUCH AS:

- f* Aerial/Scientific Photographer
- f* Agricultural Engineer
- f* Architect
- f* Computer Analyst
- f* Economic Geologist
- f* Environmental Lawyer
- f* Forest Ranger
- f* Geochemist
- f* Geologist
- f* Hydrologist

GEOLOGY (AST.GEL)

ASSOCIATE IN SCIENCE FOR TRANSFER

Required Major Courses (26 units)

F	GEL-1 – Physical Geology	4.0
F	GEL-6 – History of the Earth	4.0
F	CHM-1A – General Chemistry I	5.0
F	CHM-1B – General Chemistry II	5.0
F	MAT-3A – Analytic Geometry and Calculus I	4.0
F	MAT-3B – Analytic Geometry and Calculus II	4.0

SUBTOTAL: 26 UNITS

General Education – Required Courses

HIGH SCHOOL EQUIVALENCY

PROGRAM

f Certificate of Competency

DESCRIPTION

The Certificat

HISTORY

PROGRAM

f Associate in Arts for Transfer (A.A.-T)

DESCRIPTION

History, in the broad sense, is the study of all human experience. It examines people, institutions, ideas and events through past and into the future. The study of history develops cultural literacy, critical thinking, and other skills while helping to understand today and plan for tomorrow. The discipline provides us with a better understanding of ourselves as individuals and as a society. In the study of history it is more important to learn the skills of finding, interpreting, and relating historical information than it is to simply to memorize historical data. Through the study of history, a student can acquire the techniques of gathering and applying information to gain a perspective on the human condition. Fields for which BA graduates in history are qualified are law, journalism, writing, the foreign service, consulting, teaching, archiving, researching, and museum curating.

The Associate of Arts degree in History for Transfer provides a clearly articulated curricular track for students who wish to transfer to baccalaureate degree programs at a California State University (CSU) campus. For detailed requirements for individual four-year institutions, students should contact the transfer institution and meet with a counselor for specific transfer course requirements in their major.

TRANSFER PREPARATION

Courses that fulfill major requirements for an associate degree may differ from those needed to prepare for transfer to a four-year institution.

LEADS TO CAREER OPPORTUNITIES SUCH AS:

- f* Archivist
- f* Biographer
- f* Editor
- f* Foreign Service Officer
- f* Historian
- f* Historic Preservation Specialist
- f* International Relations Specialist
- f* Lawyer
- f* Lecturer
- f* Media Consultant
- f* Museum Curator
- f* Museum Technician/Specialist

HISTORY (AAT.HIS)

ASSOCIATE IN ARTS FOR TRANSFER

Required Major Courses (6 units)

HIS-17A – United State History A	3.0
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HIS-17B – United State History B	3.0
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Major Electives A (Complete 6 units)

HIS-4A – Western Civilization A	3.0
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OR

KINESIOLOGY

PROGRAMS

Associate in Arts for Transfer (A.A.-T)

Associate of Science (A.S.)

DESCRIPTION

KINESIOLOGY (AS.KIN)MC P MICID 1 BDC 0.002 Tw 10.02 0 0 10.02 54 720 Tm (A)1.2 (SSO)-0.6 (C

LAW, PUBLIC POLICY AND SOCIETY

PROGRAM

Associate in Arts for Transfer (A.A.-T)

DESCRIPTION

LEADS TO CAREER OPPORTUNITIES SUCH AS:

LAW, PUBLIC POLICY AND SOCIETY (AAT.LAW

LIBERAL ARTS: PATHWAY TO HEALTH SCIENCES

PROGRAMS

Associate of Arts (A.A.)

DESCRIPTION

LIBERAL ARTS: PATHWAY TO HEALTH SCIENCES (

MATHEMATICS

PROGRAM

x Associate in Science for Transfer (A.S.-T)

DESCRIPTION

TRANSFER PREPARATION

TRANSFER RESOURCES

FINANCIAL AID

LEADS TO CAREER OPPORTUNITIES SUCH AS:

f
f
f
f
f
f
f
f
f
f
f
f
f
f
f
f

MATHEMATICS (AST.MAT)

ASSOCIATE IN SCIENCE FOR TRANSFER

Required Major Courses (12 units)

- F
- F
- F

MUSIC

PROGRAMS

- f* Associate in Arts for Transfer (AA.-T)
- f* Associate of Arts (A.A)
- f* Certificate of Achievement

DESCRIPTION

The Music Program offers coursework and ensembles that embrace diversity of our valley. Music is the universal language of the global village of the 21 century. It forms an integral part of our lives, from the musical “logos” that introduce every media program, to the songs and dances that provide identity to our diverse backgrounds. Study and participation in music has proven to further not only creativity and critical thinking, but also our sense of cooperation and community. At Hartnell, performance opportunities are available for all students in a wide range of vocal and instrumental ensembles. In addition, many courses are designed for students with no previous training in music. The department offers courses that prepare music majors for transfer to four-year universities as well as many courses for the general student.

The AA Degree in Music prepares students for transfer and careers in the following fields: credentialed school instruction, private studio instruction, vocal or instrumental performance, composition or arranging for film/television/multimedia events, sound engineering, conducting, college or university instruction, arts and education administration, and music journalism. Students intending to begin in the AA in Music should plan to take ~~MUS~~ the summer prior to starting their music degree. For detailed requirements for individual four-year institutions, students should contact the transfer institution and/or meet with a counselor for specific transfer course requirements in their major.

CERTIFICATE OF ACHIEVEMENT

This certificate prepares students to transfer to four year universi.9 (e)-2 Civer

MUSIC

MUSIC (A.A.MUS)

ASSOCIATE OF ARTS

Required Major Courses (1.5 units)

F	MUS1A – Music Appreciation – Historical	3.0
F	MUS2 – Music Fundamentals	3.0
F	MUS10 – Applied Music Voice (MUS10 course must be taken two times)	2.0
	OR	
	MUS11 – Applied Music-Instrumental (MUS11 Course must be taken four times)	2.0
F	MUS13A – Beginning Piano I	

MUSIQ(CTMUS)

CERTIFICATE OF ACHIEVEMENT

Required Major Courses (4.5 units)

F MUS2, Music Fundamentals	3.0
F MUS46, Music Theory and Musicianship I	4.0
F MUS47, Music Theory and Musicianship II	4.0
F MUS13A, Beginning Piano I	1.5
F MUS13B, Beginning Piano II	
OR	
F MUS17A, Beginning Guitar I	1.0
F MUS10, Applied Music Voice	
OR	
F MUS11 Applied Musical Instrumental (2 semester)	1.0

One of the Following Course(s) (3 units)

F MUS1A, Music appreciation-Historical Perspective	3.0
F MUS5, Ethnic Musics in the United States	3.0
F MUS6, Hawaiian Music	3.0
F MUS7, Jazz Appreciation	3.0
F MUS8, American Popular Music	3.0
F MUS42, Electronic Music-History and Composition	3.0

2 Semesters of any of the following Courses (2 units)

F MUS20, Hartnell College Choir	1.0
F MUS21, Hartnell Chambers Singers	1.0
F MUS25, Hartnell College Wind Ensemble	1.0
F MUS26, Jazz Ensemble	1.0
F MUS37, Hartnell Orchestra	1.0

TOTAL: 19.5 UNITS

FINANCIAL AID

Paying for the cost of a college education requires a partnership among parents, students and the college. As the cost of higher education continues to rise we want you to know that Hartnell College offers a full array of financial aid programs, federal loan programs, and fee waivers.

<https://www.hartnell.edu/students/fa/net-price>

NURSING-REGISTERED NURSING

PROGRAM

f Associate of Science (A.S.)

DESCRIPTION

The Hartnell College Associate Degree in Nursing (ADN) is a degree program consisting of a group of pre-requisite and corequisite courses that prepare students to become registered nurses. The two-semester course of study consists of classroom, high-fidelity simulation, nursing skills laboratory, seminar, interprofessional, and clinical experience. While enrolled in the associate degree program, Hartnell students may enroll in transfer level courses that meet requirements for a Bachelor's of Science degree in nursing. Graduates are eligible to take the National Council Licensure Examination for Registered Nurses (NCLEX-RN). After passing the licensure examination, graduates may practice as registered nurses in a variety of acute and community based settings. Graduates demonstrate the leadership and commitment required for a professional nurse committed to competence, caring, collaboration, and curiosity, while providing safe, quality nursing care to diverse individuals in various care settings. The Hartnell College ADN Program is fully approved by the California Board of Registered Nursing (BRN) and is accredited by the Accreditation Commission for Education in Nursing

TRANSFER STUDENTS

Completing the AS degree does not meet all requirements for transfer. Students planning to transfer to a university should follow the requirements of the ~~four~~ year university. Information on course equivalencies and major preparation requirements for the University of California (UC) and California State University (CSU) systems is available online at <http://www.assist.org>. Please consult with a Hartnell College counselor to review transfer requirements. Hartnell, Monterey Peninsula, Cabrillo, and Gavilan Colleges are members of the collaborative baccalaureate of science degree in nursing (BSN) program at California State University, Monterey Bay. See <https://www.hartnell.edu/NHS> and <http://nursing.csumb.edu/>. Students transferring from other nursing programs seeking placement into the second, third, or fourth semesters of the Associate Degree in Nursing Program should contact the Dean of Academic Affairs: Nursing ~~Health~~ Sciences (831.770.6146). Academic counselors evaluate transfer student transcripts for coursework equivalency. Syllabi, course outlines, and catalogs may be requested for the evaluation.

ACCEPTANCE TO THE NURSING (RN) PROGRAM

The Associate Degree in Nursing (ADN) requires separate application and screening procedures that must be

NURSING—REGISTERED NURSING (AS.NRN)

ASSOCIATE OF SCIENCE

Program Outcomes Upon successful completion of this program a student will be able to:

- f incorporate leadership, management, and legal principles to guide practice as a professional nurse.
- f apply increasingly complex nursing judgement and theoretical concepts when providing safe nursing care to diverse individuals across lifespan in a variety of settings.
- f integrate caring into relationships and nursing interventions that positively influence health outcomes and demonstrate sensitivity to the values of others.
- f communicate and collaborate with members of the interprofessional healthcare team to coordinate care and optimize health outcomes.
- f model a spirit of inquiry when examining and challenging the status quo, questioning underlying assumptions, and offering new insights to improve the quality of care.

Required General Education Courses:

MUST BE COMPLETED PRIOR TO ACCEPTANCE INTO THE PROGRAM (24 units)

F BIO-5 – Human Anatomy	4.0
F BIO-6 – Introductory Physiology	3.0
F BIO-6L – Physiology Laboratory	2.0
F BIO-27 – Principles of Microbiology	4.0
F CHM-22 – The Science of Chemistry	4.0
F ENG-1A – College Composition and Reading	3.0
OR	
ENG-1AX – Intensive College Composition and Reading	4.0
F MAT-13 –Elementary Statistics (Recommended for Students pursuing BSN)	4.0

Required General Education Courses:

MAY BE TAKEN CONCURRENTLY WITH NRN COURSES (15 units)

F PSY-25 – Developmental Psychology - Lifespan	3.0
OR	
NRN-70 – Growth and Development Across the Life Span for the Healthcare Professional	
F ANT-2 – Introduction to Cultural Anthropology	3.0
AND	
SOC-1 – Introduction to Sociology	3.0
F Ethnic Group Course _____ (see page 76) (ETH 1, 2, 4, 7, 8, 13, 21, 56)	
F COM-1 – Introduction of Public Speaking	3.0
OR	
COM-3 – Survey of Human Communication	3.0

CON'T ONURSING-REGISTERED NURSING

Required Major Courses (After Acceptance into the program) (39.5 units)

1st SEMESTER 11.5 units

F NRN110– Foundations for Success for Registered Nursing Students	1.0
F NRN46– Health Promotion and Foundational Health Concepts Across the Life Span	6.5
F NRN47 – Social Determinants of health	1.5
F NRN48– Nursing Assessment and Interventions	10
F NRN49– Introduction to Pharmacology and Medication Administration	1.5

2nd SEMESTER 9 units

F NRN56– Care of Diverse Individuals and Families with Stable Conditions	8.0
F NRN57–	1.5 Td () I 0 6 I D 2 e 4 5 9 0 T c 0 T w 1 m 0 T d m 0 T d e 0 6 I D 2 T 0 T w 1 d 9

NURSING-VOCATIONAL NURSING

PROGRAM

f Associate of Science

f Certificate of Achievement

DESCRIPTION

The Hartnell 320.52 397.62 re W n BT /GS0 gs /TT1 1 Tf -0.004

NURSING-VOCATIONAL NURSING (AS.NVN)

ASSOCIATE OF SCIENCE

Required General Education Courses

MUST BE COMPLETED PRIOR TO ACCEPTANCE INTO THE PROGRAM –

F	ENG-1A- College Composition and Reading	3.0
	OR	
	ENG-1AX Intensive College Composition and Reading	4.0
F	MAT-13 –Elementary Statistics	4.0
F	BIO-11* –Intro to Human Anatomy & Physiology	4.0
	OR	
	BIO-5* – Human Anatomy	(4.0)
	AND	
	BIO-6* – Introductory Physiology	(3.0)
	AND	
	BIO-6L –Physiology Lab	(2.0)
F	PSY-2* – General Psychology	3.0
F	LIB6 – Information Competency in the Social Science	1.0
	OR	
	Communication and Analytic Thinking Course <u>(see page 68)</u>	3.0
F	Ethnic Group Course <u>(see page 76)</u>	3.0
	(Recommended: ENCA with a Multicultural Perspective)	

*Prerequisite and corequisite courses marked with an asterisk must be completed within five (5) years of entering the vocational nursing program per California Code of Regulations, Title 16: Professional Regulations, Division 25: Board of Vocational Nursing and Psychiatric

1st SEMESTER 16 units

F	NUTR-51* -Essential of Nutrition	3.0
	OR	
	NUTR-1- Nutrition	(3.0)
F	NVN-70* -Growth & Development Across the Lifespan	3.0
	OR	
	PSY-25-Developmental Psychology: Lifespan	(3.0)
F	NVN-110 -Foundationsfor Success for VN Students	1.0
F	NVN-119- Vocational Nursing Theory I: Fundamentals	4.0
F	NVN-119.1- Vocational Nursing Clinical I: Fundamentals	4.0
F	NVN-130A- Basic Pharmacology A	1.0

2nd SEMESTER 14 units

F	NVN-121- Vocational Nursing Theory II	6.5
F	NVN-121.1- Vocational Nursing Clinical II	6.5
F	NVN-130B- Basic Pharmacology B	1.0

3rd SEMESTER 14 units

F	NVN-123- Vocational Nursing Theory II	6.5
F	NVN-123.1- Vocational Nursing Clinical III	6.5
F	NVN-130G- Basic Pharmacology C	1.0

*Prerequisite and corequisite courses marked with an asterisk must be completed

NURSING-VOCATIONAL NURSING (CT.NVN)

CERTIFICATE OF ACHIEVEMENT

Required General Education Courses

MUST BE COMPLETED PRIOR TO ACCEPTANCE INTO THE PROGRAM –

F	ENG-1A- College Composition and Reading	3.0
	OR	
	ENG-1AX Intensive College Composition and Reading	(4.0)
F	MAT-13– Elementary Statistics	4.0
F	HES120 – AHS Basic Life Support for HCP	(0.5)
F	BIO-11*– Intro to Human Anatomy & Physiology	4.0
	OR	
	BIO-5*– Human Anatomy	(4.0)
	AND	
	BIO-6*– Intro to Physiology	(2.0)
	AND	
	BIO-6L*– Physiology Lab	(2.0)
F	PSY-2*– General Psychology	3.0

CON'T OF NURSING VOCATIONAL NURSING

2nd SEMESTER 14 units

F NVN-121	Vocational Nursing Theory II	6.5
F NVN-121.1	Vocational Nursing Clinical II	6.5
F NVN-130B	Basic Pharmacology B	1.0

3rd SEMESTER 14 units

F NVN-123	Vocational Nursing Theory II	6.5
F NVN-123.1	Vocational Nursing Clinical III	6.5
F NVN-130G	Basic Pharmacology C	1.0

Nursing and Allied Health Electives: (recommended, not required)

F NVN-225	Success Strategies for Vocational Nursing: Fundamentals	0.5
F NVN-226	Success Strategies for Vocational Nursing: Health Promotion	0.5
F NVN-227	Success Strategies for Vocational Nursing: Care Coordination	0.5
F NVN-210	Intravenous Therapy and Blood Withdrawal Techniques	2.0

*Prerequisite and corequisite courses marked with an asterisk must be completed within five (5) years of entering the vocational nursing program per California Code of Regulations, Title 16: Professional Regulations, Division 25: Board of Vocational Nursing and Psychiatric Technicians of the State of California.

¹Any AHA BLS or Health Care Professional course is acceptable. AHA BLS for HCPs card must be current throughout program. Not required to apply. Must be completed prior to NVN 119.

PHOTOGRAPHY

PROGRAMS

- f* Associate of Arts (A.A.)
- f* Certificate of Achievement

DESCRIPTION

Photography is an omnipresent integral part of life in the 21

PHOTOGRAPHY (AA.PHO)

ASSOCIATE OF ARTS

Required Major Courses (7 units)

F	PHO-1- Introduction to Photography	3.0
F	PHO-2- Beginning Black and White Photography	3.0
F	PHO-3- Advanced Photography Lab	3.0
F	PHO-4- Portfolio Photography	3.0
F	ART12A- Design	3.0
F	ART72- Introduction to Digital Arts	3.0
F	ART80- Intro to Digital Photography & Photographic Imaging	3.0

Major Electives A (Complete 3 units)

F	ART1A- Art History Survey I	3.0
F	ART1B- Art History Survey II	3.0
F	ART3- Drawing and Composition	3.0

Major Electives B (Complete 3 units)

F	ART6A- Watercolor and Gouache	3.0
F	ART6B- Oils	3.0
F	ART6C- Acrylics	3.0
F	ART10- Art Appreciation	3.0
F	ART70- /71	3.0

PHOTOGRAPHY (CPTPHO)

CERTIFICATE OF ACHIEVEMENT

Program Outcomes Upon successful completion of this program a student will be able to:

- f* demonstrate effective technical proficiency with film and digital media.
- f* structure visual information to produce images of intermediate level aesthetic quality.
- f* interpret and produce photographs that communicate intellectually and emotionally.
- f* demonstrate an intermediate knowledge of the history of photography.
- f* demonstrate an awareness of the influence of photography on the lives of individuals, cultures, and societies.

Required Major Courses (21 units)

F PHO-1– Introduction to Photography	3.0
F PHO-2– Beginning Black and White Photography	3.0
F PHO-3– Advanced Photography Lab	3.0
F PHO-4– Portfolio Photography	3.0
F ART12A– Design	3.0
F ART70– Graphic Design/Computer Graphics	3.0
F ART80– Intro to Digital Photo & Photographic Imaging	3.0

Major Electives (Complete 3 units)

F ART1A– Art History Survey I	3.0
F ART1B– Art History Survey II	3.0
F ART77– Digital Video, Editing and Production	3.0

TOTAL 24 UNITS

FINANCIAL AID

Paying for the cost of a college education requires a partnership among parents, students and the college. As the cost of higher education continues to rise we want you to know that Hartnell College offers a full array of financial aid programs, federal loan programs, and fee waivers.

<https://www.hartnell.edu/students/fa/net-price-calculator.html>

PHYSICS

PROGRAM

f Associate in Science for Transfer (ATS).

DESCRIPTION

Physics is the natural science involving a general analysis of nature conducted in order to understand how the universe behaves. It involves the study of matter and its motion through space and time, along with related concepts such as energy and force. Physics overlaps with many interdisciplinary areas such as astronomy, biology, chemistry, and geology. Physics also makes significant contributions through advances in new technologies that arise from theoretical breakthroughs. Research in physics includes the following specialty areas: condensed matter physics; atomic, molecular, and optical physics; particle physics; astrophysics; geophysics and biophysics. Some positions for which four-year graduates in physics are qualified are in research, teaching, engineering, medicine, and industry.

The Associate in Science degree in Physics for Transfer provides a clearly articulated curricular track for students who wish to transfer to baccalaureate degree programs at a California State University (CSU) campus. For detailed requirements for individual four-year institutions, students should contact the transfer institution and/or meet with a counselor for specific transfer course requirements in their major.

TRANSFER PREPARATION

Courses that fulfill major requirements for an associate degree may differ from those needed to prepare for transfer. Students who plan to transfer to a four-year college or university should schedule an appointment with a Hartnell College counselor to develop a student education plan before beginning their program.

TRANSFER RESOURCES

www.ASSIST.org CSU and UC Articulation Agreements and Major Search Engine

CSU System Information
<http://www2.calstate.edu>

FINANCIAL AID

P(ea)h311 Td [(C)1.1 ((d)638 Tm [(S.7/MC

LEADS TO CAREER OPPORTUNITIES SUCH AS:

- f* Aerodynamicist
- f* Astro Physicist
- f* Chemical Physicist
- f* Computer System Engineer
- f* Geophysicist
- f* Laboratory Technician
- f* Medical Physicist

PHYSICS (AST.PHY)

ASSOCIATE IN SCIENCE TRANSFER

Required Major Courses (24 units)

F	PHY-4A- General Physics/Mechanics	4.0
F	PHY-4B- General Physics/Electricity and Magnetism	4.0
F	PHY-4C- General Physics/Waves, Heat, Light Sound and Modern Physics	4.0
F	MAT-3A- Analytic Geometry and Calculus I	4.0
F	MAT-3B- Analytic Geometry and Calculus II	4.0
F	MAT-3C- Analytic Geometry and Calculus III	4.0

Major Electives (None Required)

F	CHM-1A- General Chemistry I	5.0
F	CHM-1B- General Chemistry II	5.0
F	CSS-4 Introduction to Scientific Programming	4.0
F	MAT-4- Linear Algebra	3.0
F	MAT-5- Differential Equations	3.0

SUBTOTAL 24 UNITS

General Education Required Courses

Students must complete one of the following General Education Plans:

CSUGE (see page 78)	39 units
IGETC (see page 80)	37 units

Students can double count required courses and courses for General Education

Elementary Science

POLITICAL SCIENCE

PROGRAM

f Associate in Arts for Transfer (A.A.-T)

DESCRIPTION

The Associate in Arts in Political Science for Transfer allows students to focus their major course work and required electives in a social science concerned with the description and analysis of political, and especially governmental, institutions and processes. Increasingly, the emphasis is placed on how governments deal with specific policy problems such as war and peace, poverty, crime, education, energy, pollution, or inter-group relations, and on the factors that affect these problems. The study of political science provides one with the concepts, theories and methods necessary to analyze these problems scientifically.

Fields for which BA graduates in political science are qualified are government work in the legislative or executive branches, the legal field as an attorney or paralegal, the military as an officer, a professional sales representative, or marketing professional.

TRANSFER PREPARATION

Courses that fulfill major requirements for an associate degree may differ from those needed to prepare for transfer. Students who plan to transfer to a four-year college or university

LEADS TO CAREER OPPORTUNITIES SUCH AS:

- f* Attorney
- f* Government Employee
- f* Marketing Professional
- f* Military Officer
- f* Paralegal
- f* Professional Sales Representative

PSYCHOLOGY

PROGRAMS

f Associate in Arts for Transfer (AA.-T)

DESCRIPTION

Psychology is the scientific discipline concerned with the study of the mind. It is a natural and a social science concerned with the study of human behavior. As such, it is a broad discipline which involves both pure science and practical application of science to matters of everyday living.

The Psychology program offers two associate degrees: The AA degree (associate degree in psychology) and the AA degree (associate degree in psychology for transfer). The AA degree requires calculus along with more psychology courses (as opposed to the AA degree), and is recommended for students wishing to transfer to a University of California (UC) campus. The AA degree provides a clearly articulated curriculum for students who wish to transfer to a California State University (CSU) campus. All students should meet with a counselor to determine which program would be most beneficial for their goals and to determine which courses are required for them to transfer to their desired university.

The program provides students with a basic und

ASSOCIATE IN ARTS FOR TRANSFER

Program Outcomes Upon successful completion of this program a student will be able to:

- f* compare and contrast the major concepts, theoretical perspectives, empirical findings, and historical trends in psychology.
- f* evaluate basic research methods in psychology, including research design, data analysis, and interpretation.
- f* demonstrate critical thinking and skeptical inquiry, and use the scientific approach to solving problems related to behavior and mental processes.
- f* apply psychological principles to personal, social, and organizational issues.

Required Major Courses (4 units)

F MAT-13– Elementary Statistics	4.0
F PSY-2 General Psychology	3.0
F PSY-9 Research Methods in Psychology	4.0
F PSY-10 Introduction to Biological Psychology	3.0

Major Electives Courses (Complete 3 units)

F PSY-14 Child Psychology	3.0
F PSY-25 Developmental Psychology –Lifespan	3.0

Major Electives Courses (Complete 3 units)

F PSY-6 Social Psychology	3.0
F PSY-15 Human Sexuality	3.0
F PSY-22 Abnormal Psychology	3.0

SUBTOTAL 20 UNITS

General Education – Required Courses

Students must complete one of the following General Education Plans:

CSU GE (see page 78)	39 units
IGETC (see page 80)	37 units

Students can double count required courses and courses for General Education

Electives (Courses Numbered 99) required when degree units plus GE units total fewer than 60.

TOTAL: 60 UNITS

In order to earn this degree, students must complete the Associate Degree for Transfer Requirements:

1. Completion of 60 semester units or 90 quarter units that are eligible for transfer to the California State University, including both of the following:
 - a. The Intersegmental General Education Transfer Curriculum (IGETC) or the California State University GE – Breadth Requirements (CSU GE Breadth)
 - b. A minimum of 18 semester units or 27 quarter units in a major or area of emphasis, as determined by the community college district.
2. Obtainment of a minimum grade point average of 2.0

ADTs include (AAT) and (AST) degrees. The law authorizing these degrees also requires that students must earn a “C” or better in all courses required for the major or area of emphasis. A “P” (Pass) grade is also an acceptable grade for courses in the major if the course is taken on a Pass/No Pass basis.

PUBLIC HEALTH

PROGRAM

Associate in Science for Transfer (A.S.-T)

DESCRIPTION

The Associate in Science in Public Health Science for Transfer degree prepares leaders who promote community health, prevent disease, and improve environmental conditions in which people can be healthy. The Associate in Science in Public Health Science for Transfer degree is interdisciplinary in nature and prepares students for a variety of careers in schools, non-profit organizations, government agencies, hospitals, and wellness programs.

The Associate in Science in Public Health Science for Transfer degree provides a clearly articulated curricular track for students who wish to transfer to baccalaureate degree programs at a California State University (CSU) campus in areas such as Public Health, Health Science, Kinesiology with a Health Education or a Health and Wellness Promotion concentration, Collaborative Health and Human Services with Community Health option, and related fields. For detailed requirements for individual four-year institutions, students should contact the transfer institution and meet with a counselor for specific transfer course requirements in their major.

LEADS TO CAREER OPPORTUNITIES SUCH AS:

- Community Health Educator
- Community Outreach Coordinator
- Diet Counselor
- Environmental Advocate
- Events Coordinator
- Family Planning Counselor
- Grant Writer
- Head Start Health Specialist
- Health Journalist
- Health Resource Specialist
- Public Health Inspector
- Social Services Coordinator
- Teen Outreach Coordinator
- Youth Educator
- Wellness Consultant

TRANSFER PREPARATION

Courses that fulfill major requirements for an associate degree may differ from those needed to prepare for transfer. Students who plan to transfer to a four-year college or university should schedule an appointment with a Hartnell College counselor to develop a student education plan before beginning their program.

TRANSFER RESOURCES

www.ASSIST.org – CSU and UC Articulation Agreements and Major Search Engine

CSU System Information - <http://www2.calstate.edu>

FINANCIAL AID

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<https://www.hartnell.edu/students/fa/net-price-calculator.html>

PUBLIC HEALTH SCIENCE (AST.PHS)

ASSOCIATE IN SCIENCE FOR TRANSFER

Program Outcomes: Upon successful completion of this program a student will be able to:

- describe social, political, and economical issues that impact public health and healthcare delivery systems in the United States.
- explain how functional anatomy and physiological regulations affect health and wellness.
- apply basic epidemiological principles used to study patterns of disease and injury among diverse populations.
- explain how social, behavioral, cultural, and environmental factors impact the health status of individuals and populations.
- demonstrate effective communication and problem-solving skills necessary for addressing contemporary public health issues.

Required Major Courses (30-31 units)

BIO-5 – Human Anatomy	4.0
BIO-6 – Introductory Physiology	3.0
BIO-6L – Physiology Laboratory	2.0
BIO-10 – General Biology	4.0
CHM-1A – The General Chemistry I	5.0
OR	
CHM-22 – The Science of Chemistry I	4.0
HED-2 – Individual Health and Wellness	3.0
HES-1 – Introduction to Public Health	3.0
MAT-13 – Elementary Statistics	4.0
PSY-2 – General Psychology	3.0

Major Electives (Complete 3 units)

ECO-1 – Principles of Macroeconomics	3.0
ECO-5 – Principles of Microeconomics	3.0
HES-2 – Health and Social Justice	3.0
HES-3 – Drug, Health and Society	3.0
NUTR-1 – Nutrition	3.0
PSY-15 – Human Sexuality	3.0
SOC-1 – Introduction to Sociology	3.0

SUBTOTAL: 33-34 UNITS

General Education – Required Courses

Students must complete one of the following General Education Plans:

CSU-GE (see page 78)	39 units
IGETC (see page 80)	37 units

Students can double-count required courses and courses for General Education

Electives (Courses Numbered 1-99) required when degree units plus GE units total fewer than 60.

In order to earn this degree, students must complete the Associate Degree for Transfer Requirements:

1. Completion of 60 semester units or 90 quarter units that are eligible for transfer to the California State University, including both of the following:
 - a. The Intersegmental General Education Transfer Curriculum (IGETC) or the California State University GE – Breadth Requirements (CSU GE-Breadth).
 - b. A minimum of 18 semester units or 27 quarter units in a major or area of emphasis, as determined by the community college district.
2. Obtainment of a minimum grade point average of 2.0

ADTs include (AA-T) and (AS-T) degrees. The law authorizing these degrees also requires that students must earn a “C” or better in all courses required for the major or area of emphasis. A “P” (Pass) grade is also an acceptable grade for courses in the major if the course is taken on a Pass/No Pass basis.

TOTAL: 60 UNITS

RESPIRATORY CARE

PROGRAM

Associate of Science (A.S.)

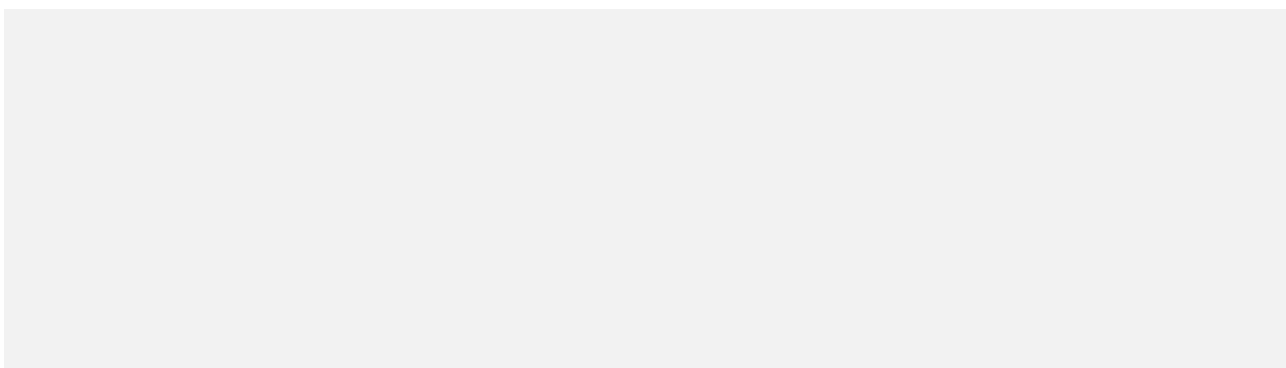
DESCRIPTION

RESPIRATORY CARE (AS.RCP)

ASSOCIATE OF SCIENCE

Required General Education Courses:

MUST BE COMPLETED PRIOR TO ACCEPTANCE INTO PROGRAM (22-23 units)



Required Major Courses (12 units)

CON'T OF RESPIRATORY CARE

Required Major Courses (After acceptance into the program) (44 units)

1st SEMESTER – 10 units

2nd SEMESTER – 12.5 units

3rd SEMESTER – 11.5 units

4th SEMESTER – 11 units

Respiratory Care Success Courses: (recommended, not required)

SUBTOTAL: 44 UNITS

TOTAL: 78 UNITS

SOCIAL JUSTICE (AAT.SJ)

ASSOCIATE IN ARTS FOR TRANSFER

Required Major Courses (9 units)

SJS-20 – Introduction to Social Justice	3.0
SJS-22 – Women’s Studies	3.0
ETH-1 – Introduction to Ethnic Studies	3.0
ETH-56 – Ethnic Studies Cinema - Silenced Voices	3.0

Major Electives (Complete 9 units)

ETH-1 – Introduction to Ethnic Studies	3.0
ETH-2 – Chicana/o/x Leadership	3.0
ETH-3 – Introduction to Chicanx Studies	3.0
ETH-4 – Chicanx Culture	3.0
ETH-5/POL-5 – Chicano Politics	3.0

SOCIOLOGY

PROGRAM

x Associate in Arts for Transfer (A.A.-T)

DESCRIPTION

Sociology is the scientific study of human behavior in society. It uses a variety of research and theoretical perspectives to analyze and explain human social behavior and social change. Sociology students examine a wide range of human interactions including marriage and family units, crime and deviance, culture and social change, group processes and interactions having to do with diversity and globalization, social stratification and mobility and social movements. Program courses will help develop the student's ability to examine the broader connections between personal life, public issues and social structure. Sociology provides a valuable major for a diverse range of career paths including teaching, social work, probation officer, employment counseling, urban planning and others.

LEADS TO CAREER OPPORTUNITIES SUCH AS:

Advocacy	Public Administration
Case Management	Public Relations
City Planning	Researcher
Counseling	Sales
Consumer Researcher	Social Work
Demographers	Teacher
Human Resources	Teaching
Human Services	Urban Planner
Information Systems	
Law Enforcement	
Management	
Market Research	
Mental Health Services	
Non-Profit	
Police Officer	
Policy Analysis	
Probation Officer	
Program Development	
Program Administration	

TRANSFER PREPARATION

Courses that fulfill major requirements for an associate degree may differ from those needed to prepare for transfer. Students who plan to transfer to a four-year college or university should schedule an appointment with a Hartnell College counselor to develop a student education plan before beginning their program.

TRANSFER RESOURCES

■ ASSIST.org – CS and UC Articulation Agreements and Major Search Engine

CS System Information - <http://2.al.state.edu>

FINANCIAL AID

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<https://hartnell.edu/student/fina-net-prior.html>

SOCIOLOGY (AAT-SOC)

ASSOCIATE IN ARTS FOR TRANSFER

Required Major Courses (10 units)

F	CS-1 -Introduction to Sociology		3.0
F	CS-5 -Introduction to Social Problems	3.0	
F	MAT-13 -Elementary Statistics		4.0

Major Electives A Courses (Complete 6 units)

F	ADJ-51 -Criminology		3.0
F	PSY-6 -Social Psychology		3.0
F	CS-20 -Sociology of Gender and Society	3.0	
F	CS-41 -Marriage and the Family		3.0
F	CS-42 -Sociology of Minority Relations	3.0	

Major Electives B Courses (Complete 3 units)

F	CS-15 -Sociology of Immigration & Identity in US	3.0	
F	CS-30 -Sociology of Latina/o in US Society	3.0	

SUBTOTAL: 19 UNITS

General Education – Required Courses

Students must complete one of the following General Education Plans:

CSU-GE (see page 78) **39 units**

CSU-GE (see page 78) **39 units** | Re7 (cou1 0)-85 (page cou)urGeneloc Rela a 1 0 M

SPANISH
PROGRAMS

f Associate in Arts

SPANISH (AAT.SPA)

ASSOCIATE IN ARTS FOR TRANSFER

Required Major Courses (Complete 5 units)

F SPA-1-Elementary Spanish	5.0
F SPA-1S Elementary Spanish 1 for Spanish Speakers	5.0
F SPA-1X Elementary Spanish for Chicano Students	5.0

Required Major Courses (Complete 5 units)

F SPA-2-Elementary Spanish	5.0
F SPA-2S Elementary Spanish 2 for Spanish Speakers	5.0
F SPA-2X Elementary Spanish for Chicano Students	5.0

Required Major Courses (Complete 5 units)

F SPA-3-Intermediate Spanish 1	5.0
F SPA-3S Intermediate Spanish 1 for Spanish Speakers	5.0

Required Major Courses (Complete 5 units)

F SPA-4-Intermediate Spanish	5.0
F SPA-4S Intermediate Spanish 2 for Spanish Speakers	5.0

Major Electives (Complete 3 units)

F ANT-20 Mesoamerica: Cultures and Civilizations of Mexico and Central America	3.0
F ETH4 -Chicanx Culture	3.0
F HIS6 -History of Mexico	3.0
F HIS49B -Chicano History	3.0

SUBTOTAL 23 UNITS

General Education - Required Courses

Students must complete one of the following General Education Plans:

CSUGE (see page 78)	39 units
IGET (see page 80)	37 units

Students can double-count required courses and courses for General Education

Electives (Courses Numbered 99) required when degree units plus GE units total fewer than 60.

TOTAL: 60 UNITS

Students placing out of Spanish 1, 1S, or 1X are not awarded units for that course; therefore, the student will need to take additional units from the elective list to complete the req. 7 (l) 3.4 (e)-1 (t)-4 (e) 5 mpe. 6 <75>-0 to or 7 laci lec 7 (o) 1.3 (c) 4. (w) 2.7 (i) 3.g (c) 4. ro tnt 2.7 (i) 3.3 (l) 6.

SPANISH (AA.SPA)

ASSOCIATE OF ARTS

Required Major Courses (Complete 5 units)

F SPA-1 Elementary Spanish	5.0
F SPA-1S Elementary Spanish 1 for Spanish Speakers	5.0
F SPA-1X –	

STUDIO ARTS

PROGRAM

f Associate in Arts for Transfer (AA.-T)

DESCRIPTION

Art is the study of communicating concepts and ideas visually. Associate in Arts in Studio Arts for Transfer degree provides students with an introductory foundation in art principles and practices while providing a clearly articulated curricular track for students who wish to transfer to baccalaureate degree programs at a California State University (CSU) campus. This degree provides the lower division art courses required at many CSUs while exposing students to the core principles of the studio arts field. Selected courses will include study in art history and studio practice in the creation of both two and three-dimensional works of art. For detailed requirements for individual four-year institutions, students should contact the transfer institution and meet with a counselor for specific transfer course requirements in their major.

TRANSFER PREPARATION

Courses that fulfill major requirements for an associate degree may differ from those needed to prepare for transfer. Students who plan to transfer to a four-year college or university should schedule an appointment with a Hartnell College counselor to develop a student education plan before

SilkScreening

LEADS TO CAREER OPPORTUNITIES SUCH AS:

- f* Art Buyer
- f* Art Critic
- f* Art Director
- f* Art Exhibition Coordinator
- f* Art Teacher
- f* Ceramic Artist
- f* Costume and Mask Designer
- f* Display Designer
- f* Gallery Owner
- f* Illustrator/Designer
- f* Impressionist
- f* Jewelry Designer
- f* Magazine Cover Artist
- f* Painter
- f* Set Designer
- f* Sculpture Artist
- f* Silkscreen Artist
- f* Sketch Artist

STUDIO ARTS (ART.SART)

ASSOCIATE IN ARTS FOR TRANSFER

Required Major Courses (5 units)

F ART1A– Art History Survey I	3.0
F ART1B– Art History Survey II	3.0
F ART3– Drawing and Composition	3.0
F ART12A– Design	3.0
F ART13– Three-Dimensional Design	3.0

Major Electives (Complete 9 units)

F ART6A– Watercolors & Gouache	3.0
F ART15A– Ceramics	3.0
F ART70– Intro to Graphic Design & Computer Graphics	3.0
F ART71– Introduction to 2D Digital Illustration	3.0
F ART72– Introduction to Digital Art	3.0
F PHO-1– Introduction to Photography	3.0
AND	
PHO-2– Beginning Black and White Photography	3.0

SUBTOTAL 24 UNITS

General Education Required Courses

Students must complete one of the following General Education Plans:

CSU GE (see uf -0.003 Tc 0366679 fuf -0.003 Tc 0.87w 1.607 0 Td (1.607 0 Tg 022 0 Td () Tj -0.003 Tc Tf 6l <7

THEATRE ARTS

PROGRAMS

f Associate in Arts for Transfer (AA.-T)

DESCRIPTION

ASSOCIATE IN ARTS FOR TRANSFER (AA

The Associate in Arts degree in Theatre Arts for Transfer provides a clearly articulated curricular track for students who wish to transfer baccalaureate Theatre Arts degree programs at a California State University (CSU) campus. This degree provides the lower division theatre major courses required at many CSUs while exposing students to the core principles of the theatre arts field. For detailed requirements for individual year institutions, students should contact the transfer institution and with a counselor for specific transfer course requirements in their major. The Hartnell College Theatre Arts AA degree is unique in that a professional theatre company is in residence at Hartnell College: The Western Stage. The collaboration between Hartnell College and The Western Stage gives students the possibility of learning their craft in a professional context. Courses are designed for students interested in pursuing theatre as a major or as a career. Career options include actor, teacher or professor, director, agent, announcer, casting director, critic, or model. Careers with a technical emphasis include theatre technician, concert venue technician, theme park technician, stage manager, designer, art director, facilities manager, or technical director.

ASSOCIATE IN ARTS

This degree program is designed for those interested in seeking employment in a theatrical, and/or cinematic environment, or for students desiring to complete major preparation coursework for transfer to a year Theatre Arts and/or Film, Television, and Electronic Media oriented Degree Program. The Hartnell College Theatre Arts program is unique in that a professional theatre company is in residence at Hartnell College: The Western Stage. The collaboration between Hartnell College and The Western Stage gives students the possibility of learning their craft in a professional context.

TRANSFER PREPARATION

Courses that fulfill major requirements for an associate degree may differ from those needed to prepare for transfer. Students who plan to transfer to a four-year college or university should schedule an appointment with a Hartnell College counselor to develop a student education plan before beginning their program.

TRANSFER RESOURCES

www.ASSIST.org CSU and UC Articulation Agreements and Major Search Engine

CSU System Information <http://www2.calstate.edu>

FINANCIAL AID

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LEADS TO CAREER OPPORTUNITIES SUCH AS:

- f Actor
- f Agent
- f Announcer
- f Art Director
- f Casting Director
- f Concert Venue Technician
- f Critic

THEATRE ARTS (A.T.THA)

ASSOCIATE IN ARTS FOR TRANSFER

Required Major Courses (Complete 6 units)

F TAG1 –Introduction to Theatre	3.0
OR	
TAG3 –History of Theatre	3.0
F TAG10 –Acting I–Acting for Everyone	3.0

Required Major Courses (Complete 3 units) (F TAC

THEATRE ARTS AND CINEMA

PROGRAMS

f Associate of Arts (A.A.)

DESCRIPTION

ASSOCIATE IN ARTS

This degree program is designed for those interested in seeking employment in a theatrical, and/or cinematic environment, or for students desiring to complete major preparation coursework for transfer to a four-year Theatre Arts and/or Film, Television, and Electronic Media oriented Degree Program. The Hartnell College Theatre Arts program is unique in that a professional theatre company is in residence at Hartnell College: The Western Stage. The collaboration between Hartnell College and The Western Stage gives students the possibility of learning their craft within a professional context.

TRANSFER PREPARATION

Courses that fulfill major requirements for an associate degree may differ from those needed to prepare for transfer. Students who plan to transfer to a four-year college or university should schedule an appointment with a Hartnell College counselor to develop a student education plan before beginning their program.

TRANSFER RESOURCES

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CSU System Information
<http://www2.calstate.edu>

FINANCIAL AID

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<https://www.hartnell.edu/students/fa/net-price-calculator.html>

LEADS TO CAREER OPPORTUNITIES SUCH AS:

- f* Actor
- f* Agent
- f* Announcer
- f* Art Director
- f* Casting Director
- f* Concert Venue Technician
- f* Critic
- f* Designer

THEATRE ARTS AND CINEMATICS (AC)

ASSOCIATE OF ARTS

Required Major Courses (Complete 15 units)

F	TAG1 –Introduction to Theatre	3.0
	OR	
	TAG50 –Introduction to Film	3.0
F	TAG3 –History of Theatre	3.0
F	TAG10 –Acting I	3.0
F	TAG2 –Script Analysis	3.0
	OR	
	TAG53 –Playwriting and Screenwriting	3.0
F	TAG30 –Fundamentals of Theatre Design	3.0

Required Major Courses (Complete 8 units)

F	Production TAC -17, 20, 21, 22, 24, 25, 53, 54	3.0
	OR	
	Technical Design TAG26, 27, 28, 29, 40, 91	3.0

CHOOSE ONE AREA OF EMPHASIS BELOW

THEATRE EMPHASIS

Major Electives (Complete 6 units –NOT TAKEN IN REQUIRED MAJOR COURSES)

F	TAG2 –Script Analysis	3.0
F	TAG7/ETH-7 –Chicano Theatre	3.0
F	TAG11 –Acting II	3.0
F	TAG15 –Acting for the Camera	3.0
F	TAG23 –Introduction to Theatre for Social Change	3.0

3.0

TAG101 (So)1.3 0 Td (Ac)4 (t)2.7 anhor2.7 (h)-n3.3 w4 (n)-0 Td [(Sc)4 (rt4 (ISo)1.3)2.7 g II

THEATRE PERFORMANCE (NCCTI.PER)

PROGRAM

f Certificate of Completion

DESCRIPTION

This noncredit certificate prepares students with basic technical, aesthetic, and collaborative skills to participate as a competent member of the theatre ensemble in production. Course offerings introduce the students to rehearsal and production concepts such as physical and vocal techniques, theatre history, aesthetics, and production roles, responsibilities, and techniques,

THEATRE PRODUCTION (NCCT.TPO)

PROGRAM

f Certificate of Completion

DESCRIPTION

This noncredit certificate prepares students with basic technical, aesthetic, and collaborative skills to participate as a competent member of the theatre ensemble in production. Course offerings introduce the students to rehearsal and production concepts such as physical and vocal techniques, theatre history, aesthetics, and production roles, responsibilities, and techniques, and direct applications within a live theatrical production environment.

PROGRAM GOALS AND OBJECTIVES:

The Noncredit Theatre Production Certificate of Completion will provide students with vocational training in a production environment, helping students develop professional competency in acting at the theatrical production for professional, educational, community-based, and/or regional theatre environments, or for the related areas of film, television, general entertainment and/or hospitality. Working with resident professional theatre company, The Western Stage, students will have the opportunity to learn their craft within a professional context.

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THEATRE PRODUCTION AND PERFORMANCE (NCCT.TRPE)

PROGRAM

f Certificate of Completion

DESCRIPTION

This noncredit certificate prepares students with basic technical, aesthetic and collaborative skills to participate as a competent member of the theatre ensemble in production. Course offerings introduce the students to rehearsal and production concepts such as physical and vocal techniques, theatre history, aesthetics, and production roles, responsibilities, and techniques, and direct applications within a live theatrical production environment.

PROGRAM GOALS AND OBJECTIVES:

The Noncredit Theatre Production and Theatre Performance Certificate of Completion will provide students with vocational training in a production environment, helping students develop professional competency in acting and theatrical production for professional, educational, community, and/or regional theatre environments, or for the related areas of film, television, general entertainment and hospitality. Working with resident professional theatre company, The Western Stage, students will have opportunity to learn their craft within a professional context.

Program Outcomes Upon completion of the Noncredit Theatre Production and Theatre Performance Certificate of Completion, students will:

- demonstrate proficiency in the acting techniques in scene work and memorization.
- conduct preliminary research of the character, period, and/or production history associated with the chosen ensemble play.
- demonstrate the organizational skills necessary to rehearse and perform within a fully-realized ensemble play.
- effectively collaborate as a contributing member of a production team.

WELDING

PROGRAMS

- f Associate of Science (A.S.)
- f Certificate of Achievement

DESCRIPTION

The Welding Technology program provides students with entry level employment skills in welding and metalworking techniques that are relevant to the needs of local employers and industries.

The program provides training in a variety of welding methods including SMAW, GTAW, GMAW and FCAW. Advanced level courses in pipe welding prepare students for American Welding Society welding certification testing. The program offers courses in sheet metal fabrication and welding fabrication that focus on print reading and metalworking skills. In addition, courses are offered in architectural/ornamental ironwork fabrication, as well as toolmaking and hardfacing techniques that are used in the construction and agriculture industries.

Job opportunities for students in this area include machine shop welder, autobody worker, sheet metal worker, structural and ironwork welder, maintenance welder, pipe welder, and agricultural welding fabrication.

As a result of ongoing changes in technology, the need to expand competencies, and changing transfer requirements, certificate and degree requirements may also change. If you note changes in degrees or certificate requirements, or if courses are not offered in a particular semester, please consult with a counselor or faculty on how best to complete the program in which you are enrolled.

TRANSFER PREPARATION

Courses that fulfill major requirements for an associate degree may differ from those needed to prepare for transfer. Students who plan to transfer should consult with a counselor.

LEADS TO CAREER OPPORTUNITIES SUCH AS:

- f Aerospace
- f Agriculture
- f Automotive Manufacturing and Repair
- f Chemical Processing
- f Construction
- f Cutter
- f General Manufacturing
- f Oil and Gas Extraction
- f Plumbing and Pipe Welding
- f Underwater Welding
- f Welder

WELDING AS WLD

ASSOCIATE OF SCIENCE

Required Courses (28 units)

F CMA74– Industrial Print Reading and Drawing	3.0
F MFGT110-Industrial Safety	2.0
F WLD-150- Introduction to Arc Welding	3.0
F WLD-151- Introduction to GTAW/TIG Welding	3.0
F WLD-152- Sheet Metal Fabrication	2.0
F WLD-153- Welding Fabrication	3.0
F WLD-154- Advanced Arc Welding	3.0
F WLD-155- Ornamental Ironwork	2.0
F WLD-156- Toolmaking	2.0
F WLD-157- Pipe Welding	3.0
F WLD-158- Hardfacing and Surfacing	2.0

Restricted Major Electives (Complete 9 units)

F CMA75– Engineering Drawing/Solid Works	3.0
F CMA81– Computer Aided Drafting and Design	3.0
F MFGT130– Introduction to Metal Fabrication	3.0
F MFGT150– Introduction to Industrial Electricity	3.0

