

Southwestern *Indian*

Polytechnic Institute

2009-2011 Catalog



Education Through Tradition

A National Indian Community College



2009-2011 CATALOG

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Southwestern Indian Polytechnic Institute
"A National Indian Community College"
9169 Coors Blvd. NW
Albuquerque, NM 87120
(Mailing Address: P.O. Box 10146, Albuquerque, NM 87184)
www.sipi.edu

A MESSAGE FROM THE INTERIM PRESIDENT

Ya' at' eeh (Greetings):

On behalf of the faculty, staff, Board of Regents, and administration at the Southwestern Indian Polytechnic Institute (SIPI), I welcome you to the SIPI community and thank you for giving us the opportunity to share important information with you. Thus, we take great pride in our 2009-2011 catalog.

SIPI is a very special place! We are pleased you have chosen SIPI to pursue your academic career and technical education goals. SIPI has a long and proud history. We are extremely proud of the services and curriculum we provide to our students; however, above of all—we are particularly proud of our students. Many of our graduates have moved on to great careers in science, technology, engineering, teaching, early childhood, natural resources, culinary arts, vision care and many more occupations. We want you to join the ranks of being a proud SIPI graduate. As you complete your program here at SIPI, our commitment is to assist you in achieving your educational goals. This catalog provides information you need to succeed in your chosen field of study.

The very essence of SIPI stems from the dreams of its founders to help train American Indians and Alaskan Natives for jobs; today, SIPI continues to provide career technical training and transfer degree programs to all 564 federally recognized tribes. SIPI has a successful history of serving the educational needs of American Indian and Alaskan Native students through comprehensive programs of education, extension education and public service. We are committed to continue our history of being of service to Indian people and nations.

As stated in our new mission statement—"Southwestern Indian Polytechnic Institute (SIPI) is a National Indian Community College that prepares Native American students to be productive life-long learners, as tribal members, in an ever-changing global environment."-SIPI plans on being a vital partner in the growth, prosperity and good health of our Indian Nations; we count on you to join us! Ahe'hee doo Nizhonigo Naninaa' doo' (Thank you and May you walk in beauty).

Dr. Sherry Allison (Dine')
Interim President

SOUTHWESTERN INDIAN POLYTECHNIC INSTITUTE

Academic Calendar 2009-2010

2009 FALL TRIMESTER

New & Readmit student application deadline	July 31
Student orientation, testing, advisement and course registration.....	August 25-29
Last day to register for courses	August 31
First day of classes	August 31
Last day to add/drop or challenge course	September 4
Labor Day holiday	September 7
Fall 2009 Trimester fees due	September 18
American Indian Day	October 12
Mid-term examination period	October 19-23
End of 8 th week; last day to drop a course with "W"	October 23
Petition to graduate closes.....	October 30
Veterans Day	November 11
Thanksgiving holiday break	November 26-27
TABE post-test	November 30
ACT Compass post-testing	December 1
Spring pre-registration	December 7-11
Final examination period	December 14-18
Final grades due / trimester ends	December 18

2010 SPRING TRIMESTER

New & Re-admit student application deadline	December 11
Student orientation, pre-testing (ACT-Compass, TABE), advisement and course registration.....	January 5-9
Last day to register for courses	January 11
First day of classes	January 11
Last day to add/drop or challenge course	January 15
Martin L. King Day holiday	January 18
Spring 2010 Trimester fees due	January 29
Presidents Day holiday	February 15
Mid-term examination period	March 1-5
End of 8 th week; last day to drop a course with "W"	March 5
Petition to graduate closes	March 12
TABE post-test	April 5
ACT Compass post-testing	April 6
Summer pre-registration	April 12-16
Final examination period	April 19-23
Trimester ends / Spring Commencement Exercises	April 23
Final grades due	April 23

Spring 2010-Summer 2010 Interim (April 26 – May 7, 2010)

2010 SUMMER TRIMESTER

New & Re-admit student application deadline	April 16
Student orientation, pre-testing (ACT-Compass, TABE), advisement and course registration.....	May 11-15
Last day to register for courses	May 17
First day of classes	May 17
Last day to add/drop or challenge course	May 21
Memorial Day holiday	May 31
Summer 2010 Trimester fees due	June 4
Mid-term examination period	June 21-25
End of 6 th week; last day to drop a course with "W"	June 25
Petition to graduate closes	July 2
Independence Day holiday	July 5
TABE post-test	July 19
ACT Compass post-testing	July 20
Fall pre-registration	July 26-30
Final examination period	August 2-6
Final grades due / trimester ends	August 6

Summer 2010-Fall 2010 Interim (August 9 – August 20, 2010)

SOUTHWESTERN INDIAN POLYTECHNIC INSTITUTE

Academic Calendar 2009-2010

2010 FALL TRIMESTER

New & Re-admit student application deadline	July 30
Student orientation, pre-testing (ACT-Compass, TABE), advisement and course registration.....	August 24-28
Last day to register for courses	August 30
First day of classes	August 30
Last day to add/drop or challenge course	September 3
Labor Day holiday	September 6
Fall 2010 Trimester fees due	September 17
American Indian Day	October 11
Mid-term examination period	October 18-22
End of 8 th week; last day to drop a course with "W"	October 22
Petition to graduate closes.....	October 29
Veterans Day	November 11
Thanksgiving holiday break	November 25-26
TABE post-test	November 29
ACT Compass post-testing	November 30
Spring pre-registration	December 6-10
Final examination period	December 13-17
Final grades due / trimester ends	December 17

Fall 2010-Spring 2011 Interim (December 20, 2010-December 31, 2010)

2011 SPRING TRIMESTER

New & Re-admit student application deadline	December 10
Student orientation, pre-testing (ACT-Compass, TABE), advisement and course registration.....	January 4-8
Last day to register for courses	January 10
First day of classes	January 10
Last day to add/drop or challenge course	January 14
Martin L. King Day holiday	January 17
Spring 2011 Trimester fees due	January 28
Presidents Day holiday	February 21
Mid-term examination period	February 28-March 4
End of 8 th week; last day to drop a course with "W"	March 4
Petition to graduate closes	March 11
TABE post-test	April 11
ACT Compass post-testing	April 12
Summer pre-registration	April 18-22
Final examination period	April 25-29
Trimester ends / Spring Commencement Exercises	April 29
Final Grades due	April 29

Spring 2011-Summer 2011 Interim (May 2 -May 11, 2011)

2011 SUMMER TRIMESTER

New & Re-admit student application deadline	April 15
Student orientation, pre-testing (ACT-Compass, TABE), advisement and course registration.....	May 12-16
Last day to register for courses	May 17
Instruction begins, first week of instruction	May 17
Last day to add/drop or challenge course	May 23
Memorial Day holiday	May 30
Summer 2011 fees due	June 3
Mid-term examination period	June 20-24
End of 6 th week; last day to drop a course with "W"	June 24
Petition to graduate closes	July 1
Independence Day holiday	July 4
TABE post-test	July 25
ACT Compass post-testing	July 26
Fall pre-registration	July 25-29
Final examination period	August 1-5
Final grades due / trimester ends	August 5

Summer 2011-Fall 2011 Interim (August 8–August 19, 2011)

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IMPORTANT NUMBERS

Main Line (Switchboard)	800-586-SIPI OR 800-586-7474
SIPI President's Office	346-2347
Vice President of Academic Programs	346-2351
Vice President of College Operations	346-2340
Director of Admissions and Financial Aid	346-2324
Financial Aid Office	346-2344
Student Accounting Office	346-2374
Information & Technology Office; Student Network Accounts	922-4080
Director of Housing and Recreation	346-4523
Four Winds Lodge (Women's Dorm)	346-2357 or 56
Golden Eagle Lodge (Men's Dorm)	346-2354 or 55
Recreation Office (Gymnasium)	922-4084
Academic Counselors	922-4082
Distance Education	922-6506
Special Needs Counselor	346-2319
Security	
Office	346-2323
Security Guard on-duty	263-7531

INTRODUCTION

The college's Board of Regents adopted the Southwestern Indian Polytechnic Institute's (SIPI) revised mission statement on September 25, 2009:

Mission Statement

Southwestern Indian Polytechnic Institute (SIPI) is a National Indian Community College that prepares Native American students to be productive life-long learners, as tribal members, in an ever-changing global environment. As a land grant institution, SIPI partners with tribes, employers, and other organizations with a stake in Indian education. An enduring commitment to student success is the hallmark of SIPI's operations.

Vision Statement

By the year 2020, Southwestern Indian Polytechnic Institute (SIPI) will solidify its position as a preeminent higher learning institution, providing a range of career and transfer opportunities for Native learners throughout the United States including Science, Technology, Engineering, and Mathematics (STEM). Recognized for its unwavering commitment to success for all students, SIPI is innovative in the pursuit of educational excellence. SIPI collaborates with tribes and other entities with a stake in Indian education. SIPI's graduates are proud of their Native American culture in a pluralistic, globalized world and are ready to compete with the best graduates from colleges and universities anywhere.

Goals

- Make learner success the core work of Southwestern Indian Polytechnic Institute.
- Develop new programs, strengthen existing programs, and recruit students to respond directly to the current and projected demographic and economic trends of Indian tribes, the state in which they are located, the nation, and the world.
- Promote the health and economic vitality of Indian tribes and communities through dynamic partnerships, coalitions, and collaborations.
- Expand the use of instructional technology to enhance student learning.
- Make better use of existing data and information; create new actionable information and customers for this information to support SIPI's operational and strategic planning efforts.
- Provide new and expanded opportunities for faculty and staff development that supports an atmosphere of excellence in academics and student support services.

(Source: SIPI's Strategic Plan 2010-2020)

Accreditations

Accredited since 1975, by:

The Higher Learning Commission (HLC)
North Central Association of Colleges and Schools (NCA)
30 North La Salle Street
Suite 2400
Chicago, Illinois 60602-2504

Southwestern Indian Polytechnic Institute (SIPI) has maintained affirmation of accreditation status for thirty years.

On August 14, 2000 SIPI received ten-year accreditation status from The Higher Learning Commission of the North Central Association of Colleges and Schools. SIPI's next comprehensive evaluation is in 2009-2010.

The Commission on Opticianry Accreditation (COA) accredits the college's Vision Care Technology program. This commission is an autonomous organization officially incorporated to serve as an independent agency for the sole purpose of accrediting opticianry and ophthalmic laboratory technology programs. The COA accredits two-year opticianry degree programs and one-year ophthalmic laboratory technology certificate programs. The Commission granted a four-year continued accreditation of the program in September 2000. In November of 2003, the program achieved its six year accreditation from the Commission. The SIPI Vision Care Technology program underwent a COA re-accreditation review in March 2009 and officially received re-accreditation for another six years in October 2009.

SIPI is nationally accredited by the Association of Collegiate Business Schools and Programs (ACBSP) to offer the following business degrees:

- Accounting (AAS)
- Business Administration (AAS)
- Office Information Applications (AAS)
- Computer Science Information Systems (AS)
- Business Administration (AS)

ACBSP granted a ten year accreditation of SIPI's Business Programs in April 2006.

Affiliations

The college is an associate member of:

- American Indian Higher Education Consortium (AIHEC)

Membership affiliations include:

- New Mexico Association of Community Colleges
- New Mexico Adult Education Association
- Council of North Central Two-Year Colleges
- American Association for Higher Education
- American Association of Community Colleges
- Association of Collegiate Business Schools and Programs (ACBSP)

Statement of Institutional Assessment and Program Review

The Board of Regents adopted the following statement on institutional assessment on October 15, 1994:

SIPI is committed to a process of assessment that offers assurance to the Indian communities of the college's effectiveness and appropriateness of its mission as a higher education institution. The purpose of the assessment is to improve all aspects of the operation and function of the college.

The Board of Regents affirms its position that assessment is an important element in the college's overall evaluation of its academic and non-academic units. An assessment program will assist the college in making useful decisions about improving the college and in developing effectiveness.

SIPI's Systematic Program Review process is designed to encourage program improvement, demonstrate accountability and provide information to guide decisions about programs and resources. Programs are evaluated according to the quality of curriculum, faculty, learning environment, infrastructure and outcomes, demand for courses and efficiency in the use of resources. SIPI's Systematic Program Review aim is to maintain academic quality, accountability and wise use of resources. All stages of the review process – department self studies, site visits and reports by reviewers, responses by the departments involved, final assessment by the Vice President of Academic Programs and appropriate committees, and action plans for the programs – are aimed at improving instructional programs, encouraging program innovation, demonstrating institutional accountability, and helping the institution plan program revisions, program deletions and resource allocation. Action plans specify detailed strategies, timelines and responsibilities to address the issues raised by reviewers.

BOARD OF REGENTS

Francis Tafoya, Chairman, Eight Northern Pueblos
Stanley Milford, Sr., Vice Chairman, Navajo Nation (New Mexico)
Vacant, Secretary-Treasurer,
La Titia Taylor, Southern Ute Indian Tribe
Steve Herrera, Alternate Member, Southern Ute Indian Tribe
Pamela Cordova, Mescalero Apache Tribe
Freddie Howard, Navajo Nation (Arizona)
Larry Schurz, Inter-Tribal Council of Arizona
Paul Shattuck, Ten Southern Pueblos
Paulette Dixon, Jicarilla Apache Nation
Kevin Mentz, SIPI Student Senate President

ADMINISTRATION

Dr. Sherry Allison, Acting President
Ed.D., Educational Administration/Leadership, Northern Arizona University
M.A., Education, Northern Arizona University
B.S.W., Social Work, New Mexico State University

Valerie Montoya, Vice President Academic Programs
M.A., Sociology, Stanford University
B.S., Sociology, Brigham Young University

Monte Monteith, Acting Vice-President College Operations
M.A., Economics, New Mexico State University
B.A., Economics, New Mexico State University

LOCATION AND HISTORY

Location

Geographically, SIPI is located in the heart of Indian Country, in the center of New Mexico's high-tech corridor, near Los Alamos and Sandia National Laboratories. SIPI is also close to the University of New Mexico, Albuquerque campus.

SIPI is located at:

9169 Coors Boulevard N.W., Albuquerque, NM 87120
South of the intersection of Coors Boulevard and Paseo del Norte N.W.

History of the Institution

The All-Indian Pueblo Council (a consortium of 19 New Mexico tribes), the Navajo Nation, the Jicarilla Apache Nation, the Mescalero Apache Tribe, the Southern Ute Indian Tribe and other southwestern tribes began planning for a school to serve American Indian communities during the mid-1960s. The United States Congress appropriated construction funds to build the school in the late 1960s at a cost of \$14.1 million dollars. Ten years later, the dream became a reality. Dedication ceremonies were held on August 20, 1971. On September 16, 1971, SIPI officially opened its doors for classes.

The SIPI School Board was officially formed in May of 1970 and operated under an informal set of by-laws and operating procedures. The Board had eleven members representing Indian Tribes from New Mexico, Arizona, Colorado, and the Student Government President. In 1973, the SIPI School Board officially changed its name to Board of Regents and established an incorporated non-profit organization.

Operating initially on an open-entry, open-exit system of individualized training, SIPI was awarded a citation for Excellence of Service by the Department of Interior in 1974. Throughout the 1980's and early 1990s, SIPI continued to evolve and grow in a way that served its student population, tribal communities, industry and public agencies.

SIPI was later threatened with closure because of the federal government's efforts to decrease spending. SIPI responded by creating a more cost effective program and a traditional semester system was established. The students and the National Indian Community responded with a major movement of public support, which resulted in the continuing operation of SIPI. In May of 1983, SIPI held its first commencement exercises with 124 students graduating.

In June 1991, the SIPI Board of Regents developed an expanded 20-year mission and direction for the institution. The "Transition 2000 Plan" required SIPI to achieve community college accreditation and to develop advanced technical education and university transfer degrees. In September of 1991, SIPI celebrated its 20th Anniversary. In August 1993, the institution achieved community college status and received continued accreditation by the Higher Learning Commission, a member of the North Central Association. SIPI presently offers the following degrees as well as certificate programs:

Associate of Applied Science
Associate of Arts
Associate of Science

By 1995, the College had developed a facility Master Plan that would help the College with its expanded 10 year mission and direction. In September of 2001 SIPI celebrated its 30th Anniversary.

In September of 2003, SIPI's newly opened 72,540 square foot Science and Technology Building was ready for occupancy.

ADMISSION AND REGISTRATION

Admission

Anyone interested in seeking admission into Southwestern Indian Polytechnic Institute (SIPI) should obtain and complete an application packet from the Admissions office by calling (505) 346-2338, or 1-800-586-7474. The application packet is also available at the SIPI website at <http://www.sipi.edu>. Admission is the process of applying and being accepted to SIPI. Registration is the process of selecting courses, receiving a class schedule and completing enrollment at SIPI. SIPI's academic year is divided into three terms defined as trimesters, which usually begin in September, January and May. Students are urged to apply for admission at least two months before registration.

General Admission Requirements

SIPI accepts as students, American Indian and Alaskan Natives who meet one of two tribal affiliation criteria: (1) verification of U.S. federal tribal membership from a Bureau of Indian Affairs (BIA) agency or tribal census office or (2) must be one-quarter percent, or more, blood quantum of a federally recognized tribe(s), verified by either a BIA agency or tribal census office.

Minimum age of acceptance to SIPI is 17 years of age. Accepted students who are 17 years of age are not eligible to reside in the lodges until their 18th birthday. A parent or legal guardian must sign the release statement on the school application. The GED program requires students to be 18 years of age.

Documents Needed for Admission

- Admission Application
- Verification of Tribal Affiliation
- Official High School Transcript (Showing a graduation date)
- Transfer students must provide all official College transcripts
- Health Physical (Can be turned in 30 days after instruction begins)
- Immunization Record (Can be turned in 30 days after instruction begins)
- DD-214 Form (If claiming veteran status)

Reporting any false information on a student's application may be grounds for denying admission or suspension from the institution. The Admissions office will not copy, transfer, or return documents submitted for admission to SIPI. All accepted new and transfer students are required to take the ACT Compass Test for placement. Based on placement and test scores, the student may be required to enroll in developmental courses to help prepare the student for success in college level courses.

Applicants on Criminal Probation or Parole

Applicants currently on criminal probation or parole must indicate their status by checking the "Yes" box in the General Information section on the first page of SIPI's Application for Admission. Any applicant, who is on criminal probation or parole or is pending for criminal probation or parole, must have their application reviewed by the Director, Admissions and Financial Aid before consideration for acceptance can be determined. The Director may request additional documents to determine the applicant's eligibility for acceptance.

SIPI will not grant acceptance to SIPI as part of a Grounds for Motion for Release or as a condition of release from incarceration, probation or parole. Students on probation or parole will not be provided lodging privileges until one year after the probation/parole is successfully completed. The student will provide the Admissions office official documentation of the successful completion of probation/parole.

If this institution finds that the SIPI application for admission has been falsified to later show that the student is on probation or parole the student will be immediately dropped from SIPI and will not be allowed to reapply until one year AFTER the drop was initiated. At that time the student must provide documentation of probation or parole and successful completion of probation or parole.

Readmission

Any student who is applying for readmission to SIPI is required to contact Admissions to obtain a readmit application. If the student attended SIPI prior to 1989, an application form and all required documents as stated in the admissions requirements must be submitted.

Orientation

Orientation is designed to assist new students in making a successful transition into SIPI and to enhance the student's positive feelings about the institution. Attendance is required of all new students. Readmitted students are also welcome to attend.

Classification of Student

Students registered for twelve (12) or more credit hours during a regular semester are considered full-time students. Part-time students may or may not be working toward a degree or certificate and are registered for one to eleven (1-11) credit hours.

Transfer Credits

Transfer students will be admitted to SIPI in good standing, if previous college cumulative grade point is 2.0 and above. Transfer students with a grade point average that is below a 2.0 may be admitted on academic probation. Grades earned in courses taken at other institutions are not included in the calculation of SIPI grade point average.

SIPI will accept college, vocation and technical transfer courses from accredited post-secondary institutions. If a credit from another college is to be accepted towards an SIPI certificate or degree then the following must apply: a). An official transcript is required for evaluation and must be submitted to the Admissions office, b). Transfer credits in any degree program of study offered by SIPI must have a letter grade of "C" or higher, provided the classes are similar or equivalent to courses offered at SIPI, c). A minimum of twenty-four (24) residency hours in a core area is required for the award of a certificate or degree. NOTE: Official transcripts submitted to SIPI Admissions become the property of the Institution and will not be transferred or returned to the students.

Students with Disabilities

SIPI ensures access to facilities and academic programs for students identified by the American Disabilities Act. The Vocational Rehabilitation Counselor assists students in arranging academic and residential accommodations. To assure that students receive the support services needed for accomplishing their educational and career goals, services are coordinated with external agencies such as, the Division of Vocational Rehabilitation Programs, and local health facilities. Please contact the Vocational Rehabilitation Counselor at (505) 346-2319 regarding a disability.

POLICY STATEMENTS REGARDING APPLICATION FOR ADMISSIONS

Anti-Harassment

It is the policy of SIPI to prevent and eliminate forms of unlawful harassment in employment and educational settings. SIPI prohibits harassment of people on the basis of race, color, religion, national origin, physical or mental disability, age, gender, sexual orientation, ancestry, medical condition or other protected status. SIPI is committed to creating and maintaining an atmosphere free from all forms of harassment.

Equal Education

SIPI is committed to providing equal educational opportunity and forbids unlawful discrimination on the basis of color, religion, physical or mental disability, age, gender, sexual orientation, ancestry, or medical condition. Equal educational opportunity includes: admission, recruitment, extracurricular programs and activities, and housing.

Family Educational Rights and Privacy Act (FERPA)

It is the policy of SIPI to comply fully with the terms, provisions and intent of the Family Educational Rights and Privacy Act of 1974, as amended (FERPA). A complete statement of SIPI's policy and procedures relative to this act may be obtained from the Admissions office.

Following the guidelines established by FERPA, the college strives to protect personal privacy and the confidentiality of official student records. This section describes in general SIPI's policy of confidentiality and privacy.

Most of the information in your student record is considered confidential, with the following exceptions:

- Your local address
- Your e-mail address
- Your local telephone number
- Your major field of study
- The dates you attended SIPI
- Your student classification
- Your enrollment status (full-time or part-time)
- The type of any degree you have earned from SIPI and the date on which you received it

The information listed above is considered public information. SIPI does not sell lists of students or name-and-address labels to businesses or agencies outside the college. If you wish to limit access to this information, you should notify the Admissions office that you want the information treated as confidential. You can do so by completing a privacy request form, available at the Admissions office.

In discharging their official duties, SIPI employees may read, review, photocopy, and distribute to appropriate persons within SIPI any information contained in your student record. However, before distributing confidential information outside SIPI, even to members of your family, SIPI faculty and staff must first secure your written permission to do so.

FINANCIAL AID

Financial Aid

SIPI offers a number of financial aid programs in the form of grants, work-study, scholarships, and employment. Students interested in financial aid are encouraged to contact the Financial Aid Office for information and application forms. Funds are limited and students should apply early. Refer to the consumer information located at the Financial Aid Office for policies and procedures and application processes.

All students enrolled in a certificate or degree program are strongly encouraged to apply for student financial aid by filling out a Free Application for Federal Student Aid (FAFSA). FAFSA applications are generally available at colleges, universities, high schools, and public libraries. The FAFSA is most prevalently accessed online at www.fafsa.ed.gov or via phone at 1-800-4-FED-AID. Students must complete a FAFSA each academic year.

Eligibility Requirements

To receive financial aid:

1. Students must be enrolled as regular students in an eligible program.
2. To qualify for a full-time financial aid award, students are required to carry a minimum class load of twelve (12) credit hours and maintain satisfactory academic progress (SAP).
3. Part-time students are also eligible for financial aid.
4. Students are required to sign a statement of educational purpose stating that funds received will be used for educational purposes only.
5. Students may not owe a refund on Title IV grants and must NOT be in default on any federal student loans at any school previously attended.
6. Students who transfer between trimesters must provide an academic transcript from the post-secondary school that they are transferring from.
7. Male students over the age of 18 are required to register with Selective Service.
8. Students must be a U. S. Citizens or eligible or non-citizens who qualify for aid.

Types of Financial Programs Available

Funding offered by the financial aid office. Students must fill out a Free Application for Federal Student Aid (FAFSA).

Need Based:

- Pell Grant
- Federal Supplemental Grant
- Federal Work Study
- New Mexico Student Incentive Grant
- New Mexico Work Study

- New Mexico College Affordability Grant
- Tribal Grant/Scholarships—must apply to your respective tribe
- National Indian Youth Council—must reside off-campus in Bernalillo County.

Non-Need Based:

- American Indian Services
- Veterans Benefits—must have services in the US military and contributed to educational fund
- American Indian College Fund—must have an established GPA of 2.5 or better; apply at www.collegefund.org
- Lumina “Angel Fund”—Funds are awarded as loans or grants depending on emergency circumstances

Other sources of scholarships may be found on the following websites:

<http://www.fastweb.com>

-OR-

<http://www.scholarshipsearch.com>

REGISTRATION FEES AND PAYMENTS

Student Fee Schedule

Admitted students are required to register for each trimester they attend. The Bureau of Indian Education (BIE) provides tuition, room and board, and some books to students at minimal charge. Students must pay required fees prior to registration for classes. All fees will be paid in the Student Accounting Office. Students are responsible for the following fees:

LODGE FULL-TIME STUDENT:

Student Activity Fee	\$ 20.00
Library Usage Fee	50.00
Academic Enhancement Fee	5.00
Lodge Resident	55.00
Text Book Usage Fee	145.00
Identification Card Fee	5.00
Total	\$ 280.00

COMMUTER FULL-TIME STUDENT:

Student Activity Fee	\$ 20.00
Library Usage Fee	50.00
Academic Advancement Fee	5.00
Text Book Usage Fee	145.00
Identification Card Fee	5.00
Total	\$ 225.00

COMMUTER PART-TIME STUDENT:

Student Activity Fee	\$ 20.00
Library Usage Fee	50.00
Academic Enhancement Fee	5.00
Text Book Usage Fee	70.00
Identification Card Fee	5.00
Total	\$ 150.00

Only money orders or tribal checks are accepted for payment of fees.

ACADEMIC SUPPORT CENTER

SIPI's faculty and staff hope you will spend many productive hours in the Academic Support Center while attending SIPI. The Center is the students' place, a place where you can study in a quiet area, engage in the dynamics of a study group, write your papers or develop spreadsheets, work with a tutor, or take advantage of computer assisted instructional software and other study resources. If you are uncomfortable with computers, we will periodically conduct basic introductions to the computer through a workshop series. Information on these workshops will be posted on our bulletin boards and the SIPI web page.

We strive to make the Academic Support Center a place where you feel comfortable and where you are able to reach your academic goals. If you have suggestions for how we might improve our services to you, please let us know.

CHILD CARE AND FAMILY CENTER

The SIPI and various partners propose to create an Early Childhood Development Laboratory School on the SIPI campus. The Laboratory School is designed to:

- Enhance the Early Childhood Education classes currently being offered at the college through a hands-on learning environment and laboratory school.
- Provide quality childcare for low-income students accessing training and education at SIPI.
- To serve as a clearinghouse for age-appropriate and culturally-appropriate materials and practices that support the social, emotional, physical, and cognitive growth of Native American children and the well-being of their families.

The Laboratory School is expected to open in Spring 2010. The Laboratory School will address the demand for high quality, credentialed early childhood educators and childcare providers at the local, state, and national level.

COUNSELING AND ADVISEMENT SERVICES

Academic Counselors work with students to solve personal, social, career and academic problems. The counselors keep in close contact with academic programs and residential lodges, so that students who are encountering difficulties may receive professional guidance and counseling. At the beginning and end of each trimester the Academic Counselors administer the ACT Compass placement assessment to new and returning students to ensure placement in appropriate courses. In addition, a career assessment is available to assist students in exploring career interests.

Counselors and instructors provide academic advisement to students. Each student admitted to SIPI is assigned an advisor. The advisor provides academic advisement to students about class schedules.

PLACEMENT TESTING AND STATUS

Placement Testing

Entering students are required to take standardized tests to help SIPI better understand the student's academic abilities and needs. College assessment tests serve two purposes. First, they assess a student's skill levels in reading, writing, and mathematics in order to identify coursework that would be most appropriate. Second, by identifying the educational skills of those entering its classes, SIPI can better assess the quality of education it provides for its students.

All new SIPI students are required to take ACT Compass, unless they possess:

ACT Assessment report that shows a composite score of 18 or higher.

OR

SAT Score Verbal + Math report that shows a mean score of 870 or higher.

Transfer students who earned a C grade or higher in course equivalents to our ENGL 101 and MATH 121 may be exempt from ACT Compass, provided the grades were earned within the past five years.

If ACT Compass cutoff scores(s) indicate a student would be best placed in Adult Basic Education (ABE) developmental courses; a student will then be administered the Test of Adult Basic Education (TABE). ABE staff will review scores and discuss course opportunities with students. Students may enroll in the ABE program as appropriate.

Placement Status

Certificate and Degree

Students who have been accepted into a program of study and intend to earn a certificate or degree.

Non-Degree

Students who have been accepted but do not wish to earn a degree or have not chosen a degree program of study. These are students who usually plan to enroll in college level courses only.

Non-Certificate

Students who have been accepted but do not wish to earn a certificate or have not chosen a degree program of study. These are students who are in developmental studies and have not been accepted into a certificate level program.

Adult Basic Education and Developmental Education

Students who have been accepted and recommended for placement in ABE/Developmental Education to develop career and/or postsecondary skills.

Concurrent Enrollment

Qualified high school students who are approved through a Concurrent Enrollment Agreement between a high school and SIPI. Accepted students are enrolled in concurrent status and earn college credit as well as credit toward high school graduation.

LIBRARY SERVICES

Location: Library Building

Phone: (505) 792-4463

Hours: 8:00 am – 4:30 pm daily

The SIPI Library is available to all enrolled students. The library's collection has around 30,000 titles, about 100 periodical titles, and many books and magazines for recreational reading. The SIPI Library offers many services to students and staff. The following are the main services offered:

- Reference Services (finding materials, titles, subjects, etc.)
- Reserve Services (books/materials on reserve will be kept behind the service desk)
- Study areas (private study carrels provided)
- Tutoring in research techniques, Internet access, and how to use the card catalogue to find materials.
- Some (older) editions of Encyclopedias are available for checkout
- Computerized card catalog, OPAC, available for research
- 15 computers and one typewriter are available for student use; the library is a WiFi zone.

HOUSING AND RECREATION

Student Rights and Responsibilities

All SIPI students have specific legal rights and responsibilities as written in the Student Handbook. Copies may be obtained from the Residential Housing and Recreation Office.

Residence Life

The Residence Life Program is responsible for the men's Golden Eagle Lodge (GEL) and the women's Four Winds Lodge (FWL) housing operations and organized recreational programs.

SIPI's residential program is comprised of two residential lodges: the Golden Eagle Lodge (GEL) for male students and the Four Winds Lodge (FWL) for female students. Each room is designed to house three (3) students.

Full-time students in good standing are eligible for on-campus residency. Full-time students are defined as those carrying a minimum of twelve (12) credit hours per trimester. Students who drop or dis-enroll from a class and fall below 12 credit hours are considered part-time and are no longer eligible for lodge residency. Non-degree seeking students are also not eligible for lodge residency.

Because employees who work at the lodge are not certified to care for individuals who are pregnant, particularly in emergency situations, students are not permitted to live in the dorms after their second trimester of pregnancy, and other living arrangements must be made.

Campus Recreation

The Residence Life Program offers a wide variety of recreation opportunities for residential students and the larger college community. Activities include instructional classes, fitness training, intramural and extramural sports, club sports, public entertainment events, outdoor recreation activities, leadership training, team building, and special events. Schedules of various activities are posted in the lodges, Academic Support Center, and other academic buildings.

All activities incurring a cost to sponsor (i.e., movie, Balloon Fiesta, etc.) require a current SIPI ID card for participation. In addition, ID cards are used to check out equipment for recreational purposes.

MAIL SERVICE

Student mailboxes are available in the Academic Support Center. Each student can request a personal mailbox that is accessible daily. Mail is distributed Monday through Friday, two times each day.

FOOD SERVICE

SIPI provides food services through the on-campus dining hall. Hot meals and a fresh salad bar are featured daily; visitors are welcome.

Monday-Friday:	Breakfast	6:45 am	to	8:00 am
	Lunch	11:30 am	to	1:00 pm
	Dinner	4:30 pm	to	6:00 pm
Holidays & Weekends:	Brunch	10:00 am	to	12:00 pm
	Dinner	4:00 pm	to	6:00 pm

STUDENT ORGANIZATIONS AND CAMPUS ACTIVITIES

There are a number of clubs on campus, which are formed by student interest on a term by term basis. Some clubs that have existed in the past include American Indian Science and Engineering Society (AISES), Basketball Club, Dance Club, Music and Art Club, SIPI Intertribal Indian Club, New Optical Image, Phi Theta Kappa (must have a GPA 3.5 or higher), Four Winds Lodge Dorm Council, Golden Eagle Lodge Dorm Council, American Indian Political Alliance Council, and Natural Resources Club. The Student Senate information board, located in the Academic Support Center, has more information about which clubs are active in any given term, and what their mission and activities are.

You have the opportunity to form your own club. Interested students must complete a Plan of Operations, which is available at the Student Senate Office, and have the application approved by administration.

STUDENT GOVERNMENT

The Student Senate is comprised of four elected officers: President, Vice-President, Secretary, and Treasurer. The student body votes for these offices soon after the beginning of the fall trimester. This body acts as the voice for the students on matters that concern the students as a whole. The Student Senate is composed of members of the recognized clubs and organizations of SIPI.

ALCOHOL AND DRUG FREE CAMPUS

SIPI recognizes illegal non-prescription drug/alcohol abuse as a potential health, safety, and security problem to the students and the SIPI community. As such, on June 3, 1991, the SIPI Board of Regents passed Resolution 148 entitled Zero Tolerance, and alcohol and illegal drug policy. SIPI's Board of Regents amended this Resolution on April 22, 2004. The amendment increases the penalties for violating this policy, and as well as including Commuter Students being covered by this policy.

CAMPUS CRIME INFORMATION

The SIPI Security Office prepares an annual report to comply with the Jeanne Clery Disclosure of Campus Security Policy and Crime Statistics Act. The full text of the report and SIPI's policies regarding crime on the SIPI campus may be found at <http://www.sipi.edu> under the link "Public Disclosures."

Each year, a notification is made to all enrolled students by distributing copies of the report campus wide and providing a copy of the report in high-traffic areas, such as the Library and dormitories. Employees are notified via the SIPI e-mail system.

Copies of the report may also be obtained at the SIPI Security Office or in the Admissions Office, both located in the Administration Building. Statistical information on crimes reported on the SIPI campus can also be found on the U.S. Department of Education's website at: <http://ope.ed.gov/security/index.asp>.

Sex Offender Registration

The Campus Sex Crimes Prevention Act (CSCPA) of 2000 is a Federal law that provides for the tracking of convicted sex offenders enrolled at, or employed by, institutions of higher education. The CSCPA is an amendment to the Jacob Wetterling Crimes Against Children and Sexually Violent Offender Act.

The New Mexico Sex Offender Registration and Notification Act (Chapter 29, Article 11A NMSA 1978) also requires convicted sex offenders to notify their local law enforcement agencies within ten days of obtaining employment or enrolling as a student.

At such time as SIPI's day care facility becomes operational, SIPI will be notified if and when a registered sex offender resides within one mile of the campus. Until that time, BCSO is not obligated to notify SIPI when a registered sex offender resides within that distance, or is employed at SIPI or potentially in contact with minors.

SIPI is required to inform the campus community that a list of registered sex offenders will be maintained and made available at two campus locations: the Security and Safety Office, located in Room 111 of the Administration Building; and the Admissions Office, also located in the Administration Building.

A list of all registered sex offenders in New Mexico is available from the New Mexico Department of Public Safety at: <http://www.nmsexoffender.dps.state.nm.us/>. Information on registered sex offenders in Bernalillo County can be found at: <http://ims.bernco.gov/website/sexoffend/viewer.htm>.

SIPI is located in Bernalillo County. SIPI's zip code is 87120.

The CSCPA amends the Family Educational Rights and Privacy Act of 1974 (FERPA) to clarify that nothing in the Act can prohibit an educational institution from disclosing information provided to the institution concerning registered sex offenders.

STUDENT COMPLAINTS

Students have the right to submit complaints in writing to the appropriate college authority. Student complaints will be taken seriously and investigated. Forms for recording and submitting complaints are available at the Director of Housing and Recreation Office and also at <http://www.sipi.edu>.

GENERAL ACADEMIC POLICIES

System of Course Descriptions and Numbering

Courses of study and their descriptions are arranged according to course numbers within their departments. The course value in trimester credit hours is indicated in parenthesis after the course title.

Courses numbered 091-100 are preparatory or developmental courses and not applicable to college credit.

Courses numbered 101-199 are college level courses usually taken (at the freshmen level) during year one.

Courses numbered 200-299 are college level courses usually taken (at the sophomore level) during year two.

Course Load

The normal course load for each trimester is 12 to 18 credit hours. Twelve credit hours constitute a full load for residence lodge accommodations and for cafeteria meals. Students requesting to register for more than 18 hours must seek permission and must meet certain criteria.

Enrollment Status

- A full-time student carries 12 or more credits per trimester.
- A three-quarter-time student carries 9-11 credits per trimester.
- A half-time student carries 6-8 credits per trimester.

Adding/Dropping Courses

Students may add or drop courses by the end of the first week of classes during a trimester. An exception can be made after the first week of classes if a course is cancelled due to low enrollment. (*See academic calendars for dates.*)

Withdrawing Courses

Students withdrawing from a course or courses on their own may do so within the first eight weeks without a penalty. A withdrawal from a course results in a final grade of "W" which is recorded on the student's transcript.

Class Attendance

All students registered for classes are expected to attend classes. Every student shall be responsible for checking with each instructor regarding their policy on missed assignments or exams.

- Absences may be allowable within a specific percent of contact hours required for credit hour courses. It is the responsibility of the student to track their own absences. If a student is absent beyond the allowable absences, he/she will be disenrolled from the class. A student may appeal a disenrollment providing there is justifiable documentation.
- A student who is absent from any class on three or more consecutive days without notification will be disenrolled from the class. A student may appeal the disenrollment with documented justifiable reasons.

Grading

Grades

Grades are issued and recorded at the midpoint and the end of the trimester. The grade earned in each course is indicative of the quality of work completed. The grading scale, except for GED, is as follows:

A	Excellent	4 Quality Points
B	Good	3 Quality Points
C	Satisfactory	2 Quality Points
D	Minimally Passed	1 Quality Point
F	Failed	0 Quality Points
I	Incomplete	The grade of "I" is given only when circumstances beyond the student's control have prevented the completion of coursework within the official dates of the session.
W	Withdrawal	Withdrawal; grade from the beginning of the trimester through the published "last day to withdraw with a 'W'" date, if a student withdraws or is disenrolled from a course. Previous course disenrollments that were processed and that resulted in a "W" will remain the same. All withdrawals or disenrollments occurring after the published "last day to withdraw with a 'W'" date and all improper withdrawals regardless of when they occur will be recorded as a letter grade of "F". Exception(s) being students who withdraw for medical reasons with verifiable documentation; or students who withdrawal due to military obligations with verifiable documentation (military orders or evidence of enlistment).
AU/S	Audit Satisfactory	To indicate a student has satisfactorily completed all course requirements for an Audit course.
AU/W	Audit Withdrawal	To indicate that the student did not complete the course requirements and/or withdrew from an Audit course.

Note: GED courses are graded using PS/FL/W and are not included in any GPA calculations.

Grade Point Average System

A Grade Point Average (GPA) is computed by dividing the total quality points by the total hours attempted in the following way:

Grade points are computed by multiplying the number of credit hours earned per individual course by the quality point value assigned to the grade. For example, a three credit hour course with a grade of “B” = 9 quality points (3 credit hours multiplied by 3 quality points value). Courses attempted that earned an “F” are included in the calculation.

The total number of quality points earned in all courses is divided by the total number of hours attempted. The result is the GPA. GPAs (including cumulative GPAs) will be to two (2) decimals, i.e., 2.8921 calculate to 2.89; 2.8974 calculate to 2.90.

Academic Standing

Students shall maintain a minimum 2.00 CGPA throughout their program of study. When a student receives a final grade of A, B, C, D, or F, they are considered credit hours attempted and earned. “W” and “I” grades earn no credits and are not considered hours completed. Transfer credit hours accepted by SIPI are not calculated in cumulative grade point averages for determining satisfactory progress.

Academic Probation and Academic Suspension

Academic Probation

All SIPI students are expected to maintain an overall “C” (2.00) Grade Point Average (GPA) to remain in good academic standing. When the Trimester GPA falls below 2.00, the student is placed on academic probation for the next trimester the student enrolls. The student on academic probation must raise his/her trimester GPA to 2.00 or better by the end of the trimester to return to good academic standing. A student on academic probation:

- Is not eligible to hold office in the Student Senate
- Cannot pre-register for the following trimester of attendance

Academic Suspension

Academic suspension takes place when a student on academic probation fails to bring his/her trimester GPA above 2.00 or better by the end of a probation period.

The first (1st) suspension is for one (1) trimester.

The second (2nd) suspension is for one (1) calendar year.

The third (3rd) suspension is permanent. After one year following the third suspension, if unusual circumstances warrant it, the student may petition the Vice President of Academic Programs for readmission, through the Director of Admissions and Financial Aid.

Eligible students applying for readmission to SIPI must go through readmission procedures. All Students readmitted from academic suspension are automatically placed on academic probation for the readmitted trimester.

If a readmitted student is placed on academic probation for a readmitted trimester, and the student earns a 2.00 or higher GPA, the student will return to good academic standing at the beginning of the next admitted term. If the readmitted student fails to achieve a 2.00 GPA, the student will be academically suspended as specified by academic standards policy.

NOTE: ACADEMIC SUSPENSION IS FINAL AND CANNOT BE APPEALED.

Students placed on Academic Probation or Academic Suspension are subject to additional regulations regarding Financial Aid Satisfactory Academic Progress (SAP). Students should contact the Financial Aid Office for pertinent regulations.

Double Degrees

Students desiring to major in two disciplines concurrently must petition to the appropriate Department Chairs within the first two trimesters of enrollment in the program. The Vice President of Academic Programs must approve double degree petitions. The double degree program must be equivalent in its purpose or must be compatible in meeting the student’s goals. A student must not be enrolled in more than two programs of study.

Maximum Time Frame

Students in Adult Basic Education (ABE), developmental, or non-degree status have a maximum of three (3) trimesters of study to enter a certificate or degree program. Students will not be granted extension beyond that timeframe. For Financial Aid purposes the Maximum Time Frame is defined as: A student cannot exceed 150% of the published length of the program measured in academic terms or credit hours. For example, if the length of an associate's degree program is 64 credit hours, the maximum period must not exceed 96 (64X1.5) attempted credit hours. Students should contact the Financial Aid Office for additional information.

Grade Replacement

College courses may be repeated only once, such as to replace a "W" or "F" or to improve a grade of "D". The student must seek approval from the Vice President Academic Programs if a course is to be repeated more than once. Developmental courses may be repeated until mastery (i.e., a passing grade of "C" or better) is achieved.

All grades earned will be recorded in the student's transcript, but only the grade approved for grade replacement will be used to calculate the cumulative grade point average (GPA). Only course work being applied toward an Associate's Degree and/or Certificate may be considered for grade replacement. A grade replacement may be applied to only 12 credit hours of course work.

Students must initiate the Grade Replacement Petition through their advisor by the end of the add/drop period of the trimester in which they are repeating the course. The course numbers must be identical except where equivalencies or a change has been noted in academic policies. Students who have not graduated from SIPI are eligible for a grade replacement.

Course Challenge

Students may, with written approval of the instructor and department chair, take a special examination to establish credit in courses appearing in the catalog. To challenge a course, the student must meet the following criteria:

1. Student must not have been previously enrolled in the course at SIPI or elsewhere,
2. Student must be enrolled in 12 or more credit hours (not including the challenge course),
3. Proposed course to be challenged must be numbered 101 or higher; and
4. A maximum of two core program courses may be challenged.

No more than 20% of the student's total program of studies requirements may be satisfied through this method. Credit for courses may only be challenged once. Course prerequisites must be fulfilled when challenge is unsuccessful and prior to challenging a course. The student must enroll in the course if it is a required course in his/her program of studies.

If credit is authorized, it will count toward satisfying course requirements in the student's program of studies. However, the challenge credit earned will not be used to:

- Calculate the grade point average (GPA),
- Satisfy lodge residency requirements,
- Compute full-time status, or
- Satisfy financial aid criteria.

Auditing a Class

A student may audit a class by registering for the course, providing the instructor approves the audit. Only courses numbered 101 or above may be audited. All audit course approvals or changes must be completed by the trimester calendar add/drop deadline. An auditor has the same responsibilities as other students and is responsible for checking with the respective instructor regarding homework assignments, examinations, and attendance policies that will be required while enrolled.

An audit receives no credit and will not be included in the student's total course load for purposes of enrollment certification such as, full time status, residence lodge privileges, and financial aid grants. Courses taken for audit may be repeated for credit. Audit courses appear on the academic record.

Final Examinations

Final examinations are given at the end of each trimester. Students must take their final examinations during the scheduled time period. Students who fail to take final examinations may receive a failing grade and jeopardize their academic status.

Course Repetition

A student must seek permission from the Vice President of Academic Programs to repeat a course for the third time if the student has failed the course, dropped the course, or is repeating the course for a better grade.

Graduation Requirements

Associates Degree:

1. Must have been formally admitted to SIPI;
2. Must submit a Petition to Graduate by the seventh week of instruction through the student's academic advisor;
3. Must have completed ALL general education and degree requirements in the program of study;
4. Must have "C" grades or better in all courses required by the program of study, and
5. Have a cumulative grade point average of 2.0 or better.

Upon graduation from SIPI with a degree in a given discipline, students will not be allowed to immediately re-enroll at SIPI to pursue another discipline until after one full calendar year has elapsed from their initial completion date. After one year, a SIPI graduate may apply for readmission to upgrade current skills in a non-degree status. Petitioning to enroll in a new area of study will be considered by the Readmission Committee. Decisions will be based on each applicant's needs and merit of each request. An exception will be made for a student who graduated with a certificate of completion.

Certificate:

1. Must have been formally admitted to SIPI;
2. Must submit a Petition to Graduate by the seventh week of instruction through the student's academic advisor;
3. Must have completed ALL general education and degree requirements in the program of study;
4. Must have "C" grades or better in all course work used on program of study; and,
5. Have a cumulative grade point average of 2.0 or better.

ACADEMIC RECOGNITION

President's Honor List

The President's list honors those students carrying 12 college-level credit hours or more who achieve a GPA of 4.00 at the end of a trimester.

Vice President's Honor List

The Vice President's list honors those students who are carrying 12 or more college-level credit hours who have a GPA between 3.50 and 3.99 at the end of a trimester.

The President invites those students who meet the membership requirements to join the Beta Beta Iota Chapter of the Phi Theta Kappa International Honor Society. A student must be:

- carrying 12 credit hours or more;
- must be accepted into a degree program;
- must be at least a second trimester student; and
- must have a cumulative GPA of 3.50 or above at the time of membership enrollment.

ARTICULATION

Core Transfer Courses

The following General Education matrix curriculum was developed by the State of New Mexico Higher Education Department (HED) to facilitate the transfer of students between New Mexico's institutions of higher education (Chapter 224 of the Laws of New Mexico 1995). In accordance with policies established by the New Mexico HED, designated general education core courses successfully completed at any regionally accredited public institution of higher education in New Mexico are guaranteed to transfer to any other New Mexico public institution. Students enrolling at a New Mexico institution and wish to prepare for transfer into a baccalaureate degree program at a four-year institution are advised to take these courses during their freshmen and/or sophomore years.

The core matrix of approved courses guaranteed to transfer and meet general education requirements at any New Mexico college or university can be found on the New Mexico Higher Education Department web site at www.hed.state.nm.us.

GENERAL EDUCATION 35 HOUR TRANSFERABLE CORE

Area I: Communication	9 credits
(a) Freshman Composition (ENGL101)	3 credits
(b) Advanced Composition (ENGL102, ENGL219)	3 credits
(c) Oral Communications (SPCH130)	3 credits
Area II: Mathematics (appropriate to transfer major)	3 credits
(a) College Algebra (MATH121)	3 credits
(b) Calculus I (MATH162)	3 credits
(c) Other College Level Mathematics (MATH120, MATH123, MATH145, MATH150, MATH180)	3 credits
Area III: Laboratory Science (Students may choose courses from one or more disciplines)	8 credits
(a) General Biology with laboratory (BIOL 111, 121 or 123)	4 credits
(b) General Chemistry with Laboratory (CHEM 111, 121, or 122)	4 credits
(c) General Physics with Laboratory (PHYS151)	4 credits
(d) Geology/Earth Science with Laboratory (GEOL101)	4 credits
(e) Astronomy with Laboratory (ASTR101)	4 credits
(f) Environmental Science (N/A)	
(g) Other Sciences (NATR200/L)	4 credits
(h) Introduction to Plant Science (AGTC104/L)	4 credits
Area IV: Social/Behavior Select Science	6-9 credits
Minimum of 6 credits must have 15 credits total between this area and Humanities and Fine Arts.	
(a) Economics (Macro or Micro) (ECON 200 or 201)	3 credits
(b) Introductory Political Science (POLS 110 or 200)	3 credits
(c) Introductory Psychology (PSYC105)	3 credits
(d) Introductory Sociology (SOC1 101 or SOC1 210)	3 credits
(e) Introductory Anthropology (ANTH 101 or 130)	3 credits
Area V: Humanities and Select Fine Arts	6-9 credits
Minimum of 6 credits must have 15 credits total between this area and Social/Behavioral Sciences.	
(a) History Survey Western Civilization (HIST101)	3 credits
• U.S. History before 1877 (HIST161), U.S. History since 1877 (HIST162)	3 credits
• History of Pre-Columbian America (HIST218)	
• History of Indian Education (HIST260)	
(c) Intro. Course in History, Theory or Aesthetics of the Arts or Literature	3 credits
• Introduction to Art (ARTH101), Art foundations (ARTH102)	
• Literature: Topics in Literature (Native American, LITR 211)	
• American Literature (LITR 296)	
COMMON CORE REQUIRED TOTAL	35 credits

New Mexico Business Transfer Courses

The following Business Transfer matrix was developed by the Statewide Business Articulation Committee to facilitate business classes transferring between New Mexico's two and four year institutions. In conjunction with the 35 hour General Education Core, selected business classes will provide students with two-year degrees in Business that transfer to other New Mexico Colleges and Universities. The core matrix of approved courses guaranteed to transfer and meet business requirements at any New Mexico college or university can be found on the New Mexico Higher Education Department web site at www.hed.state.nm.us.

Cross-walk NO.	BUSA 1113	BCIS 1113	ECON 2113	ECON 2123	MKTG 2113	MGMT 2113	ACCT 2113	ACCT 2123	BLAW 2113	MATH 2113
INSTITUTIONS	INTRO TO BUSINESS	INTRO TO COMPUTERS & BUSINESS APPS	MACRO ECONOMICS PRINCIPLES	MICRO ECONOMICS PRINCIPLES	PRINCIPLES OF MARKETING (h)	PRINCIPLES OF MANAGEMENT (h)	PRINCIPLES OF ACCOUNTING I (Financial)	PRINCIPLES OF ACCOUNTING II (Managerial)	BUSINESS LAW I (h) (c)	STATISTICS
SIPI	BADM 114	COSC 107	ECON 200	ECON 201	BADM 242	BADM 130	ACCT 201	ACCT 202	BADM 240	Math 145
Eastern NMU	BUS 151	CIS 151	ECON 221	ECON 222	MKT 301	See notes.	ACCT 212 (d)	ACCT 211	BUS 315	STAT 213
NMHU		MIS 233	ECON 216	ECON 217	MKTG 302	MGT 303	ACCT 287	ACCT 288	BLAW 360	BUS 210
NMSU	BUSA 111	BCS 110G or CS 110G	ECON 251G	ECON 252G	MKTG 303 (j)	MGT 201G	ACCT 252	ACCT 251	BLAW 316 (a) or BLAW 317	STAT 251 or EST 251 or EST 311G
NMMI		BCS 209	ECON 251	ECON 252	MKT 335		ACCT 201	ACCT 202	BA 315	BCS 283 or MATH 283
UNM	MGT 113	CS 150	ECON 105	ECON 106	MGT 222/322 (g)	Free Elective (i)	MGT 202 (e)		MGT 309 (b)	STAT 145 or STAT 245 or STAT 345 or MGT 290
WNMU	BSAD 100	CMPS 111 or CMPS 260	ECON 201	ECON 202	Free Elective (i)	BSAD 350	BSAD 230	BSAD 231	BSAD 300	MATH 321
Clovis CC	BAD 151	CIS 101 or CIS 120	ECON 221	ECON 222	MKT 201	MGT 201	ACCT 201 (d)	ACCT 202 (d)	BAD 215	STAT 213
Diné College	BUS 141	BUS 280	ECO 200	ECO 201			BUS 251	BUS 252	BUS 204	MATH 213
ENMU-Roswell	BUS 151	CIS 185	ECON 221	ECON 222	MKT 201	MGT 201	ACCT 201 (d)	ACCT 202 (d)	BUS 230	STAT 213
Luna CC	BUS 105	CIS 100	ECON 208	ECON 209	MKT 201	MGMT 207	ACCT 200 (d)	ACCT 201 (d)	LAW 242	MATH 130
Mesa Lands CC	BUS 101		ECON 252	ECON 251		MGT 113	ACCT 111	ACCT 210	BLAW 202	
NMJC	BU 113	CS 123A or CS 123D	EC 213	EC 223	BU 223A	BU 213	AC 114	AC 124	BS 213	BU 233
NMMI	BUS 111	CIS 117	ECN 211	ECN 212		BUS 201	BUS 213	BUS 214	BUS 202	MTH 251
NMSU-Alamogordo	OEBU 110 or BUSA 111	CS 110g	ECON 251G	ECON 252G	MKTG 203 or OEBU 210	MGT 201G	ACCT 252	ACCT 251	BLAW 230	STAT 251
NMSU-Carlsbad	BUSA 111	BCS 110G or CS 110G	ECON 251G	ECON 252G	MKTG 203	MGT 201G	ACCT 252	ACCT 251	BLAW 230	STAT 251
NMSU-Dona Ana	BUSA 111 or OEBU 110	CS 110G or OECS 105	ECON 251G	ECON 252G	OEBU 210	MGT 201 or OEBU 140	BOT 120 & BOT 121	ACCT 251	OEBU 231	STAT 251
NMSU-Grants	BA 104	CS 110G	ECON 251G	ECON 252G			ACCT 201	ACCT 202	BA 230	STAT 251
NMCC College	BA 120	BA 225	ECON 200	ECON 201	BA 251	BA 202	BA 130 (d)	BA 131 (d)	BA 266 (d)	MATH 115
SJCC	BADM 114	COSC 111 or COSC 125	ECON 251	ECON 252	BADM 242	BADM 233	ACCT 201 (d)	ACCT 202 (d)	BADM 230 or BADM 210	MATH 251 (d) or BADM 212
SFCC	BSA 111	CIS 111 and 111L, BOIT 131L or BOIT 132L	ECON 200	ECON 201	BSA 240	BSA 211	ACC 121 (d)	ACC 122 (d)	BSA 232	BSA 260L or MATH 135L
CNM	BA 113	BA 150(k) or CSCI 101(k) or CP 176(k)	ECON 200	ECON 201	BA 222	BA 133	ACCT 101A and ACCT 101B	ACCT 102	BA 211	MATH 145 or MATH 245
UNM-Gallup	BUSA 1010	BCIS 1010	ECON 2010	ECON 2020		MGMT 2010	ACCT 2010		BLAW 2010	STAT 2010
UNM-Los Alamos	MGMT 2010	CS 150	ECON 200	ECON 201			MGT 202		BUST 218	MGT 245 or MGT 290
UNM-Valencia	MGT 113	CS 150	ECON 200	ECON 201			MGT 202 or MGT 101 & MGT 102		BUST 218	MATH 245 or MGT 290

- Notes:
- (a) NMSU BLAW 317 is preferred for accounting majors but BLAW 316 is acceptable.
 - (b) UNM Credit toward BBA degree given for either MGMT 309 or MGMT 310. Accounting majors must take MGT 310.
 - (c) Business Law must be taught by an attorney.

- (d) Courses carrying four credit hours may transfer as three credits.
- (e) UNM Students not having completed six credit hours of accounting shall be required to demonstrate appropriate competency in the subject area.
- (f) TVI ACCT 101 is 6 credits.
- (g) UNM MGT 222 - Non-BBA majors only/MGT 322 must have ENGL 102, ECON 201 equivalents as prerequisites for conditional waiver.
- (h) 200 level courses that may be accepted do not count toward upper division core hour requirements.
- (i) Will accept as free elective credit only.
- (j) Students entering with MKTG 303 (but lacking managerial accounting and operations management) will be exempted from BUSA 422.
- (k) In fall 2005, BA 150, CSCI 101, and CP 176 will become IT 101 (same content and credit hours).

*All courses except TVI, UNM Gallup, Los Alamos, Valencia transfer in as MATH 145.

For more information contact SIPI's Department of Liberal Arts and Business Technologies (505) 346-2353.

New Mexico Common Course Numbers for Early Childhood Education

SIPI #	CC #	Course Name
ECED 126	ECED 1113	Childhood Growth and Development
ECED 124	ECED 1122	Health, Safety and Nutrition
ECED 202	ECED 1133	Family and Community Collaboration
ECED 218	ECED 1143	Assessment of Children & Evaluation of Programs
ECED 220	ECED 2152	Professionalism
ECED 130	ECED 2163	Curriculum Development & Implementation I
ECED 130P	ECED 2162	Practicum I
ECED 230	ECED 2173	Curriculum Development and Implementation II
ECED 230P	ECED 2172	Practicum II
ECED 214	ECED 2183	Guiding Young Children
ECED 204	READ 2113	Introduction to Reading and Literacy Development

Note: SIPI's Early Childhood Education Program has been approved by the New Mexico Early Childhood Education Task Force using the New Mexico Universal Catalogue of Courses for Early Care, Education, and Family Support courses to transfer to other two-year and four-year institutions in New Mexico.

In conjunction with the 35 hour General Education Core and the required Early Childhood classes will lead students to a two year degree in Early Childhood Education.

EXTENDED COLLEGE

Mission Statement

The mission of the SIPI, a National Indian Community College, is to provide quality technical and higher education opportunities that meet the dynamic needs of federally recognized tribes. To meet this mission and in recognition of the diversity of student populations (traditional and adult/non-traditional learners) the SIPI Extended College is organized to provide outreach, responsive educational programming and multiple delivery systems including distance education formats.

Goals

- Provide support services for adult and nontraditional students
- Initiate opportunities for lifelong learning
- Administer off-campus outreach programs throughout the College's service area
- Facilitate professional development, credit and non-credit programs in response to the needs of federally recognized tribes

To register for classes with academic credit under the SIPI Extended College please refer to the section on General Admissions Requirements. All documents must be submitted to the Admissions office.

For deadlines, please see the College's academic calendar.

COMMUNITY PROGRAMS

Family Extension & Education Program

The overall objective of the Family Extension and Education Program (FEEP) is to ensure community Tribal members access to knowledge, skills development, child rearing practices, child development, health, nutrition, dietary information, career path and financial assistance, in order to better manage their family life and resources. The program builds a collaborative relationship between SIPI, Tribal communities and their Head Start and Early Childhood Centers. All activities and projects are the result of focus groups, surveys and other input from Tribal communities. The use of distance education allows communities in remote areas to benefit from the same resources as SIPI students.

The Resource Center is an integral part of the FEEP Program. The Center sponsors workshops on various topics of interest in the following areas:

- Child development
- Health
- Financial education
- Nutrition
- Education

Community members are encouraged to borrow materials from the Resource Center.

Diabetes Programs

Diabetes Based Science Education in Tribal Schools (DETS)

A health disparity related to diabetes is increasing among American Indian and Alaska Native people. The Diabetes Prevention Initiative will build capacity in health, with an emphasis in prevention of Type 2 Diabetes. SIPI's Diabetes Prevention Initiative targets the College's student population by revising and upgrading its health curricula with special attention to diabetes-related content, and will assist with the development an Associate Degree or certificate that will prepare students for careers in health promotion and wellness.

Honoring Our Health: Tribal Colleges and Communities Working Together to Prevent Diabetes

American Indian Higher Education Consortium (AIHEC), National Diabetes Prevention Center, National Center for Chronic Disease Prevention and Health Promotion, and Centers for Disease Control and Prevention have partnered to build capacity and develop an infrastructure at SIPI to address disparities in health, with an emphasis on prevention of Type 2 Diabetes.

Seven Generations of Health

"Seven Generations of Health: A Trans-generational Approach to Human Nutrition and Obesity Intervention in Indian Country" is a collaborative effort among:

- SIPI
- Centers for Disease Control
- Indian Health Service
- American Indian Research and Education Center at the University of Nevada, Las Vegas, and
- Office of Native American Diabetes Program at the University of New Mexico

The project has two primary goals:

1. To develop and disseminate accurate, culturally relevant information about nutrition, exercise and obesity prevention throughout Indian Country as a means to eliminate health disparities
2. To establish community-based infrastructures for life-long healthy lifestyles in four Native American communities.

Peer-educators, trained through a Train the Trainer Institute at SIPI, facilitate Healthy Lifestyle Clubs at each of four sites. The Clubs provide support for community members through a variety of activities that reflect the needs of the individual sites.

The project integrates research, education and extension as a means to unify and modify existing health programs and curricula into an effective model for community-based Healthy Lifestyle Clubs in Native American communities, through extensive collaboration among Native American communities, institutions of higher learning, health agencies, health educators, curriculum specialists and community peer educators to assure content accuracy and cultural relevance.

The project investigates the effectiveness of community-based support groups in the intervention of obesity on a wide scale.

A variety of content delivery methods include health-related workshops and short courses at community sites and via distance education, community-based activities directed by the peer-educators, newsletters, videotapes, a website and CD-ROMs. Collaboration with existing health and education programs increases the project's impact on Tribal communities throughout the nation.

Talent Search

The SIPI Educational Talent Search Program is funded by the U. S. Department of Education to serve 600 middle and high school students who come from low-income families in which neither parent has a four-year college degree. The program works with students as early as sixth grade. It is intended to help students succeed in middle and high school and eventually enroll in a post-secondary institution. This mentoring program is also available to help secondary and postsecondary dropouts re-enroll in middle or high school, pursue a GED, or re-enroll in a post-secondary institution. There is no cost for students to participate in Talent Search.

The Talent Search program is open to all potentially college bound students regardless of racial and/or ethnic background, gender or disability.

**SOUTHWESTERN INDIAN POLYTECHNIC INSTITUTE
CIP CODES**

01-DEPARTMENT OF GENERAL EDUCATION

24.0199 Non-degree.....

02-DEPARTMENT OF DEVELOPMENTAL STUDIES

53.0201 General Education Development (GED) Certificate

03-DEPARTMENT OF ADVANCED TECHNICAL EDUCATION

15.1302 Computer Aided Drafting & Design..... Certificate
45.0702B Geo-Spatial Information Technologies Certificate
45.0702 Geo-Spatial Information Technologies AAS Degree
03.9999G Natural Resources Management, Agribusiness..... AAS Degree
03.9999S Natural Resources Management, Crop and Soil Science AAS Degree
03.9999V Natural Resources Management, Environmental Science AAS Degree
03.9999R Natural Resources Management AAS Degree
11.1002D Network Management AAS Degree
11.1002B Network Management Certificate
15.0404 Instrumentation & Control Technology..... AAS Degree
15.0613 Computer Integrated Manufacturing Technology AAS Degree
14.0101 Pre- Engineering..... AS Degree

04-DEPARTMENT OF APPLIED VOCATIONAL TECHNOLOGIES

12.0505 Culinary Arts Certificate
51.1802 Optical Laboratory Technology Certificate
12.0508 Culinary Arts AAS Degree
52.0999 Culinary Arts, Hospitality Services Management AAS Degree
51.1801V Vision Care Technology AAS Degree

05-DEPARTMENT OF LIBERAL ARTS & BUSINESS

24.0101 Liberal Arts..... AA Degree
52.0302D Accounting AAS Degree
52.0302B Accounting Certificate
52.0101D Business Administration..... AS Degree
52.0201D Business Administration..... AAS Degree
52.0201T Business Administration – Tribal Administration AAS Degree
52.0201B Business Administration..... Certificate
52.1299D Computer Science Information Systems AS Degree
52.0407D Office Information Applications AAS Degree
52.0407B Office Information Applications Certificate

06-DEPARTMENT OF EXTENDED COLLEGE

13.1210A Early Childhood Education AA Degree
13.1299A Early Childhood Education Certificate

ADULT BASIC EDUCATION AND DEVELOPMENTAL EDUCATION

Information

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Adult Basic Education

The mission of SIPI's Adult Basic Education program is to ensure that students have every opportunity to be successful in careers and post-secondary education. Our goal is to provide students with the basic academic and life skills required for the workplace and/or entrance into college. Our faculty and staff help students identify and achieve their basic educational goals. We offer classes in mathematics, reading, writing, life and job skills development. The Adult Basic Education program also offers comprehensive instruction to adults who want to earn a GED Diploma. Although courses indicate credit hours, an Adult Basic Education student's credit hours are not transferable to other degree-granting institutions. The credit hours reflect instructional hours required to meet SIPI residential requirements.

Students are placed into leveled courses on the basis of the Tests of Adult Basic Education (TABE) assessment scores in reading, writing and mathematics. Leveled courses are based on the National Reporting System for Adult Education (NRS) levels. The levels are designed to meet specific learning needs and to assist students in setting educational goals.

Developmental Education

Developmental courses help students to build their skills before entering college-level courses. Credits from Developmental Education courses are non-transferable to other degree-granting institutions. The courses are designed to help students meet program prerequisites and to prepare students for certificate and degree programs, for self-improvement, or for career enhancement.

Assessment

SIPI uses assessments approved by the NRS. The TABE is used to place students into one of six NRS levels of Adult Education in the areas of reading, writing and mathematics. Assessments serve two purposes: 1) to make sure you are enrolled in the classes that meet their learning needs and goals, and 2) to determine when students are ready to move to the next level of classes. Assessments help students to track their own progress and to set realistic goals by helping them see which subjects they know well and those they need more help with.

LIBERAL ARTS AND BUSINESS TECHNOLOGIES

Information

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Mission Statement

SIPI's Liberal Arts and Business Technologies Department offers student essential knowledge and skills for success by developing intellectual curiosity and critical thinking skills necessary for lifelong learning.

LIBERAL ARTS

The Associate of Arts Degree provides, for transfer purposes, the General Education curriculum of the first two years of baccalaureate study. It also serves as a terminal degree. Additionally, the Liberal Arts curriculum supports degree program requirements in other SIPI instructional departments. The degree includes a General Education curriculum of 35 credit hours, which is accepted by New Mexico's other colleges and universities as the General Education core for degree completion.

The Liberal Arts program provides education to students in a variety of disciplines; including Communications, Mathematics, Laboratory Science, Social Behavioral Science, Humanities and Fine Arts, Technology, Health, Physical Education and college approved electives.

LIBERAL ARTS

Associate of Arts Degree (CIP: 24.0101)

Area I: Communications Requirements: (12 Cr. Hrs.)

ENGL	101	Composition	3
ENGL	102	Critical Reading & Writing	3
ENGL	219	Technical Writing	3
SPCH	130	Public Speaking	3

Area II: Mathematics (appropriate to transfer major) Requirement: (6 cr. Hrs.)

MATH	121	College Algebra	3
MATH	_____	3 hrs. from: MATH 111, 123, 145, 150, 162, 180	3

Area III: Laboratory Science (appropriate to transfer major) Requirement: (8 Cr. Hrs. from any of the following)

_____	_____	Choose any 2 classes: BIOL 121/L, 123/L, 220/L	4
_____	_____	CHEM 111/L, 121/L, 212, ASTR 101/L, GEOL 101/L, PHYS 151/L	4

Area IV: Social/Behavioral Science Requirement: (9 Cr. Hrs. from any of the following)

_____	_____	Choose any 3 classes: ANTH 101, 130, SOSC 101, SOSC 210	3
_____	_____	PSYC 105, POSC 110, 200, ECON 200, 201	3
_____	_____		3

Area V: Humanities and Fine Arts Requirement: (9 Cr. Hrs. from any of the following)

_____	_____	Choose any 3 classes: ARTH 101, 102, 131, GEOG 101,	3
_____	_____	HIST 101,161, 162, 181, 260, LITR 211, 270, 296	3
_____	_____	SPAN 101, 102, NAVA 101, 102	3

Computer Science Requirement: (3 Cr. Hrs.)

COSC	107	Computer Literacy	3
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Health & PE Requirements: (4 Cr. Hrs.)

HLTH	164	First Aid & Safety	2
PHED	_____	PE or Health Elective	1
_____	_____	PE or Health Elective	1

Other Approved College-Level Elective: (12 Cr. Hrs.)

Approved College-level Elective	3
Total Credit Hours Required:	63

Note: The Minimum Grade Requirement for awarding the AA Degree, the AS Degree, the AAS Degree and the Certificate program in Liberal Arts and Business Technologies is a 2.00 GPA (C) or better in all program required courses.

EARLY CHILDHOOD EDUCATION

The Early Childhood Education Program offers courses for an Associate of Arts (A.A) degree in Early Childhood Education. The program is accredited by the North Central Association of Colleges and Schools. It is designed for students interested in working in this field or those who may transfer to a four year institution to complete a Bachelor's Degree in Early Childhood or a related field. Classes transfer to all New Mexico four year colleges and universities with similar programs. The courses address the seven general early childhood education competency areas required by New Mexico Department of Education licensure in Early Childhood Education (birth to third grade).

Early Childhood courses are delivered through both on-campus instruction and interactive video conferencing (distance education) to tribal nations in New Mexico and Oklahoma with compatible satellite downlinks. Classes are offered in the late afternoons, evenings, and weekends to accommodate adult learners.

The Early Childhood Education Associate of Arts Degree (ECED) prepares students to work in early childhood settings providing services to children from birth to age eight, and their families. The A.A. degree in ECED satisfies the educational requirements for Head Start teachers and educational assistants in elementary school settings. Completion of the ECED courses also entitles students to receive a vocational certificate in Early Childhood issued by the Office of Child Development, Children, Youth and Families Department of the State of New Mexico.

Mission Statement

The Early Childhood Education Program provides students access to knowledge, skills and professionalism surrounding the field of child development, family, and community development to assure the provision of quality services that address the complex needs of Native families in the 21st century.

Goals

The Early Childhood Education Program prepares graduates with theory and competencies required to work in specific child and family settings. Areas include: Childcare, Educational Assistants, Head Start and Early Care Teachers, and Family Home Childcare. Work is available with programs such as Head Start, private and public childcare facilities and preschools serving children from birth through age five.

Associate of Arts in Early Childhood Education Outcomes:

- Child Growth, Development & Learning
- Health, Safety & Nutrition
- Family and Community Collaboration
- Developmentally Appropriate Content
- Learning Environment and Curriculum Implementation
- Assessment of Children and Evaluation of Programs
- Professionalism

Important: Federal law requires a background check on all persons seeking employment in child care facilities.

EARLY CHILDHOOD EDUCATION Certificate (CIP: 13.1299A)

Communications Requirements (6 Cr. Hrs.)

ENGL	101	Composition	3
SPCH	130	Public Speaking	3

Mathematics Requirements (3 Cr. Hrs.)

MATH	111	Mathematics for Elementary & Middle School Teachers, or Higher	3
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Early Childhood Education Requirements (19 Cr. Hrs.)

ECED	124	Health, Safety & Nutrition	2
ECED	126	Childhood Growth/Development & Learning	3
ECED	130	Curriculum Development & Implementation I	3
ECED	130P	Practicum I	2
ECED	202	Family & Community Collaboration	3

ECED	204	Introduction to Reading & Literacy Development	3
ECED	214	Guiding Young Children	3
Total Credit Hours Required			28

EARLY CHILDHOOD EDUCATION Associate of Arts Degree (CIP: 13.1210A)

Area I: Communications Requirements (9 Cr. Hrs.)

ENGL	101	Composition	3
ENGL	102	Critical Reading and Writing	3
ENGL	130	Public Speaking	3

AREA II: Mathematics Requirements (3 Cr. Hrs.)

_____	_____	Choose one class from: **MATH 111, 120, 121, 123, 145, 150, 162, 163	3
<i>** MATH 111 Recommended for students planning on pursuing a B.A Degree</i>			

AREA III: Laboratory Science Requirements (8 Cr. Hrs.)

_____	_____	Choose any 2 classes: BIOL 111/L, 121/L, 123/L,	4
_____	_____	CHEM 111/L, 121/L, 212, ASTR 101/L, GEOL 101/L, PHYS 151/L	4
		NASC 261/L, 262/L, 263/L	

AREA IV: Social/Behavioral Science Requirements: (6 Cr. Hrs.)

_____	_____	Choose any 2 classes: ANTH 101, 130, SOSC 101,	3
		SOSC 210, PSYC 105, POSC 110, 200, ECON 200, ECON 201	3

AREA V: Humanities and Fine Arts Requirements: (9 Cr. Hrs.)

_____	_____	Choose any 3 classes: ARTH 101, 102, 131, 251, GEOG 101, HIST 101	3
_____	_____	161, 162, 181, 260, LITR 211, 270 296	3
_____	_____	SPAN 101, 102, NAVA 101, 102	3

Early Childhood Education Requirements (29 Cr. Hrs.)

ECED	124	Health, Safety & Nutrition	2
ECED	126	Childhood Growth/Development & Learning	3
ECED	130	Curriculum Development & Implementation I	3
ECED	130P	Practicum I	2
ECED	202	Family & Community Collaboration	3
ECED	204	Intro. Reading & Literacy Development	3
ECED	214	Guiding Young Children	3
ECED	218	Assessment of Children & Evaluation of Program	3
ECED	220	Professionalism	2
ECED	230	Curriculum Development & Implementation	3
ECED	230P	Practicum II	2

Total Credit Hours Required **64**

BUSINESS TECHNOLOGIES

Mission Statement

Within a culturally sensitive learning environment, the Business Technologies mission is to educate and prepare professional Native American business students to become informed decision makers, manage complex business operations, and contribute to commerce and business in the global market.

Goals

- Graduate 90% of entering students with a certificate or degree in Accounting, Business Administration, Computer Science, Network Management or Office Information Applications to enter the business world.
- Empower students to pursue a higher education and assist with the transition into a four-year college or university.
- Capitalize on the services of a professional business advisory committee comprised of individuals from business and government agencies utilize their expertise on relevant business practices and leverage member resources to enhance and expand the Business Technologies Department to provide excellent service to students.
- Institutionalize culturally relevant curriculum by offering a Tribal Management program that articulates with other higher education institutions.

- Build strong tribal, state and federal partnerships to strengthen tribal communities in areas such as economic development, leadership, and entrepreneurship.
- Expand articulation agreements with four-year institutions of higher education for course transfer opportunities for Business Technologies students.

Students may select from one of three Certificate programs or from one of six Associate Degree program offerings. If a student enters the Certificate Program but later wishes to continue his/her education after completing a certificate program in Business Technologies, the student will have completed 33 credit hours toward the Associate of Applied Science Degree in the related program area. Example: Completion of the Business Administration Certificate counts as 33 hours towards the Associate of Applied Science Degree Program. Based on certain criteria, a student may go directly into a degree program.

Courses in the Associate of Science Degree programs are transferable to other two-and-four year institutions of higher education in New Mexico and are on the New Mexico Statewide Articulation Matrix. Students must work closely with their transfer institutions and their advisers to assure the best transition to four-year schools.

Note: Some courses may have prerequisites. Refer to this catalog and/or consult your advisor.

ACCOUNTING

Mission Statement

The Accounting Program will provide training and education to students to enable them to compete and qualify for employment in the accounting field; and to produce well trained and competent professionals to provide services to private, public, and tribal entities.

Goals

The Accounting program prepares graduates with general and specific instruction in accounting and related skills necessary to obtain entry-level employment in the field of accounting; prepares graduates academically to succeed in four-year degree granting college; and prepares graduates with instruction in the fundamental principles of accounting used in business.

Certificate

The Certificate program in Accounting is a program of study designed to prepare students for entry-level positions in accounting. For students who wish to continue their education and pursue an AAS degree in Accounting, all credit hours from the certificate program may be applied to the Accounting AAS degree program of study.

Associate of Applied Science

The AAS Degree in Accounting is a course of study over five trimesters designed to prepare graduates with the general skills necessary to obtain an entry-level position with one of the tribes or a not-for-profit agency; or work toward completion of a Bachelor's Degree in Accounting. A formal double-entry accounting system is taught using manual and computerized systems. Generally accepted accounting principles and concepts are emphasized.

The Tribal Accounting class will further prepare students to successfully obtain employment with the tribes.

According to the U.S. Bureau of Labor Statistics, employment among Accountants, Auditors and Management Analysts will add the most jobs; 326,000 combined by 2010.

Accounting Associate of Applied Science Degree Outcomes:

- Graduates will demonstrate basic accounting concepts and principles.
- Graduates will demonstrate an understanding of basic accounting practices through analyzing and recording ordinary business transactions.
- Graduates will demonstrate the accounting skills necessary to acquire an entry-level position in accounting.
- Graduates will demonstrate that they are academically prepared to succeed in a four-year degree program.

ACCOUNTING Certificate (CIP: 52.0302B)

First Trimester

ACCT	101	Fundamentals of Accounting	3
BADM	114	Introduction to Business	3
BUED	125	Business Math	3
ENGL	101	Composition	3
Total Credits			12

Second Trimester

ACCT	201	College Accounting I	3
ACCT	220	Federal Income Tax	3
COSC	107	Computer Literacy	3
MATH	120	Intermediate Algebra	3
Total Credits			12

Third Trimester

ACCT	235	Microcomputer Accounting for Small Business	3
BADM	118	Small Business Management	3
_____	_____	COSC 123 (Excel) OR ACCT 280 (Cooperative Education)	3
Total Credits			9

Total Credit Hours Required **33**

ACCOUNTING Associate of Applied Science Degree (CIP: 52.0302D)

First Trimester

ACCT	101	Fundamentals of Accounting	3
BADM	114	Introduction to Business	3
BUED	125	Business Math	3
ENGL	101	Composition	3
Total Credits			12

Second Trimester

ACCT	201	College Accounting I	3
ACCT	220	Federal Income Tax	3
BADM	130	Principles of Management	3
COSC	107	Computer Literacy	3
MATH	120	Intermediate Algebra	3
Total Credits			15

Third Trimester

ACCT	202	College Accounting II	3
ACCT	235	Microcomputer Accounting for Small Business	3
BADM	118	Small Business Management	3
COSC	123	Excel	3
Total Credits			12

Fourth Trimester

BFIN	211	Principles of Finance	3
ECON	200	Macroeconomics	3
ENGL	219	Technical Writing	3
SPCH	130	Public Speaking	3
Total Credits			12

Fifth Trimester

ACCT	250	Tribal Accounting	3
ECON	201	Microeconomics	3
BADM	240	Business Law	3
_____	_____	ACCT 280 (Cooperative Education) OR Elective (Business Course)	3
Total Credits			12

Total Credit Hours Required **63**



This degree program is accredited by the Association of Collegiate Business Schools and Programs (ACBSP)

BUSINESS ADMINISTRATION

Mission Statement

The Business Administration Program will provide training and education to students to enable them to compete and qualify for employment in the business administration field; and to produce well trained and competent professionals to provide services to private and public entities. Graduates are prepared to continue working toward completion of a Bachelors Degree in Business Administration.

Goals

The Business Administration Program prepares graduates with the appropriate academic knowledge and skills necessary to become productive, independent, and responsible employees in the workforce; articulates program courses with other post-secondary business schools and programs; provides graduates with the skills, knowledge, and experience needed to succeed in a four-year degree granting institution; provide graduates with the entry-level skills necessary to gain employment; and prepares graduates with the managerial skills necessary to operate a business.

Certificate

The Certificate program in Business Administration is a program of study designed to prepare students for entry-level skills in business. For students who wish to continue their education and pursue an AAS degree in Business Administration, all credit hours from the certificate program will be applied to the Business Administration AAS degree program of study.

Associate of Applied Science Degree

The Associate of Applied Science (AAS) degree program in Business Administration is designed to meet the educational needs of those who want to prepare for job placement upon graduation. The program helps students attain skills, knowledge, and experience in general business, accounting, and technical training necessary to gain and maintain employment.

Business Administration Associate of Applied Science Degree Outcomes:

- Graduates will demonstrate basic business concepts and principles.
- Graduates will demonstrate the business skills necessary to acquire an entry-level position in business/marketing.
- Graduates will perform and be technically proficient in the technology required of business and industry.
- Graduates will satisfy the needs of employers based on the education and preparation received.
- Graduates will be able to benefit from programmatic networking and advisory committee contacts for employment.

Associate of Science Degree

The Associate of Science degree in Business Administration is a program of study designed to meet the educational needs of those students who wish to fulfill the lower division requirements for transfer to four-year colleges and universities. Courses in the A.S. degree program are transferable to other two and four-year institutions of higher education in New Mexico, and appear on the New Mexico Statewide Articulation Matrix. Students must work closely with their transfer institutions and their advisors to assure the best transitions to four-year schools.

According to the U.S. Bureau of Labor and Statistics by 2010, the fastest growing manager positions will be in: Computer and Information Systems, Public Relations, General Operations, Management Analysts, Personal and Financial Advisors. Employment in occupations requiring an associate degree is projected to increase 32 percent, faster than any other occupational group categorized by education and training.

Business Administration Associate of Science Degree Outcomes:

- Graduates will successfully transfer business courses to four-year institutions.
- Graduates will demonstrate basic business concepts and principles.
- Graduates will demonstrate the business skills necessary to acquire entry-level positions in business/marketing.
- Graduates will demonstrate that they are academically prepared to succeed in a four-year program.
- Graduates will perform and be technically proficient in the technology required business and industry.
- Graduates will benefit from programmatic networking and advisory committee contacts for employment.

BUSINESS ADMINISTRATION
Certificate (CIP: 52.0201B)

First Trimester

ACCT	101	Fundamentals of Accounting	3
BADM	114	Introduction to Business	3
BUED	125	Business Math	3
ENGL	101	Composition	3
Total Credits			12

Second Trimester

BADM	130	Principles of Management	3
BADM	135	Human Relations	3
BADM	240	Business Law	3
COSC	107	Computer Literacy	3
Total Credits			12

Third Trimester

ACCT	235	Microcomputer Accounting for Small Business	3
BADM	118	Small Business Management	3
_____	_____	BADM 280 (Cooperative Education) OR Elective (Business Course)	3
Total Credits			9
Total Credit Hours Required			33

BUSINESS ADMINISTRATION
Associate of Applied Science Degree (CIP: 52.0201D)

First Trimester

ACCT	101	Fundamentals of Accounting	3
BADM	114	Introduction to Business	3
BUED	125	Business Math	3
ENGL	101	Composition	3
Total Credits			12

Second Trimester

ACCT	201	College Accounting I	3
BADM	130	Principles of Management	3
BADM	135	Human Relations	3
BADM	240	Business Law	3
COSC	107	Computer Literacy	3
Total Credits			15

Third Trimester

ACCT	202	College Accounting II	3
ACCT	235	Microcomputer Accounting for Small Business	3
BADM	118	Small Business Management	3
_____	_____	BUED 210 (Word Processing) OR COSC 123 (Excel)	3
Total Credits			12

Fourth Trimester

BADM	242	Principles of Marketing	3
BFIN	211	Principles of Finance	3
ECON	200	Macroeconomics	3
MATH	120	Intermediate Algebra	3
Total Credits			12

Fifth Trimester

ENGL	219	Technical Writing	3
ECON	201	Microeconomics	3
SPCH	130	Public Speaking	3
_____	_____	BADM 280 (Cooperative Education) OR Elective (Business Course)	3
Total Credits			12
Total Credit Hours Required			63



This degree program is accredited by the Association of Collegiate Business Schools and Programs (ACBSP)

BUSINESS ADMINISTRATION
Associate of Science Degree (CIP: 52.0101D)

(Transfer degree program: Business Administration or Business Administration with Tribal Emphasis)

First Trimester			
BADM	114	Introduction to Business	3
COSC	107	Computer Literacy	3
ECON	200	Macroeconomics	3
ENGL	101	Composition	3
Total Credits			12
Second Trimester			
BADM	130	Principles of Management	3
BADM	240	Business Law	3
ENGL	219	Technical Writing	3
SPCH	130	Public Speaking	3
_____			3
_____			3
Total Credits			15
Third Trimester			
ACCT	201	College Accounting I	3
MATH	121	College Algebra	3
PSYC	105	Introduction to Psychology	3
_____			3
_____			3
Total Credits			12
Fourth Trimester			
ACCT	202	College Accounting II	3
BADM	242	Principles of Marketing	3
MATH	145	Statistics	3
_____			4
_____			4
Total Credits			13
Fifth Trimester			
ECON	201	Microeconomics	3
_____			4
_____			3
_____			3
_____			3
Total Credits			13
Total Credit Hours Required			65



This degree program is accredited by the Association of Collegiate Business Schools and Programs (ACBSP)

Tribal Emphasis

The Tribal Emphasis Program was created jointly by SIPI and New Mexico State University (NMSU). Its purpose is to prepare students to enter positions of managerial responsibility in tribal enterprises. Students would take the tribal courses listed below in place of BADM 130, BADM 240, BADM 242, ECON 201.

Tribal Emphasis Courses

BADM	250	Tribal Leadership	3
BADM	251	Tribal Management	3
BADM	252	Tribal Law	3
BADM	253	Tribal Resources and Economic Development	3

Upon completing these courses students will be able to transfer credits earned to NMSU, where they may complete a Bachelor of Business Administration degree in General Business, with an option in tribal management.

COMPUTER SCIENCE INFORMATION SYSTEMS

Mission Statement

The Computer Science Information Systems program will provide training and education to students to enable them to compete and qualify for employment in the Computer Science field, and will produce well trained and competent

professionals to provide services to private and public entities. Graduates are prepared to continue working toward completion of a Bachelors Degree in Computer Science.

Goals

The Computer Science Information Systems program provides students with appropriate academic knowledge and skills necessary to become productive, independent, and responsible employees in the workforce; articulates program courses with other post-secondary business schools and programs; provides students with the skills, knowledge, and experience needed to succeed in four-year degree granting institutions; provides students with the entry-level skills necessary to gain employment.

Associate of Science Degree

The Associate of Science degree in Computer Science Information Systems is a program of study designed to meet the educational needs of those students who wish to fulfill the lower division requirements for transfer to four-year colleges and universities. It provides general education requirements and basic computer core courses. Courses in the AS degree program are transferable to other two-and-four year institutions of higher education in New Mexico and are on the New Mexico Statewide Articulation Matrix. Students must work closely with their transfer institutions and their advisors to assure the best transitions to four-year schools.

According to the U.S. Bureau of Labor Statistics, computer occupations grow the fastest. Jobs account for eight of the 20 fastest growing occupations in the U.S. and will add more than 1.9 million new jobs to the economy. Employment of computer and information systems managers is expected to grow much faster than average for all occupations through the year 2012.

Computer Science Information Systems Associate of Science Degree Outcomes:

- Graduates will successfully transfer to four-year institutions.
- Students will demonstrate advance computer software applications, concepts and principles.
- Students will demonstrate programming concepts and principles.
- Graduates will demonstrate the business skills necessary to acquire entry-level positions in a computer environment.
- Graduates will demonstrate that they are academically prepared to succeed in four-year degree programs.
- Graduates will perform and be technically proficient in the technology required of business and industry.
- Graduates will benefit from programmatic networking and advisory by committee contacts for employment.

COMPUTER SCIENCE INFORMATION SYSTEMS Associate of Science Degree (CIP: 52.1299D) (Transfer degree program)

First Trimester

COSC	107	Computer Literacy	3
ECON	200	Macroeconomics	3
ENGL	101	Composition	3
MATH	121	College Algebra	3
Total Credits			12

Second Trimester

BADM	240	Business Law	3
COSC	121	Introduction to Programming	3
ENGL	102	Critical Reading and Writing	3
MATH	145	Statistics	3
_____	_____	Humanities and Fine Arts	3
Total Credits			15

Third Trimester

ACCT	201	College Accounting I	3
PSYC	105	Introduction to Psychology	3
SPCH	130	Public Speaking	3
_____	_____	Humanities and Fine Arts	3
Total Credits			12

Fourth Trimester

ACCT	202	College Accounting II	3
COSC	185	Database Management Systems	3

MATH	162	MATH 162 (Calculus) OR (MATH 180) Business Calculus	3
_____	_____	Laboratory Sciences with Lab	4
Total Credits			13
Fifth Trimester			
ECON	201	Microeconomics	3
_____	_____	Laboratory Sciences with Lab	4
_____	_____	Humanities and Fine Arts	3
_____	_____	Social/Behavioral Sciences	3
Total Credits			13
Total Credit Hours Required			65



This degree program is accredited by the Association of Collegiate Business Schools and Programs (ACBSP)

OFFICE INFORMATION APPLICATIONS

Mission Statement

The Office Information Applications Program will provide training and education to students to enable them to compete and qualify for employment using entry-level skills in software, web design, and other IT applications and will produce well trained and competent professionals to provide services to private and public entities.

Goals

The Office Information Applications Program prepares graduates with the appropriate academic knowledge and skills necessary to become productive, independent, and responsible employees in the workforce; articulates program courses with other post-secondary business schools and programs; provides graduates with the skills, knowledge, and experience needed to succeed in four-year degree granting institution; provide graduates with the entry-level skills necessary to gain employment; and prepares graduates with the office and IT skills necessary to operate a business.

Certificate

The Certificate program in Office Information Applications is a program of study designed to prepare students for entry-level skills in Office Information Applications. For students who wish to continue their education and pursue an AAS in Office Information Application, all credit hours from the Certificate program will be applied to the Office Information Applications AAS degree program of study.

Associate of Applied Science

The Associate of Applied Science degree in Office Information Applications is a program of study designed to meet the educational needs of students who want to prepare for job placement upon graduation. The program provides the general and technical training necessary to gain and maintain employment.

According to the U.S. Bureau of Labor Statistics workers with computer software skills are in high demand as Computer Operators, Customer Service Representative, Data Entry and Information Processing, Desktop Publishing, Medical Records and Health Information Technicians.

Office Information Applications Outcomes:

- Graduates will demonstrate advanced computer software application concepts and principles.
- Graduates will demonstrate programming concepts and principles.
- Graduates will demonstrate the computer skills necessary to acquire entry-level positions in a computer environment.
- Graduates will perform and be technically proficient in computer software required in the computer industry.
- Graduates will satisfy the needs of employers based on the education and preparation received.
- Graduates will benefit from programmatic networking and advisory committee contacts for employment.

OFFICE INFORMATION APPLICATIONS
Certificate (CIP: 52.0407B)

First Trimester			
BUED	125	Business Math	3
COSC	107	Computer Literacy	3
ENGL	101	Composition	3
Total Credits			9
Second Trimester			
ACCT	101	Fundamentals of Accounting	3
BUED	210	Word Processing	3
COSC	124	Access	3
SPCH	130	Public Speaking	3
Total Credits			12
Third Trimester			
BUED	130	Records Management	3
BUED	215	Multimedia in Business	3
COSC	123	Excel	3
_____	_____	COSC 280 (Cooperative Education) OR Elective (Business Course)	3
Total Credits			12
Total Credit Hours Required			33

OFFICE INFORMATION APPLICATIONS
Associate of Applied Science Degree (CIP: 52.0407D)

First Trimester			
BADM	114	Introduction to Business	3
BUED	125	Business Math	3
COSC	107	Computer Literacy	3
ENGL	101	Composition	3
Total Credits			12
Second Trimester			
ACCT	101	Fundamentals of Accounting	3
BUED	210	Word Processing	3
COSC	124	Access	3
SPCH	130	Public Speaking	3
Total Credits			12
Third Trimester			
BUED	130	Records Management	3
BUED	215	Multimedia in Business	3
COSC	123	Excel	3
_____	_____	Elective (Business Course)	3
Total Credits			12
Fourth Trimester			
COSC	112	Web Design	3
COSC	121	Introduction to Programming	3
COSC	211	PowerPoint Presentations	3
ENGL	219	Technical Writing	3
MATH	120	Intermediate Algebra	3
Total Credits			15
Fifth Trimester			
ACCT	235	Microcomputer Accounting for Small Business	3
PSYC	105	Introduction to Psychology	3
COSC	280	COSC 280 (Cooperative Education) OR Elective (Business Course)	3
_____	_____	Select one programming course: COSC 119 or COSC 116	3
Total Credits			12
Total Credit Hours Required			63



This degree program is accredited by the Association of Collegiate Business Schools and Programs (ACBSP)

TRIBAL ADMINISTRATION

Mission Statement

The Associate of Applied Science Degree program in Tribal Administration creates access to higher education critically important to tribes as they work to maintain economic viability, cultural integrity, self-sufficiency, and self-determination. The program offers students a choice of specialty areas to become program managers, economic development specialists, accountants, or tribal leaders.

Goals

The Tribal Administration Program prepares graduates with the appropriate academic knowledge and skills necessary to become productive, independent, and responsible employees in tribal communities; articulates program courses with other post-secondary business schools and programs; provides graduates with the skills, knowledge, and experience needed to succeed in four-year degree granting institutions; provides entry-level skills needed to gain employment; and prepares graduates with tribal management skills necessary to operate a business.

Associate of Applied Science Degree

The Associate of Applied Science (AAS) degree program in Tribal Administration provides courses in general education, business and tribal administration to meet the diverse needs of tribal communities. Specialty areas of concentration or a combination of courses from different program areas allows students flexibility in areas of interest to meet their individual needs.

Tribal Administration Associate of Applied Science Degree Outcomes:

- Graduates will demonstrate basic business and tribal concepts and principles.
- Graduates will demonstrate the business and tribal skills necessary to acquire entry-level positions in business or tribal communities.
- Graduates will perform and be technically proficient in the technology required by business, industry, and tribal communities.
- Graduates will satisfy the needs of employers based on the education and preparation received.
- Graduates will benefit from programmatic networking and advisory committee contacts for employment.

BUSINESS ADMINISTRATION – TRIBAL ADMINISTRATION EMPHASIS **Associate of Applied Science Degree (CIP: 52.0201T)**

First Trimester

BADM	114	Introduction to Business	3
BADM	251	Tribal Management	3
BADM	252	Tribal Law	3
ENGL	101	Composition	3
Total Credits			12

Second Trimester

COSC	107	Computer Literacy	3
BADM	240	Business Law	3
ECON	200	Macroeconomics OR	
ECON	201	Microeconomics	3
ENGL	219	Technical Writing	3
Total Credits			12

Third Trimester

ACCT	101	Fundamentals of Accounting OR	
ACCT	201	College Accounting I	3
BADM	118	Small Business Management	3
MATH	120	Intermediate Algebra	3
PSYC	105	Introduction to Psychology	3
Total Credits			12

Fourth Trimester

BADM	250	Tribal Leadership	3
SPCH	130	Public Speaking	3
_____	_____	Specialty Areas of Concentration	6
Total Credits			12

Fifth Trimester

ACCT	250	Tribal Accounting	3
BADM	253	Tribal Resource & Economic Development	3
_____	_____	BADM280 (Tribal Leadership Internship/Co-op) OR Elective (Business Course)	3
_____	_____	Specialty Areas of Concentration	6
Total Credits			15
Total Credit Hours Required			63

Students may select a specialty area of concentration or combination of courses such as:

- Agriculture, Business Administration, Natural Resources
- Small Business, Management
- Environmental Science
- Accounting
- Renewable Technology, Networking
- Geospatial Information Technologies
- Office Information Applications

Opportunities

- Provides access to higher education and tools for managing tribal governments and tribal enterprises.
- Provides culturally relevant curriculum.
- Promotes increased graduation of Native Americans in the area of Tribal Administration.
- Provides opportunities for Native American students nationwide to network with other students and work together to become successful.

ADVANCED TECHNICAL EDUCATION

Information

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Mission Statement

The mission of the Advanced Technical Education Department (ATE) is to provide students with a comprehensive and up-to-date technical and scientific education in their program areas. This education is based on a rigorous general education component that allows our graduates to transfer to four-year baccalaureate programs, and/or enter the workforce. The ATE Program supports students through their crucial first two years of college, providing them with both the necessary academics and the student success skills they will need to complete a four-year degree. Students who transfer from SIPI to a four-year school clearly demonstrate the success of this strategy. Graduates are also well prepared to directly enter the competitive 21st century workforce, whether on or off the reservation. Many SIPI graduates return home to seek employment on their own tribal lands, where they constitute a workforce prepared for a future with changing technologies, economies, and demographics. The department utilizes external advisory committees for each program. The committees advise faculty and administration on matters such as advancements in technology, current private industry requirements, career possibilities within federal and state agencies, and the personnel needs of tribal government entities.

ATE's Science and Technology Building. As of September 2003, the ATE science programs are housed in a 72,540 square-foot building, equipped with excellent classrooms and laboratories for Biology, Environmental Science, Chemistry, Engineering and Physics. The building also houses state of the art labs for Electronics, Manufacturing Technology, Instrumentation and Control Technology, Networking and Engineering. Other features include a 500-seat auditorium, two conference rooms, and administration and faculty offices. Two distance-learning classrooms with video conferencing capability help SIPI expand course offerings to tribes around the country. Two computer labs, one dedicated to Geographic Information Systems and one for general computer applications, are available to students.

Program Areas

The Department of Advanced Technical Education consists of eight technology programs. Three degree programs in Applied Vocational Technologies are:

- **Vision Care Technology**, A.A.S. in Vision Care Technology or Certificate in Optical Laboratory Technology
- **Culinary Arts**, A.A.S. in Institutional Cooking and Baking, A.A.S. in Hospitality Services Management, or Certificate in Institutional Cooking and Baking
- **Culinary Arts**, A.A.S. in Hospitality Services Management

The five degree programs in Advanced Technical Education are:

- **Pre-Engineering**, A.S. in Pre-Engineering
- **Electronics Technology**, A.A.S. in Instrumentation and Control Technology, A.A.S. in Computer Integrated Manufacturing Technology.
- **Geospatial Information Technology**, A.A.S. or Certificate in Geospatial Information Technology.
- **Natural Resources Management**, A.A.S. with emphases in Natural Resource Management of forests, range and wildlife, Agribusiness, Crop and Soil Science, or Environmental Science
- **Networking Technology**, A.A.S. or Certificate in Network Management

VISION CARE TECHNOLOGY PROGRAM

The Vision Care Technologist, known as the Ophthalmic Dispenser or the Optician, provides vision care correction to the patient. The optician engages in the analyzing of a doctor's eye correction prescription. The optician interprets prescriptions, measures, adapts, selects and fits eyeglasses or contact lenses for the correction of visual and ocular anomalies.

The Vision Care Technology Program provides students with the special knowledge and skills necessary to the practice of opticianry. The Vision Care Technology Program combines knowledge of theory and clinical procedures with skills and the ability to work well with patients in the fitting and adapting of ophthalmic lenses, contact lenses, and devices that aid in providing comfortable and effective vision.

The Vision Care Technology Program offers the only nationally accredited opticianry curriculum within the state of New Mexico. The program is one of the finest and best equipped optical teaching facilities in the nation. The A.A.S. degree in Vision Care Technology prepares students for successful careers in the expanding and lucrative field of Vision Care.

Graduates of the program may become proprietors of ophthalmic dispensing firms or may secure positions as ophthalmic dispensers or contact lens fitters in professional offices of ophthalmology, optometry or in a large corporate facility. Many of our graduates pursue additional degrees in general science, health science, economics, business or education.

The Associate Degree prepares students for national certification. Graduates of the Associate Degree program are eligible to take national examinations administered by the ABO (American Board of Opticianry) and NCLE (National Contact Lens Examination) examinations.

The Vision Care Technology Program also offers a Certificate of Completion in Optical Laboratory Technology. Students receive theoretical and laboratory experiences in optics, enabling them to explore the practical and laboratory experiences in the optical technology profession.

Goals

The primary goal of the Vision Care Technology Programs is to educate all individuals for technical competencies and capabilities to enable them to compete and qualify for employment in the optical and ophthalmic industry. The program also strives to eliminate hazardous waste and to reduce non-hazardous waste to minimum levels where economically and technically practical, and to be in full compliance with all federal and state environmental regulations.

Accreditation

The Commission on Opticianry Accreditation (COA) accredits the Vision Care Technology Programs. The COA exists to assess and verify educational quality in optical programs. The web site is <http://www.coaccreditation.com/>.

OPTICAL LABORATORY TECHNOLOGY

The Certificate in Optical Laboratory Technology is a course of study over three trimesters designed to train students to work in lab areas of optical establishments as technicians fabricating eyewear to ophthalmic lens prescriptions.

The Optical Laboratory Technology Program is designed to train students to work in lab areas as technicians fabricating eyewear to ophthalmic lens prescriptions. Students learn how to lay out, generate and polish optical lenses to prescription specifications. Students also learn how to edge and mount lenses into various types of frames and to apply various lens enhancements such as lens tints or coatings. The lab technician student is required to take all advanced level courses in lens fabrication. Lab technicians are generally employed by wholesale facilities. The technician generally works independently as a member of a technical team.

Some technicians are employed by contact lens manufacturing plants as contact lens lathe operators. Lathe operators use jeweler's lathes to cut the inside or outside curvature in the contact lens blanks. Skills learned within the program qualify graduates for entry-level employment.

Goals

The Optical Laboratory Technology program will educate students in technical competencies and skills to enable them to compete and qualify for employment as optical laboratory technicians; gain skills and confidence in use of optical instruments, machinery, material, procedures and techniques to optical industry standards. The program also strives to eliminate hazardous waste and to reduce non-hazardous waste to minimum levels where economically and technically practical, and to be in full compliance with all Federal and State environmental regulations.

Optical Laboratory Technology Certificate Outcomes:

- Students will be able to layout, generate and polish optical lenses to prescription specifications.
- Students will be able to verify, spot, layout, edge, and mount lenses into various types of frames and to apply various tints and coatings
- Students will be able to maintain and repair various optical instruments and equipment; plan and establish a routine maintenance schedule.
- Students will be able to establish and maintain production schedules, inventory control, and quality control compliance with OSHA and environmental regulations and relationships with eye care professionals relating to laboratory management.

OPTICAL LABORATORY TECHNOLOGY Certificate (CIP: 51.1802)

First Trimester

COSC	107	Computer Literacy	3
OPTI	101	Introduction to Optics w/Lab	5
OPTI	112	Opticianry Environmental & Safety Issues	2
Total Credits			10

Second Trimester

ENGL	100	Writing Standard English	5
HLTH	164	First Aid and Safety	2
OPTI	105	Ophthalmic Finishing & Surfacing I w/Lab	5
Total Credits			12

Third Trimester

MATH	100	Introductory to Algebra	5
OPTI	205	Ophthalmic Finishing & Surfacing II w/Lab	5
OPTI	225	Management for Opticians	3
Total Credits			13

Total Credit Hours Required **35**

VISION CARE TECHNOLOGY

Mission Statement

The Vision Care Technology Program will provide training and education to students to enable them to compete and qualify for employment in the Ophthalmic/Opticianry/Optical field; and to produce well-trained, competent professionals to provide professional services to the public.

Goals

The Vision Care Technology curriculum will train individuals for technical competencies and skills that will enable them to compete and qualify for employment as Ophthalmic Dispensers; become certified by the American Board of Opticianry (ABO) and the National Contact Lens Examiner (NCLE); and become state licensed where applicable and required. The program also strives to eliminate hazardous waste and to reduce non-hazardous waste to minimum levels where economically and technically practical, and to be in full compliance with all Federal and State environmental regulations.

Associate of Applied Science Degree

The Vision Care Technology curriculum educates students to become optician/ophthalmic dispensers. A dispenser accurately interprets and evaluates the consumer's prescription for the fitting of eyeglasses and contact lenses. This involves selecting the correct ophthalmic lenses, frames and lens enhancements to fit each individual needs and wants. Students learn a variety of dispensing skills; including product knowledge, fashion, optical eyewear fabrication, salesmanship, customer relations and retail optical management. Retail optical stores usually employ dispensers in shopping malls or retail outlets. Dispensers generally work independently with consumers.

The degree program is a two-year curriculum (five- trimesters) that includes General Education courses in Behavior Sciences, Communications, Humanities, Mathematics, and Science. The degree program, in addition to providing for transferability to advanced study, also provides an excellent foundation for students desiring to become optical managers, entrepreneurs. The program also provides a foundation for students who want to continue their education and become doctor of Optometry.

Vision Care Technology Associate of Applied Science Degree Outcomes:

- Students will be able to use the knowledge of the human visual system, theory of refraction, optical theories and mathematics to interpret prescriptions written by licensed practitioners to determine the frame and lens combinations that would be beneficial to the consumer.
- Students will be able to demonstrate the ability to use optical instruments, equipment, materials, procedures and techniques to industry standards in the practice of proper lens selection and design, insertion, removal, and care of contact lenses while adhering to OSHA and environmental regulations.
- Students will be able to establish and maintain good working relationships with doctors, managers, supervisors, and other opticians and to employ a good recordkeeping system for office supply control, business finance and operating expenses, and inventory needs.

- Students will be able to demonstrate the ability to use communications skills, both oral and written, which include interpreting, recording, instructing, designing, verifying, and transmitting facts or concepts and the ability to recognize and analyze consumer needs and wants.

VISION CARE TECHNOLOGY Associate of Applied Science (CIP: 51.1801V)

Technical Program Requirements (47 Cr. Hrs.)			
OPTI	101	Introduction to Optics w/Lab	5
OPTI	112	Opticianry Environmental & Safety Issues	2
OPTI	105A	Ophthalmic Finishing & Surfacing I w/Lab	5
OPTI	110A	Ophthalmic Dispensing I w/Lab	4
OPTI	115	Ophthalmic Sales	2
OPTI	205A	Ophthalmic Finishing & Surfacing II w/Lab	5
OPTI	215	Anatomy & Physiology of the Eye	3
OPTI	220A	Ophthalmic Dispensing II w/Lab	4
OPTI	225	Management for Opticians	3
OPTI	235	Contact Lenses w/Lab	4
OPTI	236	Introduction to Refraction w/Lab	4
OPTI	245	Ophthalmic Dispensing Internship	3
Business Elective Requirement (3 Cr. Hrs.)			
_____	_____	Choose one class from: BADM 114, 118, 130, 135, 242	3
Communications Requirements (6 Cr. Hrs.)			
ENGL	101	Composition	3
_____	_____	Choose one class from: ENGL 102, 219	3
Mathematics Requirements (3 Cr. Hrs.)			
MATH	120	Intermediate Algebra	3
<i>Computer Literacy Requirements (3 Cr. Hrs.)</i>			
COSC	107	Computer Literacy	3
Science Elective Requirements (3 Cr. Hrs.)			
_____	_____	Choose one class from: PHYS102, BIOL121/121L, 123/123L, CHEM111/111L	3
Humanities Elective Requirements (3 Cr. Hrs.)			3
Social/Behavioral Science Elective Requirements (3 Cr. Hrs.)			3
Health Requirements (2 Cr. Hrs.)			2
Total Credit Hours Required			70

CULINARY ARTS

An Associate of Applied Science Degree covers commercial food preparation, baking, and food service management and can lead to higher education. A three-trimester Certificate program concentrates on immediate employment in commercial food preparation and baking, providing students with training in the skills required to handle all types of baking in a restaurant or institutional setting.

INSTITUTIONAL COOKING AND BAKING Certificate (CIP: 12.0505)

Core Requirements (15 Cr. Hrs.)			
CULI	101	Culinary Arts I	4
CULI	102L	Culinary Arts I Lab	1
CULI	105	Culinary Arts II	3
CULI	106L	Culinary Arts II Lab	1
CULI	106I	Culinary II Internship	1
CULI	201	Culinary Arts III	3
CULI	202L	Culinary Arts III Lab	1
CULI	202I	Culinary Arts III Internship	1
Academic Requirements (15 Cr. Hrs.)			
MATH	_____	MATH 098 and above	4

ENGL	099	General English	4
HLTH	164	First Aid & Safety	2
CACS	100	College and Career Success	2
BADM	_____	BADM 114 Through BADM 252 (Business Related Subjects)	3
Total Credit Hours Required			30

CULINARY ARTS

Associate of Applied Science (CIP: 12.0508)

Technical Program Requirements (15 Cr. Hrs.)			
CULI	101	Culinary Arts I	4
CULI	102L	Culinary Arts I Lab	1
CULI	105	Culinary Arts II	3
CULI	106L	Culinary Arts II Lab	1
CULI	106I	Culinary Arts II Internship	1
CULI	201	Culinary Arts III	3
CULI	202L	Culinary Arts III Lab	1
CULI	202I	Culinary Arts III Internship	1
Business Technologies Requirements (21 Cr. Hrs.) Choose from the following:			21
ACCT	101	Fundamentals of Accounting	
ACCT	201	College Accounting I	
BADM	114	Introduction to Business	
BADM	118	Small Business Management	
BADM	130	Principles of Management	
BADM	135	Human Relations	
BADM	240	Business Law	
BADM	242	Principles of Marketing	
BADM	250	Tribal Leadership	
BADM	251	Tribal Management	
BADM	252	Tribal Law	
BADM	253	Tribal Resources & Economic Development	
BUED	125	Business Math	
COSC	107	Computer Literacy	
Communications Requirements (6 Cr. Hrs.)			
ENGL	101	Composition	3
_____	_____	Select one class from: ENGL 102, 219	3
Mathematics Requirements (3 Cr. Hrs.)			
MATH	120	Intermediate Algebra	3
Social/Behavior Science Requirements (6 Cr. Hrs.)			
_____	_____	Select two classes from: ANTH 130, SOSC 101, PSYC 105, ANTH 101	3
_____	_____		3
Laboratory Science (4 Cr. Hrs.)			
_____	_____	Select one class from: BIOL 123/123L, CHEM 111/111L	4
Humanities Elective Requirements (3 Cr. Hrs.)			
_____	_____		3
Health/Physical Education Requirements (2 Cr. Hrs.)			
HLTH	164	First Aid & Safety	2
Total Credit Hours Required			60

HOSPITALITY SERVICES MANAGEMENT

Hospitality Services Management is a program of study designed to prepare students for entry-level positions in the Hotel-Restaurant management business. The general education courses prepare each student for pre-management opportunities at entry-level supervisory positions in the Hospitality Industry, and some are transferable to a university for those who desire advanced degree educational opportunities.

HOSPITALITY SERVICES MANAGEMENT
Associate of Applied Science Degree (CIP: 52.0999)

Technical Program Requirements (18 Cr. Hrs.)			
CULI	101	Culinary Arts I	4
CULI	102L	Culinary Arts I Lab	1
CULI	105	Culinary Arts II	3
CULI	106L	Culinary Arts II Lab	1
CULI	106I	Culinary Arts II Internship	1
CULI	201	Culinary Arts III	3
CULI	202L	Culinary Arts III Lab	1
CULI	202I	Culinary Arts III Internship	1
CULI	280	Culinary Arts Co-op	3
Business Technologies Requirements (18 Cr. Hrs.) Choose from the following:			18
ACCT	101	Fundamentals of Accounting	
ACCT	201	College Accounting I*	
BADM	114	Introduction to Business*	
BADM	118	Small Business Management	
BADM	130	Principles of Management	
BADM	135	Human Relations	
BADM	240	Business Law	
BADM	242	Principles of Marketing	
BADM	250	Tribal Leadership	
BADM	251	Tribal Management	
BADM	252	Tribal Law	
BADM	253	Tribal Resources & Economic Development	
BUED	125	Business Math	
COSC	107	Computer Literacy*	
*will transfer to most colleges in our area			
Communications Requirements (6 Cr. Hrs.)			
ENGL	101	Composition	3
_____	_____	Select one class from: ENGL 102, 219	3
Mathematics Requirements (3 Cr. Hrs.)			
MATH	120	Intermediate Algebra	3
Social/Behavior Science Requirements (6 Cr. Hrs.)			
_____	_____	Select two classes from: ANTH 130, SOSC 101, PSYC 105, ANTH 101	3
_____	_____		3
Laboratory Science (4 Cr. Hrs.)			
_____	_____	Select one class from: BIOL 123/123L, CHEM 111/111L	4
Humanities Elective Requirements (3 Cr. Hrs.)			
_____	_____	Select from Humanities course list	3
Health/Physical Education Requirements (2 Cr. Hrs)			
HLTH	164	First Aid & Safety	2
Total Credit Hours Required			60

ELECTRONICS TECHNOLOGY

Electronics Technology consists of the Instrumentation and Control Technology Program and the Manufacturing Technology Program. The Instrumentation and Control Technology Program offers an Associate of Applied Science degree in Instrumentation and Control Technology. The Manufacturing Technology Program offers an Associate of Applied Science degree in Computer Integrated Manufacturing Technology (CIMT).

INSTRUMENTATION AND CONTROL TECHNOLOGY

The Associate of Applied Science degree in Instrumentation and Control Technology is a program of study requiring a suggested minimum five trimesters to satisfy the requirements of the program. The technical course requirements of 30 credit hours are theory and lab courses in Basic DC Electronics, Basic AC Electronics, Semiconductor Fundamentals, Digital Electronics, Microprocessors, Electromechanical Control Devices, and Electromechanical Control Systems. Students completing the courses are educated in operational theory, maintenance, troubleshooting, and repair of electronic equipment and communication systems. The program endeavors to prepare students for entry-level employment in an engineering environment to construct, test, and maintain electronic devices and systems developed by

engineers. The program is microprocessor-oriented providing the background necessary to understand and operate robotic and automated equipment. The technical courses can be transferable to four-year institutions toward a Baccalaureate degree in Electronics Engineering Technology. The college level courses are all transferable to a university for those students wishing to pursue advanced degrees.

Goals

The Instrumentation and Control Technology program strives to prepare students to apply the learned theoretical foundations and skills of their discipline to solve practical electronic circuit and system problems by using existing technology knowledgeably, confidently, and effectively.

Instrumentation and Control Technology Outcomes:

- Students will be able to communicate analytical theory and verification effectively in both oral and written form.
- Students will be able to use common electronic instrumentation to test and measure electronic circuit functions and phenomenon and to analyze the resulting data.
- Students will be able to apply various AC and DC principles and the fundamental laws of electronic circuits to troubleshooting procedures to identify faults in a variety of non-functional circuits and systems.
- Students will be able to identify microprocessor elements, their operation in a basic CPU-Memory configuration and the relationship between hardware operation and the instruction set.

INSTRUMENTATION & CONTROL TECHNOLOGY

Associate of Applied Science (CIP: 15.0404)

Technical Program Requirements (30 Cr. Hrs.)

ELEC	101A	Basic DC Electronics	3
ELEC	101L	Basic DC Electronics Lab	1
ELEC	105A	Basic AC Electronics	3
ELEC	105L	Basic AC Electronics Lab	1
ELEC	110A	Semiconductor Fundamentals	4
ELEC	110L	Semiconductor Fundamentals Lab	2
ELEC	118L	Electromechanical Control Devices	3
ELEC	201A	Digital Electronics I	2
ELEC	202L	Digital Electronics I Lab	1
ELEC	203	Digital Electronics II	2
ELEC	203L	Digital Electronics II Lab	1
ELEC	205A	Microprocessors	3
ELEC	206L	Microprocessors Lab	1
ELEC	218L	Electromechanical Control Systems	3

Communications Requirements (6 Cr. Hrs.)

ENGL	101	Composition	3
ENGL	219	Technical Writing	3

Mathematics Requirements (13 Cr. Hrs.)

MATH	121	College Algebra	3
MATH	123	Trigonometry	3
MATH	150	Advanced College Algebra	3
MATH	162	Calculus I	4

Computer Science Requirements (12 Cr. Hrs.)

ITCT	111	IT Essentials (A+)	3
ITCT	112	IT Essentials (Server+)	3
COSC	145	Introduction to UNIX/Administration	3
COSC	121	Introduction to Programming	3

Laboratory Science (4 Cr. Hrs.)

PHYS	151	General Physics	3
PHYS	151L	General Physics Lab	1

Humanities/Fine Arts/Social/Behavioral Science Elective Requirements (3 Cr. Hrs.)

			3
Total Credit Hours Required			68

MANUFACTURING TECHNOLOGY PROGRAM

The technological advances and developments in the world of manufacturing have created a different approach to the study of technologies in general, and in manufacturing in particular. The trends toward automation in every aspect of technological development combine the study of diverse components of instruction to enable the student to acquire a basic knowledge of several subjects in order to compete with their peers. The Manufacturing Technology Program at SIPI offers an Associate of Applied Science degree in Computer Integrated Manufacturing Technology (CIMT).

COMPUTER INTEGRATED MANUFACTURING TECHNOLOGY

This is a two-year program developed to prepare students for advanced employment in the manufacturing industry. This program is designed to provide instruction in the following subjects: Computer Numerical Controls (CNC), Computer-Aided Design (CAD), Computer-Aided Manufacturing (CAM), and Statistical Process Control (SPC). Metalworking, Robotics, Automated Technologies, and Laser-optics will aid the student in this pursuit. The student will also receive instruction in the theory and operation of Programmable Logic Controllers. Additional topics for the degree include interpretation of engineering prints using Geometric Dimensioning and Tolerancing (GD&T). A well-rounded curriculum in General Education through required and elective courses enables students toward further advancement into the pursuit of a Baccalaureate degree in Mechanical Engineering, Production Engineering, Manufacturing Engineering, or Industrial Engineering.

Possible options for employment include, but are not limited to, CNC Programmer, Machinist, Toolmaker or Millwright. Experience with processes required in high technology equipment and CAD, CAM, and CNC are invaluable contributions. The manufacturing industry is increasingly becoming more sophisticated due to the rapidly expanding trend toward automation throughout the nation.

Desirable basic skills as preparation for this program are high school machine shop, sequenced operations, setup, and operation of conventional and machine tool. The prerequisites for this course of study are satisfactory completion of entry-level language and math skills, high school diploma or GED Certificate, and placement test completion.

COMPUTER INTEGRATED MANUFACTURING TECHNOLOGY Associate of Applied Science Degree (CIP: 15.0613)

Technical Program Requirements (41 Cr. Hrs.)

ELEC	101A	Basic DC Electronics	3
ELEC	101L	Basic DC Electronics Lab	1
ELEC	105A	Basic AC Electronics	3
ELEC	105L	Basic AC Electronics Lab	1
ELEC	118L	Electromechanical Control Devices	3
ELEC	218L	Electromechanical Control Systems	3
DDET	281	Statistical Process Control	3
MT	105	Manufacturing Concepts and Practices I	3
MT	115	Manufacturing Concepts and Practices II	3
MT	120L	Manufacturing Processes and Equipment	4
MT	201	AutoCAD and Blueprint Reading for the Machine Trades	3
MT	211L	Introduction to Computer Numerical Control	4
MT	212L	Advanced Computer Numerical Control	4
MT	247	Materials Science and Analysis	3

Communications Requirements (6 Cr. Hrs.)

ENGL	101	Composition	3
ENGL	219	Technical Writing	3

Mathematics Requirements (9 Cr. Hrs.)

MATH	121	College Algebra	3
MATH	123	Trigonometry	3
MATH	150	Advanced College Algebra	3

Laboratory Science (4 Cr. Hrs.)

PHYS	151	General Physics	3
PHYS	151L	General Physics Lab	1

Humanities/Fine Arts/Social/Behavioral Science/Speech Elective Requirements (3 Cr. Hrs.)

			3
Total Credit Hours Required			63

GEOSPATIAL INFORMATION TECHNOLOGY

The Geospatial Information Technology (GIT) Program offers an Associate of Applied Science degree and a Certificate in GIT. The Associate of Applied Science degree in GIT is a course of study over five trimesters designed for students who want to enter the fast-growing field of geospatial information technology. This program prepares students for a career in GIT by learning the processes used in data capture, editing, and analysis. Students take a variety of classes including GIS/GPS, Photogrammetry and Remote Sensing. The graduates are prepared to enter into either entry-level technical positions or four-year institutions for further education.

GIT takes the locations of our lives and maps them, utilizing methods and technology from Geography, Mathematics and Computer Science. SIPI's GIT students learn skills to help them work in a variety of fields. Our students work on exercises ranging from resource management to economic development to homeland security. SIPI's GIT program prepares students to enter the workforce and to be leaders in their communities. The GIT program also offers research internships, where students research a wide range of topics.

SIPI's science and technology building houses state-of-the-art computer facilities, laboratories and classrooms that provide excellent teaching and research facilities, which combined with practical training, make the GIT program unique among community colleges.

If you enjoy science and computers, you can make a significant difference and have a well-paid job by choosing a career in geospatial information technology. You can be a part of efforts to conserve, manage and improve resources such as wildlife, fisheries, forests, rangelands, and water, or you can go to work for businesses analyzing their target markets, product distribution network, or financial lending patterns. SIPI students in GIT obtain a sound academic foundation and get extensive real-world experience.

GIT graduates are well prepared to transfer their Associate of Applied Science degrees to four-year universities and complete their Bachelor of Science degrees. SIPI has transfer programs in place that help students complete the transition to their four-year school. Career opportunities for students in geospatial fields are excellent. Most graduates are employed by federal land management agencies, local tribes, or local industry.

GEO-SPATIAL INFORMATION TECHNOLOGIES Certificate Program (CIP: 45.0702B)

Technical Program Requirements (24 Cr. Hrs.)

ENGR	101	Introduction to CAD	3
GIT	101	Digital Cartography	3
GIT	111	Introduction to GIS/GPS Technology	3
GIT	121	Advanced GIS/GPS Technology	3
GIT	202	Photogrammetry & Mapping	3
GIT	203	Remote Sensing	3
GIT	201	Principles and Theory of GIS and GPS Applied	3
GIT	280	Practicum/Internship	3

Communications Requirements (3 Cr. Hrs.)

ENGL	101	Composition	3
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Mathematics Requirements (3 Cr. Hrs.)

MATH	120	Intermediate Algebra	3
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Computer Science Requirements (6 Cr. Hrs.)

COSC	107	Computer Literacy	3
COSC	185	Data Base Management Systems	3

Health/Physical Education (2 Cr. Hrs.)

HLTH	164	First Aid & Safety	2
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Total Credit Hours Required			38
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GEO-SPATIAL INFORMATION TECHNOLOGIES Associate of Applied Science Degree (CIP: 45.0702)

Technical Program Requirements (24 Cr. Hrs.)

GIT	101	Digital Cartography	3
GIT	111	Intro to GIS/GPS Technology	3
GIT	121	Advanced GIS/GPS with Applications	3
GIT	201	Principles & Theory of GIS & GPS Applied	3

GIT	202	Photogrammetry & Mapping	3
GIT	203	Remote Sensing	3
GIT	280	Cooperative Education Internship	3
GIT	290	Special Topics in GIT	3
Technical Electives Requirements (9 Cr Hrs.)			9
_____	_____	Select from: ENGR101, Intro to CAD, ENGR102, Advanced CAD, COSC 275, RENG220/220L, Intro to Renewable Energy	
_____	_____	Java Programming, ITCT 111, IT Essentials I, ITCT112, IT Essentials II, or Any Two NATR or ESIH courses	
Communications Requirements (6 Cr. Hrs.)			
ENGL	101	Composition	3
ENGL	102	Critical Reading and Writing	3
Mathematics Requirements (6 Cr. Hrs.)			
MATH	121	College Algebra	3
_____	_____	Choose one class from: MATH 123, 145, 162	3
Computer Science Requirements (9 Cr. Hrs.)			
COSC	107	Computer Literacy	3
COSC	121	Intro to Computer Programming	3
COSC	185	Data Base Management Systems	3
Laboratory Science Requirements (8 Cr. Hrs.)			8
_____	_____	Select two classes from: GEOL 101/101L, CHEM 121/121L, BIOL 121/121L, BIOL 123/123L, ASTR 101/101L	
Humanities/Social/Behavioral Science Elective Requirements (3 Cr. Hrs.)			3
Total Credit Hours Required			65

NETWORK MANAGEMENT

The Certificate program in Network Management allows students the option of obtaining the CISCO Certified Network Association (CCNA) certification. For students who wish to continue their education and pursue an AAS in Network Management, all credit hours from the Certificate may be applied to the Network Management AAS degree program of study.

NETWORK MANAGEMENT Certificate Program (CIP: 11.1002B)

First Trimester			
COSC	107	Computer Literacy	3
ITCT	111	IT Essentials I (A+)	3
ITCT	151	Network Management/Cisco I	3
MATH	120	Intermediate Algebra	3
Total Credits			12
Second Trimester			
COSC	121	Introduction to Programming	3
ITCT	112	IT Essentials II (Server+)	3
ITCT	152	Network Management/Cisco II	3
_____	_____	COSC/ITCT Elective OR COSC 280 (Cooperative Education)	3
Total Credits			12
Third Trimester			
COSC	145	Introduction to UNIX/Administration	3
ITCT	153	Network Management/Cisco III	3
ITCT	154	Network Management/Cisco IV	3
Total Credits			9
Total Credit Hours Required			33

NETWORK MANAGEMENT

Associate of Applied Science Degree (CIP: 11.1002D)

The Associate of Applied Science degree in Network Management will train students in computer network technologies that will qualify graduates for job opportunities in industry. Both the degree and certificate programs are based on the CISCO Systems Networking Academy Program.

Technical Program Requirements (30 Cr. Hrs.)

ITCT	111	IT Essentials I (A+)	3
ITCT	112	IT Essentials II (Server+)	3
ITCT	151	Network Mgmt. CISCO I	3
ITCT	152	Network Mgmt. CISCO II	3
ITCT	153	Network Mgmt. CISCO III	3
ITCT	154	Network Mgmt. CISCO IV	3
COSC	107	Computer Literacy	3
COSC	121	Computer Programming	3
COSC	145	Introduction to UNIX Adm	3
_____	_____	Select one class from: COSC 280, ELEC 280, ENGR 280, ITCT 280	3

Communications Requirements (9 Cr. Hrs.)

ENGL	101	Composition	3
ENGL	_____	Select one class from: ENGL 102, 119, 219	3
SPCH	130	Public Speaking	3

Mathematics Requirements (6 Cr. Hrs.)

MATH	120	Intermediate Algebra	3
MATH	121	College Algebra	3

Elective Requirements with approval by Advisor (15 Cr. Hrs.)

_____	_____	Select five courses from: COSC123, 124, 280/290,	3
_____	_____	ELEC 280/290, GIT 101, 111, 121, 202, 203, 280/290, ITCT 280/290	3
_____	_____	ELEC101A,105A	3
_____	_____		3
_____	_____		3

Humanities/Social Science Elective Requirements (3 Cr. Hrs.)

_____	_____	Choose one class from: ARTH 101, LITR 101, 296, HIST 101, 161, NAVA 101, SPAN 101, PSYC 105, SOSC 101, ANTH 101	3
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Total Credit Hours Required **63**

PRE-ENGINEERING

Pre-Engineering programs consist of the Pre-Engineering Associate of Science degree and the Computer-Aided Drafting and Design Certificate programs. The Pre-Engineering program offers an Associate of Science degree in Pre-Engineering. The Computer Aided Design Certification program offers a Certificate in Computer Design.

Goals

The Pre-Engineering Program provides the Technical, Mathematics, Science, and General Education courses required in the first two years of most university four-year engineering programs. The Associate of Science degree in Pre-Engineering is a program of study requiring a suggested minimum of five trimesters to satisfy the requirements of the program. The technical course requirements of 28 credit hours consist of theory and lab courses designed to prepare students for careers as engineers. A minimum of 15 credit hours of required technical electives are chosen by the student in consultation with an Academic Advisor, depending on the student's area of engineering interest. Available electives are applicable to several engineering disciplines including Civil Engineering, Mechanical Engineering, Electrical Engineering, and Computer Engineering. Most courses are fully transferable for those students wishing to pursue four-year baccalaureate degrees at a university. For students requiring additional preparation, an initial enrichment year is also provided.

The Pre-Engineering program strives to equip students with necessary skills in Math, Physics, Chemistry, Computer-aided Design, and lower division engineering courses. These skills prepare students to apply the learned theoretical foundations and skills of their disciplines to solve practical engineering problems by using existing technology knowledgeably, confidently, and effectively.

Pre-Engineering Degree Outcomes:

- Student will be able to communicate analytical theory and problem solutions effectively in both oral and written form.
- Student will be able to use general mathematical, engineering and physical concepts.
- Student will be able to use common engineering instrumentation to test and measure phenomena and then to analyze the resulting data.
- Student will be prepared to continue in a Bachelor of Science Engineering or Engineering Technology degree program.

PRE-ENGINEERING ENRICHMENT YEAR Non-Degree (CIP: 24.0199E)

First Trimester

COSC	107	Computer Literacy	3
ENGR	105	Introduction to Engineering and Design	3
ENGL	100	Writing Std. English**	4
MATH	121	College Algebra*	3
Total Credits			13

Second Trimester

PHYS	102	Introduction to Physics***	3
COSC	121	Introduction to Programming	3
ENGL	100	Writing Std. English	4
MATH	123	Trigonometry*	3
Total Credits			13

Third Trimester

CHEM	111	Introduction to Chemistry***	3
CHEM	111L	Introduction to Chemistry Lab***	1
_____			_____
Humanities/Social/Behavioral Sciences Elective			3
ENGR	101	Introduction to CAD	3
MATH	150	Advanced College Algebra	3
Total Credits			13

Total Credit Hours Required

39

- Key: * Required if ACT/COMPASS College Math score is below 45
 ** Required if ACT/COMPASS English score is below 99
 *** Strongly recommended, but not required for engineering degree

PRE-ENGINEERING Associate of Science Degree (CIP: 14.0101)

Technical Program Requirements (31 Cr. Hrs.)

ENGR	102	Advanced CAD	3
ENGR	110	Computer Aided Problem Solving	3
_____			_____
ECON 200 (Macroeconomics) OR ECON 201 (Microeconomics)			3
ENGR	211	Circuit Analysis I	3
ENGR	211L	Circuit Analysis I Lab	1

Technical Electives Requirements (18 Cr. Hrs.) Choose from the following:

18

ENGR	205	Engineering Statics
ENGR	212/L	Circuit Analysis II and Lab
ENGR	213/L	Electronics I and Lab
ENGR	215/L	Strength of Materials and Lab
ENGR	222/L	Digital Design I and Lab
ENGR	225	Engineering Dynamics
ENGR	231	Introduction to Fluid Mechanics
ENGR	280	Engineering Internship
ENGR	295	Thermodynamics

Optional to include 3 credit hours from ENGR 280, 285, 290, ELEC 101A/101L, or above, GIT 101 or above ITCT 111 or above, RENG 220/220L, 230/230L

Communications Requirements (9 Cr. Hrs.)			
ENGL	101	Composition	3
ENGL	102	Critical Reading and Writing	3
ENGL	219	Technical Writing	3
Mathematics Requirements (12 Cr. Hrs.)			
MATH	162	Calculus I	4
MATH	163	Calculus II	4
MATH	270	Ordinary Differential Equations	4
Computer Science Requirements (3 Cr. Hrs.)			
COSC	195	C Language	3
Laboratory Science Requirements (8 Cr. Hrs.)			
PHYS	160	Engineering Physics I	3
PHYS	160L	Engineering Physics I Lab	1
CHEM	121	General Chemistry I	3
CHEM	121L	General Chemistry I Lab	1
Behavioral/Social Science Elective Requirements (6 Cr. Hrs.)			
_____	_____	Choose one class: ANTH101, 130, HIST101, 161, 162, POSC200, PSYC105, SOSC101	3
Total Credit Hours Required			69

COMPUTER-AIDED DRAFTING AND DESIGN

The Computer-Aided Drafting and Design Certificate program is intended to provide students with a marketable skill in three trimesters maximum. There is an on-going industry demand for individuals certified in computer aided drafting or design. Students can follow this program of study during their Pre-Engineering enrichment year or as they are transitioning from the Developmental Education Program to the Pre-Engineering enrichment year or into a technical program such as Electronics Technology, Manufacturing Technology, Geospatial Information Technology, Network Management, etc. Industry trends indicate that Computer Aided Drafting and Design Certification can lead to well-paying immediate full-time or part-time employment, allowing one to concurrently pursue a two-year or four-year degree.

Goals

The Computer Aided Drafting and Design Certification Program endeavors to equip students with necessary skills in math, English, engineering graphics, computer aided design, and mechanical drawing applications. These skills prepare students to apply the foundations and skills of this discipline to develop detailed CAD drawings by using existing technology and software knowledgeably, confidently, and effectively.

Computer Aided Drafting and Design Outcomes:

- Students will be able to describe the functions of dimensions on an engineering drawing.
- Demonstrate the use of conventional Dimensioning and Notation techniques to describe size and shape accurately on an engineering drawing.
- Develop engineering drawings using standard CAD software.
- Collect, organize, and manage sheet sets.

COMPUTER AIDED DRAFTING AND DESIGN Certificate in (CIP: 15.1302)

Technical Program Requirements (28 Cr. Hrs.)			
ENGR	101	Introduction to CAD	3
ENGR	102	Advanced CAD	3
ENGR	103	Engineering Graphics	4
ENGR	104	Mechanical and Electrical Drawing Applications	4
ENGR	105	Introduction to Engineering and Design	3
ENGR	106	Solid Modeling	3
MT	211L	Introduction to Computer Numerical Control	4
MT	212L	Advanced Computer Numerical Control	4
Communications Requirements (3 Cr. Hrs.)			
_____	_____	Select one class from: ENGL 101, 102	3

Mathematics Requirements (6 Cr. Hrs.)

_____	_____	Select two classes from: MATH 120, 121, 123, 150	3
_____	_____		3

Computer Science Requirements (3 Cr. Hrs.)

COSC	107	Computer Literacy	3
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Total Credit Hours Required			40
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NATURAL RESOURCES MANAGEMENT

The Natural Resources Program offers an Associate of Applied Science (A.A.S.) degree. During the first year of study, students take classes in English, Computers, Mathematics, Biology, and Chemistry, as well as introductory coursework in plants and soils. The second year is devoted to specialized coursework in one of the three emphasis areas listed below. Excellent teaching and research facilities, combined with practical outdoor field training, make the Natural Resources program at SIPI unique among community colleges. Articulation agreements between the Natural Resources program and universities in New Mexico, Arizona, and Colorado allow the direct transfer of SIPI classes toward a four-year degree. Many SIPI students have used these articulation guidelines to successfully complete their Bachelor of Science (B.S.) degrees.

Natural Resource Management

If you enjoy science and the outdoors, you can make a significant difference in the world in which we live, and have a well-paid job, by choosing a career in the management of natural resources. You can be a part of efforts to conserve, manage and improve resources such as wildlife, fisheries, forests, rangelands, and water. SIPI is ideally located in north-central New Mexico within an hour's drive of desert, grasslands, savannah woodlands, and pine forests. The range of ecosystems in our region is unique, and serves as an outdoor classroom for the Natural Resource Management program. Each student completes a paid internship during the summer, working in the field as a forestry, range or wildlife technician. Many SIPI graduates have gone on to obtain B.S. degrees in Forestry, Range Management, and Wildlife Biology. Career opportunities for students in natural resource fields are excellent. Most graduates are employed by federal land management agencies such as the U.S. Forest Service, or for tribal governments; for example, in a tribe's Department of Environment.

Crop and Soil Science

Soil and Crop Science is the theory of plant and soil science and its application to the sustainable production of abundant, high-quality food, feed and fiber crops. The Soil and Crop Science option provides an education in the basic sciences, while preparing students to apply knowledge in many technical phases of plant, soil, and environmental management. Soil and Crop scientists must have a broad knowledge of factors affecting the management of crops and soil resources. In recent years, the effects of inappropriate agricultural practices throughout the world and tribal lands have become increasingly apparent. Losses of soil fertility, soil erosion, and consequent deterioration of rural economies have led many agriculturists to search for more sustainable food and fiber production systems. The challenge for a soil and crop scientist is to understand, manage and protect earth's vital resources as well as using science and natural resources to sustain food supply and solve potential environmental issues.

Environmental Science

History shows that over the years, humans have dealt with the environment around them in different ways, some helpful and some harmful. The future of our communities will require more and more knowledgeable persons to deal with environmental issues in politics, economics, science and technology. The Environmental Science program at SIPI was developed to provide tribal communities and the national labor force with well-trained environmental technicians and managers, and covers a wide variety of topics, including water and air pollution, environmental chemistry, biological remediation techniques, renewable/alternative energy development, environmental laws and regulations and environmental monitoring and safety issues. The program is designed to meet the needs of Native American communities, places emphasis on tribal, regional and global environmental concerns, and includes a combined practicum course and an internship, encouraging students to address specific environmental issues of interest to them and their communities.

NATURAL RESOURCES MANAGEMENT, AGRIBUSINESS
Associate of Applied Science Degree (CIP: 03.9999G)

First Trimester			
ENGL	101	Composition	3
		ENVS 101 (Environmental Science I) OR NATR 200 (General Ecology)	3
MATH	121	College Algebra	3
COSC	107	Computer Literacy	3
ATE	102	Occupational Safety OR Equivalent Substitution	3
Total Credits			15
Second Trimester			
ENGL	219	Technical Writing	3
MATH	145	Statistics	3
AGTC	104	Introduction to Plant Science	3
AGTC	104L	Introduction to Plant Science Lab	1
CHEM	121	General Chemistry	3
CHEM	121L	General Chemistry Lab	1
Total Credits			14
Third Trimester			
GIT	111	Introduction to GIS/GPS Tech.	3
GEOL	101	Physical Geology	3
GEOL	101L	Physical Geology Lab	1
BIOL	121	General Biology	3
BIOL	121L	General Biology Lab	1
HLTH	164	First Aid & Safety	2
Total Credits			13
Fourth Trimester			
AGTC	101	Introduction to Soils	3
AGTC	124	Agricultural Economics I	3
BADM	130	Principles of Management	3
ACCT	201	College Accounting I	3
Total Credits			12
Fifth Trimester			
ACCT	202	College Accounting II	3
ECON	200	Macroeconomics	3
AGTC	280	Agricultural Internship	3
Total Credits			9
Total Credit Hours Required			63

NATURAL RESOURCES MANAGEMENT, CROP & SOIL SCIENCE
Associate of Applied Science Degree (CIP: 03.9999S)

First Trimester			
ENGL	101	Composition	3
BIOL	121	General Biology	3
BIOL	121L	General Biology Lab	1
MATH	121	College Algebra	3
COSC	107	Computer Literacy	3
Total Credits			13
Second Trimester			
ENGL	219	Technical Writing	3
MATH	145	Statistics	3
AGTC	104	Introduction to Plant Science	3
AGTC	104L	Introduction to Plant Science Lab	1
CHEM	121	General Chemistry	3
CHEM	121L	General Chemistry Lab	1
Total Credits			14
Third Trimester			
GIT	111	Introduction to GIP/GPS Tech	3
GEOL	101	Physical Geology	3
GEOL	101L	Physical Geology Lab	1

NATR	200	General Ecology	3
Total Credits			10
Fourth Trimester			
AGTC	101	Introduction to Soils	3
NATR	220	Principles of Range Management	3
NATR	220L	Principles of Range Management Lab	1
_____	_____	NATR 201 (Introduction to Forestry) OR NATR 230 (Introduction to Fish and Wildlife Management)	3
_____	_____	NATR 201L (Introduction to Forestry Lab) OR NATR 230 (Introduction to Fish and Wildlife Management lab)	1
_____	_____	Laboratory Science Elective	4
Total Credits			15
Fifth Trimester			
NATR	225	Advanced Field Topics in Range Management	3
NATR	205	Advanced Field Topics in Forestry OR	
NATR	235	Advanced Field Topics in Wildlife Management	3
AGTC	280	Agricultural Internship	3
Total Credits			9
Total Credit Hours Required			61

NATURAL RESOURCES MANAGEMENT
Associate of Applied Science Degree (CIP: 03.9999R)

Natural Resource Management Requirements (35 Cr. Hrs.)

Natural Resource Program Core Requirements (18 Cr. Hrs.) Select classes from:

AGTC	104	Introduction to Plant Science	16
AGTC	104L	Introduction to Plant Science Lab	
AGTC	101	Introduction to Soil Science	
GIT	111	Introduction to GIS/GPS Technology	
NATR	280	Natural Resource Program Internship	
NATR	200	Ecology	
_____	_____	NATR 221 (Identification of Grasses and Shrubs) OR NATR 202 (Trees and Forests of North America)	2

Environmental Science Requirements (8 Cr. Hrs.) Select two classes from:

NATR	201	Introduction to Forestry	8
NATR	201L	Introduction to Forestry Lab	
NATR	220	Principles of Range Management	
NATR	220L	Principles of Range Management Lab	
NATR	230	Introduction to Fishery & Wildlife Management	
NATR	230L	Introduction to Fishery & Wildlife Management Lab	

Advanced Resource Management (6 Cr. Hrs.) Select two classes from:

NATR	205	Field Topics in Forestry	6
NATR	225	Field Topics in Range Management	
NATR	235	Field Topics in Wildlife Management	
GIT	121	Advanced GIS/GPS Technology	

Natural Resource Program Elective Requirements (3 Cr. Hrs.)

_____	_____	_____	3
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Communications Requirements (6 Cr. Hrs.)

ENGL	101	Composition	3
ENGL	219	Technical Communications	3

Mathematics Requirements (6 Cr. Hrs.)

MATH	121	College Algebra	3
MATH	145	Statistics	3

Computer Science Requirements (3 Cr. Hrs.)

COSC	107	Computer Literacy	3
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Laboratory Science Requirements (8 Cr. Hrs.)

BIOL	121	General Biology	3
BIOL	121L	General Biology Lab	1
CHEM	121	General Chemistry	3
CHEM	121L	General Chemistry Lab	1

Social/Behavioral Science Elective Requirements (3 Cr. Hrs.)

Select one class from : ANTH 101, 130, ARTH 101, 131, PSYC 105,
SOCS 101, 210, POSC 110, 200, ECON 200, 201

_____ _____
Total Credit Hours Required

3
61

NATURAL RESOURCES MANAGEMENT, ENVIRONMENTAL SCIENCE
Associate of Applied Science Degree (CIP: 03.9999V)

Natural Resource Management Requirements (34 Cr. Hrs.)

Natural Resource Program Core Requirements (16 Cr. Hrs.)

AGTC	104	Introduction to Plant Science	3
AGTC	104L	Introduction to Plant Science Lab	1
AGTC	101	Introduction to Soil Science	3
GIT	111	Introduction to GIS/GPS Technology	3
ESIH	280	Environmental Internship	3
_____	_____	ESIH 101 (Environmental Science I) OR NATR 200 (Ecology)	3

Environmental Science Requirements (18 Cr. Hrs.)

GEOL	101	Physical Geology	3
GEOL	101L	Physical Geology Lab	1
ATE	102	Occupational Safety OR Equivalent Substitution	3
HLTH	164	First Aid & Safety	2
ESIH	104	Environmental Science II	3
ESIH	102	Environmental Regulations	3
ESIH	103	Sampling & Monitoring	3

Environmental Management Practicum Requirements (9 Cr. Hrs.)

_____	_____	_____	3
_____	_____	_____	3
_____	_____	_____	3

Environmental Science Elective Requirements (6 Cr. Hrs.)

_____	_____	_____	3
_____	_____	_____	3

Communications Requirements (6 Cr. Hrs.)

ENGL	101	Composition	3
ENGL	219	Technical Communications	3

Mathematics Requirements (6 Cr. Hrs.)

MATH	121	College Algebra	3
MATH	145	Statistics	3

Computer Science Requirements (3 Cr. Hrs.)

COSC	107	Computer Literacy	3
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Laboratory Science Requirements (8 Cr. Hrs.)

BIOL	121	General Biology	3
BIOL	121L	General Biology Lab	1
CHEM	121	General Chemistry	3
CHEM	121L	General Chemistry Lab	1

Total Credit Hours Required

72

COURSE DESCRIPTIONS

ACCOUNTING

ACCT 101 Fundamentals of Accounting (3)

Prerequisites: None

The basic elements for a service business including the complete accounting cycle and payroll procedures. Students will complete several problems from each chapter for a thorough presentation of each step in the accounting cycle. (Not transferable) Offered-Fall, Spring, and Summer

ACCT 201 College Accounting I (3)

Prerequisites: ACCT 101

This course gives the student a solid foundation in generally accepted accounting principles, beginning with basic double entry concepts, classification of accounts, preparation of financial statements, closing entries, payroll, special purpose journals and the measurement and reporting of assets and current liabilities. Emphasis is on the sole proprietorship, including both service and merchandising entities.

Offered-Fall, Spring, Summer

ACCT 202 College Accounting II (3)

Prerequisites: ACCT 201

Financial accounting for partnerships and corporations, and an introduction to managerial accounting concepts and techniques. Offered-Fall, Spring

ACCT 220 Income Tax (3)

Prerequisites: ACCT 101

Federal income taxation of individuals and proprietorships under the Internal Revenue Code and regulation, including accounting periods, methods, income deductions, property transactions, tax credits, and research and planning.

Offered-Spring

ACCT 235 Microcomputer Accounting for Small Business (3)

Prerequisites: ACCT 101

Upon completion of this course, the student will be able to set up a computerized accounting system for a small business using Peachtree Accounting Software. The purpose of this course is to teach the student how to set up and use an accounting software program to keep financial records of a small business.

Offered-Summer

ACCT 250 Tribal Accounting (3)

Prerequisites: ACCT 101

This is a compilation of accounting topics specifically selected for students contemplating employment in a tribal accounting office. The course addresses those skills specifically needed to succeed in that environment. Accounting principles as prescribed by the Governmental Accounting Standards Board and the Financial Accounting Standards Boards will be covered. Offered-Spring

ACCT 280 Cooperative Education (3)

Prerequisites: None

A supervised cooperative work program coordinated by the student's advisor in an approved accounting or related occupation. Offered-On Demand

AGRICULTURE

AGTC 101 Introduction to Soils (3)

Prerequisites: BIOL 121, MATH 100

Comprehensive introduction to soil science from a plant management perspective, divided into three units. A unit explores the principles and properties of soils, chemical and biological characteristics, and soil management. The course objectives are to introduce the student to the nature and function of soils in the ecosystem, and how these are related to plant growth.

AGTC 102 Fundamentals of Soils (3)

Prerequisites: Chem111/L, MATH100

Focuses on the management and fertility of soils. Conditions affecting plant growth, nutrition and production will be discussed along with the production and properties of fertilizer material.

AGTC 104 Introduction to Plant Science (3)

Prerequisites: NONE

Introductory course for students with little or no exposure to plant science. The course objectives are to introduce the basic biological, chemical, and physical principals of plant growth. Labs will emphasis how plants grow and reproduce, how they obtain essential materials for growth, how they interact with each other, and how they react under environmental stress.

AGTC 104L Introduction to Plant Science Lab (1)

Prerequisites: NONE

Supplemental to AGTC 104. Introductory course in agricultural plant science designed for students with little or no exposure to plant science.

AGTC 124 Agricultural Economics I

Prerequisites: ACCT 201

An orientation to agricultural supply business, farm and ranch production, food markets, food processing and distribution.

AGTC 202 Introduction to Soil Science (3)

Prerequisites: CHEM121/L

Presents basic concepts of all aspects of soil science as related to use, conservation, and plant growth. Emphasizing physical, chemical, and biological properties; origin and classification; soil management and conservation.

AGTC 202L Introduction to Plant Science Lab(1)

Prerequisites: CHEM121/L

Field and laboratory techniques to coincide with lecture topics.

AGTC 280 Agricultural Internship (3)

Prerequisites: None

Seminars and course topics beyond regularly scheduled classes.

AGTC 290 Special Topics in Agriculture (1-3)

Prerequisites: 6 cr. hrs. in Natural Resources program

Students are employed in the field of agriculture for one trimester. Students often work for federal agencies, such as the Natural Resources Conservation Service, for state or county governments, or for tribal governments. Students may work in the private sector, for example an agricultural business entity. Students also work as research assistants on summer research projects at four-year universities.

ANTHROPOLOGY

ANTH 101 Introduction to Anthropology (3)

Prerequisites: ENGL 100

Survey of the entire field of anthropology including archeology, biological anthropology, cultural anthropology, ecological anthropology and linguistics.

ANTH 130 Cultures of the World (3)

Prerequisites: ENGL 100

Basic concepts and methods of cultural anthropology with a focus on selected cultures, ranging from preliterate societies to aspects of urban civilization.

ART HISTORY

ARTH 101 Introduction to Art (3)

Prerequisites: ENGL 100

A beginning course in the fundamental concepts of the visual arts; the language of form and the media of artistic expression. Reading and slide lectures supplemented by museum exhibition attendance.

ARTH 102 Art Foundations (3)

Prerequisites: ARTH 101

Introduces hands-on art experience to include techniques of drawing pencil and charcoal to basic principal of using color.

ARTH 251 Art Traditions of the American Southwest (3)

Prerequisites: NONE

Survey of major artistic traditions and interrelationships among Southwest cultures from prehistoric to modern times using slide lecture, video films, discussion to review the arts of basketry, pottery, architecture, jewelry, textiles, sculpture, painting and photography in their historical and cultural contexts.

ASTRONOMY

ASTR 101 Introduction to Astronomy (3)

Prerequisites: ENGL 100, MATH 100 Co-requisite: ASTR 101L

This course provides an introduction to Astronomy by studying astronomical objects beginning with the Earth and Moon and proceeding to the farthest known objects in the universe, quasars. The course includes discussion on the birth and death of the universe. A basic understanding of algebra is helpful.

ASTR 101L Introduction to Astronomy Lab (1)

Co-Requisite: ASTR 101

The Astronomy Lab will include making qualitative observations with the naked eye and telescope, quantitative measurements of the position and motion of heavenly bodies, drawing conclusions based on observations and measurements, utilizing a sky chart/planisphere and explaining the motions of heavenly bodies.

BIOLOGY

BIOL 111 Biology for Environmental Sciences (3)

Prerequisites: ENGL 100 Co-requisites: BIOL 111L

An introduction to ecology, current environmental problems and control measures. Emphasis on human impact, modern technology, natural ecosystems, social, political, and economic processes. The student will have the knowledge to become environmentally responsible and contribute to the quality of human life. Appropriate laboratory work and demonstrations to implement the fundamental principles and concepts learned in theory.

BIOL 111L Biology for Environmental Sciences Lab (1)

Prerequisites: BIOL 111, ENGL 100 Co-requisites: BIOL 111

Laboratory, which may require dissection, is an integral and required part of this course.

BIOL 121 General Biology (3)

Prerequisites: ENGL 100, MATH 100 Co-requisites: BIOL 121L

An introduction to the fundamental concepts and principles of general biology. The course will cover basic morphological and physiological aspects of cells, tissues, organs, systems and living organisms. The course will progress from the cellular level to the population level of living organisms.

BIOL 121L General Biology Lab (1)

Prerequisites: ENGL 100, MATH 100 Co-requisites: BIOL 121

Laboratory, which may require dissection, is an integral and required part of this course.

BIOL 123 Biology for Health Sciences (3)

Prerequisites: ENGL 100, MATH 100 Co-requisites: BIOL 123L

Through the investigation and examination of basic structural and functional characteristics of the human body, its cells, tissues, organs, and systems the student will be able to apply basic biological principles to all subject material covered throughout this course. Appropriate laboratory work and demonstrations to implement the fundamental principles and concepts learned in theory.

BIOL 123L Biology for Health Sciences Lab (1)

Prerequisites: ENGL 100, MATH 100 Co-requisites: BIOL 123

Laboratory, which may require dissection, is an integral and required part of this course.

BIOL 220 General Zoology (3)

Prerequisites: ENGL 100, MATH 100, BIOL 121, CHEM 111 Co-requisites: BIOL 220L

Through systematic investigation of major animal groups, the student will apply structural, physiological, embryological, ecological characteristics, which exist in the field of zoology. The course will cover invertebrate and vertebrate representatives beginning at the microscopic level and advancing to the ecological realm. Offered-Spring

BIOL 220L General Zoology with Lab (1)

Prerequisite(s): BIOL 121 and CHEM 111 Co-requisites: BIOL 220

Laboratory, which may require dissection, is an integral and required part of this course.

BIOL 237 Anatomy and Physiology (3)

This course is an advanced study of the structures and functions of the human body. The student will recognize and describe anatomical and physiological processes that occur in the cells, tissues, organs and systems of the human body. This course is designed for students in the fields of physical education, physical therapy, nursing or related pre-professional fields. Laboratory work, which requires dissection, is an essential part of this course.

BIOL 237L Anatomy and Physiology Lab (1)

Prerequisite(s): Biology 121 or 123 with a C grade or better Co-requisite BIOL 237.

Laboratory, which may require dissection, is an integral and required part of this course.

BUSINESS ADMINISTRATION

BADM 114 Introduction to Business (3)

Prerequisites: NONE

A survey course presenting an integrated picture of American business and its operations. Included are topics such as forms of ownership, management, internal organization, production, personnel, labor relations, marketing, finance, insurance, accounting and law.

Offered-Fall, Spring, Summer

BADM 118 Small Business Management (3)

Prerequisites: ENGL 100, MATH 100

The Small Business Management Entrepreneurship course is designed to help students learn what it takes to be an entrepreneur. The structure of the course gives students who are interested in starting their own businesses the opportunity to learn the basics of entrepreneurship by developing a business plan. The course is also helpful for students who desire to learn about small business ownership and management as an academic discipline, as well as a career choice. Students of free enterprise will develop an appreciation of the role entrepreneurship has played in shaping our nation. Offered-Summer

BADM 130 Principles of Management (3)

Prerequisites: ENGL 100

Introduces the basic theory of organizations and the functions of planning, organizing, directing, staffing and controlling. The evolution of management and management styles are also examined. Offered-Spring

BADM 135 Human Relations (3)

Prerequisites: NONE

Focuses on the personal and interpersonal competencies and skills needed in a business setting to understand oneself, one's co-workers, employers, and customers. Offered-Fall, Spring, and Summer

BFIN 211 Principles of Finance (3)

Prerequisites: Successful completion of Accounting 201 or instructor's permission.

This course gives the student a solid foundation in the principles of finance, beginning with an overview of financial management, understanding financial statements and cash flow, valuing future cash flows, valuing stocks and bonds, and capital budgeting.

BADM 240 Business Law (3)

Prerequisites: ENGL 101

Business Law deals with the application of legal principles and procedures common to business practices. Primary areas of study include an overview of the American legal system, contract law and the Uniform Commercial Code, Property and Bailment's and Business Entities.

Offered-Spring

BADM 242 Principles of Marketing (3)

Prerequisites: BADM 114

Presents processes, functions and principles in the current marketing system from the perspective of a marketing director. This includes the production of a product or service, its pricing, distribution and promotion.

Offered-Fall

BADM 250 Tribal Leadership (3)

Prerequisites: ENGL 100

This course will focus on the theories, practices and styles of Leadership, compared to the cultural theories and cultural styles of leadership among tribal leaders. Styles of leadership characteristics of tribal leaders of the past are also covered.

Offered-Fall

BADM 251 Tribal Management (3)

Prerequisites: ENGL 100

This course will focus on basic management principles of tribal governments, including the functions of management within tribal reservations, tribal councils, tribal casinos and other business ventures.

Offered-Fall

BADM 252 Tribal Law (3)

Prerequisites: ENGL 100

This course will examine the special relationship that exists between the federal government and tribal governments. It includes jurisdiction in Indian country, state tribal relations and tribal governing structures.

Offered-Fall

BADM 253 Tribal Resources and Economic Development (3)

Prerequisites: ENGL 100

This course will focus on current economic issues confronting tribes and the larger Indian society. Students will analyze and study the traditional economic systems in order to compare tribal and Western economic systems and concepts within cultural, legal and historical content. Students will explore new visions for the tribe and create a vision plan for economic development. Offered-Spring

BADM 280 Cooperative Education (3)

Prerequisites: ENGL 100

A supervised cooperative work program that is coordinated by a student's advisor in an approved business or related occupation. Offered-On Demand

BUSINESS EDUCATION

BUED 102 Keyboarding (3)

Prerequisites: ENGL 099, MATH 098

Keyboarding is an intensive course designed to help students develop a strong technique of keyboarding skills needed for today and reinforced by applying word-processing functions to business correspondence, tables, reports, and administrative and employment documents. Other features include communication activities, a workplace simulation, Welcome to Windows, File Management, and news on employment topics. Offered-Fall, Spring, and Summer

BUED 125 Business Math (3)

Prerequisites: MATH 98

Fundamentals of business mathematics including percentage formula applications, discounts, markup, bank reconciliation, simple and compound interest, depreciation methods, employee earnings, money management and their applications on electronic calculators. Offered-Fall, Spring, and Summer

BUED 130 Records Management (3)

Prerequisites: COSC 107

This course covers the fundamentals of filing by learning ten basic filing rules and applying these rules to names. It covers the alphabetic, numeric, subject, and geographic filing systems. A computer Microsoft program is used to enforce and emphasize rules and filing methods used in a business environment. Offered-Summer

BUED 210 Word Processing (3)

Prerequisites: COSC 107

Specialized class featuring experimental learning of Microsoft Word 2003 software through lecture, manufacturer's operating instructions, and hands-on assignments. Students will use Microsoft Word 2003 to produce business documents, merging, segment assembly, sort, database, graphic insertions, and basic macros. Knowledge of basic business formats is required. Offered-Spring

BUED 215 Multimedia in Business (3)

Prerequisites: BUED 102, BUED 210, COSC 107

This course is designed to introduce students to desktop publishing through the use of multimedia. This course focuses on the use of word processing software features, digital camera, scanner, colored printer, black and white printer, various photo editors and the use of the Internet to create a variety of professional-looking documents. It combines the roles of page designer and typesetter and allows the user to produce professional-looking document for both the home and business office. Offered-Summer

BUED 280 Cooperative Education (1-6)

A supervised cooperative work program that is coordinated by the student's advisor in an approved office or business related occupation. Offered-On Demand

COLLEGE AND CAREER PREPARATION

CACS 100 College and Career Success (2)

This course provides an opportunity to learn and adopt methods for success in school and the workplace. Topics include time management, test taking, notetaking techniques, the development of a personal study system, exploring careers, resume writing, and interview skills. The course will focus on assisting you in developing practical college and career skills and techniques that will enhance academic and workplace success and increase your enjoyment of learning.

CHEMISTRY

CHEM 111 Elements of Chemistry (3)

Prerequisites: MATH 120 Co-requisite: CHEM 111L

This course covers qualitative and quantitative areas of non-organic general chemistry. Instruction include: atomic and molecular structure, the Periodic Table, acids and bases, mass relationships, and solutions. The course will satisfy the Chemistry requirement for an A.A. degree. It is designed for non-science majors and nursing students. 3 hr. Lecture and 3 hr. Lab.

CHEM 111L Elements of Chemistry Lab (1)

Prerequisites: MATH 120 Co-requisites: CHEM 111

Laboratory work will require working with chemicals, laboratory simulations and computer activities.

CHEM 121 General Chemistry I (3)

Prerequisites: CHEM 111 or MATH 121 Co-requisite: CHEM 121L

The first of a two-step course sequence required for students majoring in sciences, engineering or pre-med. Includes atomic and molecular structure, stoichiometry, mass and energy relationships, chemical reactions, and states of matter, acids and bases, and reaction rates. 3 hr. Lecture and 3 hr. Lab.

CHEM 121L General Chemistry Lab (1)

Prerequisites: CHEM 111 or MATH 121 Co-requisites: CHEM 121

Laboratory work will require working with chemicals, laboratory simulations and computer activities.

CHEM 122 General Chemistry II (3)

Prerequisites: CHEM 121, CHEM 121L Co-requisites: CHEM 122L

A continuation of CHEM 121 and CHEM 121L, that includes the study of chemical periodicity, equilibrium, Chemical bond theory, solubility, electro- and nuclear chemistry. Introduction to coordination and organic chemistry. 3 hr. Lecture and 3 hr. Lab.

CHEM 122L General Chemistry II Lab (1)

Prerequisites: CHEM 121/121L Co-requisites: CHEM 122

Laboratory work will require working with chemicals, laboratory simulations and computer activities.

CHEM 212 Introduction to Organic Chemistry or Biochemistry (4)

Prerequisites: CHEM 111w/Lab, CHEM 121w/Lab

Introduction to the basics of organic and biological chemistry via discussion of the structure, bonding, properties and reactivity of the basic families of organic and biologically important compounds with special emphasis toward interests of students in health sciences, including, saturated and unsaturated hydrocarbons, oxygenated hydrocarbons, carbohydrates, fats and proteins. Meets 4 hrs. per week.

COMPUTER SCIENCE

COSC 107 Computer Literacy (3)

Prerequisites: BUED 102 or permission of instructor.

The purpose of the Computer Literacy course is to expose students to the capabilities of modern data processing hardware and software. The course focuses on four types of software; operating system software, word-processing, spreadsheet, and presentation software. Offered-Fall, Spring, Summer

COSC 111 Principles of Computing (3)

Prerequisites: None

This is a technical introduction to the discipline of computing concepts and design. The course is intended for Computer Science, Network Management, Business Information Systems, Civil Engineering, Electronics and other select majors as indicated in those degree requirements. Offered-On Demand

COSC 112 Web Design (3)

Prerequisites: BUED 102, COSC 107

The course will be taught as if students are absolute beginners in web page design using Hypertext Markup Language (HTML) and will progress to more advanced material. The book used for this course is written so HTML skills can be developed quickly and easily. It integrates the Secretary's Commission on Achieving Necessary Skills workplace competencies and foundation skills. Students will use HTML and Notepad (text editor) to create the web pages. They will use an Internet provider to get clip art and preview their web pages. Offered-Fall

COSC 116 Java Programming Language for Non-Programmers (3)

Prerequisites: COSC 107, MATH 100

Java Programming for non-programmers provides first time programmers an excellent choice for learning programming using the Java Programming language and scripting. This course helps students understand the significance of the Java Programming language and scripting. With this knowledge students will develop programming skills in the areas of object-orientated and Java Technology. This course satisfies the requirements for COSC 121. Offered-On Demand

COSC 119 Visual Basic (3)

Prerequisites: MATH 100

This course is an introduction to object oriented, event-driven business application programming and graphical user interfaces in the Windows environment. This course is intended for Computer Science, Network Management, Business Information Systems, Civil Engineering, Electronics and other select majors as indicated in those degree requirements. Offered-Spring

COSC 121 Introduction to Programming (3)

Prerequisites: COSC 107, MATH 100

An introduction to programming. It includes computer vocabulary, operating system concepts, structured programming techniques, programming logic, and control. Offered-Fall, Spring

COSC 123 Excel (3)

Prerequisites: COSC 107

This course is designed to enhance student skills in working with spreadsheets to the specialist and expert level. The textbook used for this course has been approved by the Microsoft Office Specialist program. It is designed to prepare students to take the Excel Microsoft Office Specialist exam. This exam is not currently offered at SIPI. Offered-Summer

COSC 124 Access (3)

Prerequisites: COSC 107

This course is designed to enhance student skills in working with database/information management software to the intermediate and advanced level. The textbook used for this course has been approved by the Microsoft Office Specialist program. It is designed to prepare students to take the Access Microsoft Office Specialist exam. This exam is not currently offered at SIPI. Offered-Spring

COSC 145 Intro to UNIX/Administration/Linux (3) Offered-On Demand

Prerequisites: COSC 121

The goal of this course is to provide students with a comprehensive overview of the UNIX operating system while working with a PC-friendly system. By the end of the course, students will not only be familiar with the UNIX command-line environment, utilities, and applications, but also with the graphical X Window environment. Students will also learn how to use Linux as a powerful programming environment. Programming topics include introducing at shell scripting, as well as the PERL, C, and C++ programming languages.

COSC 185 Database Management Systems (3)

Prerequisites: COSC 107

Designing and writing programs in a fourth generation database language. Students learn to create their own menu systems for data input and output, create custom formatted reports, manipulate files and data outside the standard application menus, and plan projects using structured analysis and design techniques.

COSC 195 C Language Programming (3)

Prerequisites: COSC 107, MATH 120

This course provides a thorough and comprehensive introduction to the developments of structured programming. Syntax, I/O functions, control statements, variables and arrays are covered.

COSC 211 PowerPoint Presentations (3)

Prerequisites: COSC 107, BUED 102

The PowerPoint course is designed to teach students the use and purpose of presentation software. They will use presentation software to organize and present information. Students will learn to create slides for on-screen presentation, overhead or slide projectors, and to print handouts, outlines, or entire presentations.

COSC 275 Java Programming Language I (3)

Prerequisites: COSC 107, MATH 120

The Java Programming Language I course teaches students the syntax of the Java programming language, object oriented programming with the Java Programming language. Creating graphical user interfaces, exceptions, file input and output, threads and networking. Programmers familiar with object-oriented concepts can learn how to develop Java applications. Offered-On Demand

COSC 276 Java Programming Language II (3)

Prerequisites: COSC 275

The Java Programming Language II course provides students with the experience of the software development methodology called Extreme Programming while learning the Java Programming language. The course provides students with information about the syntax of Java programming language, object oriented programming with the Java programming language, and creating graphical user interfaces, exceptions, file input and output and threads and networking. Programmers familiar with object-oriented concepts can learn how to develop Java applications. The course prepares students for the Java Certification Exam.

COSC 280 Cooperative Education (1-4)

Prerequisites: NONE

A supervised cooperative work program that is coordinated by the student's advisor in an approved computer or related occupation.

CULINARY ARTS

CULI 099M Culinary Arts Technical Math (3)

Prerequisites: Acceptance into the program.

Prepare for the math requirements encountered in study of recipe conversions and calculating amounts with a review of the basic arithmetic operations of whole numbers. The following topics are then covered in greater detail: fractions, decimals, percentages, weights and measures, calculation of recipes, recipe conversions, and costs. Course emphasis is on specific math applications in the food service industry.

CULI 101 Culinary Arts I Theory (4)

Prerequisites: Acceptance into the program.

Emphasis is on sanitation and safety practices and procedures, terminology, cooking and baking methods and techniques, recipes, and recipe conversions. Importance is on comprehending and following a recipe in an organized manner.

CULI 102L Culinary Arts I Lab (2)

Prerequisites: NONE

Co-requisites: CULI 101

Practical application in both cooking and baking. Instruction includes safety procedures, correct use and care of cooking/baking hand tools, utensils, and equipment. Emphasis is on following recipes in an organized manner and on developing confidence in cooking and baking skills.

CULI 105 Culinary Arts II Theory (3)

Prerequisites: CULI 101, CULI 102L

More complex cooking and baking terminology and methods, acquire knowledge of sanitation requirements, and learn to evaluate and judge a recipe with confidence. Emphasis is placed on gaining and using the acquired skills with greater independent judgment.

CULI 106I Culinary Arts II Internship (1)

Prerequisites: CULI 101 CULI 102L

Considered as on-the-job training. The student will be directly involved in food production in the school's kitchen and bakery areas, working with food service personnel. Emphasis will be on gaining job skills and abilities through actual work performed in food production.

CULI 106L Culinary Arts II Lab (2)

Prerequisites: CULI 101 CULI 102L

Apply learned skills in cooking and baking methods and techniques. Students will participate in hands-on training in preparing large quantity kitchen and bakery products. Emphasis is placed on development of individual skills, judgment, and confidence.

CULI 201 Culinary Arts III Theory (3)

Prerequisites: CULI 105, CULI 106I, CULI 106L

Classroom work involves theory and related instruction. General knowledge of dietary nutrition, complex cooking and baking terminology and procedures, and interpretation of complex recipes and recipe conversions. Emphasis is on gaining knowledge of all phases of the food service industry.

CULI 202I Culinary Arts III Internship (1)

Prerequisites: CULI 105, CULI 106I, 106L

Coursework represents on-the-job training received by the students working alongside cooks and food service personnel in actual food production activities in the school's bakery and kitchen facilities. The emphasis continues to be on

individual skill development and the building confidence of students` judgment. Students` ability to work independently and with minimum supervision is stressed.

CULI 202L Culinary Arts III Lab (2)

Prerequisites: CULI 105, CULI 106I, 106L

Coursework represents individual tutorship utilizing specific recipes provided by the instructor in a formal lab setting. Reliance on personal judgment and the ability to work with confidence with minimum supervision is stressed.

CULI 280 Co-op/OJT (3)

Prerequisites: CULI 105, CULI 106I, 106L

Culinary Arts students may be assigned to a Co-Op or OJT site on a part-time or full-time basis for one trimester to gain practical work experience in the field. This is most valuable for students with no prior work experience. These assignments are made on a site-availability basis for third trimester students.

EARLY CHILDHOOD EDUCATION

ECED 124 Health, Safety and Nutrition (2)

Prerequisites: None

Provides information related to standards and practices that promotes children's physical and mental health. It examines the many nutritional factors that are important for children total development, healthy eating habits, and physical activity. Information is included for developing sound management procedures for the prevention of childhood illnesses and communicable diseases. Students gain knowledge necessary for creating safe learning environments for decreasing risk and preventing childhood injury. Offered - Fall

ECED 126 Childhood Growth/Development and Learning (3)

Co-requisites: None

Provides foundation for becoming an early childhood professional with knowledge of how young children develop and learn. Major developmental theories are integrated with all aspects of development including psychosocial, physical/motor, cognition, language and literacy. Offered - Fall

ECED 130 Curriculum Development and Implementation I (3)

Prerequisites: None

Focuses on developmentally appropriate content relevant for childbirth to age eight. Integrates content into teaching and learning experiences. Adapts content areas for children with special needs and includes the development of IFSPs and IEPs. Offered - Spring

ECED 130P Practicum I (2)

Prerequisites: ECED 130 or as co-requisite

Students apply knowledge gained from Curriculum Development and Implementation I. Students develop skills in planning learning experiences in all content areas from birth through age eight, including young children with special needs. Offered - Spring

ECED 190 Special Topics (1-3)

Prerequisites: None

Special topics related to Early Childhood Development at the freshman year. Offered – On Demand

ECED 202 Family & Community Collaboration (3)

Prerequisites: None

Collaborative relationships with parents and others involved with children in early childhood settings are discussed. Strategies for communicating with parents and guardians from diverse cultural and linguistic backgrounds to incorporate family goals for their children into the early childhood program will be included. Offered - Summer

ECED 204 Introduction to Reading/Literacy Development (3)

Prerequisites: None

Teaches emergent literacy and reading skills development. Addresses ways professionals can teach phonemic awareness, literacy problem solving skills, fluency, vocabulary, and comprehension, including Native language learners. Offered - Summer

ECED 214 Guiding Young Children (3)

Prerequisites: NONE

Explores various theories of child guidance and covers appropriate methods for guiding children. Appropriate strategies for preventing and dealing with violence, aggression, anger, and stress will be included. Emphasis is placed on helping children become responsible, competent, independent, and cooperative learners. Offered - Fall

ECED 218 Assessment of Children & Evaluation of Programs (3)

Class covers a variety of culturally appropriate assessment methods and instruments, including systemic observation. The course addresses the development and use of formative and summative program evaluation to ensure comprehensive quality of the total environment for children, families and the community. Students will develop skills for evaluating the assessment process and involving other teachers, professionals and families in the process. Offered - Summer

ECED 220 Professionalism (2)

Prerequisites: None

Course provides orientation to the field of early care and education. History, philosophy, ethics and advocacy are introduced. Principles of early childhood systems are explored. Professional responsibilities such as cultural responsiveness and reflective practice are examined. Offered - Fall

ECED 230 Curriculum Development and Implementation II (3)

Prerequisites: ECED 130, ECED 130P

Students will use their knowledge of content, developmentally appropriate practices, and language and culture to design and implement experiences and environments that promote optimal development and learning for children from birth through age eight, including children with special needs. Various curriculum models and learning strategies will be included. Offered - Spring

ECED 230P Practicum II (2)

Prerequisites: ECED 130, ECED 130P, ECED 230 or co-requisite

Students apply knowledge gained from Curriculum Development and Implementation II. Students develop skills in planning learning experiences in all content areas from birth through age eight, including young children with special needs. Offered - Spring

ECED 290 Special Topics (1-3)

Prerequisites: Approval by Instructor

Special topics related to Early Childhood Development at the sophomore year. Offered – On Demand

ECONOMICS

ECON 200 Macroeconomics (3)

Prerequisites: ENGL 100, MATH 100

This course covers macroeconomic theory in areas of national income, employment, price stability and growth. The role of money and banking is studied to provide an understanding of the banking systems contributions to our national economy. Unemployment, inflation, supply and demand, the business cycle, fiscal policy, monetary policy and the money supply are all covered. The international sector is also discussed. Offered-Fall

ECON 201 Microeconomics (3)

Prerequisites: ENGL 100, MATH 100

This course covers Microeconomic Theory in the areas of the market system, market structure and pricing, resource markets, market failure and public policy. Price elasticity of demand and supply are covered, perfection completion, monopoly, monopolistic competition, oligopoly, economies of scale, economic regulation and antitrust activity. Income distribution, poverty and the problems with measuring income.

ELECTRONICS

ELEC 100 Exploratory Electronics (3)

Pre-requisite: ENGL 100 or Instructor's permission. Co-requisite: MATH 100.

This course introduces students with limited math and science backgrounds to basic electronic fundamentals. The course covers schematic reading, mathematics needed in the further study of electronics, elementary circuit analysis, soldering and interconnecting techniques. The course is primarily for preparatory students and is not a degree or certificate requirement.

ELEC 101A Basic Electronics DC (3)

Pre-requisites: ENGL 100 and MATH 120.

This course addresses the basic concepts essential for mastering the principles of electronics applicable to DC circuit analysis. The emphasis is on the basic physics of matter applicable to electronics, application of the fundamental laws of electronics to discrete electrical components, and the network theorems used in circuit analysis. The course provides a detailed description of how direct current (DC) functions in an electrical circuit.

ELEC 101L Basic Electronics DC Lab (1)

Co-requisite: ELEC 101A and Pre-requisites: ENGL 100 and MATH 120.

This course provides practical application of learned DC theory in a controlled lab setting.

ELEC 105A Basic Electronics AC (3)

Pre-requisites: ELEC 101A, 101L.

This course begins with the fundamental concepts learned in DC theory and lab and progresses through the principles of alternating current (AC), transformer applications, and capacitive/inductive filter circuits with emphasis on AC circuit analysis.

ELEC 105L Basic Electronics AC Lab (1)

Pre-requisites: ELEC 101A, 101L; Co-requisite: ELEC 105A.

This course places emphasis on the lab analysis of sinusoidal waveforms and their applications in an AC electrical circuit.

ELEC 110A Semiconductor Fundamentals (4)

Pre-requisites: ELEC 105A, 105L.

This theory course provides the student with a background in solid-state electronic devices, starting with semiconductor physics, diode and transistor characteristics and applications, and progressing to operational amplifiers.

ELEC 110L Semiconductor Fundamentals Lab (2)

Pre-requisites: ELEC 105A, 105L Co-requisite: ELEC 110A.

This course provides practical application of learned semiconductor fundamentals theory, with emphasis on the development of troubleshooting skills for electronic circuits.

ELEC 118L Electromechanical Control Devices (3)

Pre-requisites: ELEC 110A, 110L.

This course covers the theory and application of mechanical devices and their electrical control circuits. Topics include hydraulics, pneumatics, AC and DC motors, stepper motors, mechanical drive systems and servomechanisms. Students develop skill in the assembly, operation, and troubleshooting of small-scale electromechanical and fluid power systems.

ELEC 201A Digital Electronics I (2)

Pre-requisite: MATH 120 or Instructor's permission.

This course is a study of digital logic, its operations, principles and applications. The emphasis is on the analysis of number systems and codes, Boolean Algebra, followed by combinational logic design using Karnaugh maps, PLDs, and FPGAs.

ELEC 202L Digital Electronics I Lab (1)

Pre-requisite: MATH 120 or Instructor's permission; and Co-requisite: ELEC 201A.

The digital electronics lab provides direction and strategies on how to apply troubleshooting techniques. The applications include utilizing Boolean Algebra to implement combinational logic circuits and using Karnaugh maps for circuit reduction.

ELEC 203 Digital Electronics II (2)

Pre-requisites: ELEC 201A, 202L; and Co-requisite: ELEC 203L.

The digital logic concepts and design techniques learned in the previous course are applied to logic devices such as flip-flops, code converters, counters, timers, multiplexers, and shift registers. The course concludes with an introduction to microprocessor interfacing circuits and techniques and TTL and CMOS circuit characteristics.

ELEC 203L Digital Electronics II Lab (1)

Pre-requisites: ELEC 201A, 202L; and Co-requisite: ELEC 203.

The digital Applications include expansion from four-bit to multi-bit circuits to demonstrate adaptability of each logic device. The student will be working with converters, encoders, counters, and registers. An operational knowledge of these devices is essential to a better understanding of the functions and operations with logic devices applied to microprocessor circuits.

ELEC 205A Microprocessors (3)

Pre-requisites: ELEC 201A, 202L or Instructor's permission.

The emphasis in this course is on the development of skills needed to maintain and repair microprocessor based electronic equipment and systems. The theory covers fundamentals of microprocessor design and operating principles, including assembly language programming.

ELEC 206L Microprocessors Lab (1)

Pre-requisites: ELEC 201A, 202L or Instructor's permission; and Co-requisite: ELEC 205A.

This lab is designed to provide introductory experimentation in the Intel 80486 and later VLSI microprocessor architectures and interfacing to develop proficiency in the application of logical instructions, assembly language programming, problem solving, and I/O management.

ELEC 218L Electromechanical Control Systems (3)

Pre-requisite: ELEC 118L.

This course provides the student with hands-on experience using electromechanical systems similar to those utilized in the manufacturing industry, using schematics for analysis, maintenance procedures and developing troubleshooting skills.

ELEC 280 Co-Op/OJT (3)

Pre-requisite: Successful completion of first year of electronics instruction with a minimum cumulative GPA as required by the industry internship partner.

This course is used to provide the qualifying student with an internship or on-the-job training for gaining related experiences in the electronics industry at an approved industrial facility. This may be accomplished any time after the first year of training.

ENGLISH**ENGL 093 GED Writing Skills (3)**

Prerequisites: NONE

Prepares students to pass the English and writing section of the GED exam. This course includes spelling, capitalization, grammar, punctuation, usage, sentence structure, and combining sentences. Teaches students the process of writing and developing an essay.

ENGL 098 Basic Writing and Reading Skills (4)

Prerequisites: None

Focuses on basic reading and writing for practical use in school and life. Provides students the opportunity to practice reading strategies, improve their sentence and paragraph skills in their own writing, use of computers for word processing and research, practice oral language skills, and improve English usage and punctuation. (TABE Writing Grade Equivalent 3.0-6.5/TABE Reading Grade Equivalent 3.0-6.5; ACT Compass Writing Score 0-17/ACT Compass Reading 0-57)

ENGL 099 Basic English Skills (4)

Prerequisites: NONE

Focuses on writing tasks related to daily life, school and the workplace to achieve a variety of practical and academic goals. Presents English grammar, usage and punctuation to improve their sentence and paragraph skills in organized pieces of writing. Includes use of computers for word processing and research. (TABE Grade Equivalent 6.7-11.9; ACT Compass Score 18-69)

ENGL 100 Writing Standard English (4)

Prerequisites: NONE

Prepares students for first-year college composition and/or advanced career skills by providing practice of the rhetorical and grammatical skills necessary to write purposeful, reader-centered essays. Covers effective use of a writing process in essays. Incorporates readings for discussion of ideas and for information to be used in students writings. Includes use of computers for word processing and research. (TABE Grade Equivalent 12.1-12.9 ACT Compass Score 70-99)

ENGL 101 Composition (3)

Prerequisites: ENGL 100

Integrates reading and writing to improve comprehension and self-expression. Selected readings include two novels and exemplary samples of rhetorical patterns students shall be expected to emulate on their compositions with focus upon logical organization and use of supporting ideas. Also covered is the research paper, including how to document external sources through internal citation and a works cited list.

ENGL 102 Critical Reading and Writing (3)

Prerequisites: ENGL 101

Emphasizes improving skills of recognizing persuasive prose. Commercialized ads and readings on controversial subject matter are carefully analyzed orally and in writing until arguments are reduced to basic syllogisms. Inductive and deductive reasoning as well as probability and logical fallacies are explained. Students compose analytical and argumentation essays.

ENGL 219 Technical Writing (3)

Prerequisites: ENGL 101

Prepares a foundation in reading, writing, and speaking skills needed in the professional workplace. Includes writing business memos and letters, summarizing information, developing description, definition, and process analysis paragraphs, making reports and proposals, understanding visuals, perfecting résumés and delivering oral presentation.

ENVIRONMENTAL SCIENCE

ENVS 101 Environmental Science I (3)

Prerequisites: ENGL 100, MATH 100

An introduction to the field of environmental science. Topics include ecosystems and ecology, air, water and soil pollution, and risk assessment and management.

ENVS 102 Environmental Regulations (3)

Prerequisites: ENVS 101

A survey course of history development and current state of environmental regulations. Covers a broad range of laws and legislative acts including the National Environmental Policy Act in depth and the Clean Air Act, Clean Water Act, Safe Drinking Water Act, Resource Conservation and Recovery Act Superfund and others in some detail. A broad study of regulations affecting tribal environmental issues is included.

ENVS 103 Environmental Sampling and Monitoring (3)

Prerequisites: CHEM 111/111L, ENGL 100, EISH 101, MATH 100

An introduction to proper sampling techniques for environmental samples in various media including air water and soil. Includes analytical training in field and laboratory settings using portable testing kits and stationary lab instrumentation. Basic monitoring and data analysis and calculations are covered.

ENVS 104 Environmental Science II (3)

Prerequisites: ENVS 101

A continuation of ENVS 101 with more in-depth studies of environmental factors encompassing solid, toxic and hazardous waste management, food and natural resource assessment and protection, and energy resources. Addresses more complex issues in environmental science that are often highly interdependent and poorly understood. Approaches current issues that are developing or theoretical.

ENVS 109 Environmental Practicum (3)

Prerequisites: ENVS 101

This course is an amalgam of short courses that are chosen by the student and his/her academic advisor. Two hundred (200) actual contact hours are required. These short courses are also a part of the developing Continuing Education program and enable the student to specialize in a particular area of the environmental field, such as waste management, environmental law, or water resources. Some of the short courses to be offered include training in HAZMAT, Asbestos, Lead and Radiation.

ENVS 130 Sustainability (3)

Prerequisites: ENVS 101

This class covers basic concepts of sustainability, analyzing local and global approaches to minimization of resource use. Ethics, culture and natural philosophy figure prominently in addressing human impact on the environment through: attitudes on disposability, reuse, recycling, waste production and treatment, renewable energy, design for longevity, pollution culpability, transportation, biological diversity and human population.

ENVS 200 Contemporary Issues in Environmental Science (3)

Co-requisites: ENGL 100, approval of instructor

This course is designed to provide a forum for introduction to and discussion of some controversial contemporary topics in environmental science. Each of these topics may be selected by class consensus or by the instructor. Each will have its own homework, class exercises and discussion. Topical essays are required and are the major portion of the grade. Typical topics include: wilderness Preservation, Recycling, Deforestation, Acid Rain, Global Warming, Cancer Etiology, Air Pollution, Pesticides, Ozone Depletion, Water Use/Pollution.

ENVS 210 Tribal Environmental Management and Planning (3)

Prerequisites: ENVS 101, ENVS 102, ENGL 100, MATH 100, or approval of instructor

A broad overview of the machinations of Tribal Environmental programs and the necessary skills required to operate them successfully. Covers resource management, planning and goal development, regulations, rights and sovereignty issues and holism and cultural issues. Communications in the form of grant and report writing, governmental (agency) correspondence and data gathering are also discussed.

ENVS 280 Co-Op/Internship (3)

Prerequisites: NONE

Prerequisite: 6 cr. hrs in environmental science program coursework. Students are employed in the field of environmental science for one trimester. Students work for federal agencies, for example the Environmental Protection Agency, for state or county governments, or for tribal governments. Students may work in the private sector, for example for an environmental engineering or consulting firm. Students also work as research assistants on summer research projects at four-year universities.

GEOGRAPHY

GEOG 101 Introduction to Geography (3)

Prerequisites: ENGL 100

Introduces students to the natural environment: weather systems, climatic regions, vegetation, soils, water resources, plate tectonics and volcanic, structural, erosional, fluvial, coastal, desert, and glacial landforms.

GEOLOGY

GEOL 101 Introduction to Physical Geology (3)

Co-requisite: GEOL 101L; *Prerequisites:* ENGL 100, MATH 100

Introduction to the materials and processes of the earth. Introduces students to the geological environment: rock types and rock forming processes, minerals and mineral identification, crystal formation and classification, volcanism, sedimentation, lakes, streams and water systems, plate tectonics, glacier and wind formations, and mass wasting. Labs will cover rocks and minerals, map reading and geomorphology.

GEOL 101L Introduction to Physical Geology Lab (1)

Co-requisite: GEOL 101

Lab times and days may vary.

GEOSPATIAL INFORMATION TECHNOLOGY

GIT 101 Digital Cartography (3)

Prerequisites: ENGL 100

The course is designed to provide the student with a vocabulary and comprehensive understanding of basic and fundamental mapping principles, historical evolution of maps, and understanding the direction and future of map-making and the technologies and data sources that support it.

GIT 111 Introduction to GIS/GPS Technology (3)

Prerequisites: COSC 107, TECH 103

An introduction to the methods and techniques currently used in the applications of Geographical Information Systems (GIS) and Global Positioning Systems (GPS).

GIT 121 Advanced GIS/GPS with Applications (3)

Prerequisites: GIT 111

An advanced look at Geographical Information Systems (GIS) and Global Positioning Systems (GPS). This course will review the initial concepts covered in ATE 111 and continue through a complete GIS GPS project. The students will develop a GIS/GPS project from conception to final presentation.

GIT 180 Practicum/Internship (3)

Prerequisites: GIT 111

This course offers the students the opportunity to take short courses to further their knowledge in geospatial informational technologies, or the opportunity to further knowledge by working at an agency utilizing and working with geospatial technologies.

GIT 201 Principles and Theory of GIS and GPS Applied (3)

Prerequisites: GIT 121

Principles and Theory of GIS and GPS Applied is a course that is designed to enhance the student knowledge of hands on application of GIS principles as well as build upon the principles and theories learned in the previous Introduction and Advanced GIS and GPS classes.

GIT 202 Photogrammetry and Mapping (3)

Prerequisites: GIT 101

An introduction to the fundamental principles of photogrammetry with specialized applications in new technologies and Geographic Information Systems GIS.

GIT 203 Remote Sensing (3)

Prerequisites: GIT 101

An introduction to the fundamental principles of remote sensing with specialized applications in new technologies and Geographic Information Systems (GIS).

GIT 280 Cooperative Education Internship (3)

Prerequisites: GIT 121

This course offers the students the opportunity to take short courses to further their knowledge in geospatial informational technologies or the opportunity to further knowledge by working at an agency utilizing and working with geospatial technologies.

GIT 290 Special Topic in Geospatial Technologies (3)

Prerequisites: GIT 121

This is a course that is designed to introduce the student to different application of GIS principles. The class is designed to enhance GIS skills learned in the previous Introduction and Advanced GIS and GPS classes.

HEALTH**HLTH 099 Health Promotion and Education (2)**

Instruction focuses on wellness and habit practices, which help maintain good physical and mental health. Dangers of habit-forming substances are emphasized.

HLTH 164 First Aid and Safety (2)

Prerequisites: NONE

Instruction in standard First Aid, Safety and CPR. Students successfully passing the course become Red Cross certified.

HLTH 165 Advanced First Aid and Safety (2)

Prerequisite: HLTH 164 and Must be certified

Instruction in use of pocket-mask, two-man rescuer CPR, giving CPR to both children and infants. Students passing both hands on and written examination with 80% or better will receive certification for Red Cross Community CPR.

HLTH 191 Survey of Health Careers (3)

Prerequisites: NONE

Designed to assist students making health career choices, providing an overview of career opportunities in health promotion, recreation, fitness and other related health careers. Included are site visits to local tribal health centers, Native American health promotion and wellness facilities, etc. as well as integrated cultural activities with Native American speakers and Elders. Health career job shadowing may be incorporated. Emphasis will be introducing a variety of recreation, fitness, and health career opportunities in Native American communities.

HLTH 192 Nutrition for Health (3)

Prerequisites: NONE

This course is designed to provide general concepts of nutrition applied to food choices that support health. Nutrition for health will assist students in making informed decisions about the foods they eat, and give the ability to evaluate nutrition claim, and distinguish food myths from nutrition facts. Popular fad diets, cultural, psychological and economic implications of food choices are also discussed.

HLTH 193 Personal Health Management (3)

Prerequisites: NONE

This course is designed to assist students in understanding the concepts of a healthy lifestyle. After covering the course subject material the students will identify nutrition basics, exercise and weight management, human body systems and aging as it is related to a healthy lifestyle.

HISTORY**HIST 101 Western Civilization (3)**

Prerequisites: ENGL 100

This course will survey the history of Western Civilization from pre-history until the end of Antiquity. Special emphasis will be placed on the social evolution of pre-historic humans, the evolution of ancient civilizations, world religions, the Greek city-states, and Alexander the Great.

HIST 161 United States History Before 1877 (3)

Prerequisites: ENGL 100

This course will survey United States history from the early inhabitants of the continent through the conclusion of the Civil War.

HIST 162 United States History Since 1877 (3)

Prerequisites: HIST 161.

Surveys the economic, political, intellectual and social development of the United States during the period of industrialism, including its role in world affairs from 1877 to the present. Emphasis is placed upon ideas, processes, and causation.

HIST 181 History of Pre-Columbian America (3)

Prerequisites: HIST 161

A survey of the economic, political and social conditions of the indigenous peoples of North and South America prior to 1492.

HIST 260 History of Indian Education (3)

Prerequisites: ENGL 100

Overview of American Indian Education as established by the Federal Government and up to the current status of Indian Education during the 20th and 21st centuries. Legal and cultural issues are covered.

HIST 270 American Indian History (3)

Prerequisites: ENGL 100

The purpose of this course is to provide an overview of American Indian history from pre-Colonial times until the present. Emphasis is placed on Indian-Anglo cultural interaction, U.S. policy development, and the roles played by Indian peoples to ensure their survival and ongoing cultural integrity into the 21st Century. Offered-Fall

INFORMATION TECHNOLOGY

ITCT 111 IT Essentials I (A+, Core) (3)

Prerequisites: NONE

This course presents an in-depth exposure to computer hardware and operating systems. Included in the course is an introduction to networking. This course may be used as preparation for an industry certification exam.

ITCT 112 IT Essentials II (Network Operating Systems) (3)

Prerequisites: ITCT 111

This is a lab-based course designed to be an overview of Network Operating Systems. Included in the course is an introduction to the Linux operating system; an overview of the Windows 2000 Network Operating System is provided; and concepts in TCP/IP processes and network administration are covered. Also presented are LAN and WAN topologies. This course may be used as preparation for an industry certification exam.

ITCT 151 Network Management/CISCO I (3)

Prerequisites: ITCT 111

This course is an introduction to networking fundamentals and router basics. Topics include the OSI model and industry standards, LAN theory and technologies, network topologies, IP addressing, and basic network design. This course may be used as preparation for an industry certification exam.

ITCT 152 Network Management/CISCO II (3)

Prerequisites: ITCT 151

This course is a continuation of studies in network administration. Topics include beginning router configurations, routed and routing protocols, and an introduction to LAN switching. This course may be used as preparation for an industry certification exam.

ITCT 153 Network Management/CISCO III (3)

Prerequisites: ITCT 152

This course is a continuation of studies in network administration. Topics include advanced router configurations, LAN switching, network management, and advanced network design. This course may be used as preparation for an industry certification exam.

ITCT 154 Network Management/CISCO IV (3)

Prerequisites: ITCT 153

This course is a continuation of studies in network administration. Topics include Wide Area Networks, advanced network design projects, and advanced network management projects. This course may be used as preparation for an industry certification exam.

LANGUAGES

NAVA 101 Elementary Navajo (4)

Prerequisites: ENGL 100

Develops listening comprehension, and speaking skills in the Navajo language.

NAVA 102 Intermediate Navajo (4)

Prerequisites: NAVA 101

A continuation of NAVA 101. Builds on NAVA 101.

SPAN 101 Elementary Spanish I (4)

Prerequisites: ENGL 100

Develops listening, comprehension, and speaking skills with introduction to the grammar of Spanish. Designed for students with no previous exposure to Spanish.

SPAN 102 Elementary Spanish II (4)

Prerequisites: SPAN 101

Students continue developing listening and grammatical skills. Emphasis is placed on speaking.

LITERATURE

LITR 093 GED Literature (3)

Prerequisites: NONE

Prepares students to pass the literature section of the GED exam. This course focuses on fiction, non-fiction, poetry, drama, and commentaries.

LITR 211 Topics in Literature (3)

Prerequisites: ENGL 101

Surveys short stories, poetry, novels, and dramatic works by Native American writers. Students learn to read literary material with enhanced appreciation and to make well-founded literary judgments. Material includes romance and war, history and mystery, Native American narratives and women's fiction. Student papers compare and interpret readings.

LITR 270 Introduction to Modern Literature (3)

Prerequisites: ENGL 101

Introduces the student to major works of modern European and American playwrights, essayists, poets, and novelists of the 20th and 21st century. In addition to reading and analyzing specific selections, students will learn about and discuss the social, cultural and intellectual currents which influenced these writers.

LITR 296 American Literature (3)

Prerequisites: ENGL 101

Focuses on 400 years of literary writing in America from the Colonial period to 20th century, including works by American Indians and other minority groups. Includes five genres of prose, poetry, short story, novel and drama. After listening to class lectures and participating in class discussions, students compose analytical essays based on reading assignments.

MANUFACTURING TECHNOLOGY

DDET 281 Statistical Process Control (3)

Prerequisite: MATH 100.

Students learn to use hardware and software as they apply to quality assurance in the manufacturing process. Students study design of experiments, sampling technique, SPC, control chart applications and developments, and process reliability.

MT 105 Manufacturing Concepts and Practices I (3)

Prerequisites: MATH 100 and ENGL 100.

This is an introductory course providing exposure to the basic history, development, and knowledge of the manufacturing industry and providing a study of the manufacturing process in a general manner.

MT 115 Manufacturing Concepts and Practices II (3)

Prerequisites: ENGL 101 and MT 105.

Topics presented are engineering metrology and instrumentation, testing and evaluating practices, safety and product liability, human factor engineering, manufacturing in a competitive environment, developments in CNC and robotics, material handling methods, cellular manufacturing, and just-in-time production methods.

MT 120L Manufacturing Processes and Equipment (4)

Prerequisites: MT 115 and MT 201.

Presents the history of manufacturing from the standpoint of the type of facilities, the methods used in the selection of materials, and the processes and equipment selected for projects. The integration of Computer-Integrated systems is presented in detail along with group technology, cellular manufacturing, and just-in-time production methods.

MT 201 AutoCAD and Blueprint Reading for the Machine Trades (3)

Prerequisite: MT 115.

This course offers the necessary knowledge to draw, read, and interpret blueprints, machine layouts, and engineering drawings. A clear progression from the simplest to the most complex multidimensional drawings is provided. Advanced Geometric Dimensioning and Tolerancing are presented.

MT 211L Introduction to Computer Numerical Control (4)

Prerequisite: MT 115.

Exposure to current CNC mill and lathe lab equipment and training software is blended into the theory to provide immediate experience and reinforcement of the concepts of Computer Numerical Control of industrial machines.

MT 212L Advanced Computer Numerical Control (4)

Prerequisite: MT 211L.

Using current CNC mill and lathe lab equipment and training software, manufacturing projects will be undertaken that enable the performance of actual processes in CNC Programming, operation, and satisfactory completion of projects.

MT 247 Materials Science and Analysis (3)

Prerequisite: MT 120L.

This course explores the science associated with the materials that are available for processing in the manufacture of components, methods of joining and bonding materials, and the chemical properties of those materials.

MATH

MATH 093 GED Math (3)

Prerequisites: NONE

Prepares students to pass the math section of the GED exam. This course covers fractions, percents, decimals, graphs, algebra, and geometry.

MATH 098 Foundations of Mathematics (I)

Prerequisites: NONE

Focus is on whole numbers, fractions, order of operations and solving simple equations. Introduction to integers, ratios, proportions, decimals, and percents. (TABE Grade Equivalent 3.0-6.4; ACT Compass Score 0-24)

MATH 099 Basic Mathematics II (4)

Prerequisites: NONE

Integrates topics from Basic Mathematics I, geometry, algebra, and word problems. (TABE Grade Equivalent 6.7-10.7; ACT Compass Score 25-45)

MATH 100 Basic Mathematics III (4)

Prerequisites: NONE

Presents linear equations, formulas, exponents, operations with polynomials, factoring, quadratic equations, graphing, and word problems. (TABE Grade Equivalent 10.9-12.9; ACT Compass Score 46-65)

MATH 111 Mathematics for Elem. and Middle School Teachers (3)

Prerequisites: NONE

This course is designed to allow prospective elementary school teachers the opportunity to develop a conceptual understanding of the mathematics that they will be teaching to their students. The course will provide hands-on experiences through which the students will discover the basic concepts and their applications in the real world. The course is taught with the use of manipulatives so that the students can experience learning the way that their students will. Computational skills will also be emphasized during the course.

MATH 120 Intermediate Algebra (3)

Prerequisites: MATH 100

After a short review of introductory algebra, the following are examined: fractional expressions and equations, exponents, powers, roots, quadratic equations and graphs.

MATH 121 College Algebra (3)

Prerequisites: MATH 120

Topics include: coordinates and graphing; equations and inequalities; functions of one variable and their inverses; polynomial and irrational functions; exponential and logarithmic functions. Facility with word problems is developed. This course is preparatory for MATH 150. Use of TI-83+ Calculator. Complex numbers are introduced.

MATH 123 Trigonometry (3)

Prerequisites: MATH 121

A study of trigonometric functions, radian and degree measure, polar coordinates, graphs, basic trigonometric identities, inverse functions, modeling and applications. Complex numbers are introduced.

MATH 145 Statistics (3)

Prerequisites: MATH 120

Introduction to basic concepts of statistics and probability, analysis of numerical data, models, sampling, and statistical inferences, test of hypothesis, probability distributions, regression and correlation.

MATH 150 Advanced College Algebra (3)

Prerequisites: MATH 121 and Math 123

Is a preparation for Math 162-Calculus. Includes a study of functions, coordinates, graphs, polynomials, the fundamental theorem of algebra, exponentials, logarithms, and complex numbers, as well as analytic geometry.

MATH 162 Calculus I (4)

Prerequisites: MATH 123, MATH 150

Examines concepts of college calculus: application of limits and continuity; the chain rule; finding extreme; the mean value theorem; integration of functions and calculation of functions and area under curves and volumes and surface area of standard geometric shapes.

MATH 163 Calculus II (4)

Pre-requisite: MATH 162

A continuation of MATH162 with concentration on concepts that will enable students to solve problems through the study of integration techniques, solution of differential equations, calculus-based methods of approximation and infinite series.

MATH 180 Business Calculus (3)

Prerequisites: MATH 121

This is a three hour course that utilizes applications of calculus. Differentiation limits and integration are introduced.

MATH 270 Ordinary Differential Equations (4)

Pre-requisite: MATH 162.

This course provides an introduction to the algorithmic theory of ordinary differential equations. Topics to be covered are elementary theory of ordinary differential equations, numerical methods, phase-plane analysis and an introduction to Laplace transformations.

NATURAL RESOURCES

NATR 200 General Ecology (3)

Prerequisites: BIOL 121, MATH 100

Ecology is the study of organisms and their environment. Ecologists may study an individual organism (for example, studying wolf biology and behavior); entire forests (for example, studying forest fire ecology); or the whole earth (for example, studying global climate changes). This is an overview course and covers a wide variety of subjects. This course is a prerequisite for all courses in Natural Resource Management.

NATR 201 Introduction to Forestry (3)

Prerequisites: NATR 200

Introduction to the ecology and management of forests. This is a survey course covering forest biomes, forest ecosystem ecology, disturbance and fire ecology, and principles of timber harvest and forest management for sustainable use.

NATR 201L Introduction to Forestry Lab (1)

Co-requisites: NATR 201

The laboratory portion of the Introduction to Forestry course includes outdoor field sessions on nearby National Forest lands and on tribal lands.

NATR 202 Trees of North America (3)

Prerequisites: NATR 201 or Co-requisite

Introduces basic taxonomy of the important trees of North America, including scientific and common names, ranges, appearance and general characteristics. Surveys major forest types of North America, their geography and dominant tree species.

NATR 205 Advanced Field Topics in Forestry (3)

Prerequisites: NATR 201

Advanced course teaching concepts in forest ecology and management through fieldwork. Emphasis on sampling and data collection. Field work using common forest mensuration techniques.

NATR 220 Principles of Range Management (3)

Prerequisites: NATR 200

Introduction to the ecology and management of rangelands. This is a survey course covering rangeland types, watershed health and restoration, stocking rate for domestic and native grazing animals, rangeland wildlife, and general principles of managing rangelands for sustainable use.

NATR 220L Principles of Range Management Lab (1)

Co-requisite: NATR 220

The laboratory portion of the Introduction to Range Management course includes outdoor field sessions in arid grassland, shrubland and pinon-juniper range communities.

NATR 221 Identification of Grasses and Shrubs (3)

Prerequisites: NATR 220 or Co-requisite

Course emphasis is on field identification of common forbs, grasses and shrubs of northern New Mexico. Students learn basic taxonomy and common and scientific plant names for approximately 100 plants. Students develop a personal plant collection which they retain for future use.

NATR 225 Advanced Field Topics in Range Management (3)

Prerequisites: NATR 220

Advanced course that teaches concepts in rangeland ecology and management through fieldwork. Emphasis on sampling and data collection. Common grassland inventory and monitoring techniques are taught.

NATR 230 Introduction to Fish and Wildlife Management (3)

Prerequisites: NATR 200

Introduction to the natural history, biology and behavior of fish and wildlife species common to the Intermountain West. Course emphasizes ecological principles and basic techniques of wildlife and fisheries management.

NATR 230L Introduction to Fish and Wildlife Management Lab (1)

Co-requisites: NATR 230

The accompanying laboratory class for Introduction to Fish and Wildlife Management includes outdoor field sessions on wildlife species identification, habitat assessment, and monitoring techniques.

NATR 235 Advanced Field Topics in Wildlife Management (3)

Prerequisites: NATR 230

Advanced course that teaches concepts in fish and wildlife ecology and management through fieldwork. Emphasis on sampling and data collection. Terrestrial and aquatic monitoring and assessment techniques are taught. A large portion of this course is conducted outdoors in the field.

NATR 280 Natural Resources Program Internship (3)

Prerequisites: 6 credit hours in natural resources program coursework

Students are employed in the field of natural resource management for one trimester. Students often work for federal agencies, for example the US Forest Service, for state or county governments, or for tribal governments. Students also work as research assistants on summer research projects at four-year universities.

NATR 290 Special Topics in Natural Resources (1-3)

Seminars and course topics beyond regularly scheduled classes.

PHYSICAL EDUCATION

PHED 111 Team Sports (1)

Instruction and practice in basketball, team handball, volleyball, soccer, softball, indoor hockey and stickball.

PHED 112 Individual Sports (1)

Instruction and practice of weight training, bowling, tennis, golf, running, archery, badminton and conditioning exercises.

PHED 115 Social Sports (1)

Instruction and practice designed to promote social skills and etiquette in mixed company. Includes aerobics and dancing; country-western and folk.

PHED 140 Golf (1)

Instruction in basic skills, rules, equipment, etiquette and shot making.

PHED 114 Tennis (1)

Basic instruction in the rules and skills of tennis.

PHED 150 Introduction to Archery (1)

An easily learned physical activity that is relatively inexpensive and can be practiced throughout the year. Nomenclature and development of physical skills required for PHED 152-Advanced Archery

PHED 160 Weight Training (1)

Training programs for the development of general strength, tone, endurance, and weight control.

PHED 161 Advanced Weight Training (1)

Prerequisites: PHED 160

Training with emphasis on muscle tone weight control.

PHED 191 Taiji Quan: Yang Style Short Form (1)

This class will learn the basics of taiji, the single most practiced exercise form in the world! This set of dance-like movements is practiced to improve your flexibility and balance both physically and mentally. The "short form" is a set of 37 movements, usually done slowly and softly, which can be learned in a single semester. This practice can improve your health, reduce your stress, and is the basis of a powerful martial art.

PHED 192 Taiji Quan: Yang Style Short Form (1)

This class will continue with the basics of taiji, the single most practiced exercise form in the world! This set of dance-like movements is practiced to improve your flexibility and balance both physically and mentally. The "short form" is a set of 37 movements, usually done slowly and softly, which can be learned in a single semester. This practice can improve your health, reduce your stress, and is the basis of a powerful martial art.

PHYSICS

PHYS 102 Introductory Physics (3)

Prerequisites: MATH 120

Intended for students with minimum previous exposure to physical science does not fulfill the requirement for lab sciences in the Associate of Arts Degree. Introduces the basic concepts and phenomena of physics, including mechanics, heat, sound, optics, electricity and magnetism. Also covered are atomic physics, nuclear physics and relativity. Includes demonstrations and practical applications.

PHYS 151 General Physics (3)

Prerequisites: MATH 123, MATH 150, PHYS 151L

A non-calculus study of mechanics, sound and heat. Includes three-hour lab.

PHYS 151L General Physics Lab (1)

Co-requisite: PHYS 151

Study of mechanics, sound and heat.

PHYS 160 Engineering Physics I (3)

Pre-requisite: MATH 162.

This course offers a calculus-based treatment of kinematics, work and energy, particle dynamics, conservation principles, and simple harmonic motion.

PHYS 160L Engineering Physics I Lab (1)

Pre-requisite: MATH 162.

Requires laboratory experiments associated with the material presented in PHYS 160.

POLITICAL SCIENCE

POSC 110 Political World (3)

Prerequisites: ENGL 100

An introduction to politics, with emphasis on ways people can understand their own political system and the political systems of others.

POSC 200 American Politics (3)

Prerequisites: ENGL 100

Survey of American politics, including political behavior of the American electorate, the theory of democracy, the structure and function of the American political institutions and contemporary issues.

PRE-ENGINEERING

ENGR 101 Introduction to CAD (3)

Pre-requisites: COSC 107 or Instructor's permission and MATH 100.

Introduces the student to the computer as a tool to create basic 2D technical drawings using AutoCAD® 2007, one of the most widely used computer aided design software programs. Provides a basic understanding of the operating system's user interface, managing drawing files, setting up a drawing, using create and modify commands to construct a drawing, adding text and dimensions, and plotting or printing a drawing.

ENGR 102 Advanced CAD (3)

Pre-requisite: ENGR 101 or Instructor's permission.

Presents intermediate to advanced CAD concepts and commands designed to increase the user's productivity. Emphasis will be placed on the tools used for advanced dimensioning techniques, editing features, blocks, external references, drawing standards, drawing collaboration, e-transmittal, and pictorial drawing. Also allows an experienced user to enhance existing skills.

ENGR 103 Engineering Graphics (4)

Pre-requisite: MATH 100 or Instructor's permission.

Orthographic Projection, often called Multiview Drawing, is utilized to represent three-dimensional objects onto the two-dimensional plane of a sheet of paper or computer screen. This method of representation is the basis of engineering drawing. A drawing that is submitted for production must contain complete instructions so the part can be manufactured. This is accomplished by the use of proper Dimensioning and Notation on the drawing. This course introduces the methodology of standard dimensioning practices and helps develop proficiency in its application.

ENGR 104 Mechanical and Electrical Drawing Applications (4)

Pre-requisite: ENGR 101.

This advanced drawing course covers industrial applications and will consist of a CAD graphic design project in a selected area of study. The student will be responsible for the complete project development, necessary calculations, presentation and written report, and graphical design drawings. This may be accomplished through an intern program at a local company.

ENGR 105 Introduction to Engineering and Design (3)

Pre-requisite: MATH 100 or Instructor's permission.

This course focuses on the systematic approach to problem solving required in engineering practice and discusses the traits of a successful engineer and the engineering design method. The students will have introductions to bridge building (civil engineering), robotics (electrical engineering) and fluid mechanics (civil and mechanical engineering).

ENGR 106 Solid Modeling (3)

Pre-requisite: ENGR 101 and ENGR 102.

Introduces terminology and methods used to produce solid modeling and the creation of parts, assemblies, and drawings. Geometric models in three dimensions provide accurate information on the shape of a part for use in computer-aided engineering (CAE) or computer-aided manufacturing (CAM) applications.

ENGR 110 Computer Aided Problem Solving (3)

Pre-requisites: ENGR 105, COSC 121, COSC 195. Co-requisite: MATH 162.

Covers the evolution and application of computers, social and economic implications, and introduction to programming using engineering workstations. Provides extensive practice in writing programs to solve engineering problems. Includes computer interfaces to real-world systems.

ENGR 205 Engineering Statics (3)

Pre-requisites: PHYS 160/160L and MATH 162.

This course will employ vector math to cover equilibrium of particles, rigid bodies and structures, the analysis of beams and cables, centroids, centers of gravity, distributed forces and moments of inertia. The application of Mohr's circle will also be discussed.

ENGR 211 Circuit Analysis I (3)

Pre-requisites: MATH 162. Co-requisite: ENGR 211L and MATH 270.

The basic electrical elements and sources and the concepts of energy and power are introduced. Topics addressed include Ohm's Law and Kirchhoff's Laws, resistive networks, node and loop analysis, network theorems, first-order and second-order circuits, sinusoidal sources, complex representations of impedance, phasors, and complex power, and three-phase circuits.

ENGR 211L Circuit Analysis I Lab (1)

Pre-requisites: MATH 162. Co-requisite: ENGR 211 and MATH 270.

Provides practical application of learned circuit theory in a controlled lab setting.

ENGR 212 Circuit Analysis II (3)

Pre-requisites: ENGR 211/211L and MATH 270. Co-requisite: ENGR 212L.

Provides experience in general transient analysis of electrical circuits. Utilizes state-space equations and Fourier series analysis to examine the network function, convolution, and frequency response.

ENGR 212L Circuit Analysis II Lab (1)

Pre-requisite: ENGR 211/211L and MATH 270. Co-requisite: ENGR 212.

This course places emphasis on the lab analysis of sinusoidal and other transient waveforms and their applications.

ENGR 213 Electronics I (3)

Pre-requisite: ENGR 212/212L. Co-requisite: ENGR 213L.

Diodes and bipolar and field-effect transistors are introduced. Analysis and design of digital gates, circuits, flip-flops, and memory circuits are included. Circuits employing operational amplifiers and analog-to-digital and digital-to-analog converters will also be covered.

ENGR 213L Electronics I Lab (1)

Pre-requisite: ENGR 212/212L. Co-requisite: ENGR 213.

Provides practical application of learned semiconductor theory, with emphasis on the development of troubleshooting skills.

ENGR 215 Strength of Materials (3)

Pre-requisites: ENGR 205 and MATH 270. Co-requisite: ENGR 215L.

A lecture course, which looks at the response of static systems, composed of various materials to the application of loading forces.

ENGR 215L Strength of Materials Lab (1)

Pre-requisites: ENGR 205 and MATH 270. Co-requisite: ENGR 215.

This laboratory course utilizes professional lab equipment to illustrate such concepts as tension and compression of loaded members, stress/strain relationships in axially and torsion ally loaded members, and shear/bending moments in beams.

ENGR 222 Digital Design I (3)

Pre-requisite: COSC 121. Co-requisite: ENGR 222L.

Introduces binary number systems and Boolean algebra. Covers combinational logic and state machine design. Includes implementation of VHDL, programmable logic devices, Arithmetic/Logic units, memories, computer organization, input-output, microprocessors, and microcontrollers.

ENGR 222L Digital Design I Lab (1)

Pre-requisite: COSC 121. Co-requisite: ENGR 222.

Provides direction and strategies in the application of troubleshooting techniques. The applications include expansion from four-bit to multi-bit circuits to demonstrate adaptability of each logic device. The student will be working with converters, encoders, counters, registers, memories, input-output, microprocessors, and microcontrollers.

ENGR 225 Engineering Dynamics (3)

Pre-requisite: ENGR 205.

This course examines kinematics and dynamics of particles, solid bodies and structures utilizing vector methods and momentum and energy methods.

ENGR 231 Introduction to Fluid Mechanics (3)

Pre-requisite: ENGR 205. Co-requisite: ENGR 225.

Introduction to basic fluid mechanics including statics, continuity, velocity of continuous fluids, laminar and turbulent flow, hydrostatic forces and friction.

ENGR 280 Engineering Internship (3)

Pre-requisite: Second year standing in engineering and successful completion of all required non-elective 200-level engineering courses or successful completion of minimum required trimesters with a minimum cumulative GPA as required by the industry internship partner.

This course provides the qualifying student with an internship or on-the-job training for gaining related experience in the engineering industry at an approved industrial facility.

ENGR 285 Design Project (3)

Pre-requisite: Second year standing in engineering and successful completion of all required non-elective 200-level engineering courses.

Design methodology and development of professional project-oriented skills including communication, team management and economics. Working in teams, a proposal for a large design is prepared in response to an industrial or in-house sponsor.

ENGR 290 Special Topics (1-4 credits, unlimited repetition)

Pre-requisite: Second year standing in engineering and successful completion of all required non-elective 200-level engineering courses and permission of instructor.

This course covers new topics, trends, methodology, skills, practices, industry certifications, etc., of interest in engineering and engineering technology fields.

ENGR 295 Thermodynamics (3)

Pre-requisites: CHEM 121/121L, PHYS 162, and MATH 163.

This course provides development of thermodynamic analysis, the first and second laws of thermodynamics, entropy and application to engineering power cycles. Related topics include: real gases; Rankine steam cycle; regenerative cycle; Otto, Brayton, and diesel cycles; refrigeration and air conditioning.

PSYCHOLOGY

PSYC 105 Introduction To Psychology (3)

Prerequisites: ENGL 100

Introduces psychology as a science and the study of behavior and mental processes. Topics surveyed include personality, abnormal behavior, learning, memory, motivation, perception, development and social psychology.

READING

READ 099 Reading Improvement (4)

Prerequisites: None

Introduces reading skills required for success in comprehending ideas and applying critical thinking skills to materials in the workplace and the academic setting. Includes use of computers for word processing and research skills. (TABE Grade Equivalent 6.7-11.8; ACT Compass Score 58-84)

READ 100 Reading and Critical Thinking with Lab (4)

Prerequisites: None

Focuses on reading required for success in college and additional workplace responsibilities. Includes comprehension, problem solving, note-taking, summarizing and computer assisted research skills. TABE Grade Equivalent 12.2-12.9; ACT Compass Score 85-99)

RENEWABLE ENERGY

RENG 220 Introduction to Renewable Energy (3)

Prerequisite: MATH 120

This course is designed to provide the student with an understanding of the fundamental principles of electricity and renewable energy technologies. In this course, the theoretical concepts of basic energy conversion will be explored with special emphasis on specific renewable energy applications and integrated renewable energy systems. Solar energy applications, biomass, nuclear energy, fuel cells and wind turbines will be discussed.

RENG 220L Introduction to Renewable Energy Lab (2)

Prerequisite: MATH 120 Co-requisite: RENG 220

This course provides practical application of learned renewable energy theory in a hands-on, interactive lab setting. Emphasis is placed on system schematic interpretation and development, modification of both schematic and hardware, load assessment, and preliminary photovoltaics (PV) system design.

RENG 230 Advanced Renewable Energy Systems (3)

Prerequisites: RENG 220, 220L, Math 120

This course is designed to provide the student with a firm understanding of the design, installation, maintenance, and applications of renewable energy systems. Special emphasis will be placed on photovoltaics (PV) and wind turbines.

RENG 230L Advanced Renewable Energy Systems Lab (2)

Prerequisites: RENG 220, 220L, MATH 120; Co-requisite: RENG 230

Students will experience the process of system design and installation applied to a small portable building utilizing both passive and active renewable energy systems. Exercises in developing a maintenance plan and schedule will be included. Students will gain in-depth experience logging data from a weather station and using this data to analyze the effectiveness of their design. Additionally, students will explore the use of the menu settings of on-site power conditioning equipment.

SCIENCE

SCIE 093 GED Science (3)

Prerequisites: NONE

Prepares students to pass the science section of the GED exam. This course focuses on integrated concepts and principles in biology, earth science, physics, and chemistry.

SOCIAL SCIENCES

SOSC 093 GED Social Science (3)

Prerequisites: NONE

Prepares students to pass the social science section of the GED exam. This course covers important concepts and issues in history, geography, economics, political science, and behavioral science.

SOSC 101 Introduction To Sociology (3)

Prerequisites: ENGL 100

A general survey of the fundamental concepts and theories of contemporary sociology: culture, the economy, family structure, deviance, and the elements and processes of social interactions, and the application of sociological principles to social institutions, groups and problems.

SOSC 210 Contemporary Indian Issues (3)

Prerequisites: ENGL 100

Critical analysis of modern Native American issues with an emphasis on personal involvement in constructive problem-solving. The course surveys contemporary social, legal, political, and economic issues as they affect Native American people individually and in communities, both urban and rural.

SPEECH

SPCH 130 Public Speaking (3)

Prerequisites: ENGL 101

A performance course. Designed to develop students public speaking skills to become more confident and more effective speakers. Students will research, prepare and present persuasive and informative speeches.

VISION CARE TECHNOLOGY

OPTI 101 Introduction to Optics w/Lab (5)

Prerequisites: Acceptance into the Program

This lecture and laboratory course introduces the student to human eye anatomy, optical terms, optical concepts and related math, instruments, equipment, lens and frame materials/types used in the surfacing and finishing of ophthalmic prescription eyewear. This course establishes the foundation for all other advanced ophthalmic courses.

OPTI 105A Ophthalmic Finishing & Surfacing I w/Lab (5)

Prerequisites: Acceptance into the Program.

This course will introduce the student to terms, instruments, lens and frame materials to be used in the surfacing and finishing of ophthalmic prescription eyewear. This lecture and laboratory course provides students with the basics of lens grinding and finishing of single vision lenses and how to use fabricating equipment safely.

OPTI 110A Ophthalmic Dispensing I w/Lab (4)

Prerequisites: OPTI 101

This course introduces historical and modern dispensing practices and the laws governing opticianry. Topics include basic eyeglass choices, dispensing, measurements, adjustments, and record keeping.

OPTI 112 Opticianry Environmental & Safety Issues (2)

Prerequisites: Acceptance into the Program

The origin and purpose of the Occupational Safety Health Act (OSHA) will be presented, along with its coverage and standards. The focus is on the OSHA Hazard Communication Standard developed to address the education and training requirements outlined in the Standard. The specifics of managing an optical/ophthalmic laboratory in terms of personal safety and environmental management will be covered. The development of OSHA compliance will be detailed.

OPTI 115 Ophthalmic Sales (2)

Prerequisites: OPTI 101

This course is designed to assist the student to function as a professional salesperson. It is a structured, programmed approach to providing effective customer service. Students will perform sales demonstrations utilizing various dispensing scenarios.

OPTI 205A Ophthalmic Finishing & Surfacing II w/Lab (5)

Prerequisites: OPTI 105A

This course is a continuation of Ophthalmic Surfacing and Finishing I with the primary focus on fabricating prescriptions using various multifocals, lens treatments and enhancements, frame and lens designs, production, quality control and other related advanced techniques.

OPTI 215 Anatomy & Physiology of the Eye (3)

Prerequisites: OPTI 101

This course gives the student an insight into the anatomical structure of the eye and its adnexa and the function of its parts as they relate to vision and the fitting of contact lenses. Common pathologies and ocular pharmacology are presented.

OPTI 220A Ophthalmic Dispensing II w/Lab (4)

Prerequisites: OPTI 110A

This course presents ophthalmic instruments and devices; analysis of absorptive lenses; computing and compensation of vertical imbalance; discussion of ethics and legal issues; record keeping and communication.

OPTI 225 Management for Opticians (3)

Prerequisites: OPTI 101

This basic optical management course presenting basic management and leadership skills necessary for a successful eyecare office. The course will teach analysis, creative thinking, and judgment, planning strategy and implementation skills necessary for today's optical business challenges.

OPTI 235 Contact Lenses w/Lab (4)

Prerequisites: OPTI 215

This lecture and laboratory course begins with a historical review of contact lenses. It progresses into the theory; design and optical principles of contact lenses; indications and contra-indications for contact lens wear; patient evaluation; lens types and availability; fundamental techniques and fitting procedures including the use the biomicroscope, keratometer, rigid contact lens modifiers, and radiuscope; ANSI standards; patient education on care, cleaning, insertion and removal of lenses.

OPTI 236 Introduction to Refraction w/Lab (4)

Prerequisites: OPTI 215

This course focuses on the refractive status of the human eye; anatomy and physiology and the visual system; binocular vision; the ophthalmic prescription; instrumentation and equipment used in clinical refraction; and basic pre-testing procedures.

OPTI 245 Ophthalmic Dispensing Internship (3)

Prerequisites: OPTI 220A

This internship course covers routine procedures used in a retail-dispensing store, which provides the student with direct hands-on experience in the dispensing clinic. Under supervision, students will coordinate all activities and functions required to dispense and fabricate optical eyewear.

Personnel Directory

Karen Abe, College Residence Assistant
Certificate, Psychology/Social Work, Stratford Career Institute

Joseph S. Abeita, College Residence Assistant
B.A., Studio Art/American Indian Studies, University of Arizona

William Adams, Instructor (Chemistry)
M.S., Applied Mathematics Statistics, Case Western Reserve University
Education Specialist, University of New Mexico
M.S., Bio-Chemistry, University of New Mexico
B.S., Mathematics, Kent State University

Ruth Allery, Early Childhood Education, Coordinator Instructor
M.A., Elementary Education, University of South Dakota
B.S., Elementary Education, Black Hills State University

Albert Artiaga, Guidance Counselor
M.A., Counseling, University of California, Sonoma
B.A., Mexican-American Studies, University of California, Sonoma

Evangeline Bahe, Secretary (OA)
A.A.S., Administrative Assistant, Albuquerque Technical Vocational
Institute

Leslie Baumgardner, Administrative Support Assistant (OA)
Certificate, Computer Secretary, Albuquerque Business College

Thelma Begay-Alonzo, College Residence Assistant
A.A.S., Office Information Applications, Southwestern Indian Polytechnic
Institute

David Benalli, Mail Clerk

Audrey Benallie, Information Technology Specialist
A.A.S., Computer Information Systems, Devry Institute of Technology

Elizabeth Bizardi, Educational Technician
B.S., Mathematics, New Mexico Institute of Mining & Technology

Joseph Carpio, Director, Admissions and Financial Aid
M.A., Organizational Management, University of Phoenix
B.A., Sociology, University of New Mexico

Alice Charley, Office Automation Assistant
Certificate, Bryant & Stratton Business College, Chicago, IL
A.A., Early Childhood Education

Kevin Chee, Security Guard

Damian Cheresposy, Lead College Residence Assistant

Barbara Chino, Educational Technician
Certificate, Business Administration, Haskell Indian Nations University

Cecelia Cometsevah, Vocational Rehabilitation Specialist
M.A., Counseling, University of New Mexico
B.A., Sociology, University of Albuquerque

Cecelia Crespín, Office Automation Clerk

Bertha Curley, Lead College Residence Assistant
B.S., Physical Education, University of New Mexico

Michael Daney, Instructor (Health/PE)
M.S., Health, Physical Education, University of Kansas
B.S., Health, P.E. & Safety, University of Kansas

Delmar Dunning, Instructor (Culinary Arts)
M.S., Occupational & Adult Education, Oklahoma State University
B.S., Trade & Industrial Education, Oklahoma State University

William Dyea, Maintenance Mechanic

Bernadine Fisherman, Human Resources Specialist

William Fragua, Supply Technician (OA)
A.A., Liberal Arts, Community College of Denver-North

Paul Frank, Instructor (Communications)
Ed.D., Education, University of Southern California
B.A., M.A., English, University of California at Los Angeles

Allen Gachupin, Director, Housing and Recreation
M.A., Education Administration, New Mexico State University
B.A., Physical Ed/History/Social Science Group, Western New Mexico
University

Elliott Gachupin, Gardener

John Gachupin, Maintenance Worker

Kirby Gchachu, Project Manager (Math/Science)
NASA Program Coordinator
M.A., B.S., Elementary Education, University of New Mexico

Joan Goodman, Coordinator, Family Extension & Education Program
M.A., French, University of New Mexico
B.S., Education, University of New Mexico

Matt Harriman, Supervisory Security Guard
Certificate, Law Enforcement Academy, University of Alaska-Fairbanks

Christopher Harrington, Instructor (Tribal Management)
J.D., Federal Indian Law, University of Utah
B.S., Philosophy/English, University of New Mexico

Sam Henderson, Instructor (Vision Care)
B.S., Mellon University
Certifications: Optician, AMOO,
National Contact Lens Examiners Certified

Vina Hiya, Instructor (Business Education)
B.S., Education, Western New Mexico University

Roxy Hunt, College Residence Assistant
M.S., Sport Administration, University of New Mexico
B.S., Athletic Training, University of New Mexico

Verbie James, Gardener
A.A.S., Natural Resources Management, Southwestern Indian Polytechnic
Institute

Regina Jaramillo-Jiron, Library Technician
Certificate, Browning Commercial

Joseph Jiron, Gardener

James Jojola, Maintenance Mechanic

Randy Lalio, Laborer

Leo Livingston, College Residence Assistant

Neva Lucero, Education Project Specialist
B.A., Biology/Sociology, New Mexico Highlands University

Stella Lucero, Human Resources Assistant

Perfilia Madalena, Program Support Assistant

Carol Maller, Coordinator, Diabetes Program
M.S., Community Health Education, University of New Mexico
B.S.N., Nursing, University of New Mexico
CHES, Certified Health Education Specialist

Luanne Manwell, Information Technology Specialist
M.B.A., Information Technology, University of Phoenix
B.B.A., Management Information Systems, University of New Mexico

Gloria Mariano, Education Project Specialist
B.S., Sociology/Psychology, Eastern New Mexico University

Irene Marrs, Instructor (Business Education)
B.A., Business Education, New Mexico Highlands University

Terry Martin, College Residence Assistant
B.S., Business Administration, Haskell Indian Junior College

Mary McCormick, Instructor (Reading)
M.A., Reading, University of New Mexico
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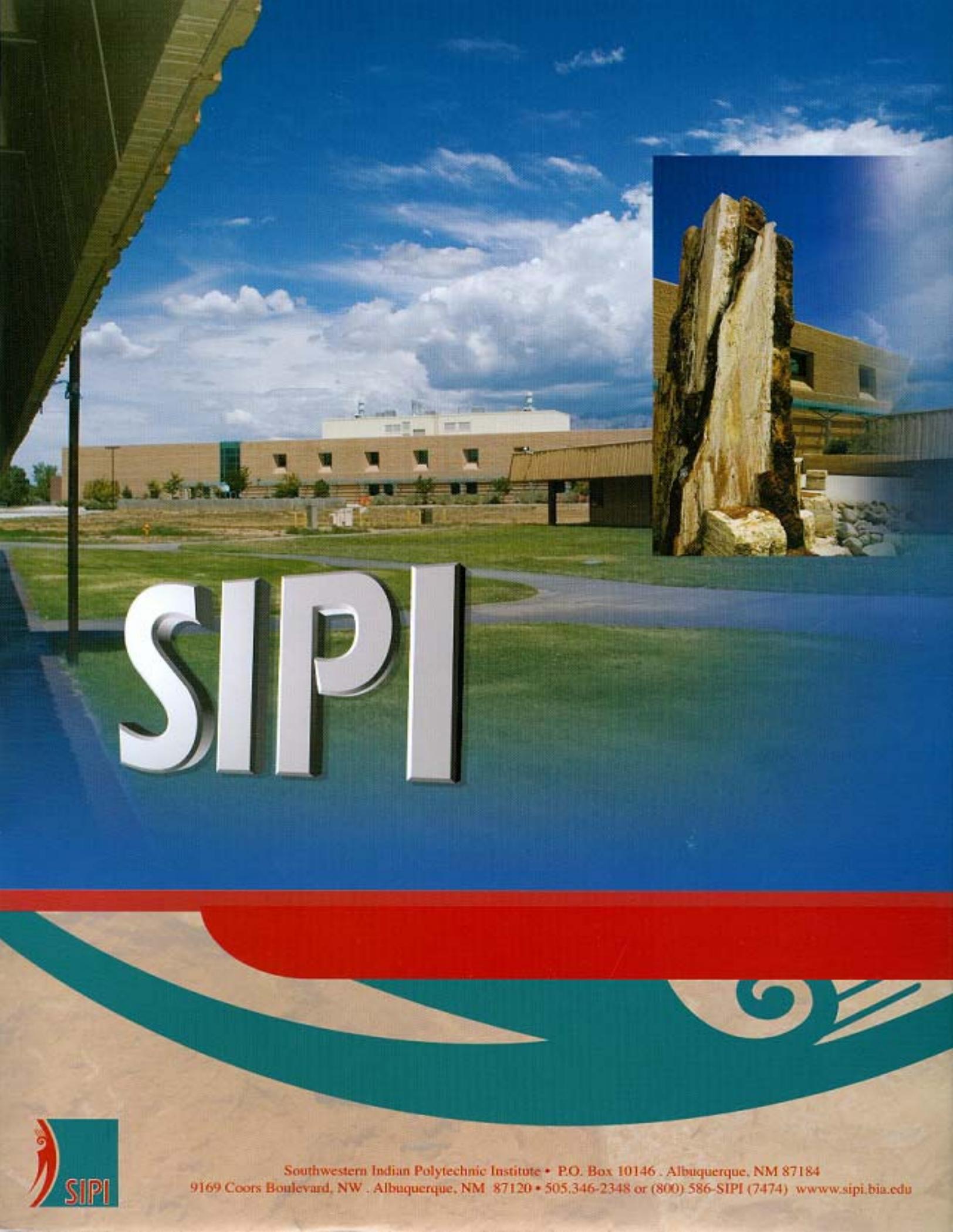
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A photograph of a modern campus building with a large, tall, textured stone monument in the foreground. The sky is blue with scattered white clouds. The SIPI logo is overlaid in large, white, 3D block letters on a blue background that transitions into a red and teal graphic at the bottom.

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