

permission.

DET 455

Applied Failure Analysis (5)

This course focuses on material failures, techniques of failure analysis, and examination/identification of failure root causes. Students will learn to interpret and explain their results to customers. Prerequisite: admittance into BAS-DT or administrative permission.

DET 465

Power Generation Systems (5)

Students will operate, maintain, test, and troubleshoot generators and related energized and de-energized components. Emphasizes safe working practices when working around on-site power generation systems. Prerequisite: enrollment in BAS-DT or by permission.

Drama

DRMA 100

Applied Drama (AE) (3)

Provides credit for participation in either the artistic or technical aspects of the college's quarterly play productions. This course may be repeated for credit.

DRMA& 101

Introduction to Theater (H) (5)

Overview of theatre as an art form with emphasis on the play in production and the roles of various theatre artists. Students are expected to attend two plays during the quarter at their own expense.

DRMA 103

Set Design (AE) (3)

Introduction to the basics of scenic design for the theatre; drafting and model building. Students will work on the concurrent Centralia College Drama production. Prior enrollment in DRMA 106 is preferred.

DRMA 105

Theater History (H) (3)

Survey of the major periods in Western drama through study of major representative plays and development of the physical theater of those periods.

DRMA 106

Introduction to Stagecraft (AE) (3)

Introduction to basic tools, materials, equipment, techniques used in the design and implementation of sets, lighting and sound for the theatre. Students will participate in the design, construction and lighting of the concurrent drama production.

DRMA 107

Beginning Acting (H) (5)

Introduction with emphasis on concentration, imagination, movement, and characterization via vocal, physical, emotional exercises, improvisation, and scene work. Students will be expected to attend two plays during the quarter at their own expense.

DRMA 108

Intermediate Acting (H) (5)

Continuation of acting fundamentals with an emphasis on improvisational techniques and exercises, and advanced monologue and scene work. Students will be expected to attend two plays during the quarter at their own expense. Prerequisite: DRMA 107 or instructor permission.

DRMA 110

Stage Makeup (AE) (3)

Introduction to the types of theatrical makeup and the techniques of application.

DRMA 111

Stage Lighting (AE) (3)

Introduction to the basic principles of stage lighting as an integral part of theatrical productions. The course will deal with theories and equipment commonly used in theatre lighting. Students will participate in the drama production.

DRMA 115

Dramatic Performance (H) (5)

For students involved in the creative/performance aspects of a play production, from audition through research/preparation for their portrayal and evaluation of their performance. The student must successfully audition and be cast in a college production. Prerequisite: audition selection for quarterly play production.

DRMA 118

Musical Theatre (H) (5)

The study of musical theatre, its major works, its significance in theatre history, and role in American culture with an emphasis on production elements and the play in performance.

DRMA 120

Introduction to Playwriting (H) (5)

Study the art and craft of writing for the stage. Students will be required to complete and oversee the production of a short play. Final performances of student works will be presented to the public.

DRMA 130

Directing (H) (5)

An introduction to the theories, methods, and processes of directing a theatrical production. The course will culminate in the performance of a short play, which will be shown to the public. Prerequisite: DRMA& 101, DRMA 107, DRMA 108.

DRMA 141

Theater Speech (AE) (3)

The training of the human voice to develop control. The emphasis is on voice projection, quality and accuracy of sound and articulation of the English language.

DRMA 148

Introduction to Dance (AE) (1)

Study the fundamentals of Ballet, Modern, and Jazz dance. Prior dance experience is not necessary. The student will be required to wear casual, comfortable clothing. Students may participate barefoot. Dance shoes are optional.

DRMA 149

Introduction to Movement for Theatre (AE) (1)

Introduction to dance for Musical Theatre. Prior dance experience is not necessary. The student will be required to wear casual, loose fitting clothing. Students may participate barefoot. Dance shoes are optional.

DRMA 150

Introduction to Modern Dance (AE) (1)

Study basic Modern Dance, Latin, and Swing movements. Prior dance experience is not necessary. The student will be required to wear comfortable, loose fitting clothing. Students may participate barefoot. Dance shoes are optional.

DRMA 155

Technical Production I (AE) (2)

This course is an introduction to the technical aspects and procedures specific to setting up and running live entertainment.

DRMA 201

Advanced Acting (H) (5)

Continued study of acting; character analysis, scene interpretation and classical styles. Students will be expected to attend two plays at their own expense and will be responsible for the presentation of a children's theatre production. Prerequisite: DRMA 108 or instructor permission.

DRMA 205

Contemporary World Theatre (AE) (3)

Introduces contemporary world theatre using the theatrical productions of the Pacific NW regional theatres and the Broadway theatres of NY City. Travel to and study these productions. Visits to additional cultural events/locales will be included.

DRMA 210

Multicultural Theatre (D) (H) (5)

An introduction to the dramatic literature and contemporary theatre practices of people of color; the study of the intersections of cultures in American society as portrayed in American theatre and performance.

DRMA 215

Improvitational Theatre (AE) (3)

An introduction to the theories, methods, and processes of improvisational theatre. Students will apply what they learn and perform an improvised piece of theatre at the end of the quarter for the public.

Economics

ECON& 201

Microeconomics (SS) (5)

Microeconomics is the study of households and firms and how they interact in markets under varying degrees of competition.

ECON& 202

Macroeconomics (SS) (5)

Macroeconomics is the study of how any system allocates limited resources to meet unlimited wants. Major concerns of macroeconomic policy are: inflation, full employment, national income accounting, fiscal policy, the money supply and trade.

ECON 305

Managerial Economics (SS) (5)

This class applies the principles of microeconomics to management decisions. Topics include consumer theory, supply & demand, efficiency, elasticity along with how firms contend with costs and competition.

Education

EDUC& 101

Paraeducator Basics (3)

An introduction to roles and responsibilities of the Paraeducator in the K-12 educational system. Students will explore techniques supporting instruction, professional and ethical practices, positive and safe

learning environments, effective communication and teamwork.

EDUC& 115

Child Development (SS) (5)

Build foundation for explaining how children develop in all domains, conception through early adolescence. Explore various developmental theories, methods for documenting growth, and impact of brain development. Prerequisite: co-enrollment or previous enrollment in an EKE/EDUC course.

EDUC& 130

Guiding Behavior (3)

Examine the principles and theories promoting social competence in young children and creating safe learning environments. Develop skills promoting effective interactions while providing positive individual guidance and enhancing group experiences.

EDUC& 136

School Age Care (3)

Develop skills to provide developmentally appropriate and culturally relevant activities/care for children ages 5-12 in a variety of settings.

EDUC& 150

Child, Family, Community (3)

Integrate the family and community contexts in which a child develops. Explore cultures and demographics of families in society, community resources, strategies for involving families in the education of their child, and tools for effective communication.

EDUC 190

Cooperative Work Experience (1-12)

Cooperative Work Experience allows students to apply classroom learning to on-the-job settings. Credit is earned for new and continued learning taking place in the work environment. Reaching set learning objectives and development of positive work habits are emphasized. Prerequisite: instructor permission.

EDUC& 201

Intro to Education (AE) (3)

Explore the role of education in our society and investigate teaching as a career. Both the historical perspective and current trends in education will be discussed.

EDUC& 204

Exceptional Child (5)

Introductory course in recognition and identification of exceptionality in children from birth through high school (age 21).

EDUC& 205

Intro to Ed w/Field Exp (AE) (5)

An overview of education in America including history, purpose, philosophies, characteristics, social aspects and current issues. Exploration of teaching as a profession in the K-12 system. Includes 30 hours in K-12 classroom.

EDUC 300

Introduction to SPED (3-5)

This course provides an introduction to the terminology, identification, and issues when addressing the needs of diverse students with disabilities. Prerequisite: Admittance into BAS-TE program or administrator approval.

EDUC 315

Teaching Science (5)

While reviewing fundamental content in life, earth, physical and space sciences, participants will develop skills for integrating Next Generation Science Standards into highly engaging, relevant, and age appropriate STEM or STEAM lessons. Prerequisite: Admission in BAS-TE program or administrator approval.

EDUC 330

Technology and Teaching (2)

This course focuses on various educational technologies, ranging from classroom equipment to online learning management systems, with a particular focus on students' physical and emotional safety. Prerequisite: Admittance into BAS-TE program or administrator approval.

EDUC 335

Teaching Art & Movement (3)

Students examine current theory, research, and best practices related to the arts and movement. Instruction will include employing strategies for integrating the arts and an appreciation for the arts across and within content areas. Prerequisites: Admittance into BAS program or Administrator approval.

EDUC 345

Language Arts and Development (3)

Examine the methods for teaching writing, reading, listening, and speaking strategies and skills, including vocabulary, grammar, usage, and language development. Prerequisite: Admittance into BAS-TE program or administrator approval.

EDUC 350

Diversity in Students (3)

Using theory, research, and practice, students will

understand and recognize issues of diversity. Behavioral supports will be assessed relative to vulnerable, special, and minority populations. Topics include race, ethnicity, gender, class, sexuality, disability, and age. Prerequisite: Admittance into BAS-TE program or administrator approval.

EDUC 351

Issues of Abuse (3)

Develop skills for working with children from abusive and/or neglectful home environments, including potential behavioral consequences of abuse or neglect and corresponding intervention strategies. Prerequisite: Admittance into BAS-TE program or administrator approval.

EDUC 355

Emergent Reading (5)

Explores reading, comprehension, and literacy as it pertains to beginning readers. Prerequisite: Admittance into BAS-TE program or administrator approval.

EDUC 360

Assessment and Evaluation (5)

Participants will explore principles of sound formative and summative assessment using grade level expectations, best grading practices, technology platforms, and individual education plans as tools. Participants will design assessments for individual needs of students in classrooms. Prerequisite: Admittance into BAS-TE program or administrator approval.

EDUC 365

Intermediate Reading (3)

Explores reading, comprehension, and literacy as it pertains to intermediate readers. Prerequisite: Admittance into BAS-TE program or administrator approval.

EDUC 370

Support: Child & Family (3)

Study techniques for communicating with families and professionals about characteristics and needs of individuals with differing abilities. Strategies for collaborating with families, recognizing and respecting family, cultural, and societal diversity. Identify local resources. Prerequisite: Admittance into BAS-TE program or administrator approval.

EDUC 380

Development of Differently-Abled (5)

Examine typical and atypical development. Identify characteristics of differing abilities, including physical or medical needs and effects disabilities have on educational implications and individual and family lives. Prerequisite:

Admittance into BAS-TE program or administrator approval.

EDUC 385

SPED Assessment (3)

This course provides potential special education teachers with knowledge and experience in assessment issues as they relate to students with disabilities. Prerequisite: Admittance into BAS-TE program or administrator approval.

EDUC 400

Education and the Law (3)

Examine educational law emphasizing rights and responsibilities of students and teachers, and current issues of education and special education. Explore current legislation, issues, and trends related to schools and special education. Prerequisite: Admittance into BAS-TE program or administrator approval.

EDUC 410

Exceptional Learners (5)

This course will identify effective, research-based instructional strategies, accommodations, and adaptations for learners with diverse academic and behavioral needs. Participants will demonstrate how to make data-based decisions informed by multiple measures of evidence. Prerequisite: Admittance into BAS-TE program or administrator approval.

EDUC 420

Curriculum & Instruction (5)

Explore a variety of evidence-based instructional strategies for successful education of students with differing social and cultural backgrounds and learning styles. Plan and implement class activities that involve students in an active learning environment. Prerequisite: Admittance into BAS-TE program or administrator approval. Corequisite: EDUC 481 Practicum 1.

EDUC 421

Classroom Management (5)

Students will examine current theory, research, and best practices related to classroom management. Instruction will include employing techniques and strategies for managing individual and group behavior in a variety of instructional settings. Prerequisite: Admittance into BAS-TE program or administrator approval. Corequisite: EDUC 483 Practicum 3.

EDUC 425

Integrated Methods (5)

Students use a combination of multiple content areas and learn how to apply them in an integrated unit, combining

a variety of learning strategies and structures to meet the needs of ALL students. Prerequisite: Admittance into BAS-TE program or administrator approval.

EDUC 480

SPED Seminar (2)

Students will work toward completing and documenting field tasks required for student teaching, certification, and the Special Education Portfolio as dictated by the state. Course Requisite: Admittance into BAS program or Administrator approval. Prerequisite: Admission in BASTE program or admin approval.

EDUC 481

Practicum 1 (2)

Each weekly class session will provide directions on the field assignment for that week. Course participants spend 33 field hours implementing current theory, research, and best practices related to their Curriculum and Instruction course. Co-requisite: EDUC 420.

EDUC 482

Practicum 2 (Field Exp aligned to Assess/Eval) (2)

While participants spend 33 hours in the field, they will apply principles of sound formative and summative assessment using grade level expectations, best grading practices, technology platforms, and individual education plans as tools. Prerequisite: Admittance into BAS-TE program or administrator approval; EDUC 360 Assessment & Evaluation

EDUC 483

Practicum 3 (2)

Weekly classes will provide directions on the field assignment for that specific week. Course participants spend 33 hours in the field, implementing current theory, research, and best practices related to their Classroom Management course. Prerequisite: Admittance into BAS-TE program or administrator approval. Corequisite: EDUC 421 Classroom Management.

EDUC 484

Practicum 4 (2)

Each weekly class session will provide directions on the field assignment for that week. Participants spend 33 field hours implementing current theory, research, and best practices related to their comprehensive program learning thus far. Prerequisite: Admittance into BAS-TE program or administrator approval.

EDUC 490

Student Teaching SPED (10)

Supervised instructional experience to develop,

implement, practice, and evaluate theory and methods learned. Students will meet one on one or in small groups with supervising faculty. Prerequisite: EDUC 497 with a 2.0 or higher.

EDUC 497

Student Teaching Elem 1 (10)

Supervised instructional experience to develop, implement, practice, and evaluate theory and methods learned. Prerequisite: Admittance into BAS-TE program or administrator approval; ENGL& 102; 2.0 or higher in EDUC 300, 330, 345, 350, 355, 370, 400, 410, 420, and 421.

EDUC 498

Student Teaching Elem 2 (10)

Supervised instructional experience to develop, implement, practice, and evaluate theory and methods learned in BAS-TE program. Prerequisite: ENGL& 102; 2.0 or higher in all prior EDUC courses.

Education – Early Childhood

ECED& 100

Child Care Basics (3)

This course is designed to meet licensing requirements for early learning lead teachers and family home child care providers, STARS 30 hour basics course recognized in the MERIT system.

ECED& 105

Intro Early Child Ed (SS) (5)

Explore the foundations of early childhood education. Examine theories defining the field, issues, trends, best practices, and program models. Observe children, professionals and programs in action.

ECED& 107

Health/Safety/Nutrition (5)

Introduction to implementation of equitable health, safety and nutrition standards for the growing child in group care. Develop skills necessary to keep children healthy, safe, report abuse and neglect, and connect families to community resources.

ECED& 120

Practicum-Nurturing Rel (2)

In an early learning setting, engage in establishing nurturing, supportive relationships with all children and professional peers. Focus on children's health and safety, promoting growth and development, and creating a culturally responsive environment.

ECED& 132

Infant/Toddler Care (3)

Examine the unique developmental needs of infants and toddlers. Study the role of the caregiver, relationships with families, developmentally appropriate practices, nurturing environments for infants and toddlers, and culturally relevant care.

ECED& 134

Family Child Care (3)

Learn how to manage a family childcare program. Topics include: licensing requirements, record-keeping, relationship building, communication strategies, guiding behavior, and promoting growth and development.

ECED& 138

Home Visiting & Family Engagement (3)

Plan and provide home visits and group activities. Promote secure parent-child relationships. Support families to provide high-quality early learning opportunities embedded in everyday routines and experiences.

ECED& 139

Administration of ECE (3)

Develop administrative skills required to develop, operate, manage and improve early childhood education and care programs. Acquire basic business management skills. Explore resources and supports for meeting Washington State licensing and professional NAEYC standards.

ECED& 160

Curriculum Development (5)

Investigate learning theory, program planning, tools and methods for curriculum development promoting language, fine/gross motor, social-emotional, cognitive and creative skills and growth in children birth through age 8 utilizing developmentally appropriate and culturally responsive practice.

ECED& 170

Environments-Young Child (3)

This class focuses on the adult's role in designing, evaluating, and improving indoor and outdoor environments that ensure quality learning, nurturing experiences, and optimize the development of young children.

ECED& 180

Language/Literacy Develop (3)

Teaching strategies for language acquisition and literacy skill development are examined at each developmental stage (birth-age 8) through the four interrelated areas of speaking, listening, writing, and reading.

ECED& 190

Observation & Assessment (3)

Collect and record observation and assessment data in order to plan for and support the child, the family, the group and the community. Practice reflection techniques, summarizing conclusions, and communicating findings.

ECED 233

ECE Practicum 2 (5)

Develop a professional understanding of teaching methods and practices with an opportunity to evaluate teaching skills and learning environment. Must have completed at least 30 credits in ECE or have instructor permission.

Electronics, Robotics, Automation

ERA 101

Electronics Assembly (5)

Techniques of electronics assembly using through-hole and surface mount components. Schematics and computer aided design will be studied. Heavy emphasis placed on personal and component safety and Electro-Static Discharge (ESD). Pre/Corequisite: MATH 098, ENGL 099 or equivalents.

ERA 117

Adv AC/DC Electronics (4)

Advanced theorems, analysis and troubleshooting of Direct and Alternating Current. Devices including inductors and variable resistors and capacitors will be studied. Circuit simplification theorems will be studied and demonstrated. Prerequisite ERA 116 or MEC 116.

ERA 170

Solid State Devices (4)

Applications of circuits using solid state electronic devices will be studied. Course content will include diodes, transistors, solid state relays, operational amplifiers and their respective applications in sensory and device control circuits. Prerequisite: ERA 115.

ERA 212

Digital Electronics (4)

Digital logic systems and devices, boolean and hexadecimal numbering systems, combinational logic sequences and application of logic systems. Lab section emphasizes safety and electro-static discharge avoidance. Prerequisites: MATH 115, ERA 115.

ERA 230

Robotic Controllers (4)

Introduction to robotic control systems and input/output processing. Platforms studied will include microcontrollers, computer numerically controlled (CNC) machines, various types of motor drive controllers and integration of input devices and sensors into algorithms to drive outputs. Prerequisite: TMATH 122 or equivalent.

ERA 235

Communication Systems (3)

Survey of communication systems used in electronics. Wired systems will include Serial, Parallel, Ethernet, fiber optic, industrial communication protocols and others. Wireless systems will include RF, IR, Bluetooth and Wi-Fi including basic applications in robotics.

ERA 240

Amplifiers (5)

Amplifier applications in audio and industrial settings. Topics will include small and large signal voltage and current amplifiers, analog and solid state configurations and applications to audio, sensing and measurement, and digital comparison circuits. Prerequisite: ERA 170.

ERA 252

Data Processing for Automation (3)

Introduction to retrieving, storing, processing and reporting data from input devices common to an industrial setting. A heavy emphasis will be placed on MS spreadsheet and database applications. Prerequisites: ERA 121, ERA 170.

ERA 276

Robotics Capstone (3)

Class will cover project management through research and product development. Students will be required to supply project proposals, plans, budgets, structured updates and technical reports. Effective time management, communication and team dynamics will be emphasized. Prerequisite: instructor permission.

Energy Technology

PPO 100

Intro to Energy Industry (5)

Provides a broad background in fields related to power generation.

PPO 102

Power Generation (5)

Focus will be on environmental issues surrounding power plants. Introduction to boilers including design and ancillary equipment. Prerequisite: PPO 100.

PPO 103

Electric Utility Distribution System (5)

Continuing coverage of power systems, boilers and prime movers. Prerequisite: PPO 102.

PPO 105

Inside Wireman Section A (7)

Provides introductory instruction in electrical theory, design, installation, and maintenance of electrical systems providing power, light heat, air conditioning, refrigeration, control, communication, monitoring, and automation to residential, commercial, and industrial markets.

PPO 106

Inside Wireman Section B (7)

This course is designed to instruct the student in electrical theory, design, installation, and maintenance of electrical systems providing power. Section B provides further mastery of knowledge, skills, and abilities to apply the principles of basic electricity, National electrical codes, engineering drawing, reading and sketching.

PPO 107

Inside Wireman C - Substation (7)

Students will be able to demonstrate mastery of principles of electronic devices, National Electrical Codes, engineering drawing, reading, sketching and industry mathematics.

PPO 108

Inside Wireman D -Substation (7)

Students will be able to demonstrate mastery of knowledge, skills and abilities in motor controls, electronics and industrial electronics.

PPO 120

Blueprint Reading (5)

An in-depth study of construction blueprints for residential, commercial, and industrial facilities emphasizing interpretation as it applies to the energy and HVAC industries, and electrical distribution systems.

PPO 130

Industrial Safety (5)

Industrial safety practices, procedures, and equipment as found in modern power plants. Also included will be basic first aid and CPR, and basic firefighting equipment and procedures. Basic Rigging will be taught stressing safety. Prerequisite: PPO 102.

PPO 150

Energy Efficiency (5)

A study of Energy Efficiency concepts related to the efficient and effective use of electricity in home and

industry. Subjects covered will include electrical terms, green alternative energy sources, transportation, solar, wind, biomass, and insulation.

PPO 191

Power Plant Job Preparation (4)

Introduces students to local power generation facilities through touring potential job sites, performing market research and preparing for the POSS test which is required for entry level employment or apprenticeship.

PPO 201

Plant Systems Boilers (5)

Provides a background in power boilers, boiler systems & equipment, an introduction to the safe operation, maintenance & control of boilers. Prerequisite: PPO 102.

PPO 202

Power Plant Prime Movers (5)

Provides a basic background in Prime Movers, focusing on construction, operation, and maintenance of steam turbine, gas turbine, diesel engine, and pump operation and maintenance. Prerequisite: PPO 201.

PPO 203

Plant Operations Refrigeration & HVAC (5)

Provides a background in power plant operations and controls. Prerequisite: PPO 202.

PPO 205

Power System Operator I (5)

Provides a background in operating the American electrical grid system and NERC (North American Electrical Reliability Corporation) required standards. The first class in a series of two classes. Prerequisite: Minimum 2.8 grade in PPO 201.

PPO 206

Power System Operator II (5)

PPO 206 is a continuation of PPO 205, providing the student with a background in operating the American electrical grid system and required NERC (North American Electrical Reliability Corporation) standards. Prerequisite: Minimum grade 1.9 in PPO 205.

PPO 208

Hydroelectric Power (5)

Provides a broad background in the field of electric power generation from hydroelectric dams. Basics of producing electricity including turbines, hydro project regulations, fish passageway, and water quality, and tribal rights. Prerequisite: PPO 103.

Engineering

ENGR 100

Introduction to Engineering (2)

Introduction to the various fields and careers of engineering. Topics will include: educational planning and transfer issues; problem solving, engineering design, teamwork, and communication skills.

ENGR 203

Applied Numerical Methods (AE) (5)

Numerical solutions to engineering and science problems using modern scientific computing tools. Application of mathematical judgment in selecting computational algorithms and communicating results. Introduction to MATLAB programming for numerical computation. Prerequisite: MATH& 152 (MATH 118 recommended) or instructor permission.

ENGR& 111

Engineering Graphics I (AE) (2)

Introduces the basic concepts of engineering graphics through freehand sketching and computer-aided drafting. Includes orthographic projection, section and auxiliary views, dimensioning and text.

ENGR& 112

Engineering Graphics II (AE) (3)

Continuation of ENGR& 111. Emphasizes basic concepts of engineering graphics in CAD-based descriptive geometry applications. The latter part of the course covers a variety of 3-D modeling techniques and solid mass properties extraction. AUTOCAD software is used as the primary CAD-tool. Prerequisites: ENGR& 111 or equivalent, MATH 111, or permission of instructor.

ENGR& 204

Electrical Circuits (AE) (5)

An introduction to basic electrical circuits and systems. Topics include: basic analysis techniques; nodal and mesh analysis; Thevenin and Norton equivalent circuits; operational amplifiers; step, natural and steady state circuit response. Concurrent enrollment in MATH 212 is recommended. Prerequisite: MATH& 152 and PHYS& 222.

ENGR& 214

Statics (AE) (5)

First of a three-course sequence. The basic principles of vector statics; friction, analytical and graphical methods of solving force systems including frames, trusses, and other simple mechanisms; centroids and moments of inertia; chains and cables. Co-requisite: MATH& 151.

ENGR& 215

Dynamics (AE) (5)

Second of a three-course sequence includes the study of kinematics and kinetics of a particle, work-energy, impulse-momentum, relative motion, and rigid-body mechanics. Vector methods will be stressed throughout. Prerequisite: MATH& 152.

ENGR& 225

Mechanics of Materials (AE) (5)

The last of a three-course sequence. Includes the study of stress, strain, deflection in beams, columns, machine and structural members. Includes bending moments, shear, torsion, deformation, unsymmetrical bending, and eccentric loading. Prerequisite: ENGR& 214.

ENGR 270

Research in Engineering (AE) (12)

Design a research project, set up experiments, collect data in the lab or in the field, and/or analyze data. Each credit hour requires 33 hours of activity per quarter. Prerequisite: instructor permission.

English

ENGL 093

Independent Study (1-5)

Individualized instruction for the student whose needs are not currently being met by the available course offerings. Specialized curriculum and instruction are developed to meet each student's needs. Permission of instructor only.

ENGL 094

Spelling (1-5)

Topics covered in this course include basic spelling patterns, commonly confused words, apostrophe use, capitalization, plural formation, and how pronunciation helps to improve spelling. Students utilize materials according to pretesting information.

ENGL 095

Vocabulary Development I (1-5)

Builds a base of words used in everyday communication, provides systematic study, increases proficiency in oral and written communication and reading comprehension. Students are given a placement test and assigned materials at an appropriate level.

ENGL 096

Vocabulary Development II (1-5)

Builds a base of words used in everyday communication, provides systematic study, increases proficiency in oral and written communication and reading comprehension. Students are given a placement test and assigned

materials at an appropriate level.

ENGL 097

Vocabulary Development III (1-5)

Course provides a systematic study of college level academic words and their roots, prefixes, and suffixes to increase proficiency in oral and written communication.

ENGL 098

Writing & Grammar Review (1-5)

Study proper word usage, sentence structure, and punctuation. Writing includes personal essays and summaries. Emphasis is on improving grammar and writing skills for personal needs and preparation for technical coursework. Prerequisite: students must meet mandatory placement requirements to enroll.

ENGL 099

Fundamentals of English (1-5)

Prepares students for college composition. Students analyze texts, review sentence structure and punctuation, and write several short essays and other writing. Students must meet mandatory placement requirements to enroll.

ENGL& 101

English Composition I (C) (5)

An expository writing course encouraging students to think and write clarity and conciseness; to organize and develop their ideas; and to express themselves sharply, economically, and grammatically. Students must meet mandatory placements to enroll. Prerequisite: placement into ENGL& 101 or 5 credits of ENGL 099 or WRT 105 with 2.0+ or BTEC 221.

ENGL& 102

Composition II (C) (5)

A course in argumentative and persuasive writing, methods of research, development and preparation of original source-based papers and projects. Prerequisite: completion of ENGL& 101 with a minimum grade of 2.0.

ENGL 103

Writing for College (AE) (1)

Lab hours in the Writing Center will support skill development and confidence in specific aspects of college writing, to be defined in an Individual Learning Plan (ILP) with instructor.

ENGL& 111

Intro to Literature (H) (5)

Introduces the major genres, techniques and themes of literature by examining the work of a variety of classic and

contemporary authors.

ENGL& 113

Intro to Poetry (H) (5)

Introduction to modern poetry (mid-19th c. to present) through the study of major English language poets: their lives, influences, and works. Prerequisite: ENGL 101.

ENGL& 114

Intro to Dramatic Lit (H) (5)

Survey of dramatic literature from classical Greek to modern plays, emphasizing basic elements of plot, character, language, and the traditional genres of tragedy and comedy. Students will attend two plays at their own expense.

ENGL 160

Women's Literature (D) (H) (5)

Examines literature written by women to understand how gender, class and race shape their experience and their writing. Genres will include poetry, short stories, non-fiction, fiction and drama. College-level reading and writing skills expected.

ENGL 180

Short Fiction (H) (5)

Survey of short story as representational vehicle in romanticism, realism, modernism, horror, satire, science fiction, magical realism. Primarily American in focus; includes cross-cultural comparisons. College-level reading, writing skills expected. Creative writing options. Prerequisite: college level reading and writing skills.

ENGL 204

Introduction to Shakespeare (H) (5)

Learn about the life, times and works of William Shakespeare, how Elizabethans' likes and dislikes, superstitions, and social order influenced this golden age of the theatre by studying six of the Bard's 37 plays.

ENGL 208

Intro to Creative Writing (H) (5)

Writers will move beyond the traditional "academic essay" into an exploration of literary genres to include poetry, creative nonfiction, short fiction, and drama. Prerequisite: college-level writing: test into ENGL& 101.

ENGL 209

The Hero's Quest: Survey of Eng Lit 7th Cent (H) (5)

Surveys how medieval and early Renaissance English writers explored issues like the relationship between rulers and subjects, God and free will, and the war between the sexes. Covers the Beowulf poet, Chaucer, Shakespeare,

and more.

ENGL 210

The Crisis of Faith: Survey Engl Lit 1616 (H) (5)

Surveys late Renaissance through Enlightenment writers like John Donne, Ben Jonson, Andrew Marvell, John Milton, Daniel Defoe, Jonathan Swift, Alexander Pope, and Samuel Johnson, emphasizing how writers reflected social concern about faith, politics, and gender roles.

ENGL 211

Survey of English Literature: 1798 - Present (H) (5)

This survey studies how, amid political, technological, religious, and artistic ferment, English literature was transformed by the Romantic poets, the rise of the Victorian novel, and the innovations of modern fiction, drama, and poetry.

ENGL 220

American Drama (H) (3)

Presents six classic American plays which deal with society and family expectations. Students will view, analyze, discuss, and write on the literary components and substance of these plays.

ENGL 222

Screenwriting (H) (5)

An introduction to the theories, methods, and processes of writing a screenplay. Students will apply what they learn and complete a full-length screenplay at the end of the quarter.

ENGL 233

Children's Literature (D) (H) (5)

An examination of the diverse body of literature written for children and adolescents, as well as techniques used to read aloud to children. Classics and contemporary works will be approached chronologically and thematically. Prerequisite: ENGL& 101.

ENGL& 235

Technical Writing (C) (5)

An alternative to ENGL& 102 for science and engineering majors, focused on writing with clarity, objectivity, audience awareness, proper formats as well as research techniques, problem-solving, critical thinking and development of source-based writing. Prerequisite: completion of ENGL& 101 with a minimum grade of 2.0.

ENGL& 244

American Literature I (H) (5)

Surveys three American literary movements: Puritans, Colonialists, and American Renaissance /

Transcendentalism. Examines rise of a distinctly American literature, focusing on themes of faith, work, self-government, race and gender. Prerequisite: ENGL& 101 with 2.0 or better or instructor permission.

ENGL& 245

American Literature II (D) (H) (5)

American literature from Civil War to World War I: Gilded Age of industry/capital, labor movement, postwar race relations, westward expansion, gender issues/ suffrage, shift from romanticism to realism/naturalism in prose and poetry. Prerequisite: ENGL& 101 w/2.0 or better or instructor permission.

ENGL& 246

American Literature III (D) (H) (5)

Surveys development and diversification of American literature from Roaring 1920's to the present, including modernist innovations in poetry/prose, the Beats, Harlem Renaissance, Latino/a, Asian American, Native American, feminist, environmental, science, and dystopian fictions. Prerequisite: ENGL& 101 w/2.0 or better or instructor permission.

ENGL 249

The Great American Novel (H) (5)

Explore development of the American novel, its major themes and stylistic techniques, focusing on classics by writers like Hawthorne, Melville, Twain, Chopin, Hemingway, Faulkner, Morrison, as well as evaluating contemporary works. Prerequisite: ENGL& 101 with 2.0 or better or instructor permission.

ENGL 250

Literary Themes (AE) (1-5)

A major theme is followed through important works of fiction, poetry, and drama. Themes vary depending on the instructor and the quarter in which it is offered.

ENGL 251

Science Fiction (H) (5)

Surveys rise and development of science fiction, focusing on short stories; students may address novels in course projects. Explores common themes; science fiction as social commentary; technology; war; relationships; race; gender; defining "human." Creative writing options. Prerequisite: ENGL& 101.

ENGL 260

Non-Western World Literature (D) (H) (5)

Literature of the non-western world, ancient times to the present: Middle East, India, Africa, China, Japan, Americas focusing on how literature expresses these cultures' spiritual traditions, political values, gender issues,

environmental beliefs. Prerequisite: ENGL& 101 with 2.0 or better or instructor permission.

ENGL 271

Intermediate Creative Writing (AE) (3)

Students will hone their creative writing, workshopping, and revising skills while working on an individual project. Prerequisite: ENGL 208 and instructor permission.

ENGL 272

Advanced Creative Writing (AE) (3)

For serious students who wish to prepare a manuscript for publication and/or writing program admission. Emphasis on workshopping, and revising of an individual project. Prerequisite: ENGL 271 and instructor permission.

WRT 105

Writing in the Workplace (5)

Study a variety of workplace communications, along with proper use of grammar, sentence structure, mechanics and vocabulary within those communications. Prerequisite: 5 credits of ENGL 098 with 2.0+ or placement into ENGL 099/WRT 105.

English Language Acquisition

ELA 011

English for Work (1-15)

Introduces beginning non-native speakers of English to career pathways in Business, Health, Academic Transfer and Industry. Students learn listening, speaking, reading, writing and math skills through the use of contextualized instruction and technology. (Prerequisite: valid scaled scores from CASAS pre- or post-tests lower than 190.)

ELA 012

English for Work (1-15)

Introduces beginning non-native speakers of English to career pathways in Business, Health, Academic Transfer and Industry. Students learn listening, speaking, reading, writing and math skills through the use of contextualized instruction and technology. (Prerequisite: valid scaled scores from CASAS pre- or post-tests lower than 190.)

ELA 013

English for Work (1-15)

Introduces beginning non-native speakers of English to career pathways in Business, Health, Academic Transfer and Industry. Students learn listening, speaking, reading, writing and math skills through the use of contextualized instruction and technology. (Prerequisite: valid scaled scores from CASAS pre- or post-tests lower than 190.)

ELA 014

ELA 044

English for Work (1-15)

Introduces beginning non-native speakers of English to career pathways in Business, Health, Academic Transfer and Industry. Students learn listening, speaking, reading, writing and math skills through the use of contextualized instruction and technology. (Prerequisite: valid scaled scores from CASAS pre- or post-tests between 211-220.)

ELA 070

Lang Comprehension 1 (1-9)

In this Level 1 Language Comprehension course, students will develop listening and reading comprehension skills needed to succeed in subsequent liberal arts and technical/occupational courses. Prerequisite: Official Language Test or valid CASAS score of 211-220.

ELA 071

Aural/Written Lang 1 (1-9)

In this Level 1 Aural/Written Language course, students will develop speaking, grammar, and composition skills needed to succeed in subsequent liberal arts and technical/occupational courses. Prerequisite: Official Language Test or CASAS score of 211-220.

ELA 072

Lang Comprehension 2 (1-9)

In this Level 2 Language Comprehension course, students will develop listening and reading comprehension skills needed to succeed in subsequent liberal arts and technical/occupational courses. Prerequisite: Official Language Test or valid CASAS score of 221-235.

ELA 081

Aural/Written Lang 2 (1-9)

In this Level 2 Aural/Written Language course, students will develop speaking, grammar, and composition skills needed to succeed in subsequent liberal arts and technical/occupational courses. Prerequisite: Official Language Test or CASAS score of 221-235.

Early Learning Program

ELP 080

Incredible Years

Parents learn how to help their babies and toddlers feel loved, safe and secure, and encourage language, social, and emotional development.

ELP 081

Learning and Playing

For parents and their children, birth - 48 months. This is

an interactive program where parents learn and play with their youngest children. Discussions focus on physical, social, emotional, cognitive, and language development of children.

ELP 082

Learn: Infants & Toddler

A class designed for developmentally delayed and typically developing children from birth - 36 months to learn and play together.

ELP 083

Incredible Years

Parents learn how to increase their child's school readiness and success in school by learning ways to help the child control their emotions, develop social skills, and learn problem solving.

ELP 084

Guiding Good Choices

Parents guiding young adolescents (ages 9-14) toward healthy lifestyles.

ELP 085

Level Up Parenting

The class helps parents understand stages of child development and how to use effective communication skills with their children.

ELP 086

Love & Logic

Through an educational video and lecture class, parents will have the opportunity to better understand the mental, social and emotional needs of children.

ELP 087

Parenting in Recovery

Parents in substance abuse recovery on the journey of rebuilding connections and bonds with their children.

ELP 088

Social Kids

Parents and children learn strategies for regulating behavior. Children and parents learn how to identify strategies and needs to support the child's growth and learning.

ELP 089

Strengthening Families

Parents or guardians learn about guiding young adolescents towards healthy lifestyles. The class is focused on children ages 10-14 and includes both the youth and parent or guardian participating in class activities.

ELP 090

Summer Spectrum

This class is designed to help strengthen, support and provide education specific to parents and caregivers of children on the Autism spectrum.

ELP 100

Parents as Teachers

Parents of children up to 3 years old and pregnant mothers, learn evidence-based parent modeling for early childhood development and improving parent practices.

ELP 101

Parent Ed. ECEAP

Parents with children enrolled in ECEAP programs, receive instruction to understand the physical, mental, social, and emotional needs of children. Activities and discussions, help parents develop strategies to help their children learn and grow.

ELP 102

Parent Ed. CLS

Parents with children enrolled in Children's Lab School, receive instruction to understand the physical, mental, social, and emotional needs of children. Activities and discussions, help parents develop strategies to help their children learn and grow.

ELP 103

Parent Ed. Coop Preschool

Parents with children enrolled in cooperative preschool program, receive instruction to understand the physical, mental, social, and emotional needs of children. Activities and discussions, help parents develop strategies to help their children learn and grow.

ELP 104

Coop Leadership

The class focuses on the strategy and practical application of the skills necessary to maximize the benefit to children and families in their role as a Cooperative Preschool Board Officer.

ELP 105

Parent Ed - Head Start

Parents with children enrolled in a Head Start program, learn how to provide learning experiences for their children ages 3-5 to grow intellectually, socially, and emotionally.

Environmental Science

ENVS 100

Survey of Environmental Science Lab (S) (1)

Field experience in environmental science. Visit local environments, both natural and human-dominated, ranging from old growth forests to floodplain restoration sites to recycling, forestry and organic farming operations. Includes two Saturday field trips.

ENVS& 100

Survey of Environmental Science (NS) (5)

An interdisciplinary course for both non-science majors and beginning science students. Topics include biodiversity, climate, pollution, energy, and food. Students cannot receive credit for both ENVS& 100 and ENVS& 101.

ENVS& 101

Intro to Environmental Science w/lab (NS) (5)

An interdisciplinary course for non-science majors and beginning science students. Topics include biodiversity, climate, pollution, energy and food. Independent laboratories and field trips included. Students cannot receive credit for both ENVS& 100 and ENVS& 101.

ENVS 120

Watersheds: Connecting Mountains to the Sea (NS) (5)

Investigate interconnections among geology, hydrology, biological diversity, ecology, human impacts and development along local rivers from headwaters to the ocean. General concepts presented in lectures are illustrated during day-long weekend field trips over rough terrain.

ENVS 121

Fire and Ice, Rain and Rocks-The Geology of (AE) (1)

Examine the geologic and hydrologic characteristics and history of a river from its headwaters to its delta-how earthquakes, faulting, folding, climate, glaciers, volcanism, and man have affected the river. Includes a day-long field trip over rough terrain.

ENVS 122

Plants, People, and Watershed Health (AE) (1)

Investigate the role of upland forests and riparian vegetation on the health of watersheds and people. During a day-long field trip over rough terrain, identify plant species, measure ecosystem characteristics, observe healthy and impacted sites, and investigate the compatibility of forestry, agriculture and watersheds.

ENVS 123

Let the Bugs Speak: Biological Communities (AE)

(1)

Investigate biological communities found in local streams and rivers, focusing on aquatic insects and aquatic vertebrates. Apply stream survey techniques to assess stream health. Includes a day-long field trip over rough terrain.

ENVS 124

Life in the Mud: Where the River Meets the (AE)

(1)

Estuaries, important and yet impacted ecosystems, are critical nursery habitats for many marine species, including endangered salmon and important overwintering habitat for migratory birds. Investigate the impacts of anthropogenic modification to the local estuaries and recent attempts at habitat restoration. Includes a day-long field trip over rough terrain.

ENVS 125

Life on the Edge: Surviving the Intertidal (AE) (1)

Investigate the flora and fauna living in the intertidal zones of sandy and rocky habitats in Puget Sound and the Straits of Juan de Fuca. Explore the physical and biological factors that regulate intertidal communities in the Pacific Northwest. Includes field trips over rough terrain.

ENVS 126

Our River's Keepers: Pollution & Remediation

(AE) (1)

Examines pollution within the Chehalis River watershed, including pollutant types, sources, impacts, environmental fates and methods of remediation. Asses water quality, examine potential sources of pollutants, and visit restoration/remediation projects. Includes a day-long field trip over rough terrain.

ENVS 127

Fishes & Rivers in Northwest: Intro to the 4 (AE)

(1)

Investigate fish communities found in local streams and rivers. Examine the impacts of habitat loss, hydropower and dams, hatcheries, and overharvesting on local fish populations. Includes a day-long trip over rough terrain.

ENVS 170

Natural Resources Mgmt (NS) (5)

What are Pacific Northwest forests, fishes and wildlife? Learn some common species, historical human uses, what policies drive their management, how to conserve them for future use, and how to plan for a career in the field.

ENVS 440

Environmental Issues (NS) (5)

An exploration of environmental issues and their effect on business, communities and consumers. Case studies are used to examine basic concepts of ecology and environmental science as they relate to permitting and other business decisions. Prerequisite: lower division natural science course.

French

FRCH& 121

French I (H) (5)

An introduction to the French language, including the major axes of reading, writing, listening, and speaking. While building competence in French language, students will also study francophone cultures from around the world, including but not limited to France.

FRCH& 122

French II (H) (5)

Second class in sequence. An introduction to the French language, including the major axes of reading, writing, listening, and speaking. While building competence in French language, students will also study francophone cultures from around the world, including but not limited to France. Prerequisite: FRCH& 121 or instructor permission.

FRCH& 123

French III (H) (5)

Third class in sequence. An introduction to the French language, including the major axes of reading, writing, listening, and speaking. While building competence in French language, students will also study francophone cultures from around the world, including but not limited to France. Prerequisite: FRCH& 122, or instructor permission

FRCH& 221

French IV (AE) (5)

Reviews and expands essential points of grammar. Students will develop reading skills, build their vocabulary, and increase their listening and speaking skills in a variety of topics. French is used almost exclusively in the classroom. Prerequisite: FRCH& 123 or permission of instructor.

FRCH& 222

French V (AE) (5)

Reviews and expands essential points of grammar. Students will develop reading skills, build their vocabulary, and increase their listening and speaking skills in a variety of topics. French is used almost exclusively in the

classroom. Prerequisite: FRCH& 221 or permission of instructor.

FRCH& 223

French VI (AE) (5)

Reviews and expands essential points of grammar. Students will develop reading skills, build their vocabulary, and increase their listening and speaking skills in a variety of topics. French is used almost exclusively in the classroom. Prerequisite: FRCH& 222 or permission of instructor.

Geography

GEOG& 200

Human Geography (D) (SS) (5)

Introduction to basic geographical concepts, with an emphasis on inter relationships of people and their physical and cultural environments. Course will satisfy requirements for elementary education majors and meet state-mandated Essential Academic Learning Requirements for geography.

GEOG 201

Introduction to Physical Geography (NS) (5)

Explore the characteristics of and relationships between Earth's natural system: lithosphere, hydrosphere, atmosphere, and biosphere. Introduction to landforms, climates, vegetation, soils, mineral and water resources, plate tectonics, and maps. Course work will include some college level writing and math.

Geology

GEOL& 101

Intro Physical Geology (NS) (5)

Introduces the study of the Earth, fundamental geologic principles, and physical processes acting within and upon the Earth, with an emphasis on mountains, volcanoes, earthquakes, and rock and mineral identification. Field trip(s) required. Includes lab.

GEOL 102

Earth Surface Processes (NS) (5)

Introduces the processes that shape Earth's landscape. Includes the study of mass wasting, river dynamics, groundwater sources, glacial land forms, deserts, and

coastal processes. One of more field trips may be required. Includes lab. Corequisite: MATH 098.

GEOL& 103

Historical Geology w/Lab (NS) (5)

Evolution of Earth and life as interpreted through the fossil and rock record. Includes fossils, relative and numerical-age dating, stratigraphic principles, global change, and the geologic history of the North American continent. Includes lab.

GEOL 106

Survey of Earth Sciences (NS) (5)

Study of Earth as a diverse system of interconnected processes. Explores topics in: geology, oceanography, atmospheric science, and astronomy with an emphasis on the interactions between humans and Earth. Includes lab.

GEOL 108

Natural Hazards and Catastrophes (NS) (5)

An examination of earth materials and processes through the study of earthquakes, volcanoes, landslides, floods, tsunamis, hurricanes, tornadoes, wildfires, and meteorite impacts. Examination of causes and effects on human populations and the environment; preparedness, prediction and forecasting; mitigation of risks, and case studies.

GEOL 180

Cascade and Plateau Geology (NS) (3)

Students will explore the geology of a selected area of interest, for example, Hawaii, Grand Canyon, Rocky Mountains, Cascades, Yellowstone, Tetons, Southwest Deserts, etc.

GEOL& 208

Geology of Pacific NW (NS) (5)

Examines the geology and geologic history of the Pacific Northwest and geologic processes important to its evolution. Topics include volcanoes, earthquakes, plate tectonics, rock and minerals, faults and folds, mountain building, landforms, glaciation, and surface processes.

GEOL 270

Research in Geology (AE) (1-12)

Design a research project, set up experiments, collect data in the lab or in the field, and/or analyze data. Each credit hour requires 33 hours of activity per quarter. Prerequisite: instructor permission.

German

GERM& 121

German I (H) (5)

A multimedia course that combines video, audio, and print. Emphasis is on communicative proficiency, self-expression and cultural insight. Resources include CDs, videos, and the World Wide Web.

GERM& 122

German II (H) (5)

A multimedia course that combines video, audio, and print. Emphasis is on communicative proficiency, self-expression and cultural insight. Resources include computer study modules, recorded tapes, videos, laser disks, and the World Wide Web. Prerequisite: GERM& 121 or permission of instructor.

GERM& 123

German III (H) (5)

A multimedia courses that combines video, audio, and print. Emphasis is on communicative proficiency, self-expression and cultural insight. Resources include CDs, videos, and the World Wide Web. Prerequisite: GERM& 122 or permission by the instructor.

GERM& 221

German IV (5)

Reviews and expands essential points of grammar. Students will develop reading skills, build their vocabulary, and increase their listening and speaking skills in a variety of topics. German is used almost exclusively in the classroom. Prerequisite: GERM& 123 or permission of instructor.

GERM& 222

German V (5)

Reviews and expands essential points of grammar. Students will develop reading skills, build their vocabulary, and increase their listening and speaking skills in a variety of topics. German is used almost exclusively in the classroom. Prerequisite: GERM& 221 or permission of instructor.

GERM& 223

German VI (5)

Reviews and expands the essential points of grammar. Students will develop reading skills, build their vocabulary, and increase their listening and speaking skills in a variety of topics. German is used almost exclusively in the classroom. Prerequisite: GERM& 222 or permission of instructor.

Health

HLTH 120

Women's Health Issues (D) (HF) (3)

An opportunity to examine current women's health and well-being issues

HLTH 125

Exploring Healthcare Professions (3)

An opportunity for investigating the many career opportunities in the health sciences.

HLTH 130

Health & Wellness (HF) (3)

An exploration of current personal health issues and a presentation of contemporary approaches to obtaining and maintaining a high level of wellness.

HLTH 135

Healthy Weight Control (HF) (2)

An introduction to healthy eating that focuses on a balance of foods, including a variety of lifestyle change strategies that will enhance the maintenance of a healthy weight.

HLTH 140

Exercise & Nutrition (HF) (3)

The two core components of a healthy lifestyle--a healthy diet and a safe exercise program--will be explored and developed. Students will be expected to exercise on their own.

HLTH 141

Global Health Issues (D) (HF) (3)

Introduction to global health issues, with a current events focus. Explore factors impacting the health of people around the world, including biological, socio-economic and environmental factors. Examine issues of water, disease, nutrition, and maternal-child health.

HLTH 143

Stress Management (HF) (2)

Understand how stress can impact quality of life. Learn methods for identifying stressors and strategies to effectively manage them. Construct a personalized stress management program.

HLTH 144

Technology Health/Fitness (HF) (2)

Explore current uses of technology for adherence, motivation and monitoring of health and fitness behaviors. Areas covered will be digital coaching, fitness monitors and trackers, downloadable applications and peer to peer or social apps.

HLTH 145

Safety and Fitness (HF) (3)

The course emphasizes the importance of safety, first aid, and exercise as they relate to an individual's level of health and fitness. The course includes the American Heart Association Heartsaver First Aid/CPR and AED certification.

HLTH 154

Community First Aid and CPR (1)

Basic First Aid/CPR/AED class covering critical skills needed to respond to and manage first aid, choking or sudden cardiac arrest emergencies in the first few minutes until emergency medical services (EMS) arrives.

HLTH 159

Anatomy & Terminology for EMT's (1)

Provide EMT students with a basic understanding of basic anatomy, functions of the human body, and medical terminology. Topics include: anatomic definitions, initial medical terminology, skeletal system, circulatory system, respiratory system, and the nervous system.

High School Equivalent

HSE 001

Portfolio & English L5 (1-10)

SBCTC High School 21 Degree class demonstrating English competency through student self-evaluation of prior education, previous and current employment, and life experiences -in fulfillment of one's high school degree competencies or GED. Prerequisite: CASAS score 236-245.

HSE 002

CWP, Env Sci, English L5 (1-10)

SBCTC High School 21 Degree integrated reading writing class demonstrating English competency through the study of CWP's and Environmental Science -in fulfillment of one's high school degree competencies or GED. Prerequisite: CASAS score 236-245.

HSE 003

Life Science & ENGL L5 (1-10)

SBCTC High School 21 degree integrated reading writing class demonstrating English competency through the study of Life Science and scientific thinking--in fulfillment of one's high school degree competencies or GED. Prerequisite: CASAS score 236-245.

HSE 004

Occ Ed & ENGL L5 (1-10)

SBCTC High School 21 degree integrated reading writing class demonstrating English competency through studying communication, occupational skills and work

opportunities-in fulfillment of one's high school degree competencies or GED. CASAS score 236-245.

HSE 005

US Hist, GOV, FA, ENGL L5 (1-10)

SBCTC High School 21 degree integrated reading writing class demonstrating English competency through the study of US History, Government and Fine Arts-- fulfillment of one's high school degree competencies or GED. Prerequisite: CASAS score 236-245.

HSE 006

WA State Hist, Engl L5 (1-10)

SBCTC High School 21 degree integrated reading writing class demonstrating English competency through the study of Washington State History--in fulfillment of one's high school degree competencies or GED. Prerequisite: CASAS score 236-245.

HSE 007

Health, Fitness and English L5 (1-10)

SBCTC High School 21 degree class introducing emotional, physical, and mental components of health to develop an individual health and fitness program--in fulfillment of one's high school degree competencies or GED. Prerequisite: CASAS score 236-245.

HSE 008

Algebra 1 - L5 (1-5)

SBCTC High School 21 degree for Algebra 1--fulfillment of one's high school degree competencies or GED. Prerequisite: CASAS score 236-245.

HSE 009

Algebra 2 - L5 (1-5)

SBCTC High School 21 degree for Algebra 2--fulfillment of one's high school degree competencies or GED. Prerequisite: CASAS score 236-245.

HSE 010

Geometry - L5 (1-5)

SBCTC High School 21 degree for Geometry--in fulfillment of one's high school degree competencies or GED. Prerequisite: CASAS score 236-245.

HSE 011

Portfolio & English L6 (1-10)

SBCTC High School 21 degree class demonstrating English competency through student self-evaluation of prior education, previous and current employment, and life experiences -in fulfillment of one's high school degree competencies or GED. Prerequisite: CASAS score 246- or higher (ASE 2).

HSE 012

CWP, Env Sci, English L6 (1-10)

SBCTC High school 21 degree integrated reading writing class demonstrating English competency through the study of CWP's and Environmental Science -in fulfillment of one's high school degree competencies or GED. Prerequisite: CASAS score 246 or higher.

HSE 013

Life Science & Engl L6 (1-10)

SBCTC High School 21 degree integrated reading writing class demonstrating English competency through the study of Life Science and scientific thinking--in fulfillment of one's high school degree competencies or GED. Prerequisite: CASAS score 246 or higher (ASE 2).

HSE 014

Occ Ed & ENGL L6 (1-10)

SBCTC High School 21 degree integrated reading writing class demonstrating English competency through studying communication, occupational skills and work opportunities-in fulfillment of one's high school degree competencies or GED. Prerequisite: CASAS score 246 or higher (ASE 2).

HSE 015

US Hist, GOV, FA, ENGL L6 (1-10)

SBCTC High School 21 degree integrated reading writing class demonstrating English competency through the study of US History, Government and Fine Arts-in fulfillment of one's high school degree competencies or GED. Prerequisite: CASAS score 246 or higher.

HSE 016

WA State Hist, English L6 (1-10)

SBCTC High School 21 degree integrated reading writing class demonstrating English competency through the study of Washington State History-in fulfillment of one's high school degree competencies or GED. Prerequisite: CASAS score 246 or higher.

HSE 017

Health, Fitness, English L6 (1-10)

SBCTC High School 21 degree class introducing emotional, physical, and mental components of health to develop an individual health and fitness program-in fulfillment of one's high school degree competencies or GED. Prerequisite: CASAS score 246 or higher.

HSE 018

Algebra 1 - L6 (1-5)

SBCTC High School 21 degree for Algebra 1-in fulfillment of one's high school degree competencies or GED.

Prerequisite: CASAS score 246 or higher (ASE 2).

HSE 019

Algebra 2 - L6 (1-5)

SBCTC High School 21 degree for Algebra 2-in fulfillment of one's high school degree competencies or GED. Prerequisite: CASAS score 246 or higher (ASE 2).

HSE 020

Geometry - L6 (1-5)

SBCTC High School 21 degree for Geometry-in fulfillment of one's high school degree competencies or GED. Prerequisite: CASAS score 246 or higher (ASE 2).

HSE 052

L5-WA Hist/Fine Arts/Sci (1-15)

Integration of language arts and thinking skills through exploration of Washington State: civics, economics, art, literature, music, history, industry, geography, settlement, and migration. Will also examine unique technological and innovational advancements within the state. Prerequisite: CASAS score: 236-245.

HSE 054

L5-US Hist/Fine Arts/Sci (1-15)

Integration of language arts and thinking skills through exploration of United States history: civics, economics, art, literature, music, history, industry, geography, settlement, and migration. Will also examine unique technological and innovational advancements within America. Prerequisite: CASAS score: 236-245.

HSE 055

L5-CWP/Fine Arts/Science (1-15)

Integration of language arts and thinking skills through exploration of contemporary world problems; politics, economics, art, literature, music, history, industry, geography, colonization, re-settlement, and migration. Will also examine technological, environmental, and innovational issues. Prerequisite: CASAS score: 236-245.

HSE 062

L6-WA Hist/Fine Arts/Sci (1-15)

Integration of language arts and thinking skills through exploration of Washington State: civics, economics, art, literature, music, history, industry, geography, settlement, and migration. Will also examine unique technological and innovational advancements within the state. Prerequisite: CASAS score: 246-255.

HSE 064

L6-US Hist/Fine Arts/Sci (1-15)

Integration of language arts and thinking skills through exploration of United States history: civics, economics, art,

literature, music, hi, industry, geography, settlement, and migration. Will also examine unique technological and innovational advancements within America. Prerequisite: CASAS score: 246-255.

HSE 065

L6-CWP/Fine Arts/Science (1-15)

Integration of language arts and thinking skills through exploration of contemporary world problems; politics, economics, art, literature, music, history, industry, geography, colonization, re-settlement, and migration. Will also examine technological, environmental, and innovational issues. Prerequisite: CASAS score: 246-255

History

HIST 110

History of Intolerance (SS) (D) (3)

An examination and analysis, through reading and film, of intolerance in America's history. Particular attention will be paid to historical events which demonstrate intolerance based on: religion, ethnicity, race, gender, sexual orientation and age.

HIST& 116

Western Civilization I (SS) (5)

Analysis of the development of major political, economic, social and cultural characteristics of Antiquity and Medieval Europe.

HIST& 117

Western Civilization II (SS) (5)

Analysis of the modern state with emphasis on the Renaissance, the Reformation, Absolutism, Scientific and Political Revolutions.

HIST& 118

Western Civilization III (SS) (5)

Analysis of the late 19th and 20th centuries with special attention paid to the development of political, social and economic trends and events.

HIST& 126

World Civilization I (SS) (D) (5)

Focuses on the origins, development, and features of societies in the ancient and classical world. This course examines the political, social, and cultural contours of societies and the interactions and relationships among different historical cultures.

HIST& 127

World Civilization II (SS) (D) (5)

Examines the progression of world history in pre-modern

and early modern period. Topics include the development of mercantile capitalism, the Columbian exchange, revolutions in science, philosophy and politics, and the impact of colonialism and slavery.

HIST& 128

World Civilization III (SS) (D) (5)

Examines the issues of modern world history including role of warfare, empire, diplomacy, and revolution in shaping international events and interactions taking place when cultural values, ideas, and technologies of multiple societies interact over time.

HIST& 146

US History I (SS) (5)

Analysis of American history from the pre-invasion to the Antebellum Era. Emphasis will be on the political, social, and economic changes.

HIST& 147

US History II (SS) (5)

Analysis of American history from Antebellum Era to the Progressive Era. Emphasis will be on the political, social, and economic changes.

HIST& 148

US History III (SS) (5)

Analysis of American history from World War One to the present. Emphasis will be on the political, social, and economic changes.

HIST 210

Introduction to Pacific Asian History (SS) (D) (5)

Description and analysis of emergence of modern nations of Pacific Asia. Gain understanding of historical and geographical context of the political and economic development of the region.

HIST& 214

Pacific NW History (SS) (5)

Study of the early exploration and settlement of the Pacific Northwest. Emphasis will be on the economic, political and social developments. The course is designed to meet state certification requirements for teachers.

HIST& 215

Women in U.S. History (SS) (5)

Exploration of female experiences in the 18th, 19th, 20th and 21st centuries by looking at class, race and ethnicity and study women in the context of the major historical developments in their time.

HIST& 220

African American History (SS) (D) (5)

Examines the history of the continent from the pre-colonial era to the present. Topics include pre-colonial lineage, patterns of ethnic identity, colonialism and tribal identity, urbanization and its impact, and apartheid.

HIST 275

America in Vietnam (AE) (5)

Overview of the Vietnam Conflict, including the Vietnamese culture, and history; U.S. foreign policy; roots of the war; effects on world politics media conduct during and after the war; and impacts on American society.

HIST 280

History of American Foreign Relations (SS) (5)

Survey of American foreign relations from the 17th to the 21st centuries focusing on such issues as national security, economic needs, capitalism democracy and imperialism.

Honors Project

HON 160

Honors Project (3)

Honors students will work with one faculty mentor to develop, complete, and publicly present a three-credit project or paper that requires original research and development. It is expected that the project will involve 60 to 90 hours of work, including initial and progress meetings with the faculty mentor.

HON 170

Honors Project (3)

Honors students will work with one faculty mentor to develop, complete, and publicly present a three-credit project or paper that requires original research and development. It is expected that the project will involve 60 to 90 hours of work, including initial and progress meetings with the faculty mentor.

HON 250

Honors Colloquium (5)

Honors students will explore the annual Phi Theta Kappa (International Honors society of the Two-Year College). Honors Study Topic in a colloquium setting, using texts, films, Internet, and other resources.

Horticulture

HORT 101

Horticulture Science (3)

Overview of horticulture, landscape and botany. Classroom and lab. Prerequisite: GED.

HORT 102

Plant Pest Management (4)

Students learn to detect, identify, and control weeds and diseases. Classroom and lab. Prerequisite: HORT 101.

HORT 103

Plant Propagation (3)

Students learn multiple methods of reproducing plants primarily in a greenhouse setting.

HORT 104

Pruning Practices (4)

Landscape development and maintenance. Focus on power equipment. Classroom and lab.

HORT 105

Landscape Equipment (3)

Landscape development and maintenance. Focus on power equipment. Classroom and lab.

HORT 106

Landscape Management (3)

Students will learn tree and lawn care, primarily using hand tools. Classroom and lab.

Human Relations

H R 101

Human Relations 101 (2)

Students learn and put into practice concepts related to college success. Topics include exploration of self, learning styles, academic strategies, degree and certificate planning, campus and online resources, effective communication, Financial Aid, and campus involvement. (Formerly SDEV 150)

H R 103

Career Planning (2)

Students identify interests, skills, personality, and values to evaluate their career goals. Possible activities could include: interest inventory, personality assessment, resume writing, mock interview, informational interviews, and online career research. (Formerly SDEV 105)

H R 110

Human Relations-Workplace (5)

Study of behavior, personality, self-management, self-development, and elementary business psychology in the workplace. Focus on understanding and demonstrating skills imperative to workplace success including communications, personal attitude, motivation, and workplace etiquette.

Humanities

HUM 110

Ethics and Cultural Values (H) (D) (5)

An interdisciplinary study of philosophy, literature, history and religion within Western and Oriental ethical systems of thought. It focuses on the importance of cultural values through a study of virtue, duty, utility, and rights.

HUM& 116

Humanities I (H) (5)

A survey of the major movements in art, architecture, music, philosophy and literature in a historical context, from pre-history to 1400 C.E.

HUM& 117

Humanities II (H) (5)

A survey of the major movements in art, architecture, music, philosophy, and literature in a historical context, from 1300 C.E. to 1800 C.E.

HUM& 118

Humanities III (H) (5)

A survey of the major movements in art, architecture, music, philosophy, and literature in a historical context, from 1800 C.E. to the present.

HUM 270

Survey of Film Studies (H) (5)

An examination of the social, historical, technical, and artistic aspects of film through viewing, study and discussion of notable motion pictures.

HUM 281, 282, 283, 284, 285, 286

Lyceum I-VI (AE) (1)

The Lyceum offers a variety of lectures on topics of current interest across a wide variety of disciplines. The theme may vary from quarter to quarter.

HUM 315

Ethics (H) (5)

Foundation course in ethics as applied to businesses and organizations related to management issues. Students will explore theoretical concepts in business ethics and apply them to real-world situations based on challenges managers face.

Individualized Certificate Program

ICP 101

Individualized Certificate Program Seminar (1)

Primary focus on the workplace environment. Emphasis on topics including: finding employment; job performance and advancement; customer relations, co-worker, bosses, workplace ethics; team work; and entrepreneurship. Provides practical information for immediate and future use.

ICP 201

Individualized Certificate Program (1-12)

A series of continuing, on-the-job training experiences. A minimum of 12 credits is required for each program. Students work in businesses, agencies, organization, or at the college, gaining employment experience in applicable field. Co-requisite: ICP 101.

Information Technology

CS& 131

Computer Science I C++ (5)

Intended as an introduction to programming. Emphasis is on the features of the "C" programming language with an introduction to C++ object oriented programming and good programming style.

CS& 141

Computer Science I Java (5)

A study of rapid application development (RAD) JAVA. Development of GUIs using Swing Technology. Object Oriented Programming as it is implemented in JAVA. Introduction to graphics, animation, and multi-threading. Prerequisite: MATH 099 or equivalent.

I T 101

Intro to Programming (5)

This course provides an introduction to programming using Microsoft Visual Studio. Course focus is on building basic graphical applications using the Python programming language.

I T 110

Learning and Working Virtually (5)

This class is an introduction on how to learn and work effectively in a remote, virtual environment. Students will gain hands-on experience participating in and hosting remote group projects.

I T 117

Intro to Windows OS (3)

An introduction to Windows Operating System. Course will cover such things as the taskbar, Start menu, recycle bin, windows views, Window Explorer, storage devices, printing, saving, control panels, etc.

I T 119

Web Scripting 1 (5)

Designed for new web designers who want to develop, modify and design standards compliant web pages and sites using the HTML and CSS Languages. Students will be publishing their work on a web server.

IT 121

Web Scripting 2 (4)

A second course in Web Development. Focus is on modern, responsive, and accessible web design using the latest web specifications. Students will be publishing their work on a web server. Prerequisite: IT 119 or CST 119.

IT 123

PC Operating Systems (5)

This course is based on the CompTIA A+ certification materials. Material covered includes operating system basics, operating system administration, security, network services, cloud computing, virtualization and troubleshooting theory.

IT 124

Computer Hardware (5)

This course is based on the CompTIA A+ certification materials. Material covered includes typical desktop computer components, storage devices, peripherals, expansion cards, display devices, custom configurations, computer networking. Prerequisite: IT 123 or IT 125.

IT 125

Linux Operating Systems (5)

This course is based on the CompTIA Linux + certification materials. Material covered includes Linux operating system basics, operating system administration, security, network configuration, virtualization and troubleshooting theory.

IT 130

IT Apps Internship (2)

Students will get hands on, full life cycle software development experience working on projects for the department and college. Projects will include web and database application design, development, maintenance and support. Prerequisite: IT 101 and IT 119 or CST 101 and CST 119.

IT 140

IT Support Internship (2)

This course is designed to provide students with an introduction to and experience in Help Desk operations. Students will learn the fundamentals of Tier 1 call taking and customer service. Prerequisite: IT 123 and IT 124 or CNT 123 and CNT 124.

IT 144

Microsoft Office for IT (5)

This course provides an introduction to Microsoft Office from the perspective of a support technician. Coverage includes installation, configuration, formatting, document structure, templates, forms, security and troubleshooting. Prerequisite: IT 123 and IT 124 or CNT 123 and CNT 124.

IT 150

Relational Databases (5)

Students learn the tools and processes for data modeling in Relational Database Management Systems. Topics include Structured Query Language (SQL), functional dependencies, normalization, database design methodologies and entity relationship modeling.

IT 201

Network Technology 1 (5)

This is the first course based on CompTIA Network+ certification materials. Material covered includes fundamental concepts, implementation and terminology relating to LANs, WANs, Internet-working, VLANs, Routing Basics and Wireless Networking. Prerequisite: MATH 098.

IT 202

Advanced Networking (5)

This second networking course is based on CompTIA Network+ certification materials. Material covered includes advanced concepts, implementation and terminology relating to LANs, WANs, VLANs, Routing and Wireless Networking. Prerequisite: IT 201.

IT 203

Network Security (5)

Course concentrates on materials commonly associated with Security+ certification. Coverage includes risk identification, intrusion detection, encrypted communication, firewalls and basic forensics. Prerequisite: IT 201 and IT 202 or CNT 201, 202.

IT 205

PHP/SQL (4)

An introduction to web application development using PHP and SQL. Coverage includes an introduction into server side programming using PHP, SQL database design, querying, and use from PHP. Prerequisite: IT 121 or CST 121.

IT 218

Server OS 1 (5)

This is a first course on server installation, configuration and management. Coverage includes Active Directory

fundamentals, DHCP, DNS, and the basics of setting up and managing a web server. Prerequisite: IT 123.

IT 219

Server OS 2 (4)

This is the second course on server installation, configuration and management. Coverage includes server content management systems, PHP, Microsoft Exchange and Office 365. Prerequisite: IT 218 or CNT 218.

IT 220

Server OS 3 (5)

This is the third course on server installation, configuration and management. Coverage includes MS SQL, Lync, Hyper-V and an introduction to cloud computing. Prerequisite: IT 219 or CNT 219.

IT 224

JAVA 1 (5)

Introduction to Java programming. Concepts including procedural programming (methods, parameters, and primitive variables), control structures and logic (if/else, for and while loops), arrays, and an introduction to object oriented programming. Prior computer knowledge recommended.

IT 228

JAVA 2 (5)

Second course in the introduction to JAVA programming sequence. These topics include: abstract data structures, lists, stacks, queues, linked lists, maps, recursion, interfaces, encapsulation, serialization, file access, sorting and computational complexity. Prerequisite: IT 224 or CST 224.

IT 230

JAVA 3 (5)

Third and final course in the introduction to Java programming sequence. This course covers recursion, exception handling and recovery, remote file access, event driven programming, binary search trees, and priority queues. Prerequisite: IT 224 and IT 228 or CST 224 and CST 228.

IT 235

CISCO Networking (5)

Utilizing CISCO equipment and operating systems, students will gain the ability to install, operate and troubleshoot network environments. This course is based upon the skills needed to achieve a CISCO Certified Entry Networking Technician certification. Prerequisite: IT 201 and IT 202.

IT 240

Mobile Device OS (3)

This is an introductory course on mobile device operating system use and management. Course will include coverage of operating systems for currently popular devices such as Android Tablets and iPads. Prerequisite: IT 123 or CNT 123.

IT 245

Object-Oriented Programming (4)

An intermediate level course in object-oriented programming. Course covers creating classes from requirement documents, modeling using diagrams, object-relationship analysis, object reuse and good software design. Experience with one or more computer programming languages recommended.

IT 250

Discrete Structures (4)

A programming-based course in discrete structures. Logic, set theory, counting, algorithmic efficiency, graphs and trees are presented. This course uses programming algorithms to demonstrate and explore the discrete math topics commonly used in computer programming.

IT 255

Design Patterns (4)

This course builds upon object-oriented design methodologies and introduces the concept of design patterns to solve software problems. The well-known "Gang of Four (GOF)" patterns are explored.

IT 260

Advanced Web Development (5)

Students will learn to develop applications that use three-tier architecture, allowing for rich client side user interfaces, sophisticated functionality, and advanced database interactions. This course builds on previous experience in web development.

IT 265

Mobile Applications (5)

Students will learn how to design and implement software in a mobile environment, using the device's sensors, distribution models, location awareness, and other interactive elements present in the mobile device.

IT 270

Dreamweaver (4)

Learn the Adobe Dreamweaver CC software from several perspectives, including tool usage, and use as a development environment for web and mobile

applications.

I T 275

CSS Frameworks & Grids (4)

This course leads to the mastery of HTML and CSS in comprehensive and responsive design. Creation of grids, Syntactically Awesome Style Sheets (SASS) and responsive frameworks are covered.

I T 280

Advanced CSS & HTML (4)

This course expands beyond the current World Wide Web Consortium (W3C) standards of HTML and CSS into future territories. The course explores the latest in HTML and CSS and compares them with today's techniques.

I T 285

WordPress Skinning (5)

WordPress is among the most popular content management systems/bloggings systems in the world. Students learn how to "skin" a WordPress Site, providing the functionality of WordPress, but with the look and feel a customer wants.

I T 301

App Dev Fundamentals (5)

This class focuses on object-oriented programming techniques using classes, polymorphism, inheritance, abstraction and interfaces. Application design will be emphasized. Additional topics include UML diagramming, architectural frameworks such as MVC. Prior basic understanding of OOP recommended. Course Requisite: admittance into BAS program or administrator approval.

I T 310

Adv Web Applications (5)

An advanced course in web development. This course covers the full web development stack including client side (HTML, CSS, JavaScript), server side (ASP.NET), database layer (MSSQL), using frameworks (MVC). Prerequisite: BAS-IT: AD admission or approval.

I T 320

Development Methodologies (5)

Students are introduced to formal software engineering methodologies. Various well known methodologies are covered through examination of case studies and in project work. Team development practices are emphasized. Prerequisite: BAS-IT: AD admission or approval.

I T 330

Software Engineering I (5)

An introduction course in software engineering. Software modeling using Unified markup language (UML) diagramming, systems (business) analysis, requirements gathering, analysis, and design are the focus of this course.

I T 340

Software Engineering II (5)

A second course in Application/Software Engineering. Introduces test-driven development. Coding exercises include building unit tests and application code based on the requirements documentation of a project. Prerequisite: BAS-IT: AD admission or approval.

I T 350

Advanced Database Design (5)

Class will focus on data models, entities, normalization/denormalization, SQL, stored procedures, and general design. MS SQL Server is used for the class. Includes survey of other modern database systems such as NOSQL and Postgres. Course Requisite: Admittance into BAS program or Administrator approval.

I T 410

Adv. Data Access Technique (5)

This course examines utilization of advanced database systems such as NOSQL systems, dimensional cubes and hypercubes (OLAP), ODBC connections, and relational database systems for data analysis and development of data driven applications. Prerequisite: IT 350 or permission of instructor.

I T 420

Business Intelligence App (5)

Students gain practical experience and skills to develop business intelligence solutions. Students will create reports, dashboards, setup and perform statistical analysis, data mining, and classification/clustering of data using both programming and tools. Prerequisite: BAS-IT: AD admittance or permission of the instructor.

I T 430

Info Security for Developers (5)

Students will examine information system security. Students will develop protocols and controls to harden information systems, and learn how vulnerabilities in information systems can be exploited using common, easy to access tools and techniques. Prerequisite: BAS-IT: AD admittance or permission of the instructor.

I T 440

Internship I (5)

Students enrolled in this internship will have opportunities

to serve on a software development team in some capacity, gaining practical experience in the software development life cycle, stakeholder communication, collaboration, and software development. Prerequisites: IT 310, IT 330, IT 340.

I T 450

Internship 2 (5)

Students enrolled in this internship will have opportunities to serve on a software development team in some capacity, gaining practical experience in the software development life cycle, stakeholder communication, collaboration, and software development. Prerequisite: BAS-IT: AD admittance or permission of the instructor.

I T 460

BAS-IT: AD Capstone (5)

Students will deliver a working software project, and all associated documentation to demonstrate mastery of the software development life cycle, and of modern software development methodologies. Prerequisite: BAS-IT: AD admittance or permission of the instructor

Integrated English

IEL 015

IELC Integrated Lab (1-5)

Technology lab for IELCivics. Students learn how to use computers as a tool to improve listening, speaking, reading, writing and math skills. Prerequisite: valid scaled scores from CASAS pre- or post-tests lower than 190.

IEL 016

IELC Integrated Lab (1-5)

Technology lab for IELCivics. Students learn how to use computers as a tool to improve listening, speaking, reading, writing and math skills. Prerequisite: valid scaled scores from CASAS pre- or post-tests lower than 190.

IEL 017

IELC Integrated Lab (1-5)

Technology lab for IELCivics. Students learn how to use computers as a tool to improve listening, speaking, reading, writing and math skills. Prerequisite: valid scaled scores from CASAS pre- or post-tests lower than 190.

IEL 018

IELC Integrated Lab (1-5)

Technology lab for IELCivics. Students learn how to use computers as a tool to improve listening, speaking, reading, writing and math skills. Prerequisite: valid scaled scores from CASAS pre- or post-tests lower than 190.

IEL 025

IELC Integrated Lab (1-5)

Technology lab for IELCivics. Students learn how to use computers as a tool to improve listening, speaking, reading, writing and math skills. Prerequisite: valid scaled scores from CASAS pre- or post-tests between 191 and 200.

IEL 026

IELC Integrated Lab (1-5)

Technology lab for IELCivics. Students learn how to use computers as a tool to improve listening, speaking, reading, writing and math skills. Prerequisite: valid scaled scores from CASAS pre- or post-tests between 191 and 200.

IEL 027

IELC Integrated Lab (1-5)

Technology lab for IELCivics. Students learn how to use computers as a tool to improve listening, speaking, reading, writing and math skills. Prerequisite: valid scaled scores from CASAS pre- or post-tests between 191 and 200.

IEL 028

IELC Integrated Lab (1-5)

Technology lab for IELCivics. Students learn how to use computers as a tool to improve listening, speaking, reading, writing and math skills. Prerequisite: valid scaled scores from CASAS pre- or post-tests between 191 and 200.

IEL 035

IELC Integrated Lab (1-5)

Technology lab for IELCivics. Students learn how to use computers as a tool to improve listening, speaking, reading, writing and math skills. Prerequisite: valid scaled scores from CASAS pre- or post-tests between 201 and 210.

IEL 036

IELC Integrated Lab (1-5)

Technology lab for IELCivics. Students learn how to use computers as a tool to improve listening, speaking, reading, writing and math skills. Prerequisite: valid scaled scores from CASAS pre- or post-tests between 201 and 210.

IEL 037

IELC Integrated Lab (1-5)

Technology lab for IELCivics. Students learn how to use computers as a tool to improve listening, speaking, reading, writing and math skills. Prerequisite: valid scaled

scores from CASAS pre- or post-tests between 201 and 210.

IEL 038

IELC Integrated Lab (1-5)

Technology lab for IELCivics. Students learn how to use computers as a tool to improve listening, speaking, reading, writing and math skills. Prerequisite: valid scaled scores from CASAS pre- or post-tests between 201 and 210.

IEL 045

IELC Integrated Lab (1-5)

Technology lab for IELCivics. Students learn how to use computers as a tool to improve listening, speaking, reading, writing and math skills. Prerequisite: valid scaled scores from CASAS pre- or post-tests between 211 and 220.

IEL 046

IELC Integrated Lab (1-5)

Technology lab for IELCivics. Students learn how to use computers as a tool to improve listening, speaking, reading, writing and math skills. Prerequisite: valid scaled scores from CASAS pre- or post-tests between 211 and 220.

IEL 047

IELC Integrated Lab (1-5)

Technology lab for IELCivics. Students learn how to use computers as a tool to improve listening, speaking, reading, writing and math skills. Prerequisite: valid scaled scores from CASAS pre- or post-tests between 211 and 220.

IEL 048

IELC Integrated Lab (1-5)

Technology lab for IELCivics. Students learn how to use computers as a tool to improve listening, speaking, reading, writing and math skills. Prerequisite: valid scaled scores from CASAS pre- or post-tests between 211 and 220.

IEL 052

Office Management 1 (EL5) (1-10)

Low-intermediate non-native English speakers improve English language, math, and technology skills through integrated instruction in Office Management. Prerequisite: valid CASAS scores between 211 and 220.

IEL 053

Office Management 1 (EL5) (1-10)

Low-intermediate non-native English speakers improve English language, math, and technology skills through

integrated instruction in Office Management. Prerequisite: valid CASAS scores between 211 and 220.

IEL 054

Office Management 1 (EL5) (1-10)

Low-intermediate non-native English speakers improve English language, math, and technology skills through integrated instruction in Office Management. Prerequisite: valid CASAS scores between 211 and 220.

IEL 062

Office Management 1 (EL6) (1-10)

Low-advanced non-native speakers improve English language, math, and technology skills through integrated instruction in Office Management. Prerequisite: valid CASAS scores between 221 and 235.

IEL 063

Office Management 1 (EL6) (1-10)

Low-advanced non-native speakers improve English language, math, and technology skills through integrated instruction in Office Management. Prerequisite: valid CASAS score between 221 and 235.

IEL 064

Office Management 1 (EL6) (1-10)

Low-advanced non-native speakers improve English language, math, and technology skills through integrated instruction in Office Management. Prerequisite: valid CASAS scores between 221 and 235.

IEL 072

Office Management 1 (L5) (10)

Transitional education students improve English language, math, and technology skills through integrated instruction in Office Management. Prerequisite: valid CASAS scores between 236-245.

IEL 073

Office Management 1 (L5) (1-10)

Transitional education students improve English language, math, and technology skills through integrated instruction in Office Management. Prerequisite: valid CASAS scores between 236 and 245.

IEL 074

Office Management 1 (L5) (1-10)

Transitional education students improve English language, math, and technology skills through integrated instruction in Office Management. Prerequisite: valid CASAS scores between 236 and 245.

Intensive English Program

IEP 070

Comprehension Language 1 (1-9)

In this Level 1 Comprehension Language Skills course, Students will develop listening and reading comprehension skills needed to succeed in subsequent liberal arts and technical/occupational courses. Prerequisite: Official Language Test score or Accuplacer score.

IEP 071

Communicative Language 1 (9)

In this Level 1 Comm Language course, students will develop speaking, grammar, and composition skills needed to succeed in subsequent liberal arts and technical/occupational courses. Prerequisite: Official Language Test score or Accuplacer score.

IEP 072

Comprehensive Language 2 (1-9)

Language skills course, students will develop listening and reading comprehension skills needed to succeed in subsequent liberal arts and technical/occupational courses. Prerequisite: Official Language Test score or Accuplacer score.

IEP 073

Communicative Language 2 (9)

In this Level 2 Comm Language course, students will develop speaking, grammar, and composition skills needed to succeed in subsequent liberal arts and technical/occupational courses. Prerequisite: Official Language Test score or Accuplacer score.

IEP 074

Comprehension Language 3 (1-9)

In this Level 3 Comprehension Language Skills course, students will develop listening and reading comprehension skills needed to succeed in subsequent liberal arts and technical/occupational courses. Prerequisite: Official Language Test score or Accuplacer score.

IEP 075

Communicative Language 3 (9)

In this Level 3 Comm Language course, students will develop speaking, grammar, and composition skills needed to succeed in subsequent liberal arts and technical/occupational courses. Prerequisite: Official Language Test score or Accuplacer score.

IEP 076

Comprehension Language 4 (1-9)

In this Level 4 Comprehension Language Skills course, students will develop listening and reading comprehension skills needed to succeed in subsequent liberal arts and technical/occupational courses.

IEP 077

Communicative Language 4 (9)

In this Level 4 Comm Language course, students will develop speaking, grammar, and composition skills needed to succeed in subsequent liberal arts and technical/occupational courses. Prerequisite: Official Language Test score or Accuplacer score.

Journalism

JOUR 106

Introduction to News Writing I (H) (5)

Learn the difference between news writing and other types of writing. Practice writing a variety of kinds of news articles.

JOUR 107

Introduction to News Writing II (H) (3)

Start, develop and polish hard news and soft news stories. Practice gathering information from a variety of sources. Prerequisite: JOUR 106.

JOUR 111

Newspaper Staff I (1-5)

Help produce the college's online student newspaper. Editors, reporters, photographers, videographers, page designers, and advertising sales people needed. Prerequisite: JOUR 106.

JOUR 112

Newspaper Staff II (1-5)

Help produce the college's online student newspaper. Editors, reporters, photographers, videographers, page designers, and advertising sales people needed. Prerequisite: JOUR 106, 111.

JOUR 113

Newspaper Staff III (1-5)

Help produce the college's online student newspaper. Editors, reporters, photographers, videographers, page designers, and advertising sales people needed. Prerequisite: JOUR 106, 111, 112.

JOUR 180

Issues in Mass Media (AE) (2)

Discuss and interpret issues as they relate to the media. Learn to evaluate media messages critically.

JOUR 206

News Reporting and Writing (5)

Write a variety of in-depth and extended coverage news articles concentrating on enterprise and package projects. Practice writing editorials, columns and reviews. Learn the basics of broadcast and public relations writing. Prerequisite: JOUR 106, 107, 111, ENGL 101.

JOUR 208

Copy Editing and Newspaper Design (5)

Learn newspaper copy editing and page design. Edit copy for the student newspaper. Design and layout pages of the student newspaper. Prerequisite: ENGL 101, JOUR 106, 107, 111, 206.

JOUR 211

Newspaper Staff IV (1-5)

Help produce the college's online student newspaper. Editor, reporters, photographers, videographers, page designers, and advertising sales people needed. Prerequisite: JOUR 106, 111, 112, 113.

JOUR 212

Newspaper Staff V (1-5)

Help produce the college's online student newspaper. Editors, reporters, photographers, videographers, page designers, and advertising sales people needed. Prerequisite: JOUR 106, 111, 112, 113, 211.

JOUR 213

Newspaper Staff VI (1-5)

Help produce the college's online student newspaper. Editors, reporters, photographers, videographers, page designers, and advertising sales people needed. Prerequisite: JOUR 106, 111, 112, 113, 211, 212.

Linguistics

LING 101

Intro to Linguistics (SS) (5)

Learn how languages take a collection of sounds and create meaning from them using many different techniques. This course studies the different levels of language composition by looking at data from many different languages.

LING 102

World Languages Survey (D) (SS) (5)

Similar to a family tree, the thousands of languages of the

world are also related in complex ways. Learn how the history of human migration and culture can be seen in the world's languages.

Mathematics

MATH 095

Basic Mathematics (1-5)

For students who need to review basic math concepts such as whole number, fraction and decimal operations. Appropriate placement test scores.

MATH 096

Pre-Algebra (1-5)

Covers percents, proportions, unit conversions, geometry, simplifying algebraic expressions and solving simple first degree linear equations. Prerequisite: MATH 095 or appropriate test score placement.

MATH 097

Algebra for Statistics (5)

An algebra course for students intending to enroll in MATH& 146, Introduction to Stats. This course does not meet the algebra prerequisite for other quantitative skills courses or for transfer to the University of Washington. Prerequisite: MATH 096 or Compass score of 78+.

MATH 098

Algebra I (1-5)

For students with good arithmetic skills and familiarity with signed numbers and basic algebraic expressions. Problem-solving skills are emphasized. Topics include: linear equations and inequalities, graphing, polynomials, and rational expressions. Prerequisite: MATH 096.

MATH 099

Algebra II (1-5)

Introduces the concept of functions, their graphs and properties. Particular attention will be paid to linear, quadratic, exponential and logarithmic functions. Prerequisite: MATH 098 or equivalent.

MATH& 107

Math in Society (M) (5)

Designed to enhance math proficiency of liberal arts students as they meet personal and professional demands. Includes mathematics in management, statistics, probability, art, and other practical applications in society. Not preparation for calculus. Prerequisite: MATH 099 or equivalent.

MATH 118

Linear Algebra (M) (5)

Computational and modeling tools with applications in physics, mathematics, engineering, economics, and business. Topics include systems of equations, matrix algebra, vector spaces, subspaces, bases, orthogonality, transformations, and eigenvalues. Prerequisite: MATH& 142 or equivalent placement.

MATH 128

Discrete Structures (M) (5)

This class is designed to introduce mathematical concepts and applications in computer science. Topics include logic, permutations and combinations, graphs and trees, recursion, and basic modular arithmetic. Prerequisite: MATH 099 or instructor permission.

MATH& 131

Math for Elem Educ 1 (M) (5)

Designed to provide the conceptual framework for teaching mathematics from kindergarten through eighth grade. Prerequisite: MATH 099 or equivalent ASSET/COMPASS score.

MATH& 132

Math for Elem Educ 2 (M) (5)

The second of two courses designed to provide the conceptual framework for teaching mathematics from kindergarten through eighth grade. Prerequisite: MATH& 131.

MATH 135

Pre-Calculus Refresher (M) (5)

Designed as a refresher course for students who have previously had a Pre-Calculus course. Content includes everything covered in MATH 141 and MATH 142. Prerequisite: High school pre-calculus equivalent or instructor approval.

MATH 140

Pre-Calc 1 Seminar (AE) (1)

Supports skill development in students registered in MATH& 141 Pre-Calculus 1. Topics covered in this course include those defined in MATH& 141 and/or any prerequisite skills needed by the student to be successful in MATH& 141. Corequisite: MATH& 141.

MATH& 141

Pre-Calculus I (M) (5)

Study of elementary functions (polynomial, exponential, logarithmic), systems of equations, matrix algebra. Modeling and problem solving techniques are emphasized from a graphic, symbolic and numeric perspective. Prerequisite: MATH 099 or equivalent placement.

MATH& 142

Pre-Calculus II (M) (5)

Graphical, numerical, symbolic development of trigonometric functions and their inverses as defined on the unit circle and right triangles; identities, equations, and applications; complex numbers, polar coordinates, parametric equations, vectors, conics, and sequences and series. Prerequisite: MATH& 141.

MATH 145

Statistics Prep Seminar (AE) (1)

Refreshes and enhances the necessary prerequisite skills for a college-level statistics course. Topics include algebra for statistics, spreadsheet software skills, and probabilistic reasoning. Prerequisite: MATH 097, 099 or equivalent, or instructor permission.

MATH& 146

Introduction to Stats (M) (5)

Introduction to concepts of data collection, organization and summaries. Develop the fundamental concepts of mean, median and standard deviation, probability, probability distributions, and apply these ideas to hypothesis testing, linear regression and analysis of variance. Prerequisite: MATH 097, MATH 099 or equivalent.

MATH 147

Finite Math for Business (M) (5)

Linear, polynomial and rational function models. Exponential and logarithmic functions. Mathematics of finance, matrices, linear programming, set operations and probability. Prerequisite: MATH 099 or equivalent.

MATH& 148

Business Calculus (M) (5)

An introduction to calculus concepts needed for business applications. Topics discussed are limits, derivative, integrals, and partial derivatives. Business applications are stressed. Prerequisite: MATH 147 or MATH& 141 or equivalent.

MATH& 151

Calculus I (M) (5)

The first in a four-quarter sequence. Limits, derivatives of algebraic and some transcendental functions, applications of derivatives, the indefinite integral. Topics covered from numerical, analytical and graphical viewpoints. Prerequisite: MATH& 142 or equivalent.

MATH& 152

Calculus II (M) (5)

The second in a four-quarter sequence. Covers the calculus of transcendental functions (exponential, logarithm, inverse circular, hyperbolic), techniques of integration, sequences, series, and power series. Prerequisite: MATH& 151 or equivalent.

MATH 156

Calculus I Lab (AE) (1)

Analyze concepts from Calculus I using algebra-based computer software. For students currently enrolled in Calculus I or who have instructor permission. Corequisite: MATH& 151.

MATH& 163

Calculus III (AE) (5)

Third in a four-quarter sequence. Polar coordinates, parametric equations, vectors, and vector fields, the analytic geometry of three-space, partial derivatives, and multiple integrals. Prerequisite: MATH& 152 or equivalent.

MATH 212

Elementary Differential Equations (AE) (5)

Linear ordinary differential equations with emphasis on supporting concepts of differential operators, Wronskians, characteristic polynomials, homogeneous and nonhomogeneous cases, variation of parameters, undetermined coefficients. Solution of IVP by Laplace transforms and power series method. Prerequisite: MATH& 163.

MATH 228

Discrete Math(M) (5)

This class introduces the basic concepts of mathematics that are used in computer science. Topics covered include logic, mathematical induction, combinatorics, set theory, relations, and functions. Prerequisite: MATH& 142 or MATH 128.

MATH 245

Statistical Programming (M) (5)

Introduction to data structures and implementing procedures in statistical computing languages and spreadsheet applications. Examples may include R, Python, and Excel. Provides a foundation in computation components of data analysis. Prerequisite: MATH& 146 or equivalent, or instructor permission.

MATH 246

Intermediate Statistics (M) (5)

Continuation of MATH& 146 (Introduction to Statistics).

Expands on concepts of data collection, data cleaning, descriptive statistics, and inferential statistics. Emphasis is on statistical software and applications in data science. Prerequisite: MATH 245 or instructor permission (Co-enrollment is acceptable)

MATH 264

Calculus IV (AE) (3)

Fourth in a four-quarter sequence. Optimization of 2 and 3 variable functions, Lagrange Multipliers, applications and techniques of multiple integration, Green's Theorem, Stokes Theorem, and line and surface integrals. Prerequisite: MATH& 163 or equivalent.

MATH 315

Teaching Math (M) (5)

Provides the requisite knowledge and skills to teach K-8 students core math concepts. Current state standards for math learning will be reviewed with a focus on understanding how to teach and apply mathematical concepts.

MATH 350

Managerial Statistics (M) (5)

Statistical analysis techniques will be examined and applied in case studies involving real-world management issues. Students will examine difficulties, subjective decisions, and pitfalls when analyzing data and making inferences from numbers. Prerequisite: Lower division Quantitative Skills course

TMATH 100

Technical Mathematics I (5)

Focus is on methods of problem solving for the technical fields. Course develops mathematical vocabulary and skill with algebraic expressions, formula manipulations, graphing techniques, right triangle trigonometry, geometry, exponents, logarithms, and equation/system of equation solving. Prerequisite: MATH 098.

TMATH 101

Foundational Math Concepts (5)

Study of foundational math theory and concepts including number sense, algebra, geometry, data analysis and math vocabulary through inquiry-based learning. Does not meet Quantitative Skills distribution requirement for AA degree. Prerequisite: MATH 095 or equivalent.

TMATH 110

Technical Math II (3)

Course emphasizes trigonometric functions used to solve engineering, electronics, and mechanics application problems. Prerequisite: TMATH 100.

TMATH 116

Industrial Math (5)

Application of basic mathematical operations to specific workforce programs including common fractions, decimal fractions, percentages, ratio and proportion, practical algebra, and computations involving rectangles and triangles. Emphasizes the use of mathematics in diesel and welding. Prerequisite: MATH 095.

TMATH 121

Electronics Math 1 (5)

Students will be introduced to math concepts relating to electronics and robotics. Topics studied will include functions, direct and inverse relationships, unit analysis, calculator operation, linear and exponential equations, and spreadsheet math operations. Prerequisite: MATH 098.

TMATH 122

Electronics Math 2 (4)

Continuation of Electronics Math 1 -students will learn math concepts applicable to AC electronics and semiconductor device performance. Trigonometry and complex numbers will be emphasized. Prerequisite: TMATH 121.

Mechatronics

MEC 105

Industrial Computer Operations (2)

Best practices for computer operations in an industrial environment. Topics include Microsoft Windows operating system navigation, hardware maintenance and various industrial software interfaces.

MEC 116

AC/DC Electronics (4)

Basic analysis and troubleshooting of Direct and Alternating current circuits including Ohm's Law, Watt's Law, and Kirchoff's Laws; devices such as resistors, capacitors, and transformers are studied. Prerequisite: MATH 098 or equivalent.

MEC 120

Machine Tool Operation (6)

Introduction to machining operations. Emphasis on safe application of the most common machining procedures and machines used by multi-skilled industrial maintenance technicians.

MEC 151

Mechanical Systems (5)

Introduction to mechanical system components and safe operation of mechanical drive systems. Simple machines, basic drive systems, and operation of various tools will be studied.

MEC 152

Power Transmission (3)

Continuation of MEC 151, course includes study of power transmission components including bearings, brakes and gear systems. Concepts will also include vibration analysis, heat control and maintenance, and gear/cam systems. Prerequisite: MEC 151

MEC 153

Hydraulic Systems (5)

Introduction to fluid power - hydraulics and pneumatics. Safe operation of fluid systems will be emphasized. Course covers fluid characteristics, component symbols, control valves, pumps and reservoirs.

MEC 154

Electrohydraulics (4)

Continuation of MEC 153. Fluid power transfer and electrohydraulic fluid systems. Components studied will include pipes and hoses, pressure regulators, pressure and flow sensors, and electrical control systems. Heavy emphasis on troubleshooting. Prerequisite: MEC 153

MEC 155

Preventative Maintenance (3)

Basic Preventive and predictive maintenance procedures. Topics include facility upkeep, safety monitoring and risk management, teardown and inspection techniques, and technologies used in PM procedures. Prerequisite: MEC 151.

MEC 190

Coop Work Experience (1-12)

Education through experience in an industrial automated facility. Students will learn safe work habits and proper workplace procedures and interaction strategies under the instruction of workplace supervisor. Prerequisite: instructor permission and Coop Work Experience Seminar.

MEC 220

Sensors and Instruments (5)

Examination of sensors and diagnostic tools used in industrial environments. Electrical and mechanical measurement instruments will be studied and

troubleshooting steps performed to prove competency. Control systems will also be studied. Prerequisite MEC 151

MEC 250

Industrial Electronics (2)

Study of electricity in an industrial facility. Topics covered will focus on 3-phase power analysis and motion control devices including motors, motor drivers and controls. Prerequisite: MEC 116 or equivalent knowledge of AC electricity.

MEC 260

Allen Bradley PLCs (5)

Study of Allen Bradley programmable logic controllers. Input and output modules will communicate with peripheral devices such as sensors, motors, lights and relays. Heavy emphasis on ladder logic, safety, troubleshooting and efficiency.

MEC 261

Siemens PLCs (3)

Study of Siemens programmable logic controllers. Siemens SIMATIC equipment and STEP7 software will be used to construct basic PLC systems. Heavy emphasis on Siemens ladder logic, safety, troubleshooting and efficiency. Prerequisite: MEC 260.

MEC 270

Industrial Robotics (5)

Survey of robotics used in industry. Heavy emphasis on safe handling and work cell safety. Programming features include teaching points, program structure and device interfaces. Course includes Fanuc Corporation Certified Education Robot Training (CERT) Certification.

Media Studies

M ST 122

Writing the Short Film (3)

An introduction to the basics of writing the short screenplay. Co-requisite MST 261.

M ST 125

Introduction to Sports Announcing (AE) (1)

Learn about the history of Sports Broadcasting. Specific duties of announcers as well as technical knowledge, current trends, career paths, legal and ethical issues of Sports Broadcasting will be covered during the quarter.

M ST 126

Sports Announcing for Football (C) (1)

Learn and apply the basic skills and knowledge required of today's football announcers. This course will emphasize

practical tips, ideas and theories that will help you on your way to becoming a quality football announcer.

M ST 127

Basketball Announcing (3)

Learn and apply the basic skills and knowledge required of today's basketball play-by-play and color analysis announcers. Students will announce men's and women's basketball games.

M ST 128

Sports Announcing for Baseball (1)

Learn and apply the basic skills and knowledge required of today's baseball announcers. This course will emphasize practical tips, ideas and theories that will help you on your way to becoming a quality baseball announcer.

M ST 158

Studio & Outdoor Lighting for Television & Film (2)

Discover the basic principles and techniques of lighting television and film sets in both indoor and outdoor situations.

M ST 159

Stagecraft for Television and Film (2)

Designed specifically for television and film majors, this class introduces students to the basic tools, materials, equipment and techniques used in the design and building of television and film sets.

M ST 190

Cooperative Work Experience (1-12)

Cooperative Work Experience allows students to apply classroom learning to on-the-job settings. Credit is earned for new and continued learning taking place in the work environment. Reaching set learning objectives and development of positive work habits are emphasized. The Cooperative Education Coordinator and employees arrange Cooperative Work Experience. 60-360 hour on-the-job per quarter. Prerequisite: Enrollment in a Work Experience Seminar (BTEC 191-194) is required of Co-op students. You may take the Work Experience Seminar before or in the same quarter as the Co-op course. Instructor permission required.

M ST 220

Intro to Broadcast News (H) (5)

An introduction to Broadcast News. This course includes instruction on writing, producing, and delivering news on various media outlets. Legal issues that affect the news industry will also be covered.

M ST 222

Screenwriting (H) (5)

An introduction to the theories, methods, and processes of writing a screenplay. Students will apply what they learn and complete a full-length screenplay at the end of the quarter.

M ST 225

Introduction to Telecommunications (AE) (5)

The field of telecommunications is constantly changing and affecting the way we live our lives. Learn about the history, social impact, moral, ethical issues and philosophies of telecommunications in our society.

M ST 230

Intro to Radio (AE) (5)

Introduction to Radio Broadcasting. Learn about radio programming, announcing, writing copy, audio production and FCC rules and regulations that apply to radio. The history and social aspects of radio will also be covered.

M ST 231

Advanced Radio Broadcasting (3)

Learn strategies to research and prepare material for broadcast. The use of promotions and contests to increase station ratings also will be covered.

M ST 260

Intro to TV & Video Production for the Elect (AE) (5)

Learn studio and control room operations, field and studio camera techniques, basic script writing and video editing. At the end of the quarter students will be able to write, produce and edit short videos.

M ST 261

Introduction to Editing (5)

An introduction to editing for film and video. Basic audio and video editing will be covered during the quarter. Prerequisite: MST 260

M ST 262

Television Production (5)

Students will write, direct, produce and edit video packages and participate as crew members in producing classmate's video projects.

M ST 271

Radio Broadcasting Internship (1)

Practice and perfect your announcing skills on the campus radio station KCED FM. Prerequisite: M ST 230, 231 or instructor permission.

M ST 272

Radio Broadcasting Internship (2)

Practice and perfect your announcing skills on the campus radio station KCED FM. Prerequisite: MST 230, 231 or instructor permission.

M ST 273

Radio Broadcasting Internship (3)

Practice and perfect your announcing skills on the campus radio station KCED FM. Prerequisite: M ST 230, 231 or instructor permission.

M ST 274

Radio Broadcasting Internship (4)

Practice and perfect your announcing skills on the campus radio station KCED FM. Prerequisite: M ST 230, 231 or permission of the instructor.

M ST 281

TV Broadcasting Internship (1)

Designed for students who wish to produce independent video projects outside of the classroom environment. Permission of instructor required. Prerequisite: M ST 260, 261, 262.

Medical Assistant

M A 130

Medical Math (5)

A mathematics course that focuses on solving applications using percent, proportion, and unit conversion as well as descriptive data interpretation. Satisfies the math requirement for Medical Assistant AAS. Prerequisite: MATH 096 or equivalent.

M A 139

MA Medical Terminology (5)

A required class for all students enrolled in the Medical Assistant Program to develop a medical vocabulary from an anatomy, physiology, and pathology format. It is suitable for others entering medical-related fields.

M A 140

Intro to Medical Assistant (5)

An introduction to the profession of the Medical Assistant in the health care setting. Designed to explore the fundamentals of the scope of practice in a lecture and lab setting.

M A 208

MA Electrocardiography (2)

Electrocardiography (ECG) for the medical assistant student; including anatomy of the heart and the cardiac cycle, ECG applications and methods for testing in ambulatory care.

M A 241

MA Clinical Procedures (6)

Overview of physical examinations, procedures, and testing that a medical assistant would assist a health care provider with in an ambulatory care setting. Prerequisite: Acceptance into a 2nd year MA.

M A 242

Medical Administration (7)

An overview of pharmacology and medication administration as it applies to the medical assistant's responsibilities in ambulatory care. Prerequisite: Acceptance into 2nd year MA program.

M A 243

MA Clinical Procedure II (6)

Surgical setup for clinical/office procedures explored in detail; review of the role of diagnostic imaging, rehabilitation, and nutrition in the interdisciplinary approach of patient care. Prerequisite: MA 242, MA 246 with a 2.5 GPA or higher.

M A 244

MA Externship Seminar (1)

This class allows the medical assistant extern to explore objectives and challenges in bridging their classroom/lab experiences to the experiences they are encountering in their externships. Prerequisite: MA 242, MA 246 with a 2.5 GPA or higher.

M A 245

MA Clinical Externship (6)

One hundred eighty unpaid hours of externship in an ambulatory health care setting that allows the medical assistant student to bridge their classroom education and lab training to the real-world medical setting. Prerequisite: MA 242, MA 246 with a 2.5 GPA or higher.

M A 246

MA Laboratory Procedures (10)

Overview of laboratory procedures and regulations for the ambulatory health care setting, including phlebotomy training. Prerequisite: Acceptance into 2nd year MA program.

M A 249

MA Admin Procedures (8)

Administrative protocols and procedures related to front and back office responsibilities in an ambulatory care setting; with emphasis on communications, medical records management, and fiscal management practices. Prerequisite: acceptance into 2nd year of MA program.

Music

MUSC 100

Fundamentals of Music (H) (5)

Introduction to the elements of music theory, including scales, intervals, keys, triads, elementary ear training, notation, meter and rhythm.

MUSC 101

Music History (D) (H) (5)

An overview of music in its historical context, including both the Western Classical canon and musical traditions from Asia, Africa, the Middle East, the Pacific Islands, and the Americas. (D) (H)

MUSC& 105

Music Appreciation (D) (H) (5)

Developing an understanding of music through the study of musical elements and cultural contexts.

MUSC 118

Musical Theatre (H) (5)

The study of musical theatre, its major works, its significance in theatre history, and role in American culture with an emphasis on production elements and the play in performance.

MUSC 124

Jazz Ensemble I (AE) (2)

Performing ensemble made up of students and community members. The ensemble's instrumentation is flexible, depending on availability of musicians. One evening rehearsal and one evening concert will be required. Off campus performances may be required.

MUSC 125

Jazz Ensemble II (AE) (2)

Performing ensemble made up of students and community members. The ensemble's instrumentation is flexible, depending on availability of musicians. One evening rehearsal and one evening concert will be required. Off campus performances may be required. Prerequisite: MUSC 124 (Jazz Ensemble I)

MUSC 126

Jazz Ensemble III (AE) (2)

Performing ensemble made up of students and

community members. The ensemble's instrumentation is flexible, depending on availability of musicians. One evening rehearsal and one evening concert will be required. Off campus performances may be required. Prerequisite: MUSC 125 (Jazz Ensemble II)

MUSC 127

Jazz Ensemble IV (AE) (2)

Performing ensemble made up of students and community members. The ensemble's instrumentation is flexible, depending on availability of musicians. One evening rehearsal and one evening concert will be required. Off campus performances may be required. Prerequisite: MUSC 126 (Jazz Ensemble III)

MUSC 128

Jazz Ensemble V (AE) (2)

Performing ensemble made up of students and community members. The ensemble's instrumentation is flexible, depending on availability of musicians. One evening rehearsal and one evening concert will be required. Off campus performances may be required. Prerequisite: MUSC 127 (Jazz Ensemble IV)

MUSC 129

Jazz Ensemble VI (AE) (2)

Performing ensemble made up of students and community members. The ensemble's instrumentation is flexible, depending on availability of musicians. One evening rehearsal and one evening concert will be required. Off campus performances may be required. Prerequisite: MUSC 128 (Jazz Ensemble V)

MUSC 135

Beginning Guitar (AE) (2)

Presents the basic skills for reading and techniques needed to play the guitar. Intended for students with little or no background in guitar performance. Students must supply their own acoustic guitar.

MUSC 139

Music of the World (D) (H) (5)

A music survey of diversity found in music around the world. Examines music as accompaniment to ceremony and ritual, aid to work and routine, and an expression of universal unchanging human emotions. Prior musical experience is not necessary. Prerequisite: proficiency in reading, grammar skills.

MUSC 140

History of American Music (D) (H) (5)

This course offers students a thorough and general study of American Music from Tin Pan Alley to the first part of the 21st Century.

MUSC& 141

Music Theory I (H) (5)

A study of musical concepts, such as pitch and rhythmic notation, scales and modes, key signatures, intervals, seventh chords and triads. Prerequisite: MUSC 100 or placement by instructor.

MUSC& 142

Music Theory II (H) (5)

A study of musical concepts, including 16th and 18th century counterpoint, part writing, and musical phrases. Prerequisite: MUSC& 141.

MUSC& 143

Music Theory III (H) (5)

A study of musical concepts, such as dominant substitutions, voice leading chords, secondary dominants, motives, and phrase structures. Prerequisite: MUSC& 142.

MUSC 144

Concert Choir I (AE) (2)

A vocal ensemble performing both sacred and secular music literature. Availability for up to two evening performances is required.

MUSC 145

Concert Choir II (AE) (2)

A vocal ensemble performing both sacred and secular music literature. Availability for up to two evening performances is required.

MUSC 146

Concert Choir III (AE) (2)

A vocal ensemble performing both sacred and secular music literature. Availability for up to two evening performances is required.

MUSC 147

Concert Choir IV (AE) (2)

A vocal ensemble performing both sacred and secular music literature. Availability for up to two evening performances is required.

MUSC 148

Concert Choir V (AE) (2)

A vocal ensemble performing both sacred and secular music literature. Availability for up to two evening performances is required.

MUSC 149

Concert Choir VI (AE) (2)

A vocal ensemble performing both sacred and secular music literature. Availability for up to two evening performances is required.

MUSC 150

Applied Flute (AE) (1)

This course teaches performance skills to students majoring in music. Musical literature from various style periods and composers will be selected to acquaint the student with a wide range of repertoire written for the instrument. Instructor's permission and/or audition required. Corequisite: ensemble and/or music theory.

MUSC 151

Functional Piano I (AE) (1)

Functional piano study/skill for music majors. A practical course to accompany the music theory courses. Co-requisite: Simultaneous enrollment in music theory class

MUSC 152

Functional Piano II (AE) (1)

Functional piano study/skill for music majors. A practical course to accompany the music theory courses. Prerequisite: MUSC 151 or instructor permission (audition required). Corequisite: simultaneous enrollment in music theory class.

MUSC 153

Functional Piano III (AE) (1)

Functional piano study/skill for music majors. A practical course to accompany the music theory courses. Corequisite: simultaneous enrollment in music theory class. Prerequisite: MUSC 152 or instructor permission. Audition required.

MUSC 154

Applied French Horn (AE) (1)

This course teaches performance skills to students majoring in music. Musical literature from various style periods and composers will be selected to acquaint the student with a wide range of repertoire written for the instrument. Instructor's permission and/or audition required. Corequisite: ensemble and/or music theory.

MUSC 155

Applied Trumpet (AE) (1)

This course teaches performance skills to students majoring in music. Musical literature from various style periods and composers will be selected to acquaint the student with a wide range of repertoire written for the instrument. Instructor's permission and/or audition required. Corequisite: ensemble and/or music theory.

MUSC 156

Applied Trombone (AE) (1)

This course teaches performance skills to students majoring in music. Musical literature from various style

periods and composers will be selected to acquaint the student with a wide range of repertoire written for the instrument. Instructor's permission and/or audition required. Corequisite: ensemble and/or music theory.

MUSC 157

Applied Tuba (AE) (1)

This course teaches performance skills to students majoring in music. Musical literature from various style periods and composers will be selected to acquaint the student with a wide range of repertoire written for the instrument. Instructor's permission and/or audition required. Corequisite: ensemble and/or music theory.

MUSC 158

Applied Euphonium (AE) (1)

This course teaches performance skills to students majoring in music. Musical literature from various style periods and composers will be selected to acquaint the student with a wide range of repertoire written for the instrument. Instructor's permission and/or audition required. Corequisite: ensemble and/or music theory.

MUSC 159

Applied Percussion (AE) (1)

This course teaches performance skills to students majoring in music. Musical literature from various style periods and composers will be selected to acquaint the student with a wide range of repertoire written for the instrument. Instructor's permission and/or audition required. Corequisite: ensemble and/or music theory.

MUSC 160

Applied Piano (AE) (1)

This course teaches performance skills to students majoring in music. Musical literature from various style periods and composers will be selected to acquaint the student with a wide range of repertoire written for the instrument. Instructor's permission and/or audition required. Corequisite: ensemble and/or music theory.

MUSC 161

Applied Violin (AE) (1)

This course teaches performance skills to students majoring in music. Musical literature from various style periods and composers will be selected to acquaint the student with a wide range of repertoire written for the instrument. Instructor's permission and/or audition required. Corequisite: ensemble and/or music theory.

MUSC 162

Applied Viola (AE) (1)

This course teaches performance skills to students majoring in music. Musical literature from various style

periods and composers will be selected to acquaint the student with a wide range of repertoire written for the instrument. Instructor's permission and/or audition required. Corequisite: ensemble and/or music theory.

MUSC 163

Applied Cello (AE) (1)

This course teaches performance skills to students majoring in music. Musical literature from various style periods and composers will be selected to acquaint the student with a wide range of repertoire written for the instrument. Instructor's permission and/or audition required. Corequisite: ensemble and/or music theory.

MUSC 164

Applied Double Bass (AE) (1)

This course teaches performance skills to students majoring in music. Musical literature from various style periods and composers will be selected to acquaint the student with a wide range of repertoire written for the instrument. Instructor's permission and/or audition required. Corequisite: ensemble and/or music theory.

MUSC 165

Applied Guitar (AE) (1)

This course teaches performance skills to students majoring in music. Musical literature from various style periods and composers will be selected to acquaint the student with a wide range of repertoire written for the instrument. Instructor's permission and/or audition required. Corequisite: ensemble and/or music theory.

MUSC 166

Applied Saxophone (AE) (1)

This course teaches performance skills to students majoring in music. Musical literature from various style periods and composers will be selected to acquaint the student with a wide range of repertoire written for the instrument. Instructor's permission and/or audition required. Corequisite: ensemble and/or music theory.

MUSC 167

Applied Voice (AE) (1)

This course teaches performance skills to students majoring in music. Musical literature from various style periods and composers will be selected to acquaint the student with a wide range of repertoire written for the instrument. Instructor's permission and/or audition required. Corequisite: ensemble and/or music theory.

MUSC 168

Applied Composition (AE) (1)

This course teaches composition skills to students majoring in music. Students will study musical literature from various style periods and composers and will complete works based on guidelines set out by the instructor. Instructor's permission and/or audition required. Corequisite: Ensemble and/or music theory.

MUSC 169

Applied Clarinet (AE) (1)

This course teaches performance skills to students majoring in music. Musical literature from various style periods and composers will be selected to acquaint the student with a wide range of repertoire written for the instrument. Instructor's permission and/or audition required. Corequisite: ensemble and/or music theory.

MUSC 170

Applied Oboe (AE) (1)

This course teaches performance skills to students majoring in music. Musical literature from various style periods and composers will be selected to acquaint the student with a wide range of repertoire written for the instrument. Instructor's permission and/or audition required. Corequisite: ensemble and/or music theory.

MUSC 171

Applied Bassoon (AE) (1)

This course teaches performance skills to students majoring in music. Musical literature from various style periods and composers will be selected to acquaint the student with a wide range of repertoire written for the instrument. Instructor's permission and/or audition required. Corequisite: ensemble and/or music theory.

MUSC 172

Applied Harp (AE) (1)

This course teaches performance skills to students majoring in music. Musical literature from various style periods and composers will be selected to acquaint the student with a wide range of repertoire written for the instrument. Prerequisite: ensemble and/or music theory, and instructor permission.

MUSC 175

Community Band I (AE) (2)

Performance ensemble consisting of students and community members. Repertoire will vary and be selected by the band director(s). The ensemble consists of band instrumentation and meets weekly for three hours.

MUSC 176

Community Band II (AE) (2)

Performance ensemble consisting of students and community members. Repertoire will vary and be selected

by the band director(s). The ensemble consists of band instrumentation and meets weekly for three hours.

MUSC 177

Community Band III (AE) (2)

Performance ensemble consisting of students and community members. Repertoire will vary and be selected by the band director(s). The ensemble consists of band instrumentation and meets weekly for three hours.

MUSC 178

Community Band IV (AE) (2)

Performance ensemble consisting of students and community members. Repertoire will vary and be selected by the band director(s). The ensemble consists of band instrumentation and meets weekly for three hours.

MUSC 179

Community Band V (AE) (2)

Performance ensemble consisting of students and community members. Repertoire will vary and be selected by the band director(s). The ensemble consists of band instrumentation and meets weekly for three hours.

MUSC 180

Community Band VI (AE) (2)

Performance ensemble consisting of students and community members. Repertoire will vary and be selected by the band director(s). The ensemble consists of band instrumentation and meets weekly for three hours.

MUSC 185

Community Orchestra I (AE) (2)

Performing ensemble made up of students and community members. Repertoire will vary and will be selected by the orchestra director. The ensemble consists of orchestral instrumentation and meets weekly for three hours.

MUSC 186

Community Orchestra II (AE) (2)

Performing ensemble made up of students and community members. Repertoire will vary and will be selected by the orchestra director. The ensemble consists of orchestral instrumentation and meets weekly for three hours.

MUSC 187

Community Orchestra III (AE) (2)

Performing ensemble made up of students and community members. Repertoire will vary and will be selected by the orchestra director. The ensemble consists

of orchestral instrumentation and meets weekly for three hours.

MUSC 188

Community Orchestra IV (AE) (2)

Performing ensemble made up of students and community members. Repertoire will vary and will be selected by the orchestra director. The ensemble consists of orchestral instrumentation and meets weekly for three hours.

MUSC 189

Community Orchestra V (AE) (2)

Performing ensemble made up of students and community members. Repertoire will vary and will be selected by the orchestra director. The ensemble consists of orchestral instrumentation and meets weekly for three hours.

MUSC 190

Community Orchestra VI (AE) (2)

Performing ensemble made up of students and community members. Repertoire will vary and will be selected by the orchestra director. The ensemble consists of orchestral instrumentation and meets weekly for three hours.

MUSC 220

Applied French Horn II (AE) (1)

This course teaches second-year level performance skills to majors. Musical literature from various style periods and composers will acquaint students with a wide range of repertoire for the instrument. Instructor permission and/or audition required. Prerequisite: MUSC 154.

MUSC 221

Applied Flute II (AE) (1)

This course teaches second-year level performance skills to majors. Musical literature from various style periods and composers will acquaint students with a wide range of repertoire for the instrument. Instructor permission and/or audition required. Prerequisite: MUSC 150.

MUSC 222

Applied Trumpet II (AE) (1)

This course teaches second-year level performance skills to majors. Musical literature from various style periods and composers will acquaint students with a wide range of repertoire for the instrument. Instructor permission and/or audition required. Prerequisite: MUSC 155.

MUSC 223

Applied Trombone II (AE) (1)

This course teaches second-year level performance skills to majors. Musical literature from various style periods and composers will acquaint students with a wide range of repertoire for the instrument. Instructor permission and/or audition required. Prerequisite: MUSC 156.

MUSC 224

Applied Tuba II (AE) (1)

This course teaches second-year level performance skills to majors. Musical literature from various style periods and composers will acquaint students with a wide range of repertoire for the instrument. Instructor permission and/or audition required. Prerequisite: MUSC 157.

MUSC 225

Applied Euphonium II (AE) (1)

This course teaches second-year level performance skills to majors. Musical literature from various style periods and composers will acquaint students with a wide range of repertoire for the instrument. Instructor permission and/or audition required. Prerequisite: MUSC 158.

MUSC 226

Applied Percussion (AE) (1)

This course teaches second-year level performance skills to majors. Musical literature from various style periods and composers will acquaint students with a wide range of repertoire for the instrument. Instructor permission and/or audition required. Prerequisite: MUSC 159.

MUSC 227

Applied Piano II (AE) (1)

This course teaches second-year level performance skills to majors. Musical literature from various style periods and composers will acquaint students with a wide range of repertoire for the instrument. Instructor permission and/or audition required. Prerequisite: MUSC 160.

MUSC 228

Applied Violin II (AE) (1)

This course teaches second-year level performance skills to majors. Musical literature from various style periods and composers will acquaint students with a wide range of repertoire for the instrument. Instructor permission and/or audition required. Prerequisite: MUSC 161.

MUSC 229

Applied Viola II (AE) (1)

This course teaches second-year level performance skills

to majors. Musical literature from various style periods and composers will acquaint students with a wide range of repertoire for the instrument. Instructor permission and/or audition required. Prerequisite: MUSC 162.

MUSC 230

Applied Cello II (AE) (1)

This course teaches second-year level performance skills to majors. Musical literature from various style periods and composers will acquaint students with a wide range of repertoire for the instrument. Instructor permission and/or audition required. Prerequisite: MUSC 163.

MUSC 231

Applied Double Bass II (AE) (1)

This course teaches second-year level performance skills to majors. Musical literature from various style periods and composers will acquaint students with a wide range of repertoire for the instrument. Instructor permission and/or audition required. Prerequisite: MUSC 164.

MUSC 232

Applied Guitar II (AE) (1)

This course teaches second-year level performance skills to majors. Musical literature from various style periods and composers will acquaint students with a wide range of repertoire for the instrument. Instructor permission and/or audition required. Prerequisite: MUSC 165.

MUSC 233

Applied Saxophone II (AE) (1)

This course teaches second-year level performance skills to majors. Musical literature from various style periods and composers will acquaint students with a wide range of repertoire for the instrument. Instructor permission and/or audition required. Prerequisite: MUSC 166.

MUSC 234

Applied Voice II (AE) (1)

This course teaches second-year level performance skills to majors. Musical literature from various style periods and composers will acquaint students with a wide range of repertoire for the instrument. Instructor permission and/or audition required. Prerequisite: MUSC 167.

MUSC 235

Applied Composition II (AE) (1)

This course teaches second-year level performance skills to majors. Musical literature from various style periods and composers will acquaint students with a wide range of repertoire for the instrument. Instructor permission

and/or audition required. Prerequisite: MUSC 168.

MUSC 236

Applied Clarinet II (AE) (1)

This course teaches second-year level performance skills to majors. Musical literature from various style periods and composers will acquaint students with a wide range of repertoire for the instrument. Instructor permission and/or audition required. Prerequisite: MUSC 169.

MUSC 237

Applied Oboe II (AE) (1)

This course teaches second-year level performance skills to majors. Musical literature from various style periods and composers will acquaint students with a wide range of repertoire for the instrument. Instructor permission and/or audition required. Prerequisite: MUSC 170.

MUSC 238

Applied Bassoon II (AE) (1)

This course teaches second-year level performance skills to majors. Musical literature from various style periods and composers will acquaint students with a wide range of repertoire for the instrument. Instructor permission and/or audition required. Prerequisite: MUSC 171.

MUSC 239

Applied Harp II (AE) (1)

This course teaches second-year level performance skills to majors. Musical literature from various style periods and composers will acquaint students with a wide range of repertoire for the instrument. Instructor permission and/or audition required. Prerequisite: MUSC 172.

MUSC& 241

Music Theory IV (H) (5)

A study of musical concepts, such as modulation, binary and ternary forms, and contrapuntal genres, including fugues and inventions. Prerequisite: MUSC& 143

MUSC& 242

Music Theory V (H) (5)

A study of musical concepts, such as mode mixture, Neapolitan and Augmented Sixth chords, chromatic modulation, popular music and song forms, variation, Sonata and Rondo form. Prerequisite: MUSC& 241.

MUSC& 243

Music Theory VI (H) (5)

A study of musical concepts, focused on techniques and methods of the 20th and 21st century. Prerequisite: MUSC& 242

MUSC 244

Performance Ensemble I (AE) (1)

An ensemble is for the advanced performer (Instrumentalists or Vocalists). Music reading is imperative. Will perform many styles of music. Concert performances will be both on and off campus and/or tour. By audition ONLY.

MUSC 245

Performance Ensemble II (AE) (1)

An ensemble is for the advanced performer (Instrumentalists or Vocalists). Music reading is imperative. Will perform many styles of music. Concert performances will be both on and off campus and/or tour. By audition ONLY.

MUSC 246

Performance Ensemble III (AE) (1)

An ensemble is for the advanced performer (Instrumentalists or Vocalists). Music reading is imperative. Will perform many styles of music. Concert performances will be both on and off campus and/or tour. By audition ONLY.

MUSC 247

Performance Ensemble IV (AE) (1)

An ensemble is for the advanced performer (Instrumentalists or Vocalists). Music reading is imperative. Will perform many styles of music. Concert performances will be both on and off campus and/or tour. By audition ONLY.

MUSC 248

Performance Ensemble V (AE) (1)

An ensemble is for the advanced performer (Instrumentalists or Vocalists). Music reading is imperative. Will perform many styles of music. Concert performances will be both on and off campus and/or tour. By audition ONLY.

MUSC 249

Performance Ensemble VI (AE) (1)

An ensemble is for the advanced performer (Instrumentalists or Vocalists). Music reading is imperative. Will perform many styles of music. Concert performances will be both on and off campus and/or tour. By Audition ONLY.

MUSC 250

Musical Theatre Production I (H) (5)

Designed to introduce the student to all the elements of musical theatre. The student will study the audition process, the effect of musical choreography, the historical setting of the work chosen, musical score and dialogue.

MUSC 251

Musical Theatre Production II (AE) (5)

The student will continue to study the audition process, the effect of musical choreography, the historical setting of work chosen, musical score and dialogue. Prerequisite: by audition only.

MUSC 254

Vocal Ensemble I (AE) (2)

A small vocal ensemble that prepares and performs chamber works, and contemporary vocal literature. Placement is by audition only. Auditions will take place during the first scheduled class.

MUSC 255

Vocal Ensemble II (AE) (2)

A small vocal ensemble that prepares and performs chamber works, and contemporary vocal literature. Placement is by audition only. Auditions will take place during the first scheduled class.

MUSC 256

Vocal Ensemble III (AE) (2)

A small vocal ensemble that prepares and performs chamber works, and contemporary vocal literature. Placement is by audition only. Auditions will take place during the first scheduled class.

MUSC 257

Vocal Ensemble IV (AE) (2)

A small vocal ensemble that prepares and performs chamber works, and contemporary vocal literature. Placement is by audition only. Auditions will take place during the first scheduled class.

MUSC 258

Vocal Ensemble V (AE) (2)

A small vocal ensemble that prepares and performs chamber works, and contemporary vocal literature. Placement is by audition only. Auditions will take place during the first scheduled class.

MUSC 259

Vocal Ensemble VI (AE) (2)

A small vocal ensemble that prepares and performs chamber works, and contemporary vocal literature. Placement is by audition only. Auditions will take place during the first scheduled class.

MUSC 276

Computer Music (AE) (3)

A course focused on the creation of music using digital software on computers and/or other electronic devices.

MUSC 281

Instrumental Improvisation I (AE) (2)

An historical study of improvisation in instrumental styles: Dixieland, jazz, and contemporary popular music. Course will involve stylistic and chordal analysis as well as performance on the student's major instrument.

MUSC 282

Instrumental Improvisation II (AE) (2)

An historical study of improvisation in instrumental styles: Dixieland, jazz, and contemporary popular music. Course will involve stylistic and chordal analysis as well as performance on the student's major instrument.

MUSC 283

Instrumental Improvisation III (AE) (2)

An historical study of improvisation in instrumental styles: Dixieland, jazz, and contemporary popular music. Course will involve stylistic and chordal analysis as well as performance on the student's major instrument.

MUSC 284

Instrumental Improvisation IV (AE) (2)

An historical study of improvisation in instrumental styles: Dixieland, jazz, and contemporary popular music. Course will involve stylistic and chordal analysis as well as performance on the student's major instrument.

MUSC 285

Instrumental Improvisation V (AE) (2)

An historical study of improvisation in instrumental styles: Dixieland, jazz, and contemporary popular music. Course will involve stylistic and chordal analysis as well as performance on the student's major instrument.

MUSC 286

Instrumental Improvisation VI (AE) (2)

An historical study of improvisation in instrumental styles: Dixieland, jazz, and contemporary popular music. Course will involve stylistic and chordal analysis as well as performance on the student's major instrument.

Natural Resources

NATR 131

Plants of the Pacific Northwest (5)

Basic biology, life history and distribution of plants of the Pacific Northwest, emphasizing major tree species. Laboratory exercises focus on taxonomy and

identification methods. An accelerated two-week course: first in a three part series. Prerequisite: ENGL 099, placement in ENGL& 101 or instructor permission.

NATR 150

Disturbance Ecology (5)

Investigation of forces that change forest and riparian plant communities: fire, wind, floods, and insects and diseases endemic to the Pacific Northwest. An accelerated two-week course; second part of a three-part series. Prerequisite: ENGL 099 or placement in ENGL& 101 or instructor permission.

NATR 160

NW Terrestrial Habitats (5)

Exploration of diverse Pacific Northwest ecosystems. Succession, plant associations, site characteristics, biodiversity, population ecology and community ecology are studied within the context of ecosystem sustainability. A two-week, accelerated course; third in a three-part series. Prerequisite: ENGL 099 or placement in ENGL& 101 or instructor permission.

NATR 191

Work Experience Seminar (1)

Preparation for cooperative work experience required for the Natural Resources- Forestry Technician program: job applications, resumes, cover letters, interview techniques, and employment research.

NATR 260

Forest Mensuration (5)

Forestry measurement requirements, such as timber cruising, log scaling, tree grading, inventory techniques, and computer applications. Labs, some in the field, emphasize equipment and techniques necessary to measure forest resources. Prerequisite: ENGL 099, MATH 099 or college-level placement or instructor permission.

NATR 265

Forest Management (5)

Contemporary forest management principles, economics and concepts. Emphasizes sustainable forest management; certification systems, fragmentation and current forest rules including policy and regulatory issues on the state and federal levels.

NATR 270

Silviculture (5)

Forestry fundamentals, including methods of regeneration, site preparation, planting practices, animal damage control, nursery practices, pesticide/herbicide use and safety, prescribed burning, pre-commercial and commercial thinning and harvest treatments.

NATR 280

Harvest Systems and Products (5)

Forest harvest techniques; includes transport systems, logging plans, wood products and other forest products, road layout and construction, best management practices, timber appraisal and contracts.

Nursing

NURS 101

Basic Nursing Care Concepts (12)

Program themes of homeostasis, the role of the nurse, and continuum of care are applied at on-campus theory and skills labs and off-campus clinical experiences at assisted living and long-term care facilities. Prerequisite: admission to the Centralia College Nursing Program.

NURS 102

Common Alterations I (12)

Progressive competencies reflecting program themes are applied to nutrition; cardiac, respiratory, and endocrine systems; and medication and fluid administration. On-campus theory, skills labs and off-campus clinical experiences are provided. Prerequisite: NURS 101 or equivalent.

NURS 103

Common Alterations II (12)

Progressive competencies reflecting program themes are applied to surgical, neurologic, musculoskeletal, renal, and gastrointestinal nursing care. On-campus theory and skills labs and off-campus acute care clinical experiences are provided. Prerequisite: NURS 101, 102 or equivalent.

NURS 108

Electrocardiography for Health Care

Professional (2)

Review of cardiac anatomy and physiology; ECG equipment operation and supplies; patient preparation; ECG testing procedure; rhythm recognition and interpretation; cardiovascular disorders; pharmacology in ECG testing. Includes hands on ECG training and practice. Co-requisite: RN, LPN, or nursing student or instructor permission.

NURS 200

LPN to RN Transition (2)

Explores LPN and RN roles and responsibilities. Centralia College Nursing Program philosophy, purpose, conceptual framework, and outcome criteria are reviewed. Includes orientation to clinical facilities and classroom, campus, and off-campus lab expectations. Prerequisite:

Admission to RN program.

NURS 201

Mental Health & Lifespan (10)

Progressive competencies reflecting program themes are applied to the care of clients with mental health alterations, complications of child-bearing and high-risk newborns and children. Community-based and in-patient clinical experiences are provided. Prerequisites: NURS 101, NURS 102, NURS 103 & Co-requisite NURS 220 or equivalents.

NURS 202

Complex Alterations (12)

Progressive competencies reflecting program themes are applied to the care of clients with complex alterations in health. Women's Health and Pediatric and Adult acute care clinical opportunities are provided at regional facilities. NURS 201 and 220 or equivalent.

NURS 203

Complex Management (8)

Progressive competencies reflecting program themes are applied to the care of clients with complex alterations in health. Community-based and acute care inpatient clinical opportunities are provided at regional facilities. Prerequisite: NURS 201, NURS 202 & NURS 220 or equivalents, concurrent NURS 222.

NURS 210

Basic Life Support for Healthcare Providers (1)

Covers the information and skills needed for adult, child, and infant cardiopulmonary resuscitation; the use of an automated external defibrillator; recognition and treatment of choking; safety factors in training and actual rescue. Corequisite: admission to the nursing program or permission of the instructor.

NURS 220

Management & Leadership (2)

Expands on the program theme of the role of the nurse to provide a stronger theoretical foundation for assuming a management and leadership role in a variety of care settings. Prerequisite: NURS 101, 102 and 103 or equivalent; corequisite: NURS 201.

NURS 222

Transition to Practice (4)

Preceptor-guided experiences in a variety of community health care organizations are provided. Community-based and personal professional development projects are assigned. Prerequisite: NURS 201, NURS 202, NURS 220 & Co-Requisite NURS 203 or equivalent.

Nursing Assistant

HLSV 100

Home Care Aide (7)

Home Care Aides provide personal care for vulnerable individuals. Upon successful completion of the DSHS-approved course, graduates are eligible for the WA state HCA competency exam. HCA's must have a favorable background check. RCW 18.130.064.

HLSV 110

Basic Life Support for Healthcare (1)

Course covers the information and skills needed for adult, child, and infant cardiopulmonary resuscitation; the use of an automated external defibrillator; recognition and treatment of choking; safety factors in training and actual rescue.

HLSV 122

Calculation and Vocabulary of Healthcare

Profess (4)

This course will use a team teaching approach to give students the basic calculations and vocabulary skills needed to enter the healthcare field including the abbreviations and formulas commonly used in the NAC profession.

HLSV 130

Basic Fundamentals of Caregiving (2)

Focus is on the requirements for basic caregiving. Topics include client rights, communication, problem solving skills, and protecting the health and safety of residents.

HLSV 131

Nursing Assistant Certification (9)

Awareness of the role of the nursing assistant in nursing care and skill development. Topics: maintain a safe environment, provide restorative care, communication, and practice basic concepts of care. Background check is required for clinical.

HLSV 132

Nurse Delegation (2)

Class for Washington caregivers who work or will work with specific populations in community-based care settings. Course covers laws pertaining to delegation and hands-on skills.

HLSV 133

Mental Health 1 (1)

Course identifies types of mental illness and common signs and symptoms. Learn capable caregiving for mental wellness. A DSHS curriculum that meets population

specific training requirements.

HLSV 134

Dementia 1 (1)

Learn how dementia affects a person's body and mind. This basic understanding is the foundation on which to build skills needed to provide the best care for people with dementia.

HLSV 135

Traumatic Brain Injury (2)

Learn the basics of brain anatomy and function and how injury may affect a Traumatic Brain injury (TBI) survivor. Topics include brain injury management, understanding changes in behavior and mood, communication strategies and self-care strategies.

HLSV 160

Emergency Medical Technician (12)

Techniques of emergency medical care presently considered as the responsibilities of a technician in his/her role. Designed to assure a uniformly high level of knowledge and skills among those involved in emergency care. Prerequisite: healthcare provider CPR, instructor permission.

HLSV 163

Emergency Medical Responder (5)

This course prepares students for certification as an Emergency Medical Responder in the State of Washington. Both lecture and practical training are used to teach important aspects of basic pre-hospital care. Prerequisite: 18 years old, affiliated with Lewis County EMS, valid driver's license.

Nutrition

NUTR& 101

Nutrition (NS) (5)

An exploration of human nutrition with an emphasis on metabolism, digestion, dietary planning and analysis, and weight control. Prerequisite: High school-level biology or chemistry.

NUTR 103

Intro Food Science w/Lab (NS) (5)

Introduction to the biology, chemistry, microbiology, ethics, history, preparation, and production of food. Includes independent laboratories and field trips.

NUTR 202

Nutritional Laboratory (AE) (1)

Consumer-oriented labs will teach students how to

analyze their diet, apply nutrition knowledge to menu planning and reading food and supplement labels. Prerequisite: NUTR 201, HLTH 140 or permission of instructor.

NUTR 203

Issues in Nutrition (NS) (5)

Examines the interrelationship between diet and individual lifestyles with regard to health risks during all stages of life.

Oceanography

OCEA& 101

Intro to Oceanography (NS) (5)

Explore the physical, geological, chemical and biological characteristics of the ocean: waves and tides, ocean and atmosphere circulation, coastal features and beach processes, ocean basins, sediments, ocean chemistry and physics, plate tectonics, and marine life.

Open Door

OD 001

Portfolio & English (1-10)

High School course in which students demonstrate English competency through student self-evaluation of prior education, previous and current employment, and life experiences-in fulfillment of one's high school diploma competencies and graduation requirements. Course requisite: Acceptance into program.

OD 002

CWP, Env Sci, English (1-10)

High School course in which students demonstrate English competency through the study of CWP's and Environmental Science in fulfillment of one's high school diploma competencies and graduation requirements. Course requisite: Acceptance into program.

OD 003

Life Science & English (1-10)

High School course in which students demonstrate English competency through the study of Life Science and scientific thinking in fulfillment of one's high school diploma competencies and graduation requirements. Course requisite: Acceptance into program.

OD 004

Occ Ed & English (1-10)

High School course in which students demonstrate English competency through the study of communication, occupational skills and work opportunities in fulfillment of

one's high school diploma competencies and graduation requirements. Course requisite: Acceptance in program.

OD 005

US Hist, Gov, FA, Engl (1-10)

High School course in which students demonstrate English competency through the study of US History, Government and Fine Arts in fulfillment of one's high school diploma competencies and graduation requirements. Course requisite: Acceptance into program.

OD 006

WA State Hist & English (1-10)

High School course in which students demonstrate English competency through the study of Washington State History in fulfillment of one's high school diploma competencies and graduation requirements. Course requisite: Acceptance into program.

OD 007

Health, Fitness & Engl (1-10)

High School course in which students demonstrate English competency through the study of the emotional, physical, and mental components of health and the development of an individual health and fitness program in fulfillment of one's high school diploma competencies and graduation requirements. Course requisite: Acceptance into program.

OD 008

Algebra 1 (1-5)

High School course in Algebra 1 which students complete in fulfillment of one's high school diploma competencies and graduation requirements. Course requisite: Acceptance into program.

OD 009

Algebra 2 (1-5)

High School course in Algebra 2 which students complete in fulfillment of one's high school diploma competencies and graduation requirements. Course requisite: Acceptance into program.

OD 010

Geometry (1-5)

High School course in Geometry which students complete in fulfillment of one's high school diploma competencies and graduation requirements. Course requisite: Acceptance into program.

Philosophy

PHIL& 101

Intro to Philosophy (H) (5)

Investigate the assumptions philosophers have made about reality, knowledge, truth, God, morality, social construction, freedom, and paternalism.

PHIL 103

Introduction to Ethics (H) (5)

Focus on choices made in concrete circumstances. Study traditional ethical theories and present-day moral dilemmas.

Phlebotomy

PHLE 131

Intro to Phlebotomy Tech (5)

Overview of laboratory procedures and regulations for the medical office laboratory. Prerequisite: MA 139, BIOL 172 with a 2.5 or higher.

PHLE 132

Advanced Phlebotomy (8)

Expansion of Phlebotomy skills introduced in PHLE 131. This course will offer lecture and lab sessions with emphasis on hands-on practice and dexterity for successful and safe venipuncture. Prerequisite: PHLE 131 with a 2.5 GPA or higher.

PHLE 201

Phleb for Healthcare 1 (5)

Overview of laboratory procedures and regulations for the medical office laboratory. Prerequisite: Health-care provider license MA, RN, NA-C.

PHLE 202

Phleb for Healthcare 2 (5)

Expansion of Phlebotomy skills introduced in PHLE 201. This course will offer lecture and lab sessions with emphasis on hands on practice and dexterity for successful and safe venipuncture. Prerequisite: PHLE 201 with a 2.5 GPA or higher and healthcare license.

Physical Education

P E 101

Introduction to Physical Education (3)

A survey course designed for students considering a career in physical education, recreation and sports. Presents background information for the wide scope of career opportunities.

P E 103

Basketball (1)

This course will cover the basic skills and techniques of basketball. Includes team defense and team offense.

P E 107**Cycling Basics (HF) (2)**

A class consisting of road tours of varying distances as well as classroom lectures. Each student must have a bicycle in good repair and an approved helmet.

P E 108**Soccer Fundamentals (1)**

This course will cover the basic skills and techniques of soccer. Includes team defense and team offense.

P E 109**Golf (1)**

Instructions for beginners, fundamentals, rules, and etiquette. Off campus but first class will meet in MSG 115.

P E 110**Physical Fitness (HF) (1)**

Study all five areas of fitness: aerobic endurance, muscle strength, muscle endurance, flexibility, and body composition. Students work at their own fitness levels.

P E 111**Fitness in the Workplace (HF) (1-2)**

Course will increase cardiovascular endurance, flexibility, and increase strength. Students will develop and conduct their own personal fitness program.

P E 113**Beginning Tennis (1)**

Instruction for beginners in fundamentals of the game. Rules and court etiquette. All students need their own racquet. Gold Street courts will be used. First class meets in MSG 115.

P E 115**Volleyball (1)**

This course will cover the fundamental skills and techniques of beginning volleyball. Includes basic rules, scoring and strategy.

P E 120**Lifestyle Mgmt & Exercise (HF) (2)**

Designed to assist individual in making life style changes associated with health and fitness.

P E 121**Stretching & Flexibility (HF) (1)**

Learn and perform safe stretches to increase flexibility and range of motion. Understand how stretching can help decrease injury, recover after other workouts and calm the mind and body.

P E 123**Basic Weight Training/Conditioning (HF) (1)**

Designed to condition the musculature of the body using machine and free weights.

P E 125**Free Weights (HF) (1)**

Designed to develop muscle fitness through lifting free weights, Olympic lifts, plyometrics and power lifting. Students need prior weight training experience.

P E 130**Basketball Applications (3)**

A course designed to provide experience in advanced strategies, fundamental skills, and team concepts of basketball. Prerequisite: PE 103, 167 or instructor permission.

P E 131**Baseball Application I (3)**

Learn the techniques and strategies in a practice or game situation with an emphasis on fundamentals, conditioning, team concept and sportsmanship.

P E 139**Volleyball Applications (3)**

A course designed to provide experiences in advanced strategies, skills, and team concepts of volleyball. Prerequisite: PE 115 or instructor permission.

P E 140**Boot Camp Basics (HF) (1)**

A high-impact exercise class designed to improve muscle strength, endurance, flexibility and aerobic capacity.

P E 141**Elite Fitness (1)**

A combination of cardio, strength, core and circuit training in athletic conditioning format. Topics of athletic durability, athletic functional training, and the typical physical adaptations will be covered throughout the quarter. Prerequisite: instructor permission.

P E 142**Cardio Conditioning (HF) (1)**

A combination of current cardio experiences to improve cardiovascular endurance, body composition, muscle

fitness and flexibility. A variety of movements will be explored, including step aerobics, kickboxing, HIIT, Zumba and circuits.

P E 150

Yoga (HF) (1)

An exercise class integrating components of flexibility, muscular strength and endurance, and relaxation. Students will be encouraged to work at their own level of fitness.

P E 151

Aerobic Fitness/Walking (HF) (1)

A fitness program emphasizing aerobic activities only. Designed to develop cardiovascular endurance, flexibility and body composition.

P E 152

Pilates/Core (HF) (1)

An exercise class designed to teach breathing with movement, body mechanics, balance, coordination, spatial awareness, strength and flexibility.

P E 153

Tai Chi Basics (HF) (1)

Develop balance, lower-body strength and relaxation in motion with Wu Style Tai Chi. Students will work at their own level of fitness.

P E 158

Beginning Tae Kwon Do (HF) (2)

Develop balance, coordination, agility, spatial awareness, strength, and flexibility through the Korean art of Tae Kwon Do. Students will work at their own level of fitness.

P E 159

Intermediate Tae Kwon Do (2)

Further development of the techniques, forms, the sport, and self-defense aspects required to advance to blue belt in the Korean martial art of Tae Kwon Do.

P E 160

Advanced Tae Kwon Do (2)

Further development of the techniques, forms, the sport, and self-defense aspects required to advance to blue and orange belt in the Korean martial art of Tae Kwon Do.

P E 162

Softball Fundamentals (1)

A mental and physical approach to the fundamentals of fastpitch softball. An emphasis will be placed on the basic

skills and concepts needed to play the game effectively.

P E 164

Softball Theory (3)

An analysis of the mental approach to the game of softball. An emphasis will be placed on the theories and strategies of fastpitch.

P E 165

Softball Applications I (3)

Learn how to apply the fundamentals of softball in game like situations.

P E 166

Baseball Fundamentals (1)

On-the-field practice in development of the basic fundamentals of baseball. Emphasis on basic skills and conditioning.

P E 167

Basketball Fundamentals (1)

This course will implement basic fundamentals with theory of various phases of the game. Conditioning for a lifetime activity is an important aspect of the course.

P E 168

Lifetime Fitness (HF) (2)

Cardiovascular endurance, muscle fitness, weight management and flexibility will be studied. One lecture hour and two hours of activity per week.

P E 172

Theory of Baseball (3)

A practical course with emphasis on the coaching of offensive and defensive strategies, theory, psychology and basic rules. First class meets in Gym.

P E 208

Adv Soccer Fundamentals (1)

This course will review basic skills and techniques of soccer. Included in the course will be advanced skills and techniques along with game strategies, team offense and team defense. Prerequisite: PE 108 or instructor permission.

P E 209

Advanced Golf (1)

The course is designed to help the individual develop more advanced skills and strategies of golf. Prerequisite: PE 109 or instructor permission. First class meets in Gym.

P E 210

Advanced Physical Fitness (HF) (1)

Designed to continue the individual's personal health-

related physical fitness - cardiovascular endurance, muscular strength, muscular endurance, body composition and flexibility. Students will be encouraged to work at their own level of fitness. Prerequisite: PE 110 or instructor permission.

P E 211

Advanced Fitness in the Workplace (1-2)

Course will continue to increase cardiovascular endurance, flexibility, and increase strength. Students will develop and conduct their own advanced personal fitness program.

P E 213

Advanced Tennis (1)

For students who are more advanced than the beginning level in tennis. First class will meet in the gym classroom. Borst Court will be used.

P E 215

Advanced Volleyball (1)

Advanced techniques and skills included in competitive volleyball. Advanced offensive and defensive tactics and strategy will be covered. Prerequisite: PE 115 or instructor permission.

P E 223

Advanced Weight Training (HF) (1)

Advanced weight training methods and programs including Olympic lifting and power lifting programs. Prerequisite: PE 123.

P E 229

Physical Fitness Concepts (HF) (3)

A combination of theory and practice in the development of physical fitness. Two lecture hours and two activity hours per week.

P E 230

Advanced Basketball Applications (3)

A course designed to provide experiences in advanced strategies, advanced fundamental skills, and advanced team concepts of basketball. Prerequisite: PE 130 or instructor permission.

P E 231

Baseball Application II (3)

Learn advanced techniques and strategies in a practice or game situation with an advanced emphasis on fundamentals, conditioning, team concept and sportsmanship. Prerequisite: PE 131 or instructor permission.

P E 239

Advanced Volleyball Applications (3)

Provides experiences in advanced techniques and tactics needed to execute advanced team concepts of volleyball.

P E 251

Advanced Aerobic Fitness/Walking (HF) (1)

Advanced aerobic conditioning class for the well-conditioned aerobic athlete. Prerequisite: PE 151.

P E 262

Advanced Softball Fundamentals (1)

Continuation of the physical and mental skills needed for playing fast pitch softball. Emphasis will be on a variety of strategies utilized in the game of softball.

P E 264

Advanced Softball Theory (3)

An advanced analysis of the mental approach to the game of softball. An emphasis will be placed on the theories and strategies of fastpitch. Prerequisite: PE 164.

P E 265

Softball Applications II (3)

Learn how to apply the advanced techniques of softball in game-like situations. Prerequisite: PE 165 or instructor permission.

P E 266

Advanced Baseball Fundamentals (1)

On the field practice in development of the advanced fundamentals of baseball. Emphasis on advanced skills, strategies, and techniques. Prerequisite: PE 166 or instructor permission.

P E 267

Advanced Basketball Fundamentals (1)

More advanced skills practiced. Prerequisite: PE 167 or instructor permission.

Physics

PHYS& 110

Phys: Non-Sci Majrs w/Lab (NS) (5)

A survey of physics with applications in everyday life for non-science majors. Basic concepts in Newtonian mechanics, thermodynamics, electricity, magnetism, optics, and modern physics. Requires knowledge of basic algebra. Includes a 2 hour lab.

PHYS& 114

General Phys I w/Lab (NS) (5)

Fundamentals of classical mechanics. The first of a three quarter sequence for science majors not requiring calculus based physics. Classical mechanics including statics and dynamics of particles, rigid bodies, and fluids. Prerequisite: two years HS algebra and trigonometry or concurrent enrollment in MATH 110.

PHYS& 115

General Phys II w/Lab (NS) (5)

Fluids, electrostatics, simple circuits, and the fundamental laws of thermodynamics. A continuation of PHYS& 114. Prerequisite: PHYS& 114.

PHYS& 116

General Phys III w/Lab (NS) (5)

Magnetism and A.C. circuits, optics, and modern physics. Includes Laws of Faraday, Lenz, and Ampere, geometrical and physical optics, special relativity, atomic and nuclear physics. A continuation of PHYS& 114 and PHYS& 115. Prerequisite: PHYS& 115.

PHYS& 221

Engineering Physics I (NS) (5)

First in a three quarter calculus-based sequence for science and engineering majors stressing classical mechanics. Include dynamics of translational, rotation, and oscillatory systems of solids, particles and fluids. Prerequisite: MATH& 151 and Corequisite: MATH& 152

PHYS& 222

Engineering Physics II (NS) (5)

Wave motion, thermodynamics, and electrostatics. Includes sound, heat transfer, law of thermodynamics, and electric fields. Prerequisite: PHYS& 221 and MATH& 152 and corequisite: MATH& 153.

PHYS& 223

Engineering Physics III (NS) (5)

Optics modern physics, electricity and magnetism. Includes geometrical and physical optics, Maxwell's equations, AC/DC circuits and special relativity. Prerequisite: PHYS& 222 and MATH& 153.

PHYS 270

Research in Physics (AE) (12)

Design a research project, set up experiments, collect data in the lab or in the field, and/or analyze data. Each credit hour requires 33 hours of activity per quarter. Prerequisite: instructor permission.

Political Science

POLS& 101

Intro Political Science (SS) (5)

Exploration of the fundamentals of political science: key concepts, principles, and theories. Analyze why and how leaders make the decisions they do, and why citizens obey most of these decisions.

POLS& 202

American Government (SS) (5)

Students will examine the American political structure and its ideological roots. We will explore how the structure is organized and how it operates.

POLS& 204

Comparative Government (D) (SS) (5)

Examine political theory and application within a comparative framework: ideology, nature of participation, as well as a variety of governmental structures, and functions. Contemporary situations will provide the cases for example and analysis.

POLS 220

International Terrorism (AE) (5)

An introduction to terrorism in contemporary society, focusing on the underlying political, social, economic, cultural and religious causes, its use as a political tool and measures to be taken to counter and prevent its use.

POLS 280

History of American Foreign Relations (SS) (5)

Survey of American foreign relations from the 17th to 21st centuries, focusing on such issues as national security, economic needs, capitalism, and democracy and imperialism.

Psychology

PSYC& 100

General Psychology (SS) (5)

An introduction to the scientific study of behavior: history, research methods, biology of behavior, lifespan development, sensation and perception, learning, memory, intelligence, motivation, emotion, personality, psychological disorders and therapies, and social psychology.

PSYC& 200

Lifespan Psychology (SS) (5)

Human development from conception to death. Basic concepts and principles of biological, cognitive, and psychosocial development are integrated for each age period. Typical developmental tasks as well as problems are emphasized. Prerequisite: PSYC& 100.

PSYC 202

Biopsychology (AE) (5)

Biopsychology, studies the branch of neuroscience that explains human behavior in terms of the biology of the brain, including mechanisms that produce motivation, emotion, and aggression. Prerequisite: PSYC& 100.

PSYC 209

Research Methods (AE) (5)

Overview of scientific method, major research designs, statistical concepts and utilization of materials related to scientific journals. Prerequisites: PSYC& 100 (may be currently enrolled), eligible for ENGL& 101 and college-level math.

PSYC 210

Introduction to Personality (AE) (5)

An introduction to the study of personality, including major theories, with a focus on basic principles of psychology and their application to personality development, personal growth and psychological adjustment. Prerequisite: PSYC& 100 or instructor permission.

PSYC& 220

Abnormal Psychology (AE) (5)

An introduction to the study of abnormal behavior, including behavioral problems, personality disorders and maladjustment, and the study of the causes, diagnoses, and treatment. Prerequisite: PSYC& 100.

PSYC 250

Social Psychology (AE) (5)

The scientific study of how a person's thoughts, emotions and behaviors are influenced by other people. Includes an exploration of: propaganda, persuasion, social cognition, human aggression, prejudice, love, and interpersonal sensitivity. Prerequisite: PSYC& 100 or instructor permission.

PSYC 320

Leadership & Org. Behavior (SS) (5)

Relate theory and research to organizational problems by reviewing advanced concepts in motivation, perception, leadership, decision-making, communication and influence, group behavior, diversity, conflict and cooperation, politics, corporate culture, organizational structure, and environmental influences.

Reading

READ 096

Independent Study (1-5)

Individualized instruction for the student whose needs are not currently being met by the available course offerings. Specialized curriculum and instruction are developed to meet each student's needs. Permission of instructor only.

READ 097

Specific Reading Skill Development (1-3)

This course is designed to provide students with opportunities to improve their reading specifically identified areas of need. Comprehension building, word attack skills, and content area reading are a few of the specific areas that can be targeted by this class.

READ 099

Improvement of Reading (1-5)

Students strengthen thinking, reading comprehension, and vocabulary skills in learning to read and study textbooks, writing summaries, notetaking, and test taking. Completion of course satisfies the basic skill deficiency in reading. Prerequisite: COMPASS placement (reading) 49.

READ 100

Technical Reading (3)

Designed to teach discipline-specific reading strategies useful to students in both vocational and academic areas. It will also teach awareness of academic thought processes and present skills to enhance that thinking process.

READ 110

Speed Reading (3)

Self-paced course for students wishing to increase reading rate and comprehension using proper eye movements, improved vocabulary, and correct reading methods based on reading material. Prerequisite: college level reading and vocabulary skills.

Science

SCIE 104

Intro to Physical Science (NS) (5)

Study the basic concepts of physical science, learn to apply the scientific method to problem solving and popular science, and apply the scientific methods to a project.

SCIE 115

Weather and Climate (NS) (5)

Study of Earth's atmosphere, atmospheric processes, weather, climate, and climate history. Experience will be provided in weather map interpretation, use of

instruments, forecasting, interpretation of past climate conditions, and hands-on dendrochronology. Prerequisite: MATH 098 or equivalent.

Social Studies Teachers

SST 365

Social Studies for Teachers (SS) (5)

Explores the specific concepts and topics in social studies. Applies methods used to teach through integrated thematic units of curriculum and instruction, incorporating current research and best practices for teaching. Prerequisite: Admittance into BAS program or administrator approval.

Sociology

SOC& 101

Intro to Sociology (SS) (5)

Study of society and human interaction. Topics include social ranking, change, deviance, social control, the creation of thought and personality, groups, institutions, political and economic power, social movements, and how to gather valid sociological information.

SOC 125

Sociology of the Family (SS) (5)

Introduction to the study of the family as a social institution. An overview of social theories and methodological underpinnings will be included.

SOC 190

Cooperative Work Experience (1-12)

Cooperative Work Experience allows students to apply classroom learning to on-the-job settings. Credit is earned for new and continued learning taking place in the work environment. Reaching set learning objectives and development of positive work habits are emphasized. The Cooperative Education Coordinator and employees arrange Cooperative Work Experience. 60-360 hrs on-the-job per quarter. Prerequisite: Enrollment in a Work Experience Seminar (BTEC 191-194) is required of Co-op students. You may take the Work Experience Seminar before or in the same quarter as the Co-op course. Instructor permission required.

SOC& 201

Social Problems (SS) (5)

Investigate problems within society and how we view certain social conditions as social problems. Topics include technology, environment, population, economy, class, race/ethnic relations, sexism, ageism, family

problems, education, cities, deviance, crime, mental health, physical health.

SOC 225

Cultural & Ethnic Pluralism (D) (SS) (5)

Examine ethnicity, ethnic identity, and cultural characteristics of ethnic and social groups in North America and around the world. Understand the relationship between social organization and forms of social, economic, and political domination and subordination.

Spanish

SPAN 105

Spanish for Public Service (AE) (3)

Basic Spanish to meet the needs of working professionals who wish to communicate with Spanish speaking persons.

SPAN 106

Spanish for Social Services (AE) (3)

Basic Spanish to meet the needs of working professionals who wish to communicate with Spanish speaking persons.

SPAN 107

Spanish for Social Services (AE) (3)

Basic Spanish to meet the needs of working professionals who wish to communicate with Spanish speaking persons.

SPAN 170

Latin American Texts (D) (H) (5)

A survey course analyzing representative texts of Latin American literature in English from the pre-Columbian period to the present. Develop an understanding of the historical and cultural contexts and apply literary criticism.

SPAN& 121

Spanish I (H) (5)

First class in 100 level sequence. Learn the fundamental skills of listening comprehension, speaking, reading and writing. Develop an awareness of Spanish speaking countries and their cultures.

SPAN& 122

Spanish II (H) (5)

Second class in sequence. Learn the fundamental skills of listening comprehension, speaking, reading and writing. Develop an awareness of Spanish speaking countries and their cultures. Prerequisite: SPAN& 121 or instructor permission.

SPAN& 123

Spanish III (H) (5)

Third class in sequence. Learn the fundamental skills of listening comprehension, speaking, reading and writing. Develop an awareness of Spanish speaking countries and their cultures. Prerequisite: SPAN& 122 or instructor permission.

SPAN 201

Heritage Spanish I (H) (5)

Introduction to academic Spanish for heritage/native speakers. Course is first sequence designed to prepare speakers for more advanced study. Areas of focus included grammar terminology, spelling, accentuation, reading, writing and discussion of cultural topics. Prerequisite: Native or heritage speaker of Spanish, Instructor permission required.

SPAN 202

Heritage Spanish II (H) (5)

Introduction to academic Spanish for heritage/native speakers. Course is second in sequence designed to prepare speakers for more advanced study. Areas of focus include grammar terminology, spelling, accentuation, reading, writing and discussion of cultural topics. Prerequisite: Native or heritage speaker of Spanish, Instructor permission required.

SPAN& 221

Spanish IV (H) (5)

Fourth class in sequence. Learn the fundamental skills of listening comprehension, speaking, reading, and writing. Develop an awareness of Spanish speaking countries and their cultures. Prerequisite: Spanish III or equivalent amount of high school Spanish.

SPAN& 222

Spanish V (H) (5)

Fifth class in sequence. Learn the fundamental skills of listening comprehension, speaking, reading, and writing. Develop an awareness of Spanish speaking countries and their cultures. Prerequisite: Spanish IV or equivalent amount of high school Spanish.

SPAN& 223

Spanish VI (H) (5)

Sixth class in sequence. Learn the fundamental skills of listening comprehension, speaking, reading, and writing. Develop an awareness of Spanish speaking countries and their cultures. Prerequisite: Spanish V or equivalent amount of high school Spanish.

SPAN 260

Latin America Field Trip I (D) (5)

Explore the culture(s) and language(s) of a specific region

of Latin America through first-hand experience. Contact instructors or follow Field Trip links on anthropology or Foreign Language pages of college website for current information. Prerequisite: instructor permission.

SPAN 261

Latin America Field Trip II (D) (5)

Explore the culture(s) and language(s) of a specific region of Latin America through first-hand experience. Contact instructors or follow Field Trip links on Anthropology or Foreign Language pages of college website for current information. Prerequisite: instructor permission.

SPAN 262

Latin America Field Trip III (D) (5)

Explore the culture(s) and language(s) of a specific region of Latin America through first-hand experience. Contact instructors or follow Field Trip links on Anthropology or Foreign Language pages of college website for current information. Prerequisite: instructor permission.

SPAN 263

Latin America Field Trip IV (D) (5)

Explore the culture(s) and language(s) of a specific region of Latin America through first-hand experience. Contact instructors or follow Field Trip links on Anthropology or Foreign Language pages of college website for current information. Prerequisite: instructor permission.

Speech

SPEE 101

Fundamentals of Public Speaking (H) (3)

A course focusing on development, preparation, and delivery skills for beginning public speakers. Attention given to anxiety reduction techniques in addition to the preparation and use of visual aids in informative and persuasive speeches.

SPEE 111

Interpersonal Communication in Film (1)

Highlights concepts introduced in SPEE 110 by using films to identify a different application of the principles of interpersonal communication.

Student Development

SDEV 097

Introduction to Online Learning (0)

Work in an online environment to communicate with others, submit homework, view lessons, and correctly configure technology.

SDEV 099

Study Skills (1-5)

Students learn essential skills needed for effective study. Course includes learning style assessment, time management, study reading, memory techniques, test-taking strategies, and research techniques.

SDEV 100

Start Smart (1)

A seminar for new students on college expectations and communication and technological skills for college. Introduction to academically related technology. Students will participate in small group activities, reading, writing and discussion exercises and practice accessing on-line resources.

SDEV 101

Centralia College 101 (1)

An orientation class emphasizing utilization of campus resources and offering multiple workshops on library research skills, note taking, test taking, stress management, reading skills and memory improvement.

SDEV 105

Career Planning (2)

Students identify interests, skills, personality, and values to evaluate their career goals. Activities: interest inventory, personality assessment, resume writing, mock interview, informational interviews, and online career research. Lecture, discussions, and individual projects are included.

SDEV 126

Career Workshops (1)

Nine workshops cover analyzing peoples' interests, values, aptitudes and personalities as they relate to career success. Includes career information, transfer information, resume writing, interviewing, placement and workforce trends.

SDEV 150

Student Success (3)

Students learn and put into practice concepts related to college success. Topics include exploration of self, learning style, degree and career planning, culture, academic, personal, financial resources, academic skills, and campus involvement.

SDEV 155

College Success (5)

Major topics include setting academic, career and personal goals; effective communication and presentation skills; study, research and test-taking strategies; critical thinking; note taking and memory improvement. Includes

Saturday field trip for challenge course activity.

SDEV 166

Stress Management for Test Anxiety (2)

Identify causes of stress and physical and emotional side-effects. Learn methods for reducing stress, including progressive relaxation, meditation, biofeedback, cognitive analysis, and nutrition and exercise strategies. Management of test and math anxiety is emphasized.

SUBSTANCE USE DISORDER PROFESSIONAL

SUDP 100

Intro to SUDP (5)

Introduction to the field of substance use disorder counseling. Topics include theories surrounding the etiology of addiction, basic psychopharmacology, Federal and State regulations, introduction to prevention, intervention, assessment, treatment planning and case management.

SUDP 110

Counseling Techniques (4)

An overview of techniques and theoretical approaches to substance use disorder counseling. Practical training designed to develop interviewing and substance use disorder counseling skills when working with diverse populations within all levels of care. Prerequisite: SUDP 100 (2.0 of higher) or instructor permission.

SUDP 120

Substance Use & Family (4)

An examination of substance use, misuse, and dependency within the family system. Course emphasis on the integration of Family System and Substance Use Disorder approaches when working with chemically dependent families. Prerequisite: SUDP 100 (2.0 of higher) or instructor permission.

SUDP 130

Drug & Alcohol Responses (5)

Physical, psychological, and behavioral response to alcohol, drugs, and compulsive behaviors. Topics include drug classification, the neurochemistry of addiction, and an overview of basic drug kinetics to include absorption, distribution, metabolism, elimination. Prerequisite: SUDP 100 (2.0 of higher) or instructor permission.

SUDP 200

Law & Ethics (4)

Contemporary legal and ethical issues in substance use disorder counseling including professional and peer relationships, boundaries, NAADAC code of ethics, multiple relationships and values in the counseling relationship, and laws surrounding counseling including confidentiality and HIPAA. Prerequisite: SUDP 100 (2.0 of higher) or instructor permission.

SUDP 210

Cultural Diversity (3)

Designed to explore self-awareness and improve knowledge and skills of substance use disorder professionals while working with the clients from diverse cultural backgrounds. Prerequisite: SUDP 100 (2.0 of higher) or instructor permission.

SUDP 220

Counseling Adolescents (5)

An overview course covering the Bio-Psycho-Social risk and protective factors associated with adolescent substance use, misuse, and dependency. Topics: Adolescent brain development; assessment, treatment, and referral; client, family, and community education, prevention, and intervention. Prerequisite: SUDP 100 (2.0 of higher) or Instructor Permissions.

SUDP 230

Assess & Treatment Plans (5)

Course introduces students to the current standard used in assessing, diagnosing, and treating those with substance use and co-occurring disorders. Prerequisite: SUDP 100 (2.0 of higher) or Instructor Permission.

SUDP 240

Group Counseling (5)

An introduction to group dynamics and group process, as applied to Substance Use Disorder counseling. Topics include group formation and planning, ethical considerations, diversity, group developmental stages, documentation, and group counseling approaches/techniques. Prerequisite: SUDP 100 (2.0 or higher), or instructor permission.

SUDP 250

Relapse Prevention (2)

An overview of the recovery process with an emphasis on Relapse Prevention. Topics include identifying warning signs of relapse, Post-Acute Withdrawal Syndrome, and developing effective relapse prevention strategies and techniques with the client. Prerequisite: SUDP 100 (2.0 or higher), or instructor permission.

SUDP 260

Supervised Practicum (5)

Allows the student to bridge their classroom education and training in a supervised practicum in a pre-arranged faculty approved facility for 150 supervised hours that includes a minimum of 50 face-to-face hours under direct supervision. Prerequisite: SUDP 100 (2.0 or higher), or instructor permission.

Industrial Trades

TRDS 100

Industrial Safety (5)

Theory and application of tools and practices as used in an industrial setting. Students will develop skills and habits as well as safety practices, procedures, and equipment. Basic firefighting equipment and procedures will be included.

TRDS 110

Mechanical Systems Lab (2)

Introduction to components and safe operation of mechanical drive systems. Machines, drive systems, and operation of various tools will be studied. Applying mechanical power transmitting devices and associated components as used in an industrial setting. Co-requisite: TRDS 120.

TRDS 120

Mechanical Systems (3)

Mathematical operations in Industrial Trades settings, as applicable to mechanical systems and thermodynamics. Prerequisite: MATH 95 or equivalent; co-requisite: TRDS 110.

TRDS 130

Fluid Systems Lab (2)

Students will engage in practical exercises that will aid understanding basic fluid systems. Safe operation of fluid systems will be emphasized. Course covers fluid characteristics, component symbols, control valves, pumps, and reservoirs. Co-requisite: TRDS 140

TRDS 140

Fluid Systems (3)

Application of mathematical operations in Industrial Trades settings, emphasizing the use of mathematics to study the engineering field of Fluids; Hydraulics and Pneumatics, as used in industry. MATH 95 or equivalent. Co-requisite: TRDS 130.

TRDS 150

Print Reading (2)

The foundation of print reading in the industrial trades. Included is print reading relative to welding, pipe-fitting,

electrical, fluids, and construction.

TRDS 160

CAD for Industry (2)

Introduction to computer-aided drafting (CAD), editing, dimensioning, drawing aids, and layer control design used in the industrial trades. Prerequisite: TRDS 150 OR instructor permission.

TRDS 170

Electrical Systems Lab (2)

The exploration and application of fundamental principles of AC/DC electrical systems found on industrial systems. Prerequisite: TRDS 120, TRDS 140 or equivalent; co-requisite: TRDS 180.

TRDS 180

Electrical Systems (3)

Application of mathematical operations in relation to Industrial Trades electrical systems. Prerequisite: TRDS 120, TRDS 140, or equivalent; co-requisite: TRDS 170.

Welding

WELD 151

Welding for Mechanics (5)

Introduction of cutting and welding processes. Includes information on welding equipment and material, various welding techniques and proper safety procedures. Prerequisite: DET 110 or DET 130 or instructor permission.

WELD 159

Oxyfuel & GTAW Welding (12)

Theory and practice of oxyacetylene welding, brazing, cutting and gas tungsten arc welding. Safety, handling and use of compressed gases, materials, types of weld joints, and procedures. Prerequisite: GPA 2.0 or higher in WELD 164 or instructor permission.

WELD 161

SMAW Welding (12)

Shielded metal arc welding safety, joint design, electrode selection, welding machine setup and operations. Lab practice will include butt, lap, tee and corner joints in all positions. Weld testing and air carbon arc cutting included.

WELD 164

GMAW Welding (12)

Gas metal-arc welding (GMAW) and flux-cored arc welding (FCAW)safety, setup, operation and troubleshooting. Lab practice includes butt, lap, tee and corner joints in all positions. Also includes GMAW with

aluminum and AWS weld testing. Prerequisite: GPA 2.0 or higher in WELD 161 or instructor permission.

WELD 167

Metallurgy for Welders (3)

Study of metals relevant to welding technology, extraction of metals from ores, refining metals, the manufacture of metal products, mechanical, physical and chemical properties of metals and the hardening, tempering and heat treating of metals.

WELD 180

Oxyfuel & GTAW (5)

Safety, setup, brazing, cutting, and welding in all positions using oxy-fuel and gas tungsten arc welding equipment.

WELD 181

Shielded Metal Arc Welding (5)

Safety, setup, and welding in all positions using AC/DC arc welding equipment on carbon steel.

WELD 182

Gas Metal Arc Welding (5)

Safety, setup, and welding in all positions using gas metal arc and flux cored arc welding equipment.

WELD 190

Cooperative Work Experience (1-12)

Cooperative Work Experience allows students to apply classroom learning to on-the-job settings. Credit is earned for new and continued learning taking place in the work environment. Reaching set learning objectives and development of positive work habits are emphasized. The Cooperative Education Coordinator and employees arrange Cooperative Work Experience. 60-360 hours on-the-job per quarter. Prerequisite: Enrollment in a Work Experience Seminar (BTEC 191-194) is required of Co-op students. You may take the Work Experience Seminar before or in the same quarter as the Co-op course. Instructor permission required.

WELD 265

Advanced Arc Welding (12)

Theory and practice of advanced shielded metal arc welding (SMAW) to prepare for the Washington Association of Building Officials (WABO) certification tests on plate and pipe. Prerequisite: GPA 2.0 or higher in WELD 161 or Instructor permission. Completion of year 1 welding.

WELD 267

Adv. Gas Shielded Arc Welding (12)

Advanced Gas Metal Arc Welding (GMAW), Flux Cored Arc Welding (FCAW), and Gas Tungsten Arc Welding (GTAW)

techniques for all position plate and pipe welding. This course prepares welders for WABO certification. Prerequisite: WELD 164 or permission of instructor.

WELD 268

Gas Shielded Arc Welding (9)

Exercises enable students to prepare for the Washington Association of Building Officials tests. Includes Gas Metal Arc, Flux Cored Arc and Gas Tungsten Arc Welding on test plates and pipe in all positions; Oxy fuel introduced. Concurrent enrollment in WELD 267. Prerequisite: WELD 164 or permission of instructor.

WELD 269

Advanced Fabrication (11)

Blueprint interpretation, layout tools and procedures, oxy-fuel and plasma cutting, fitting, and welding fabrication projects. Prerequisite: WELD 267 with a 2.0 or higher or instructor permission.

WELD 270

Advanced Fabrication and Welding Procedure

Lab (6)

Fabrication and fitting tools, setup, and procedures. Butt and tee joint will be required in the flat position using various welding processes. Students will have the opportunity to work on individual projects. Prerequisite: WELD 268 or permission of instructor. Corequisite: WELD 269.

WELD 271

Blueprint Reading (3)

Fundamentals of drawing interpretation in the welding trade. Included are blueprint reading, welding symbols, fabrication techniques, identification of welds, and welding abbreviations.

WELD 281

Advanced Gas Metal Arc Welding - Aluminum (5)

Provides a thorough understanding of welding safety and gas metal arc welding of aluminum. Prerequisite: WELD 165, WELD 181 or prior welding experience with permission of instructor.

WELD 285

Arc Welding Certification (5)

Practical exercises enable students to prepare for the Washington Association of Building Officials (WABO) certification tests in gas metal arc welding (GMAW), flux cored arc welding (FCAW), and shielded metal arc welding (SMAW). Prerequisite: prior welding experience required.

WELD 287

Welding Fabrication (5)

Fabrication and fitting tools, setup and procedures. Students have the opportunity to work on individual projects and/or cooperative work experience. Prerequisite: prior welding experience required.

DIRECTORY

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Debbie Campbell (2018)
Stuart Halsan (2011)
Mark Scheibmeier (2017)
Court Stanley (2020)

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Director of Student Life & Involvement.....Shelley Bannish
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Director of Custodial & GroundsCasey Rice
Executive Director of Fiscal ServicesMarla Miller
Director of Institutional Budgets/Payroll.....Lisa Rice
Director of Maintenance & Construction Projects Rick Perkins

Director of Information TechnologySamuel Small

This directory of Centralia College faculty and staff includes the year the individual began at Centralia College followed by the subject area of instruction (for faculty), college or university where a degree was earned and the field of study for the highest graduate degree earned.

Teresa Adams (2019) Assistant Professor, Mathematics. B.S., Gonzaga University; M.S., Eastern Washington University.

Catherine Aden (2019), Career and Technical Education (CTE) Navigator. B.S., Concordia University.

Toby Avalos (2017), Associate Professor, Anthropology. A.A., Truckee Meadows Community College; B.A., University of Nevada; M.A., New Mexico State University; Ph.D., University of Iowa.

Shelley Bannish (1987), Director of Student Life and Involvement. B.A., Central Washington University; Master of Arts in Community College Management, Antioch University, Ohio.

Erin Baker (2014) Assistant Director of Student Success and Retention. A.A., Centralia College, B.A., Central Washington University.

Ryer Banta (2016), Associate Professor/Librarian. B.A., Montana State University; M.S., University of Washington.

Jeanene Bauska (2021) Assistant Professor, Nursing. A.A., Lower Columbia College.

Jacob Beach (2018), Coordinator of Esports/Student Life Advisor. A.A., Fullerton College.

Tadd Belden (2007), Associate Professor, Criminal Justice. B.A. and M.P.A., Western Michigan University.

Kelli Bloomstrom (2010) Dean, Transitional Studies and Centralia College East. B.A., Saint Martin's University; M.A., Central Washington University.

Tara Boerner (2016), Assistant Professor, Medical Assistant. A.A.S., Centralia College.

Cindy Broadbent (1996), Talent Search Program Specialist. B.A., The Evergreen State College, Communications/Liberal Arts.

Mark Brosz (1994), Associate Professor, Basic Math. A.S., Centralia College; B.A., University of Washington.

Christian Bruhn (2015), Dean of Arts & Sciences. B.S., Central Washington University; M.S., Central Washington

University.

Monica Brummer (2017), Director, Pacific NW Center of Excellence for Clean Energy. B.S., Oregon State University.

Rachel Bryant-Anderson (2019) Assistant Professor, Sociology. B.A., Oregon State University; M.A. and Ph.D., University of California-Santa Cruz.

Bobby Burger (2020), Assistant Professor, Business Administration. A.A., Community College of the Air Force; B.A. and M.B.A., California State University East Bay.

Andrew Burghardt (2021), Video and Photography Specialist. B.A., Central Washington University.

Joe Burr (2014), Assistant Professor, Adult Basic Education. B.A., The Evergreen State College; M.Ed., St. Martin's University.

Vann Cantin (1984), Assistant Professor, Computer Science. B.A., The Evergreen State College.

Mary Capen (2014), Associate Professor, Nursing. A.A. and A.A.S., Centralia College; B.S., University of Phoenix; M.S., Grand Canyon University.

Bruce Carley (2011), Associate Professor, Building Maintenance.

Lisa Carlson (1999), Professor, General Biology/Botany. M.A., University of Virginia; Ph.D., University of Washington, Ecosystems Analysis.

Barbara Chapman (2011) MERIT Verification Operations Manager. A.T.A. and A.A., Centralia College; B.A., Mayville State University.

Richard Cowan (2019), Assistant Professor, CTAP. B.A., University of Hawaii.

Robert Cox (2014), Vice President of Student Services. A.A., Centralia College; B.A., Western Washington University; M.A. and Ed.D., Oregon State University.

Teresa Cox (2020), Interim Director, Program

Development. A.A., Centralia College; B.A., St. Martin's University; M.A., Washington State University; Ed.D., University of Washington.

Rulon Crawford (2007), Assistant Professor, Energy Technology. B.S. Eastern Oregon University; M.B.A.; Marylhurst University.

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