

# Course Offerings

2025-2026

CULTIVATE  
LEARN SOMETHING NEW @  
NORTH VALLEY  
CURIOSITY

North Valley Career and Technology Center is a regional facility committed to excellence in education, providing diverse populations with learning opportunities that reflect the changing needs of the community and workplace.

# Agriculture Education



**Instructor: Callahan Lemar**

**Grade Level: 10-12**  
**Credits: 1/2 per semester**  
**Prerequisite: None**  
**Online**

## **Agricultural Business Management (01035)** *2nd Semester*

A course designed to introduce the students to agribusiness management in the free enterprise system. It includes a study of economic principles, budgeting, recordkeeping, finance, risk management, business law, marketing, and careers in agribusiness. Leadership development and supervised agricultural experience programs are an integral part of this course.

CAREER CLUSTER - Agribusiness Systems

**Grade Level: 10-12**  
**Credits: 1/2 per semester**  
**Prerequisite: None**  
**Online**

## **Agricultural Sales and Service (01034)** *1st Semester*

To provide students with skills necessary for entry into employment or furthering education in agriculture sales and service. The course deals with business organizations, business structures, job responsibilities, job applications, and interviewing, human relations, marketing, selling, displaying, using business machines, business accounting, and management skills. Learning activities are varied with classroom, laboratory, and field experiences. Leadership development and supervised agricultural experience programs are an integral part of this course.

CAREER CLUSTER - Agribusiness Systems

**Grade Level: 10-12**  
**Credits: 1 per year**  
**Prerequisite: None**  
**Online**

## **Agronomy Science (01025)**

Agronomy is the study of plants and how they relate to soil. This course will study units in such areas as principles of crop science, field crops, plant anatomy, plant physiology, and the basics of safe and sustainable food and fiber production.

CAREER CLUSTER - Plant Systems

# Agriculture Education

(Continued)



Grade Level: 10-12  
Credits: 1 per year  
Prerequisite: Priority  
given to students who  
have taken Intro to  
AFNR

## **Botany/Horticulture I (01053)**

*May count as a science credit.*

This course teaches students how to grow and maintain greenhouse and nursery plants while exploring plant science, soils, and entomology. Students will study plant structures, functions, processes, and reproduction, along with environmental and conservation concepts. Landscape design units will prepare students to create and maintain outdoor spaces for homes and recreational areas. This course connects scientific principles to real-world agricultural applications and includes leadership development and supervised agricultural experiences. CAREER CLUSTER - Natural Resources/Environmental Service Systems/Plant Systems

Grade Level: 11-12  
Credits: 1 per year  
Prerequisite:  
Botany/Horticulture I

## **Botany/Horticulture II (01054)**

*May count as a science credit.*

A continuation of Botany/Horticulture I.  
CAREER CLUSTER - Natural Resources/Environmental Service Systems/Plant Systems

Grade Level: 9-12  
Credits: 1 per year  
Prerequisite: Priority  
given to students who  
have taken Intro to  
AFNR

## **Food Science (01086)**

Food Science is a specialization course in which students complete hands-on activities, projects, and problems that simulate actual concepts and situations in the food science and safety industry, allowing students to build content knowledge and technical skills. Students will investigate areas of food science, including food safety, food chemistry, food processing, food product development, and marketing

# Agriculture Education

(Continued)



**Grade Level: 9-12**  
**Credits: 1 per year**  
**Prerequisite: None**

## **Introduction to Agriculture, Food, and Natural Resources (01080)**

Introduction to AFNR (Agriculture, Food, and Natural Resources) will introduce students to the world of agriculture, the pathways they may pursue, and the science, mathematics, reading, and writing components they will use throughout the CASE curriculum. Student experiences will involve the study of communication, the science of agriculture, plants, animals, natural resources, and agricultural mechanics.

CAREER CLUSTER – ALL

**Grade Level: 10-12**  
**Credits: 1 per year**  
**Prerequisite: None**  
**Classroom or Online**

## **Veterinary Science I (01067)**

This course prepares students for careers in animal science by introducing veterinary practices for both large and small animals. Students will explore veterinary medicine history, professional ethics, and the human-animal bond while learning about animal anatomy, behavior, and disease identification. Hands-on lab and field investigations will teach students to conduct clinical exams, operate veterinary equipment, and determine proper nutrition for animal health. This course provides essential skills for careers in veterinary science and animal care.

**Grade Level: 11-12**  
**Credits: 1 per year**  
**Prerequisite:**  
**Veterinary Science I**  
**Online**

## **Veterinary Science II (01061)**

This course is a continuation of Veterinary Science.

CAREER CLUSTER – Animal Systems

# Automotive Technology



## Instructor:

**Grade Level:** 10-12  
**Credits:** 1 per year  
**Prerequisite:** None  
**Classroom or Online**

### **Introduction to Auto Technology (17032)**

To begin preparation for employment as an ASE-certified auto technician. This sequential course will include topics on vehicle engines, power transmission, steering, brakes, and electrical systems. This course will also explore the various careers in the Automotive industry. This course is a suggested prerequisite to Automotive Technology.

TRANSPORTATION, DISTRIBUTION, AND LOGISTICS CAREER CLUSTER – Facility & Mobile Equipment Maintenance

**Grade Level:** 10-12  
**Credits:** 2 per year  
**Prerequisite:** None

### **Auto Technology (2 hour) (17037)**

This course covers in depth the safety and tools, engine service, suspension and steering, brakes, drive train, HVAC, electrical and engine performance. TRANSPORTATION, DISTRIBUTION, AND LOGISTICS CAREER CLUSTER – Facility & Mobile Equipment Maintenance

**Grade Level:** 12  
**Credits:** 1 per year  
**Prerequisite:** Priority given to seniors who currently hold a Class D License.

**Classroom or Hybrid**  
**Instructor:** Bryan Stastny

### **Commercial Drivers License (CDL) (17045)**

The focus of this class is to give the students an understanding of what is needed to obtain the CDL certification. You will start with the basics and move up to the finer points of the trade. Topics include required CDL Manual subjects such as General Knowledge, Air Brakes, and Combination Vehicle, as well as Tanker, Doubles/Triples, and Hazmat endorsements. Also covered are hours of service, weight and balance, vehicle out-of-service regulations, and National Safety Council professional truck driver DDC. At the end of the year students should have the skills needed to obtain a CDL permit and begin to work on the skills needed to pass the CDL drivers test. TRANSPORTATION, DISTRIBUTION, AND LOGISTICS CAREER CLUSTER – Transportation Operations

# Business Education



**Instructors: Susan Shuley and Joey Demers**

**Grade Level: 10-12**  
**Credits: 1 per year**  
**Prerequisite: None**  
**Instructor: Joey Demers**

## **Accounting I/II (14010/14011)**

**Accounting I:** Students will learn the fundamentals of Accounting principles that include: terminology, accounting cycle, basic concepts, financial statements, roles of accountants and ethics in accounting. A manual simulation packet is integrated in the course.

**Accounting II:** Students will continue learning the fundamental concepts of Accounting. Topics covered include terminology, accounting cycle, basic concepts, financial statements, roles of accountants and ethics in accounting. An automated simulation packet is integrated in the course.

FINANCE CAREER CLUSTER – Accounting

**Grade Level: 11-12**  
**Credits: 1 per year**  
**Prerequisite:**  
**Accounting I/II**  
**Instructor: Joey Demers**

## **Accounting III/IV (14012/14013)**

**Accounting III:** Students will acquire a more thorough, in-depth knowledge of accounting procedures and techniques utilized in solving business problems and making financial decisions. Students will develop skills in analyzing and interpreting financial information common to businesses. A contemporary automated business simulation set that lets the students put accounting skills into practice is included.

**Accounting IV:** Students will continue to develop skills in analyzing and interpreting information common to corporate forms of organization, preparing formal statements and supporting schedules, and using inventory and budgetary control systems. Higher level corporate, managerial and cost accounting concepts are presented in this course. A contemporary automated simulation set that lets the student put accounting skills into practice is included.

FINANCE CAREER CLUSTER – Accounting

# Business Education

(Continued)



Grade Level: 9-12  
Credits: 1 per year  
Prerequisite: None  
Instructor: Susan Shuley

## **Developing Leaders (14060)**

This class introduces students to communication methods, time management, and presentation skills. Through group projects, they research, prepare, and present formal and informal materials while developing leadership and soft skills. Guest speakers share insights, and students create a platform issue to benefit the community, building confidence and preparing for future careers.

BUSINESS MANAGEMENT & ADMINISTRATION  
CAREER CLUSTER - ALL

Grade Level: 9-12  
Credits: 1 per year  
Prerequisite: None  
Instructor: Susan Shuley

## **Financial Literacy (04081/04082)**

Manage spending to meet financial goals and minimize the impact of financial obstacles. Learn how to control personal credit and debt. Explore how to boost personal earning capability. Put personal assets to work to build wealth.

Understand how to use financial services in a sensible and cautious manner. Gain knowledge in protecting personal property, financial resources, and personal information. BUSINESS MANAGEMENT & ADMINISTRATION CAREER CLUSTER - Administrative Support

# Construction Technology



**Instructor: RJ Sanders**

**Grade Level: 10-12**  
**Credits: 1 per year**  
**Prerequisite: None**

## **Construction Technology (1 hour) (17100)**

Learn about the construction industry. Students learn the basics of concrete, floor framing, wall framing, rafter and roof framing, shingling, and exterior finishing by completing construction projects. ARCHITECTURE & CONSTRUCTION CAREER CLUSTER - Construction

**Grade Level: 11-12**  
**Credits: 2 per year**  
**Prerequisite: None**

## **Construction Technology (2 hour) (17117)**

Students learn about various building materials, use and care of tools, and foundation, floor, wall, and roof construction while working on construction projects. Students are introduced to concrete, plumbing, and electrical installation, interior wall finishing, insulating, stair construction, and window and door installation. ARCHITECTURE & CONSTRUCTION CAREER CLUSTER - Construction



# Family and



# Consumer Sciences

**Instructor: Katelyn Mondry**

## **Child Development (09026)**

*1st Semester*

Students will explore the parenting roles that most adults will assume at some time during their lives. Content will include readiness for parenthood, financial concerns of parenting, family communication and providing and environment for optimum child growth and development. Students will study how children grow and develop and foster acquisition of skills that promote healthy development of the individual. Content will include human growth and development, prenatal development and care, how children learn, processes in individual development, and current issues relating to children and families.

**Grade Level: 10-12**

**Credits: 1/2 per semester**

**Prerequisite: None**

## **Teaching Professional (09041)**

*2nd Semester*

The overall goal is to provide opportunities for students to explore education as a career and examine teaching strategies, learning styles, time management and planning strategies, presentations and questioning skills, classroom management, and evaluation techniques. After earning credit in this course, students would be eligible to participate in an Education Cooperative Work Experience the following year/s where they will be paired up and work with a teacher putting the skills they learned to use.

**Grade Level: 10-12**

**Credits: 1/2 per semester**

**Prerequisite: None**

# Health Science

Instructor: Valerie Heuchert, BSN



Grade Level: 10-12  
Credits: 1/2 per  
semester  
Prerequisite: None

## **Introduction in Nursing (07038)**

*2nd Semester*

This course introduces students to professional nursing roles and attributes encompassing fundamental human needs, the nursing process, judgment, ethical professionalism, and concepts of health promotion and disease prevention. This course emphasizes the legal and ethical considerations shaping nursing roles, while also exploring professional standards, scope of practice, and the impact of social forces on nursing within the healthcare delivery system.

HEALTH SCIENCE CAREER CLUSTER - Therapeutic Services

Grade Level: 10-12  
Credits: 1 per year  
Prerequisite: None

## **Basic Patient Care (07032)**

The Nursing Assistant Training program prepares students for careers as a certified nurse assistant in a skilled nursing facility, acute care, or home health care through classroom instruction and clinical practice. Topics include geriatric care, medical abbreviations, safety promotion, medical math, and CNA training. Students may challenge the CNA exam through the North Dakota Board of Nursing, a key step for college health science programs. Opportunities for First Aid and CPR certification may also be available.

HEALTH SCIENCE CAREER CLUSTER - Therapeutic Services

Grade Level: 10-12  
Credits: 1 per year  
Prerequisite: None

## **Health Science I or II (07033/07035)**

This course introduces students to core concepts related to various health careers. Topics include medical terminology, human anatomy and physiology, health care systems, infection control, and the role of technology in medicine. Students will explore the history of health care, human growth and development, and key body systems while gaining foundational knowledge for future medical studies. The curriculum rotates every other year, allowing students to take the course for two consecutive years.

HEALTH SCIENCE CAREER CLUSTER - Therapeutic Services

# Health Science

(Continued)



Grade Level: 11-12

Credits: 1/2 per  
semester

Prerequisite: None

## **Medical Terminology (07036)**

*1st Semester*

Introduces students to the health information technology field. Students will learn prefixes, suffixes, and root words while building a medical vocabulary based on body systems. Topics include anatomy, physiology, pathological conditions, diagnostic procedures, and common medical abbreviations. This class is available for three college credits through Lake Region State College.

HEALTH SCIENCE CAREER CLUSTER - Therapeutic Services

Grade Level: 10-12

Credits: 1 per year  
Prerequisite: None

## **Sports Medicine (07034)**

This course provides the student with a background in athletic training and basic health care. The course emphasizes injury prevention, first responder management daily for athletic injuries, and skills to fulfill the activities of daily living. Students will be able to complete the requirements to become a student athletic trainer.

HEALTH SCIENCE CAREER CLUSTER - Therapeutic Services

# Marketing Education

**Instructor: Joey Demers**



**Grade Level: 10-12**  
**Credits: 1 per year**  
**Prerequisite: None**  
**Classroom or Online**

## **Marketing I (04210)**

This course is designed to develop students' understanding and skills in such areas as business law, communication skills, customer relations, economics, emotional intelligence, financial analysis, human resource management, information management, marketing operations, professional development, and strategic management. Students acquire knowledge of fundamental business activities and factors affecting business, develop verbal and written communication skills, use information literacy skills, utilize job-seeking strategies, and participate in career planning.

MARKETING CAREER CLUSTER - ALL

**Grade Level: 11-12**  
**Credits: 1 per year**  
**Prerequisite: 1**  
**Marketing or**  
**Business Credit**

## **Model Store (DECA Depot) (04290)**

This course is designed to prepare students for employment. The DECA Depot provides a model store complete with modern business equipment. Retail operation and marketing activities integrated with classroom learning, including involvement in real work situations, various store responsibilities and other relevant activities; participation in total store operations by student rotation through the store departments of management, merchandising, sales promotion, and controlling.

MARKETING CAREER CLUSTER - ALL

# Marketing Education

(Continued)



Grade Level: 9-12  
Credits: 1/2 per  
semester  
Prerequisite: None

## **Multimedia (04235)**

*1st Semester*

Designed to allow students to use digital images and videos to create meaningful documentation, production, and presentations. Images, logos, backgrounds, and navigation tools for digital display will be used in multimedia and Internet applications. The topics of image-editing, and planning for multimedia applications will also be discussed. Enhancements include proper format and appropriate use of graphics, animations, and transitions.

MARKETING CAREER CLUSTER – ALL

Grade Level: 9-12  
Credits: 1/2 per  
semester  
Prerequisite: None

## **Principles of Marketing (04080)**

*2nd Semester*

An introductory course that develops student understanding and skills in such areas as business law, communication skills, customer relations, economics, emotional intelligence, financial analysis, human resources management, information management, marketing, operations, professional development, and strategic management. Students acquire knowledge of fundamental business activities and factors affecting business, develop verbal and written communication skills, use information literacy skills, utilize job-seeking strategies, and participate in career planning.

MARKETING CAREER CLUSTER – ALL

Grade Level: 10-12  
Credits: 1 per year  
Prerequisite: None  
Classroom or Online

## **Sports and Entertainment Marketing (04240)**

One of the largest industries in the world, sports marketing provides a unique way of looking at the business world. This course will focus on the two main aspects of sports and entertainment marketing: 1) The marketing of sports and entertainment, and 2) The marketing of non-sports products and services through sports. You will discover why companies pay to be associated with a team or entertainer, how to develop ticket plans to fill the seats in the arena, why targeting your marketing efforts is so important, and more. MARKETING

CAREER CLUSTER – Professional

Sales/Merchandising/Marketing Communication

# Welding and Manufacturing



**Instructors: Bryan Stastny and Mike Schmidt**

**Grade Level: 9-12**  
**Credits: 1 per year**  
**Prerequisite: None**  
**Instructor: Mike Schmidt**

## **Emerging Technology (17113)**

An applied technology course studying our ever changing technology in today's society. A hands-on course designed to further students' knowledge in some of the more advanced, as well as practical technology fields. This is aided by the use of such equipment as a CNC lathe/mill to produce self-designed products. Students will also receive training in other CNC areas such as in the laser engraver, plasma table, router, 3D printer, and embroidery machine. MANUFACTURING CAREER CLUSTER - Production

**Grade Level: 10-12**  
**Credits: 2 per year**  
**Prerequisite: Priority given to students who have taken Emerging Technology**  
**Instructor: Mike Schmidt**

## **Advanced Manufacturing (2 hour) (17230)**

Covers the theory and shop work related to teaching safe and intelligent operation of machines found in industry are emphasized. Students will learn about the manufacturing industry's concepts and career opportunities. Course offerings will include machining, blueprint reading, fabrication, robotics, assembly, industry terminology, safety, tools, milling, electrical principles, and measurement. MANUFACTURING CAREER CLUSTER - Production

## **Welding Technology (17236-1 credit/17237-2 credits)**

Students learn the various welding processes: Oxy-Fuel weld and cutting, Shielded metal arc weld (Stick), Gas metal arc weld and Flux core arc weld (wire feed), Gas tungsten arc weld (Tig), Plasma arc cutting, and Air arc gouging. General shop safety and theory of each weld process along with blueprint reading, weld symbols, weld joints and positions, and properties of metals are studied. Students completing required standards will be eligible to test for A.W.S. entry level weld certification. This class is available for three college credits through NDSCS.

MANUFACTURING CAREER CLUSTER - Production

**Grade Level: 10-12**  
**Credits: 1 or 2 per year**  
**Prerequisite: None**  
**Instructor: Bryan Stastny**

# Work-Based Learning

**Grade Level: 9-11**  
**Credits: 1 per year**  
**Prerequisite: 1 credit in any program area**

## **Summer Internship**

A temporary position that allows students to gain practical work experience in a specific field. It is a valuable opportunity for high school students to apply what they have learned in the classroom to real-world situations. During an internship, students work closely with professionals in their chosen field, gaining hands-on experience, developing new skills, and building professional networks that can help them in their future careers.

**Grade Level: 11-12**  
**Credits: 4 per year**  
**Prerequisite: 2 credits in one pathway**

## **Cooperative Work Experience**

This course provides students with a regularly scheduled, supervised employment opportunity during school hours to develop and improve work skills consistent with the student's occupational goals. The employment must be preceded by, or concurrent with, classroom instruction related to the work experience.

## **MISO3 Codes**

Agriculture Education: 01999

Business Education: 14999

Family and Consumer Science: 09299

Health Science: 07999

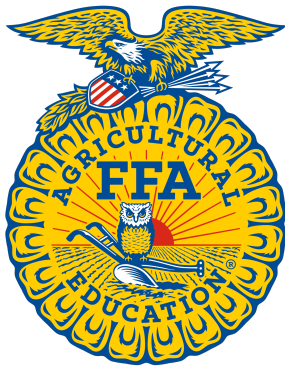
Marketing Education: 04999

Trade and Industry: 17999

# Career and Technical Student Organizations

Joining a career & technical student organization (CTSO) is a great way to grow your leadership skills and ensure that you are career ready. Each student organization is affiliated with a CTE program area.

## Agriculture Education



## Business Education



## Health Science



## Marketing Education



## Trade and Industry



To learn more about getting involved, talk to your instructor.