

Renewable Energy

sUAS (Drones)

Associate of Applied Science



CLOUD COUNTY
Community College

Across the U.S. and around the world, small unmanned aircraft systems (sUAS; under 55 lbs.) are rapidly transforming businesses and industries. UAV's, or drones, are projected to be a \$21 billion industry by 2022. UAV's are already being implemented in agriculture, infrastructure, package delivery, EMS, law enforcement, wind turbine blade inspections, utility substation and power line inspections, wildlife monitoring and reporting, mining, pipeline inspection, and real estate to name just a few. Almost every industry in the next few years will be utilizing UAVs in some capacity. The CCCC sUAS program provides training for students who want to become involved in an industry in its infancy. CCCC offers a one-year certificate and a two-year Associate of Applied Science degree program in sUAS.

General Education Required Courses **19 cr**

Communication Requirement **6**

- __CM101 English Composition I (3 cr) **or**
- __CM120 Survey of Technical Writing (3 cr)
- __CM115 Public Speaking (3 cr) **or**
- __CM240 Interpersonal Communication (3 cr)

Humanities Requirement **3**

- __Art
- __Music
- __Theatre
- __Foreign Language
- __Humanities
- __Literature
- __Philosophy
- __History

Mathematics Requirement **3**

- __MA104 Technical Math (3 cr) **or**
- __MA110 Intermediate Algebra (3 cr) **or**
- __Mathematics General Education Course

Natural Science Requirement **4**

- __SC107 Meteorology (4 cr) *recommended*

Social/Behavioral Science Requirement **3**

- __SS101 General Psychology (3 cr) *recommended*

Required Courses **27 cr**

- __UA100 Introduction to sUAS **3**
- __UA110 sUAS Ground School **3**
- __UA140 sUAS Applications **3**
- __UA150 sUAS Personnel, Safety, & Crew Res. Mgmt **3**
- __UA201 sUAS Command, Control, & Comm. **3**
- __UA210 sUAS Systems & Conceptual Design **3**
- __WE240 GIS/GPS **3**
- __WE250 Data Acquisition and Communications **3**
- __WE255 Airfoils and Composite Repair **3**

Elective Courses * **16 cr**

- __AG255 Precision Ag Hardware **3**
- __AG256 Precision Ag Software **3**
- __AR129 Introduction to Digital Photography **3**
- __CS140 Introduction to Robotics **3**
- __CS141 Introduction to Additive Manufacturing (3D Printing) **3**
- __CS145 Introduction to CAD **3**
- __CS155 Networking & Computer Technology **3**
- __EC101 Principles of Macroeconomics **3**
- __MG102 Introduction to Entrepreneurship **3**
- __SC109 Applied Physics **3**
- __WE110 Electrical Theory **3**
- __WE280 Wind Energy Technology Internship **4**

Total Credits Required 62

*All electives should be selected with assistance from an advisor

General Education substitutions must be approved by the Vice President for Academic Affairs.

Program substitutions must be approved by the department chair.

Recommended Course Sequence:

First Semester: UA100, UA110, WE110, WE250, MA110
 Second Semester: UA140, UA150, UA201, UA210, WE240
 Third Semester: WE255
 Fourth Semester: WE280

First Semester:

Second Semester:

Third Semester:

Fourth Semester:

Anticipated Graduation _____ Total Hours _____
 Minimum 62 credit hrs. with minimum GPA 2.0.



There are many factors to consider when picking the college and the degree that are the best match for you. Explore ksdegreestats.org to learn more about the specific costs of each undergraduate degree program offered in Kansas, and the earnings those graduates are making today.

GENERAL EDUCATION COURSES

Catalog year 2023 – 24

COMMUNICATIONS

- CM101 English Composition I [placement]
- CM102 English Composition II [Comp I]
- CM106 Creative Writing (AA/AS only)
- CM115 Public Speaking
- CM120 Survey of Technical Writing (Cert/AAS/AGS only)
[placement or Transitional English]
- CM240 Interpersonal Communications

HUMANITIES

Arts AR100 Art Appreciation

Foreign Language

- FL105 French I
- FL111 Spanish I
- FL113 German I

History

- HI108 Women in American Society
- HI120 World History I
- HI121 World History II
- HI122 US History I
- HI123 US History II
- HI124 Introduction to History

Humanities

- CM106 Creative Writing
- HU201 Humanities I [Comp I]
- HU202 Humanities II [Comp I]
- JN100 Mass Media in Society

Literature

- CM121 Intro to Literature [Comp I]
- CM122 American Literature I [Comp I]
- CM123 American Literature II [Comp I]
- CM124 World Literature [Comp I]
- CM127 The Short Story [Comp I]

Music

- MU100 Music Appreciation
- MU101 American Music
- MU102 World Music
- MU103 History of Rock Music

Philosophy

- PH100 Intro to Philosophy
- PH105 Ethics
- RE104 World Religion

Theatre

- CM140 Theater Appreciation
- CM148 American Cinema Appreciation

MATHEMATICS

- MA104 Technical Math (Cert/AAS only)
- MA105 Survey of Math (Cert/AAS only)
- MA110 Intermediate Algebra [placement]
(Cert/AAS/AGS only)
- MA111 College Algebra [placement]
- MA112 Trigonometry [Col Alg or placement]
- MA114 Elementary Statistics [placement or College Alg]
- MA115 General Calculus [College Algebra]

MATH CON'T.

- MA120 Analytical Geom/Calc I [see catalog]
- MA121 Analytical Geom/Calc II [Calc I]
- MA130 Contemporary Math [placement or Interm Alg]

NATURAL SCIENCES

Biological Science

- SC101 General Biology
- SC110 Principles of Biology I
- SC120 Human Anatomy & Physiology I
- SC126 Anatomy and Physiology
- SC151 Principles of Biology II

Physical Science

- SC103 Physical Science [Int Alg or placement]
- SC104 Geology
- SC105 General Astronomy
- SC107 Meteorology
- SC130 General Chemistry [Elem Alg or placement]
- SC131 Chemistry I [Int Alg or placement]
- SC137 Natural Hazards & Disasters
- SC138 Natural Hazards & Disasters Lab
- SC140 College Physics I [see catalog]
- SC142 University Physics [co-req Calc I]
- SC146 Environmental Science and Conservation
- SC147 Environmental Science and Conservation Lab

SOCIAL / BEHAVIORAL SCIENCES

Anthropology

- SS125 Intro to Cultural Anthropology

Economics

- EC101 Principles of Macroeconomics
- EC102 Principles of Microeconomics

Geography

- GE101 World Geography

Political Science

- SS140 US Government – National
- SS141 US Government – State & Local
- SS142 Current Political Issues
- SS150 Introduction to International Relations

Psychology

- SS101 General Psychology
- SS105 Human Growth & Development

Sociology

- SS106 Marriage & Family
- SS130 Introduction to Sociology
- SS131 Cultural Diversity and Ethnicity
- SS201 Social Problems

Pre-requisites are listed in []

Students should see the current catalog for specific program requirements.

The Kansas Board of Regents has approved courses for guaranteed transfer among all Kansas public postsecondary institutions. Visit www.kansasregents.org/transfer_articulation for more information.

5/17/23

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