**Career Cluster:** Engineering and Technology Education  
**STEM**

**CTE Program:** Stellar Academy of Engineering – Allen D. Nease High School  
**Engineering Pathways-9400300**

**Industry Certification:** Autodesk User-AutoCAD (ADESK002), Autodesk User-Revit (ADESK025)

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### 16 CORE CURRICULUM CREDITS

<table>
<thead>
<tr>
<th>ENGLISH</th>
<th>MATH</th>
<th>SCIENCE</th>
<th>SOCIAL STUDIES</th>
<th>OTHER REQUIRED COURSES</th>
<th>PHYSICAL EDUCATION</th>
<th>CAREER AND TECHNICAL EDUCATION COURSES</th>
<th>RECOMMENDED ELECTIVES</th>
</tr>
</thead>
<tbody>
<tr>
<td>4 credits</td>
<td>4 credits</td>
<td>3 credits, 2 with lab</td>
<td>3 credits</td>
<td>Fine Arts (1 credit)</td>
<td>(1 credit)</td>
<td><strong>INTRODUCTION TO ENGINEERING DESIGN-8600395</strong></td>
<td>Elective</td>
</tr>
</tbody>
</table>

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### 8 ADDITIONAL CREDITS

**HIGH SCHOOL**

- Students are encouraged to use fchices.org to explore careers and postsecondary options.
- Students are also encouraged to participate in dual enrollment courses which may be used to satisfy high school graduation or Bright Futures Gold Seal Vocational Scholars course requirements.
- One course within the 24 credit program must be an online course. Cumulative GPA of 2.0 on a 4.0 scale for 24 credit program

#### 9th
- English 1 or English 1 Honors
- Algebra I or Geometry
- Physical Science or Biology
- Teen Lessons/World Geography, World History or AP Human Geography
- HOPE – Health Opportunities through Physical Education

#### 10th
- English 2 or English 2 Honors
- Geometry or Algebra II
- Biology
- World History Honors
- Fine or Practical Arts

#### 11th
- English 3 or English 3 Honors
- Algebra II or Pre-Calculus
- Chemistry
- American History or American History Honors or APUSH
- Elective or World Language

#### 12th
- English 4 or English 4 CP, Comp 1/2, or AP Eng. Literature
- Pre-Calculus or AP Calculus
- Marine Science, Earth/Space, or Physics
- American Government 5 + Economics 5 or AP Economics/Government
- Elective or World Language

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### POSTSECONDARY

**TECHNICAL CENTER PROGRAM(S)**
- FL State College at Jacksonville: Drafting – 10 month certificate program

**COMMUNITY COLLEGE PROGRAM(S)**
- FL State College at Jacksonville: AutoCAD Foundations T.C., Drafting T.C.
- Valencia College, Orlando: Civil/Surveying Engineering Technology Associate A.S.
- Daytona State College, Daytona Beach: AutoCAD Foundations A.S.

**UNIVERSITY PROGRAM(S)**
- University of N. FL, Jacksonville: Engineering – Civil, Electrical, Mechanical B.S.
- University of FL, Gainesville: Engineering – Civil, Environmental, Mechanical, Architectural B.S.
- University of Central FL, Orlando: Engineering – Civil, Environmental, Electrical, Mechanical, Aerospace B.S.

**Postsecondary Options**

- Based on the Career Cluster of interest and identified career and technical education program, the following postsecondary options are available.

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### CAREER

#### Draftsman, Carpenter; Electrician; Heating and Air Conditioning, Mason
- Architectural Engineering Assistant, AutoCAD Technician, Draftsman
- **Articulation and CTE Dual Enrollment Opportunities**
  - Secondary to Technical Center (PSAV) (Minimum # of clock hours awarded)
  - Secondary to College Credit Certificate or Degree (Minimum # of clock or credit hours awarded)
  - FSCJ: 3 credits immediately awarded upon enrollment for AutoCAD certification – Architectural Design & Construction Tech major, Course CGS2470, ETD 2395 (FSCJ value of $343.95)
  - No CTE Dual Enrollment

**Career and Technical Student Association**
- FL – TSA - Technology Student Association

**Internship/Work Experience Recommendations**
- Career Academy students may apply for internships at engineering firms after their junior year.

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