

# RCAS Cluster Plan of Study:

## INFORMATION TECHNOLOGY

Preparing individuals for employment in career pathways that relate to families and human needs.

<p><b>Activities that describe what I like to do:</b></p> <ul style="list-style-type: none"> <li>• Work with computers</li> <li>• Reason clearly and logically to solve complex problems</li> <li>• Use machines, techniques and processes</li> <li>• Read technical materials and diagrams and solve technical problems</li> <li>• Adapt to change</li> <li>• Play video games and figure out how they work</li> <li>• Concentrate for long periods of time without being distracted</li> </ul>	<p><b>Personal qualities that describe me:</b></p> <ul style="list-style-type: none"> <li>• Logical / analytical thinker</li> <li>• See details in the big picture</li> <li>• Persistent</li> <li>• Good concentration skills</li> <li>• Precise and accurate</li> </ul>	
<p><b>9<sup>th</sup> Grade Required Core Courses:</b></p> <ul style="list-style-type: none"> <li>• English 9</li> <li>• Integrated Math 1</li> <li>• Physical Science 1 &amp; 2 or Biology 1 &amp; 2</li> <li>• World Geography</li> </ul> <p><b>10<sup>th</sup> Grade Required Core Courses:</b></p> <ul style="list-style-type: none"> <li>• English 10 / Adv. English 10</li> <li>• Integrated Math 2</li> <li>• Any physical science, Biology 1 &amp; 2</li> <li>• World History</li> </ul> <p><b>11<sup>th</sup> Grade Required Core Courses:</b></p> <ul style="list-style-type: none"> <li>• English 11 / Adv. English 11 / AP English 11</li> <li>• Integrated Math 3</li> <li>• Chemistry or Physics</li> <li>• U.S. History 1, 2, 3</li> </ul> <p><b>12<sup>th</sup> Grade Required Core Courses:</b></p> <ul style="list-style-type: none"> <li>• English 12 / AP English 12</li> <li>• Integrated Math 3</li> <li>• U.S. Government</li> </ul> <p><b>Other Required Courses:</b></p> <ul style="list-style-type: none"> <li>• Information Technology (1 credit)</li> <li>• Fine Arts (1 credit)</li> <li>• Physical Education / Health (1 credit)</li> <li>• Economics or Personal Finance (.5 credit)</li> <li>• World Language, Capstone Experience or Service Learning, or Approved Career and Technical Education (1 credit)</li> </ul>	<p><b>Recommended Cluster Electives:</b></p> <ul style="list-style-type: none"> <li>• Computer Applications</li> <li>• Advanced Computer Applications</li> <li>• Web Publishing and Design</li> <li>• Computer Graphics</li> <li>• Desktop Publishing</li> </ul> <p><b>Other Recommended Electives:</b></p> <ul style="list-style-type: none"> <li>• Youth internship</li> <li>• CAD Design and Development</li> <li>• Audio/Visual Production</li> <li>• Entrepreneurship</li> </ul>	<p><b>Careers in this Cluster:</b></p> <p>Software Engineer Network Administrator Web Designer Database Manager Security Administrator</p> <p><b>Post-Secondary Programs in this Cluster:</b></p> <p><u>Technical Degree*:</u> CCNA MCSE</p> <p><u>Associates Degree:</u> Information Technology</p> <p><u>Baccalaureate Degree:</u> Computer Science Programming Network Administration</p> <p><u>Advanced Degree:</u> Systems Analyst Computer Engineering</p> <p><small>*See Western Dakota Tech (WDT) Dual Enrollment for more information.</small></p>
<p align="center"><b>Interest, Aptitude and Achievement Inventories</b></p> <p><b>Career Matchmaker</b> (8<sup>th</sup>-12<sup>th</sup> grade); <b>Ability Profiler</b> (10<sup>th</sup> grade); <b>PLAN</b> (10<sup>th</sup> grade); <b>Learning Styles Inventory</b> (10<sup>th</sup> – 11<sup>th</sup> grade); <b>My Skills</b> (10<sup>th</sup> – 12<sup>th</sup> grade); <b>Armed Services Vocational Aptitude Battery – ASVAB</b> (11<sup>th</sup> &amp; 12<sup>th</sup> grade); <b>PSAT</b> (11<sup>th</sup> grade); <b>ACT</b> or <b>SAT</b> (11<sup>th</sup> – 12<sup>th</sup> grade)</p>		