# COMPUTER SCIENCE AND APPLIED MATHEMATICS

## DATA ANALYTICS CONCENTRATION

### B.S.

**+GLOBAL DISTINCTION**

### MAJOR ACADEMIC PLAN (MAP)

**Sample Progression Plan**

<table>
<thead>
<tr>
<th>Fall Semester 1</th>
<th>Spring Semester 1</th>
<th>Summer 1</th>
</tr>
</thead>
<tbody>
<tr>
<td>ICSi 201</td>
<td>ICSi 213</td>
<td>Consider coursework</td>
</tr>
<tr>
<td>AMat 112/118 MS</td>
<td>AMat 113/119</td>
<td>Look for a summer job in the area of your studies</td>
</tr>
<tr>
<td>Social Science Gen Ed SS</td>
<td>AARH 171 AR IP (Culture)</td>
<td></td>
</tr>
<tr>
<td>AHIs 158 CH IP (Transnational)</td>
<td>U.S. Historical Perspectives Gen Ed US</td>
<td></td>
</tr>
<tr>
<td>Elective</td>
<td>UUni 110 WCI</td>
<td></td>
</tr>
</tbody>
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**Fall Semester 2**

<table>
<thead>
<tr>
<th>Fall Semester 2</th>
<th>Spring Semester 2</th>
<th>Summer 2</th>
</tr>
</thead>
<tbody>
<tr>
<td>ICSi 210</td>
<td>ICSi 308 or 362</td>
<td>Consider study abroad options, or international internship/research</td>
</tr>
<tr>
<td>ICSi 333</td>
<td>ICSi 402 or 418</td>
<td>Look for shadowing opportunities</td>
</tr>
<tr>
<td>AMat 214</td>
<td>AMat 220</td>
<td></td>
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<tr>
<td>Foreign Language</td>
<td>Foreign Language</td>
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</tbody>
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You can start FL study in your 1st year instead.

**Fall Semester 3**

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<thead>
<tr>
<th>Fall Semester 3</th>
<th>Spring Semester 3</th>
<th>Summer 3</th>
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</thead>
<tbody>
<tr>
<td>AMat 367 or AMat 363</td>
<td>Study Abroad! IP</td>
<td>Intern/Research Abroad!</td>
</tr>
<tr>
<td>ICSi 409</td>
<td>ICSi or AMat Restricted Elective</td>
<td>(8-10 weeks)</td>
</tr>
<tr>
<td>AAC 119 NS CH (Development)</td>
<td>Humanities Gen Ed (culture area/literature?) HU</td>
<td>May earn credit for ICSi 490</td>
</tr>
<tr>
<td>Elective</td>
<td>Elective</td>
<td>(globally oriented capstone project)</td>
</tr>
<tr>
<td>Foreign Language</td>
<td>Foreign Language</td>
<td>Pro Tip: Why not declare the</td>
</tr>
<tr>
<td></td>
<td>Study abroad in any semester, with the approval of</td>
<td>International Studies Minor</td>
</tr>
<tr>
<td></td>
<td>your Major and GD academic advisors.</td>
<td>to formally reflect study and interning abroad, or add a Language Minor,</td>
</tr>
<tr>
<td></td>
<td></td>
<td>or the Peace Corps Prep Certificate?</td>
</tr>
</tbody>
</table>

**Fall Semester 4**

<table>
<thead>
<tr>
<th>Fall Semester 4</th>
<th>Spring Semester 4</th>
<th>Congratulations!</th>
</tr>
</thead>
<tbody>
<tr>
<td>ICSi or AMat Restricted Elective</td>
<td>ICSi 451</td>
<td>You have earned UAlbany's</td>
</tr>
<tr>
<td>AMat 464</td>
<td>ICSi 403</td>
<td>Global Distinction!</td>
</tr>
<tr>
<td>AMat 465</td>
<td>ICSi 431</td>
<td></td>
</tr>
<tr>
<td>Elective (more language?)</td>
<td>Prof Development/Elective</td>
<td></td>
</tr>
</tbody>
</table>

General Education Requirements, for students matriculating Fall 2014 and after:

- **MS** Mathematics and Statistics
- **WCI** Writing and Critical Inquiry
- **AR** Arts
- **HU** Humanities
- **NS** Natural Sciences
- **SS** Social Sciences
- **IP** International Perspectives
- **US** U.S. Historical Perspectives
- **CH** Challenges for the 21st Century
- **FL** Foreign Language (one semester of collegiate study, or the equivalent, of a foreign language)

**Credit bearing Professional Development Options:**

- RSSW 290, 291 and 390 – Community Service
- Research within major
- University/Departmental Internship
- Community Engaged Coursework
- Study Abroad
- Tutoring opportunities

**NOTE:** This is a suggested course sequence.

**Global Distinction (GD) Course Categories:**

- UAlbany Gen Ed or Major requirement AND counts towards GD (Global Distinction)!
- Counts towards GD AND your Electives AND may also count towards your Major, Minor or Gen Ed Requirements!

*See the back of this sheet for more information about Global Distinction.*

Prepared by CIEGS – 2019
What Global Distinction can do for you!

Global Distinction is a new University at Albany Milestone (appearing on the bottom of your official transcript upon graduation) conferred upon students who complete a structured set of transformative international academic experiences that produce a more globally agile graduate. Today's employers and graduate school programs seek students who have the right balance of disciplinary knowledge and real-world problem-solving skills. In today's highly globalized society, scientists, artists, employees, and small business owners all need to master inter-cultural communication skills. Global Distinction meets that need through

- 2 years (4 semesters) of foreign language acquisition or the equivalent in proficiency
- Interdisciplinary, globally-oriented coursework, including 3 courses that include a focus on
  - Culture-Area Studies or Inter-Cultural Competency (Culture)
  - International Development or Economics (Development)
  - International Relations, Migration, or Human Rights (Transnational)
- and a Capstone Research Project in the Major that is approached with a global lens
- International immersion via a study abroad semester and an 8-10 week summer internship/research opportunity

You can graduate on time!

With the guidance of your academic advisers for your Major, Minor and the Global Distinction (GAP Director Dr. Annette Richie; email ariche@albany.edu for an appointment), you will find your “best fit” university for your study abroad semester and your summer internship or lab research placement. The “extra” language and interdisciplinary, globally-oriented coursework can be completed at UAlbany or abroad, or applied from your Transfer, Advanced Placement, and University in the High School courses. Culture, Development and Transnational courses can be found in various Majors and Minors and many fulfill Gen Ed requirements.

Global Distinction is within your financial reach!

You can use financial aid and most UAlbany scholarships for studying and interning abroad as you are earning UAlbany credit! All Global Distinction participants are awarded Flight Reimbursements to apply towards studying, interning, and/or researching abroad, thanks to The Dolan Family Study Abroad Opportunity Fund!

Global Academic Programs offers its own Bridge the GAP scholarship. Jacqueline Ledermann, Assistant Director of International Scholarships and Fellowships, advises on external scholarship applications, such as the NSEP Boren Scholarship, the Benjamin A. Gilman International Scholarship, and the Critical Language Scholarship. Some nations and overseas universities that we partner with also offer their own scholarships. Amounts and eligibility criteria vary. Learn more at https://abroad.albany.edu/finances/scholarships/

Study abroad in your Major at these UAlbany partner universities (these are just a few examples)!

(See the following partner universities offer coursework in Computer Science, Applied Mathematics, and/or Data Analytics.)

**Australia:** University of Wollongong (Wollongong); University of Notre Dame Australia (Freemantle and Sydney)

**China:** Beijing Normal University (Beijing); Hong Kong Baptist University (Hong Kong); Peking University (Beijing); Sichuan University (Chengdu)

**Denmark:** Aarhus University (Aarhus); Study Abroad in Scandinavia (DIS Copenhagen)

**Finland:** Abo Akademi University (Turku); Oulu University (Oulu); University of Helsinki (Helsinki)

**France:** University of Grenoble (Grenoble)

**Germany:** German Universities of Applied Sciences 7 (Bremen, Hamburg, Muenster, and Munich); Wurzburg University (Wurzburg)

**India:** Symbiosis University (Pune)

**Ireland:** National University of Ireland, Galway (Galway)

**Israel:** Ben-Gurion University of the Negev (Beer Sheva); Technion-Israel Institute of Technology (Haifa)

**Japan:** Tohoku University (Sendai); Waseda University (Tokyo)

**Korea:** Hallym University (Chuncheon); Seoul National University (Seoul); Sookmyung Women’s University (Seoul); Yonsei University (Seoul)

**Luxembourg:** University of Luxembourg (Luxembourg)

**Netherlands:** Radboud University Nijmegen (Nijmegen); Tilburg University (Tilburg)

**New Zealand:** Nelson Marlborough Institute of Technology (Nelson)

**Norway:** University of Bergen (Bergen)

**South Africa:** University of Cape Town (Cape Town)

**Sweden:** University of Gothenburg (Gothenburg)

**Taiwan:** National Central University (Taoyuan); National Taiwan University (Taipei)

**Trinidad and Tobago:** University of the West Indies, St. Augustine (St. Augustine)

**U.K.:** Northumbria University (Newcastle upon Tyne, England); Swansea University (Swansea, Wales); University of Aberdeen (Aberdeen, Scotland); University of Glasgow (Glasgow, Scotland); University of Hull (Hull, England); University of Nottingham (Nottingham, England)

**Internship and Short-Term Experiential Opportunities**

**Australia:** The Intern Group (Melbourne, 8-week, summer)

**Chile:** The Intern Group (Santiago, 8-week, summer)

**China:** The Intern Group (Hong Kong and Shanghai, 8-week, summer)

**Colombia:** The Intern Group (Medellin, 8-week, summer)

**Ireland:** The Intern Group (Dublin, 8-week, summer)

**Israel:** Tel Aviv University (Tel Aviv, internship and other short-term programs)

**Japan:** The Intern Group (Tokyo, 8-week, summer)

**Spain:** The Intern Group (Barcelona and Madrid, 8-week, summer)

**Thailand:** The Intern Group (Bangkok, 8-week, summer)