MATHEMATICS (Applied Concentration) - B.S. - 2021-22
To the student: Please make sure you are using the correct check sheet based on your enrollment year. YOU are responsible for making sure you are on the correct check sheet and completing all program requirements accurately and on time.

Min Total Hours Required: 120
Total Lib Arts Hrs Req'd: 60
Min overall GPA for mjr accept \& grad: 2.0
Other: Min major GPA of 2.0
Other: No grade less than C- in major

Residence Requirements:
31 Hrs at RWC
15 Hrs in Major at RWC
Of last 31 Hrs, 24 at RWC


| Shared Core |  | SHr | Grd |
| :--- | :--- | :--- | :--- |
| FYSE 1000 | First Year Seminar | 2 |  |
| COMP 1010 | Prin Writing | 3 | Min C- |
| PHST 1300 | Personal Wellness | 1 |  |
| BIBL 1010 | Encounter the OT | 3 |  |
| BIBL 1020 | Engaging the NT | 3 |  |
| ECON 1050 | Personal Financial Success | 1 |  |
| HIST 1400 | Western History Global Cont | 3 |  |
| SRSE 4100 | Senior Seminar | 2 |  |


| Choice Core |  | SHr | Grd |
| :--- | :--- | :--- | :--- |
| COMP 1020 | Writing \& Research | 3 |  |
| PHIL 2202 | Philosophical Ethics | 3 |  |
| LITR 1010 | Intro Literature | 3 |  |
| COMM 1105 | Fund of Oral Communication | 3 |  |
|  | Behavioral Science | 3 |  |
|  | Social Science | 3 |  |
| N/A | Lab Science | N/A | N/A |
| N/A | Mathematics | N/A | N/A |
|  | Fine Arts | 4 |  |


| Foreign Language |  | SHr | Grd |
| :--- | :--- | :--- | :--- |
|  | Foreign Language | 3 |  |
|  | Foreign Language | 3 |  |
|  | Foreign Language | 3 |  |

Honors program students will have substitutions for several Gen Ed courses
Or proficiency as outlined in the College catalog

| Major Requirements: 53 Hours |  | SHr | Grd |
| :--- | :--- | :--- | :--- |
| MATH 2070 | Discrete Math | 3 |  |
| MATH 2281 | Calculus I | 4 |  |
| MATH 2282 | Calculus II | 4 |  |
| MATH 2283 | Calculus III | 4 |  |
| MATH 3110 | Linear Algebra | 3 |  |
| MATH 4990 | Seminar | 1 |  |

Applied Mathematics Concentration (18 Hrs)

| MATH 3210 | Differential Equations | 3 |  |
| :--- | :--- | :--- | :--- |
| MATH 4200 | Real Analysis | 3 |  |
| Plus four of the following: |  |  |  |
| MATH 3400 | Probability \& Statistics | 3 |  |
| MATH 3710 | Numerical Analysis | 3 |  |
| MATH 3720 | Mathematical Mthds for Sci | 3 |  |
| MATH 4710 | Mathematical Modeling | 3 |  |
| MATH 4500 | Internship | $3-6$ |  |

Supporting Courses (16 Hrs)

| CSCI 2010 | Computer Science I | 4 |  |
| :--- | :--- | :--- | :--- |
| PHYS 2001 <br> \& I | Physics for Engrs/Scntsts I | 3,1 |  |
| PHYS 2002 <br> \& I | Physics for Engrs/Scntsts II | 3,1 |  |
| PHYS 2003 <br> \& L | Modern Physics | 3,1 |  |

Recommended Electives:

- Additional courses in computer science, physics, mathematics, or other natural sciences
- Work toward a minor or a second major in a quantitative field. (Recommended fields would include: computer science, physics, chemistry, biology, psychology, finance and economics.)

| Other Elective Credits to Reach 120 Hours | SHr | Grd |  |
| :--- | :--- | :--- | :--- |
|  |  |  |  |
|  |  |  |  |
|  |  |  |  |
|  |  |  |  |
|  |  |  |  |
|  |  |  |  |
|  |  |  |  |
|  |  |  |  |
|  |  |  |  |
|  |  |  |  |

