

# Information Technology Undergraduate Program

School of Information | Rochester Institute of Technology  
2026-2027

☐ Soph Sem (ISTE 99)

☐ Wellness #1

☐ Wellness #2

☐ Writing Intensive

☐ Co-op #1

☐ Co-op #2

—Freshman—

—Sophomore—

—Junior—

—Senior—

**ISTE 140**  
Web & Mobile I

**GCIS 123**  
Software Development and Problem Solving I

**NSSA 102**  
AI & Contemporary Computing

**First Year Writing Intensive**

**MATH 131**  
Discrete Mathematics (P-7A)

**ISTE 230**  
Introduction to Database and Data Modeling

**GCIS 124**  
Software Development and Problem Solving II

**CSEC 140**  
Introduction to Cybersecurity

**COMM 142**  
Intro to Technical Communications

**MATH 161**  
Applied Calculus (P-7B)

**ISTE 240**  
Web & Mobile II

**NSSA 241**  
Introduction to Routing and Switching

**Lib. Arts & Sciences (P-1 Artistic)**

**Lib. Arts & Sciences (P-2 Ethical)**

**STAT 145**  
Introduction to Statistics I

**ISTE 340**  
Client Programming

**NSSA 221**  
Systems Administration I

**Free Elective #1**

**Lib. Arts & Sciences (P-3 Global)**

**Liberal Arts and Sciences (Immersion-1)**

**ISTE 260**  
Designing the User Experience

**NSSA 370**  
Project Management

**Lib. Arts & Sciences (P-4 Social)**

**Lib. Arts & Sciences (P-5 Nat. Science Inq.)**

**Liberal Arts and Sciences (Immersion-2)**

**IT**  
Advanced Course #1

**ISTE 422**  
Application Development Practices

**Free Elective #2**

**Lib. Arts & Sciences (P-6 Scientific Princ.)**

**Liberal Arts and Sciences (Immersion-3)**

**IT**  
Advanced Course #2

**IT**  
Advanced Course #3

**ISTE 510**  
Senior Project Design (co-ops completed)

**5 Credits - Liberal Arts and Sciences Elective (any Gen Ed)**

**Free Elective #3**

**IT**  
Advanced Course #4

**IT**  
Advanced Course #5

**ISTE 520**  
Senior Project Development

**Free Elective #4**

**Free Elective #5**

Start of the 2 co-ops

Completion of both co-ops before beginning Senior Project

## Advanced Courses

- Students who matriculate in this degree program will select **any five** advanced courses representing fifteen semester hours to fulfill the advanced course requirements.
- The advanced courses are organized below by IT subdisciplines.
- The courses selected are subject to prerequisite requirements.

### Database and Data Management

|                                           |                                      |
|-------------------------------------------|--------------------------------------|
| ISTE-330 Database Connectivity and Access | ISTE-470 Data Mining and Exploration |
| ISTE-432 Database Application Development | ISTE-472 Text Analytics              |
| ISTE-436 Database Management and Access   | ISTE-476 Visual Analytics            |
| ISTE-438 Contemporary Databases           | ISTE-534 Data Warehousing            |

### Enterprise Administration

|                                    |                                           |
|------------------------------------|-------------------------------------------|
| NSSA-244 Virtualization            | NSSA-423 Scalable Computing Architectures |
| NSSA-320 Configuration Management  | NSSA-425 Data Center Operations           |
| NSSA-322 Systems Administration II | NSSA-428 DevOps Principles and Practices  |
| NSSA-422 Storage Architectures     |                                           |

### Full Stack Development

|                                             |                                                  |
|---------------------------------------------|--------------------------------------------------|
| ISTE-341 Server Programming                 | SWEN-383 Software Design Principles and Patterns |
| ISTE-442 Secure Web Application Development | SWEN-566 AI Centric Software                     |

### Human Centered Computing

|                                                  |                                                          |
|--------------------------------------------------|----------------------------------------------------------|
| ISTE-262 Foundations of Human Centered Computing | ISTE-358 Foundations of IOT and Ubiquitous Computing     |
| ISTE-264 Prototyping and Usability Testing       | ISTE-458 Advanced Topics in IOT and Ubiquitous Computing |
| ISTE-266 Design for Accessibility                |                                                          |

### Mobile Application Development

|                                           |                                            |
|-------------------------------------------|--------------------------------------------|
| ISTE-252 Foundations of Mobile Design     | ISTE-456 Mobile Application Development II |
| ISTE-454 Mobile Application Development I |                                            |

### Networking and Communications

|                                 |                                         |
|---------------------------------|-----------------------------------------|
| NSSA-242 Wireless Networking    | NSSA-441 Advanced Routing and Switching |
| NSSA-245 Network Services       | NSSA-443 Network Design and Performance |
| NSSA-342 Large Scale Networking |                                         |