[ARCHIVED CATALOG]

Computer Science, Minor

Students pursuing a minor in Computer Science are required to:

- Complete 24 credits.
- Complete a minimum of 12 credits in the minor that are not duplicated by the major or any other minor.
- Complete 6 credits upper division credits in the minor in residence at Chapman.
- Complete a minimum of 9 upper division credits in the minor.
- Achieve a 2.000 cumulative GPA in the minor and a 2.000 GPA for all upper-division coursework in the minor.

lower-division requirements (15 credits)

- CPSC 230 - Computer Science I **3 credits**
- CPSC 231 - Computer Science II **3 credits**
- CPSC 236 - Visual Programming **3 credits**
- MATH 250 - Discrete Mathematics I **3 credits**
- CPSC 350 - Data Structures and Algorithms **3 credits**

electives (9 credits)

three of the following

- SE 310 - Software Design **3 credits**
- SE 320 - The Software Development Lifecycle **3 credits**

- CPSC 330 - Digital Logic Design I **3 credits**

  AND
- CPSC 330L - Lab - Digital Logic Design I **1 credit**

- CPSC 351 - Computer Architecture I **3 credits**
- CPSC 353 - Data Communications and Computer Networks **3 credits**
- CPSC 354 - Programming Languages **3 credits**
- CPSC 355 - Human Computer Interaction **3 credits**
- CPSC 356 - Android Application Development **3 credits**
- CPSC 357 - iOS Application Development **3 credits**
- CPSC 360 - Computer Graphics **3 credits**
- CPSC 370 - Topics in Computer Science **3 credits**
- CPSC 380 - Operating Systems **3 credits**
- CPSC 390 - Artificial Intelligence **3 credits**
- CPSC 392 - Introduction to Data Science **3 credits**
- CPSC 393 - Machine Learning **3 credits**
- CPSC 402 - Compiler Construction **3 credits**
- CPSC 406 - Algorithm Analysis **3 credits**
- CPSC 408 - Database Management **3 credits**
- CPSC 430 - Computational Economics **4 credits**
- CPSC 445 - High Performance Computing **3 credits**
- CPSC 453 - Network Implementation and Security **3 credits**

total credits 24