COMP 1000 – Computing for All

Course description:
COMP 1000 Computing for All (3) An introduction to computational thinking and computing applications, including creative problem solving, graphic novels, digital arts, social media, artificial intelligence, and impacts of computing on society. NOTE: this course may not be used as a COMP elective to fulfill the requirements of the major or minor in Computer Science.

Why This Course?
The fact that computing principles are pervasive in our society and across the sciences has led to a national effort, known as CS For All, aimed to teach computing principles and practices to a broad audience. This course is in line with this national effort. Its aim is to introduce computational thinking and computing principles to all undergraduate students regardless of their academic backgrounds and interests and career goals.

Textbook:

Additional References:

Topics:
• Thinking like a computer scientist (SG, Chapter 1 and DA, Chapter 1)
• Computers (SG, Chapters 4 and 5)
• Computational thinking, algorithms and software (SG, Chapters 2, 3, 9, 10)
• Internetworking and security (SG, Chapters 7 and 8)
• Computing applications (SG, Chapters 13, 14 and 15)
  • Graphic novels, gaming
  • Digital arts, and virtual reality
  • Digital health
  • Social media
  • Big data
  • Digital payment, Ecommerce
  • Artificial intelligence
  • Simulation and modeling
• Societal aspects of computing (SG, Chapter 17)
  • Cybersecurity, plagiarism, cyberbullying, net neutrality, …

Evaluation
Classwork and Participation 300 pts.
Homework 200 pts.
Quizzes 100 pts.
Midterm Exam 125 pts.
Final Exam (Comprehensive) 300 pts.

Final grade: add up your point total and divide by 1000.

Note that the highest possible percentage grade is 102.5% since the points add up to 1025.
Grading Scale:
Letter grades will be determined as follows: A+: 96-100%; A: 90-95% B+: 87-89%; B: 81-86%; B-: 79-80% C+: 77-78%; C: 71-76%; C-: 69-70% D+: 67-68%; D: 60-66% F: Below 60%