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| Sac State Logo - b & w, no text | **California State University, Sacramento**  **College of Engineering and Computer Science**  **Computer Science 190: Senior Project (Part1)**  **Fall 2022 Syllabus** |

# Instructor

Kenneth Elliott, M.S.

# Contact Information

I use the same e-mail address to answer questions and to receive your coursework. So, please use a descriptive subject in your e-mail. I get quite a bit of e-mail, and the subject helps a lot.

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| **E-Mail** | kenneth.elliott@csus.edu |
| **Office** | Online |

# Website

All the information including this syllabus – as well as other helpful information presented during the course – can be found on Canvas.

# Course Description

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| Catalog Description The first of a two-course sequence in which student teams undertake an industry-grade a project to develop and deliver a software product. Teams apply software engineering principles in the preparation of a software proposal, a project management plan, a software product backlog, and a high-fidelity prototype. All technical work is published using guidelines modeled after IEEE documentation standards. Oral and written reports are required. Lecture one hour, laboratory three hours. |  | Prerequisites Senior status (90 units completed)  WPJ score of 70+ or at least a C- in ENGL 109 M/W  CSC 130  CSC 131  Four additional 3-unit upper division CSC courses that fulfill the major requirements  (Excluding CSC 192-195, 198 and 199)  Not currently enrolled in CSC 190 Textbook None |

# Course Expectations

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| * Teams will be formed at the beginning of the semester and will remain intact for the duration of both CSc190 and CSc 191. * Teams are expected to self-organize which will require cooperation and collaboration of all team members throughout the duration of the project (CSc 190 and CSc 191). * Each team is expected to understand and apply “Agile Principles” and to do the work in accordance with the SCRUM methodology adapted for Senior Project use. * In collaboration with the project Client, the team will produce a project Product Backlog Document (a high-level list of everything that needs to be built or done to make the product owner’s vision a reality). The team’s Product Backlog Document will formally describe each of the required product features, a description of the users of each feature, and the needs/objectives of each user’s expected interaction with the feature (these interactions must be specified in the form of user stories). * The team is responsible for providing professional, quality documentation, both in the content and the design of all required documentation. * The planning and actual work required during CSC 190 will be scheduled into a series of two-week “sprints”. The work to be completed will be specified at the start of CSC 190 and the team will collaborate with their client in identifying the work to be done. At completion of each sprint, the team is expected to meet with their client 1) to review and provide the team with feedback on the increment of work completed at the end of the sprint, and to 2) create the plan for the work to be completed in the next sprint. |  | * Each team is responsible for securing a project Client; with the Client and proposed project being approved by the instructor. * Once a project is secured, each team is expected to collaborate with their project Client throughout the duration of the project. * In collaboration with the project Client, the team will produce a Project Charter Document that documents why the project is needed, the criteria needed to measure success throughout the project and what will be needed to ensure the project provides the client with the value expected. * The Product Backlog Document will also contain the list of Project Features, the list of user stories associated with each Feature, and the team’s estimates of the scope of work associated with each of the user stories. * In collaboration with the project Client, the team will produce several throw-away prototypes, which will later be refined into an evolutionary prototype. It is highly recommended that the team start their actual implementation work based on the evolutionary prototype. * At the end of each sprint, the team will meet with the lab adviser, and review what was accomplished, what went well, what could have gone better, and what improvement(s) could be made improve in the next sprint. |

# Lectures

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| * Please ask questions and give comments. I enjoy back-and-forth interactions with students. There are no dumb questions! * Attendance is vital to your success in the course. If you need to miss a class, you are responsible for checking with a classmate about the material we covered. |  | * Pop quizzes, if given, **cannot** be made up. * During lectures **no** electronic devices, of any type, are allowed. This includes laptops, phones, and other texting devices. **No** exceptions. * I will provide all the lecture slides in PDF format on Canvas. |

# Assignments

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| * My job is not to give you the correct solution, but to help you figure it out by yourself. There are no “dumb” questions, so don’t be afraid to ask. But, don’t be upset if I don’t given an answer! * I don’t mind students discussing, ahead of time, how to find a solution. In fact, it’s a great idea! Just don’t share solutions – just ideas! * Late assignments are penalized. I will take off 10% per day. Weekend days are counted. |  | * Do **not** cheat or help others cheat. This means you cannot show your solution to another student or show how to do it. For example: don’t copy off another student’s screen or let them copy off yours. * In **any** case of cheating, both the student, that copied the solution, and the one who allowed it, will receive a zero. Depending on the severity, I might have to notify the College. * You only get to submit each assignment once – so make sure you did it correct! |

# Deliverables

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| * Evidence of Work (Each Sprint) * Properly Maintained Sprint Backlog (Each Sprint) * Bi-weekly Sprint Execution Report (Each Sprint) * Bi-weekly Lab Advisor Meeting Agenda/ Minutes (Each Sprint) * Bi-weekly Client Meeting Agenda/Minutes (Each Sprint) |  | * Project Charter Document (end of Course) * Oral Presentation Slides * Product Backlog Document * Product Prototype * Project Website |

# Grading

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| Graded By | Grading Category | Type | Weight |
| Team | Peer Evaluation | Individual | 5% |
| Instructor | Individual Assignments | Individual | 5% |
| Instructor | Oral Presentation Performance | Individual | 10% |
| Instructor | End-of-semester deliverables | Team-based | 40% |
| Lab Adviser | Sprint Performance (Attendance + Sprint Performance + End-of-Sprint Deliverables) | Team-based | 40% |

# Grading Scheme

**Name Range**

**A 100%**

**A - < 94.0%**

**B + < 90.0%**

**B < 87.0%**

**B – < 84.0%**

**C + < 80.0%**

**C < 77.0%**

**C – < 74.0%**

**D + < 70.0%**

**D < 67.0%**

**D – < 64.0%**

**F < 61.0%**

# COVID – 19

# Please visit the following page for more about CSUS’ polices regarding COVID-19:

# https://www.csus.edu/student-affairs/emergency-student-information/

# (https://www.csus.edu/student-affairs/emergency-student-information/)

# Students with Disabilities

If you have a disability and require accommodations, you need to provide disability documentation to SSWD (Services to Students with Disabilities), Lassen Hall 1008, (916) 278-6955. Please discuss your accommodation needs with me after class or in lab early in the semester.

# Housing & Food Security

If you experience difficulties with financial, housing or food security, please contact Basic Needs Division of Student Affairs (

https://www.csus.edu/student-affairs/crisis-assistance-resource-education-support/ (https://www.csus.edu/student-affairs/crisis-assistance-resource-educationsupport/)

) For assistance.

# Parents & Families

If you are students with children, please feel free to let me know your needs. Also, please reach out to Parents & Families Division of Student Affairs (https://www.csus.edu/student-affairs/centers-programs/parents-families/ (https://www.csus.edu/student-affairs/centers-programs/parentsfamilies/) For all resources available on campus.

# Writing Center

For free, one-on-one help with reading or writing in any class, visit the University Reading and Writing Center (URWC) in Calaveras Hall 128. Homepage is http://www.csus.edu/writingcenter