

USC
Viterbi

School of Engineering
Daniel J. Epstein
Department of Industrial
and Systems Engineering

ISE 495bx Senior Project Design

Fall 2021 — Friday - 9:00am - 11:50 pm

Location: KAP 159

Syllabus addendum

Coach: Theodore Mayeshiba Contact Info: email: mayeshib@usc.edu https://usc.zoom.us/j/3929749748	Coach: Paul Lu Contact Info: email: paullu@usc.edu
Coach: Prof. James Moore Office: GER203 Contact Info: email: jmoore@usc.edu USC: (213) 740-0595 Cell: (213) 663-8146	Blackboard (Bb) Help: (213) 740-5555 option 2 email: blackboard@usc.edu Office Hours: F, 11:00a and by appointment

Catalogue Course Description

Preparation and development of the senior project proposal. Open only to industrial and systems engineering majors.

Prerequisites

- ISE 315 – Engineering Project Management
- ISE 435 – Discrete Systems Simulation
- ISE 495ax – Senior Design Project
- Either ISE 370 – Human Factors in Work Design or ISE 470 – Human / Computer Interface Design

Required Readings, Supplementary Materials, and Course Notes

Product Development for Technical and Non-Technical Managers and Practitioners, 1st Ed., Kendall Hunt (2021), ISBN: 978-1-7924-7707-2.

ISE 495bx is Web-Enhanced with high reliance on Blackboard. Readings and supplementary materials will be posted to Blackboard as needed, accompanied by a posting on Announcements. All assignments will be submitted via Blackboard. No assignments will be accepted by email or paper unless arrangements have been made in advance. Copies of lecture slides and other class information will be posted on Blackboard. Supplementary materials and other reference guidance will be posted to Blackboard under *Content*.

Schedule

The Calendar is **approximate** and **subject to change**, especially this year. The teams and clients are working in an uncertain environment. This is a living document and will be modified as needed based on the course requirements. Presentations are to be coordinated and scheduled with your coach.

Note:

All client deliverables must receive customer approval prior to proceeding to the next phase.

Copy coaches on all communications to the client.

Week	Friday	In Class	Activity	Deliverable
1	8/27		Read Steps 1-5	Meet Coach: Project Update Schedule progress review meeting with client
2	9/3		Begin weekly meetings with Coach during Office hours	PUR 1: Use Status Template
3	9/10	Case: Step 4 (T 1) Step 5 (T 2)	Client Progress Review meeting	Peer Evaluation
4	9/17		Prep CDR using Templates	PUR 2: Use Status Template CDR Readiness Review
5	9/24		Read Steps 6-9	CDR Dress Rehearsal
6	10/1	Case: Step 7 (T3)	Client CDR Presentation / Report	Final CDR Presentation/Report
7	10/8		Prepare CDR Exit	CDR Exit documents, templates Peer Evaluation
8	10/15	Recess	Begin Implement Project Read Step 10-12	PUR 3: Use Status Template
9	10/22	Case: Step 12		
10	10/29			PUR 4: Use Status Template
11	11/5			Peer Evaluation
12	11/12		Prep Customer Acceptance	Meet Coach: Customer Acceptance Readiness Review
13	11/19		Customer Acceptance	
14	11/26		Thanksgiving	
15	12/3		Customer Acceptance Review	Peer Evaluation
Finals	12/7 @9A			Final Written Report due: Including lessons learned, delivery and training checklists

- It is the expectation that all teams will meet with their Coaches **weekly** during office hours.
- Dress Rehearsal requires presentation be recorded and at least two (2) coaches be present for assessment

Grading Breakdown

Course Component	Weight
Progress Update Reports emailed to client & coaches (4 submissions at 2% each)	8%
Critical Design Review <ul style="list-style-type: none"> • Readiness Review (Coach) (5%) • Client Presentation (10%) • Report (5%) 	20%
Implementation / Final <ul style="list-style-type: none"> • Readiness Review (Coach) (5%) • Client Presentation (10%) • Report (15%) 	30%
Quality of peer Evaluations you provide	2%
Sponsor Evaluation	20%
Module 7-12 Quiz	5%
Instructors' Evaluation <ul style="list-style-type: none"> • Interim feedback from the sponsor • Individual contributions to each progress report • Quality of Interaction with other team members 	15%
Total	100%