Course Description
Introduction to tools and methods for the design, production, and delivery of goods and services. Techniques for planning, monitoring, and controlling complex projects.

Operations include everything it takes for a business to deliver products or services to our customers. A business, whether it is profit making or non-profit, cannot exist without Operations. One component of Operations is Project Management, which is the oversight of the projects that deliver new value for customers with intent to meet scope, schedule and budget.

In the first half of this course, you will learn the basics of Operations including a high-level understanding of Supply Chain, measuring and optimizing processes, strategic decision making when faced with uncertainty, forecasting and more.

In the second half we will focus on the delivery of Projects and all of their components. We will discuss traditional Waterfall Projects as well as Agile Projects, and even discuss topics like Lean and Six-Sigma.

Prerequisites: None
Registration Restriction: Not open to business and accounting majors and exchange students
Credit Restriction: Not available for degree or major credit for business and accounting majors
Duplicates Credit in BUAD 311 and BUAD 311T.

Learning Objectives
1. Understand high-level Supply Chain vocabulary used in business conversations
2. Gather the specific details required to analyze and improve a process
3. When faced with uncertainty, determine the best decisions and be able to explain your strategy logically and persuasively.
4. Based on past performance establish a forecast for future performance and when comparing multiple forecasts be prepared to select the optimal forecast
5. Understand Project Management terminology, including the roles and responsibilities of a Project Manager, how they differ from other managers in the company,
as well as the roles and responsibilities of project team members and stakeholders both internal and external to the company.

6. Evaluate project selection tools and use them to select the best project(s) for the success of your company.

7. Recognize the Project Management trade-offs and provide examples of how they are intertwined.

8. Plan a project starting with a Work Breakdown Structure to establish the baseline scope, schedule, and budget.

9. Use scheduling tools to determine the critical path and manage project tasks that may impact the project schedule.

10. Demonstrate the ability to optimize the trade-offs between schedule and cost.

11. Explain the similarities and differences between Waterfall, Agile, Lean and Six Sigma.

**Materials**
For most of the class, lecture notes and materials on blackboard will be sufficient. If you are interested in greater detail than what we discuss in class, you may choose (optionally) to purchase the below recommended textbooks or access pertinent chapters from ARES at no cost (see below).

- **BUAD 311 Operations Management**: Custom-made textbook available in eBook format at [https://create.mheducation.com/shop/](https://create.mheducation.com/shop/), ISBN: 9781308430478. (*This is optional, $88*)

- Or access the four relevant chapters (Textbook chapters 2, 3, and 8) from **BUAD 311 Operations Management** which are available for free on ARES. To access these chapters:
  - Login to [https://reserves.usc.edu](https://reserves.usc.edu) using your USC net-id and password.
  - Under Student Tools, select Search Courses. In the Course Number Contains field, type 315 then click “Go”.
  - Click Add Course to add it to your Ares library.
  - When you click View Course, you will see Chapters 2, 3, and 8, which are the only chapters applicable for BUAD 315x. If you would like additional chapters, you can purchase the eBook listed above.
  - For more information on how to use course reserves, check here [https://libguides.usc.edu/distancelearning/coursereserves](https://libguides.usc.edu/distancelearning/coursereserves).

**Prerequisites and/or Recommended Preparation:**
This course has no prerequisites.
**Course Notes:**
We will use Slack as our main method of communication. If you have not used Slack previously, go to the Student Toolkit on [https://keepteaching.usc.edu/](https://keepteaching.usc.edu/) to find information about Slack, including how to download and install it on your desktop and mobile device. If you have trouble seeing our class channel, please send me a Slack DM or email so I can get that resolved for you.

During class, Poll Everywhere is used to keep students engaged. You will access polls at [pollev.com/kathytakayama/](http://pollev.com/kathytakayama/) from your mobile device or laptop.

All Homework and exams will be submitted on Blackboard. There are 6 homework assignments. Your top 5 scores will count towards your grade. Midterm and Final questions will be of similar difficulty as the homework. It is highly recommended you work on the Practice Sets before you complete the homework (the Practice are for you; do not turn in Practice Sets). You can work in groups of 2 on homework. Submit only ONE copy for both students – make sure both names are at the top of your homework. You can also discuss homework with me during Office Hours.

**Exams** – There is one midterm and one final (cumulative). These are individual assessments. Anyone caught cheating will be brought to SJACS and will be dealt with harshly.

**Grading Policies:**

**Participation**
- Participation is measured by your engagement through polls and class discussions
- If you are unable to attend class, recordings will be posted by the end of the day; there may be participation quizzes to allow you to earn participation credit even though you were not attending class in person

**Make up Exams**
Students must attend all exams at the indicated times and dates. If you foresee a conflict, you must contact the instructor within the first three weeks of the semester to explore alternative options. No rescheduling of exams will be allowed after the first three weeks of class. The only exception is a “documented medical emergency,” for which the student must provide all of the following documentation by the time of the exam: (1) A signed doctor’s note, with the name and phone number of the medical professional verifying the medical emergency; (2) An email from the student’s Marshall advisor. For all other reasons of missing an exam, including travels for non-emergencies, interviews, adverse traffic conditions, or forgetfulness about exam time, the student will not be allowed to reschedule, and missing an exam may result in a zero for that exam.

**GRADING DETAIL**

<table>
<thead>
<tr>
<th>Assignments</th>
<th>% of Grade</th>
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<tbody>
<tr>
<td>Midterm Exam</td>
<td>30%</td>
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<tr>
<td>Final Exam</td>
<td>40%</td>
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<tr>
<td>Assignments</td>
<td>20%</td>
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<tr>
<td>Participation</td>
<td>10%</td>
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<tr>
<td><strong>Total</strong></td>
<td><strong>100%</strong></td>
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Final grades represent how you perform in the class relative to other students. The average grade for this class is expected to average about 3.50. Three items are considered when assigning final grades:

1. Your average weighted score as a percentage of the available points for all assignments (the points you receive divided by the number of points possible).
2. The overall average percentage score within the class.
3. Your ranking among all students in the class.

**Collaboration policy (for non-quiz/exam assignments).**

Students are permitted and encouraged to discuss with others their ideas for completing assignments; however, once a student begins writing the deliverable, all work must be individual and independent. Students may not seek help from anyone outside the class, including but not limited to former students of this course, friends and family, tutors, and online forums. Students may consult course materials and web resources. Students may not post anything related to the assignments online. Failure to abide by the above guidelines may constitute a case of suspected plagiarism or cheating, which will be reported and investigated. Please see the “Academic Integrity and Conduct” section below for further details. For more information about unauthorized collaboration, visit [https://libraries.usc.edu/tutorial/academic-dishonesty](https://libraries.usc.edu/tutorial/academic-dishonesty) or [http://lib-php.usc.edu/tutorials/academic-dishonesty/story_html5.html](http://lib-php.usc.edu/tutorials/academic-dishonesty/story_html5.html).

**Assignment Submission Policy:**

Assignments must be turned in on the due date/time electronically via Blackboard. Any assignment turned in late, even if by only a few minutes, will receive a grade deduction (for example, if your work is a B+ grade, you will be given a C+ grade). If your internet breaks down on the due date, use your smart phone to submit via Slack Direct Message (DM) to Professor Takayama. Late or not, however, you must complete all required assignments to pass this course.
## COURSE CALENDAR

<table>
<thead>
<tr>
<th>Session</th>
<th>Topics/Daily Activities</th>
<th>Pre-Work</th>
<th>Deliverables and Due Dates</th>
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<tbody>
<tr>
<td><strong>Week 1</strong></td>
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<tr>
<td>1 Tue, 08/23</td>
<td>Intro to Ops, Intro to SC Process Analysis</td>
<td>Welcome Video, Read Syllabus, Slack Training</td>
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<td>2 Thu, 08/25</td>
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<tr>
<td><strong>Week 2</strong></td>
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<tr>
<td>3 Tue, 08/30</td>
<td>Little’s Law Decision Trees</td>
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<td>HW#1 due Tue, 8/30</td>
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<td>4 Thu, 09/01</td>
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<tr>
<td><strong>Week 3</strong></td>
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<tr>
<td>5 Tue, 09/06</td>
<td>Forecasting Midterm Review</td>
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<td>HW#2 due Tue, 9/6</td>
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<td>6 Thu, 09/08</td>
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<td>HW#3 due Thu, 9/8</td>
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<td><strong>Week 4</strong></td>
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<td>7 Tue, 09/13</td>
<td>MIDTERM Intro to Project Mgmt</td>
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<td>8 Thu, 09/15</td>
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<td><strong>Week 5</strong></td>
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<tr>
<td>9 Tue, 09/20</td>
<td>Project Selection Scope and WBS</td>
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<td>HW#4 due Fri, 9/23</td>
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<td>10 Thu, 09/22</td>
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<tr>
<td><strong>Week 6</strong></td>
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<tr>
<td>11 Tue, 09/27</td>
<td>Schedule Time-Cost Tradeoff</td>
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<td>HW#5 due Fri, 9/30</td>
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<td>12 Thu, 09/29</td>
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<td><strong>Week 7</strong></td>
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<tr>
<td>13 Tue, 10/04</td>
<td>Closing Projects Agile, Lean Six-Sigma Agile Videos</td>
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<td>HW#6 due Thu, 10/6</td>
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<td>14 Thu, 10/06</td>
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<tr>
<td><strong>Week 8</strong></td>
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<td>15 Tue, 10/11</td>
<td>Final Review</td>
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<tr>
<td>16 Thu, 10/13</td>
<td><strong>FINAL</strong></td>
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ADDITIONAL INFORMATION

Add/Drop Process
Most Marshall classes are open enrollment (R-clearance) through the Add deadline. If there is an open seat, you can add the class using Web Registration. If the class is full, you will need to continue checking Web Registration or the Schedule of Classes (classes.usc.edu) to see if a space becomes available. Students who do not attend the first two class sessions (for classes that meet twice per week) may be dropped from the course. There are no formal wait lists for Marshall undergraduate courses, and professors cannot add students or increase the course capacity.

The last day to add the class or withdraw without receiving a “W” (and receive a refund) is on Thursday, September 1, 2022. The last day to drop without a “W” is on Thursday, September 15, 2022, and to drop with a “W” is on Wednesday, October 5, 2022.

Use of Recordings
Pursuant to the USC Student Handbook (www.usc.edu/scampus, Part B, 11.12), students may not record a university class without the express permission of the instructor and announcement to the class. In addition, students may not distribute or use notes or recordings based on university classes or lectures without the express permission of the instructor for purposes other than personal or class-related group study by individuals registered for the class. This restriction on unauthorized use applies to all information that is distributed or displayed for use in relationship to the class.

Open Expression and Respect for All
An important goal of the educational experience at USC Marshall is to be exposed to and discuss diverse, thought-provoking, and sometimes controversial ideas that challenge one’s beliefs. In this course we will support the values articulated in the USC Marshall “Open Expression Statement.”

Students with Disabilities
The University of Southern California determines through the Office of Student Accessibility Services if/that academic accommodations are necessary to support a student with a disability. It is the academic department and faculty members’ responsibility to ensure academic accommodations are provided. It is the student’s responsibility to submit accommodation requests in a timely manner as well as follow OSAS’s policies and procedures. OSAS personnel are available for consultation should questions and more complicated accommodation needs arise.

Students must register with Student Accessibility Services (OSAS) for each academic term that accommodations are desired. Guidelines for the OSAS accommodation process can be found at https://osas.usc.edu/.

Emergency Preparedness/Course Continuity
In case of a declared emergency if travel to campus is not feasible, the USC Emergency Information web site (http://emergency.usc.edu/) will provide safety and other information, including electronic means by which instructors will conduct class using a combination of
USC’s Blackboard learning management system (blackboard.usc.edu), teleconferencing (usc.zoom.com), our class communication tool (usc.slack.com), and other technologies.

**Statement on Academic Conduct and Support Systems**

**Academic Conduct:**

Plagiarism – presenting someone else’s ideas as your own, either verbatim or recast in your own words – is a serious academic offense with serious consequences. Please familiarize yourself with the discussion of plagiarism in SCampus in Part B, Section 11, “Behavior Violating University Standards” policy.usc.edu/scampus-part-b. Other forms of academic dishonesty are equally unacceptable. See additional information in SCampus and university policies on Research and Scholarship Misconduct.

**Students and Disability Accommodations:**

USC welcomes students with disabilities into all University’s educational programs. The Office of Student Accessibility Services (OSAS) is responsible for the determination of appropriate accommodations for students who encounter disability-related barriers. Once a student has completed the OSAS process (registration, initial appointment, and submitted documentation) and accommodations are determined to be reasonable and appropriate, a Letter of Accommodation (LOA) will be available to generate for each course. The LOA must be given to each course instructor by the student and followed up with a discussion. This should be done as early in the semester as possible as accommodations are not retroactive. More information can be found at osas.usc.edu. You may contact OSAS at (213) 740-0776 or via email at osasfrontdesk@usc.edu.

**Support Systems:**

*Counseling and Mental Health* - (213) 740-9355 – 24/7 on call studenthealth.usc.edu/counseling
Free and confidential mental health treatment for students, including short-term psychotherapy, group counseling, stress fitness workshops, and crisis intervention.

*National Suicide Prevention Lifeline* - 1 (800) 273-8255 – 24/7 on call suicidepreventionlifeline.org
Free and confidential emotional support to people in suicidal crisis or emotional distress 24 hours a day, 7 days a week.

*Relationship and Sexual Violence Prevention Services (RSVP)* - (213) 740-9355(WELL), press “0” after hours – 24/7 on call studenthealth.usc.edu/sexual-assault
Free and confidential therapy services, workshops, and training for situations related to gender-based harm.

*Office for Equity, Equal Opportunity, and Title IX (EEO-TIX)* - (213) 740-5086 eeotix.usc.edu
Information about how to get help or help someone affected by harassment or discrimination, rights of protected classes, reporting options, and additional resources for students, faculty, staff, visitors, and applicants.

*Reporting Incidents of Bias or Harassment* - (213) 740-5086 or (213) 821-8298
*usc-advocate.symplicity.com/care_report*
Avenue to report incidents of bias, hate crimes, and microaggressions to the Office for Equity, Equal Opportunity, and Title for appropriate investigation, supportive measures, and response.

*The Office of Student Accessibility Services (OSAS)* - (213) 740-0776
*osas.usc.edu*
OSAS ensures equal access for students with disabilities through providing academic accommodations and auxiliary aids in accordance with federal laws and university policy.

*USC Campus Support and Intervention* - (213) 821-4710
*campussupport.usc.edu*
Assists students and families in resolving complex personal, financial, and academic issues adversely affecting their success as a student.

*Diversity, Equity and Inclusion* - (213) 740-2101
*diversity.usc.edu*
Information on events, programs and training, the Provost’s Diversity and Inclusion Council, Diversity Liaisons for each academic school, chronology, participation, and various resources for students.

*USC Emergency - UPC:* (213) 740-4321 – 24/7 on call dps.usc.edu,
*emergency.usc.edu*
Emergency assistance and avenue to report a crime. Latest updates regarding safety, including ways in which instruction will be continued if an officially declared emergency makes travel to campus infeasible.

*USC Department of Public Safety - UPC:* (213) 740-6000 – 24/7 on call
dps.usc.edu
Non-emergency assistance or information.

*Office of the Ombuds* - (213) 821-9556 (UPC)
*ombuds.usc.edu*
A safe and confidential place to share your USC-related issues with a University Ombuds who will work with you to explore options or paths to manage your concern.

*Occupational Therapy Faculty Practice* - (323) 442-3340 or *otfp@med.usc.edu*
*chan.usc.edu/otfp*
Confidential Lifestyle Redesign services for USC students to support health promoting habits and routines that enhance quality of life and academic performance.