Descriptive Statistics
measures of location and dispersion, including mean, median, mode, percentiles and quartiles, range, standard deviation, variance, coefficient of variation, and inter-quartile range. Also graphical methods such as stem-and-leaf plots, crosstabulations, scatter diagrams, and box plots. (1 week)

Confidence Intervals
point and interval estimation of the mean, proportion, or variance of a single population, the difference between two population means or proportions, the ratio between two population variances, and matched pairs. Also a discussion of Type I and II errors, power, and p-values. (2 weeks)

Regression and Correlation
simple linear regression and correlation, and the corresponding confidence intervals and hypothesis tests. Also, an introduction to polynomial regression and multiple regression. (2 weeks)

Analysis of Variance
one-way analysis of variance and multiple comparison methods. Also, randomized block designs and factorial designs. (2 weeks)

Chi-squared Tests
goodness-of-fit tests and tests of independence. (1 week)

Grading:

Midterm 33\% 
Project 33\% 
Final 33\%

Note: Class notes and information will be available at: 
http://web.pdx.edu/~fountair/
If you have, or think you may have, a disability that may affect your work in this class and feel you need accommodations, contact the Disability Resource Center to schedule an appointment and initiate a conversation about reasonable accommodations. The DRC is located in 116 Smith Memorial Student Union, 503-725-4150, drc@pdx.edu, https://www.pdx.edu/drc.

- If you already have accommodations, please contact me to make sure that I have received a faculty notification letter and discuss your accommodations.
- Students who need accommodations for tests and quizzes are expected to schedule their tests to overlap with the time the class is taking the test.
- Please be aware that the accessible tables or chairs in the room should remain available for students who find that standard classroom seating is not useable.

Portland State is committed to providing an environment free of all forms of prohibited discrimination and sexual harassment (sexual assault, domestic and dating violence, and gender or sex-based harassment and stalking). If you have experienced any form of gender or sex-based discrimination or harassment, know that help and support are available. PSU has staff members trained to support survivors in navigating campus life, accessing health and counseling services, providing academic and on-housing accommodations, helping with legal protective orders, and more. Information about PSU’s support services on campus, including confidential services and reporting options, can be found on PSU’s Sexual Misconduct Prevention and Response website at: http://www.pdx.edu/sexual-assault/get-help or you may call a confidential IPV Advocate at 503-725-5672.

Please be aware that all PSU faculty members and instructors are required to report information of an incident that may constitute prohibited discrimination, including sexual harassment and sexual violence. This means that if you tell me about a situation of sexual harassment or sexual violence that may have violated university policy or student code of conduct, I have to share the information with my supervisor or the University’s Title IX Coordinator or the Office of Affirmative Action. For more information about Title IX please complete the required student module Creating a Safe Campus in your D2L.