

SPRING 2019 - STAT 380 D100

INTRODUCTION TO STOCHASTIC PROCESSES (3)*Class Number: 3440 Delivery Method: In Person***COURSE TIMES + LOCATION:**Mo, We, Fr 9:30 AM – 10:20 AM
SSCK 9509, Burnaby**EXAM TIMES + LOCATION:**Apr 13, 2019
3:30 PM – 6:30 PM
AQ 3149, Burnaby**INSTRUCTOR:**Richard Lockhart
lockhart@sfu.ca
1 778 782-3264
Office: SC-K10561**PREREQUISITES:**

STAT 330, or all of: STAT 285, MATH 208W, and MATH 251.

Description

CALENDAR DESCRIPTION:

Review of discrete and continuous probability models and relationships between them. Exploration of conditioning and conditional expectation. Markov chains. Random walks. Continuous time processes. Poisson process. Markov processes. Gaussian processes. Quantitative.

COURSE DETAILS:**Course Outline:**

1. Review: Chapters 1,2,3
2. Discrete Time Markov Chains
3. Poisson Processes
4. Continuous Time Markov Chains
5. Some applications

Computing Requirements:

Students should feel comfortable in some programming environment, such as R.

Grading

Assignments	25%
Midterm	25%
Final Exam	50%

NOTES:***Above grading is subject to change.***

Materials

REQUIRED READING:

Required Text:

***Introduction to Probability Models (11th Edition)* by: S.M. Ross. Publisher: Academic Pres**

DEPARTMENT UNDERGRADUATE NOTES:

Students with Disabilities:

Students requiring accommodations as a result of disability must contact the Centre for Accessible Learning 778-782-3112 or csdo@sfu.ca

Tutor Requests:

Students looking for a Tutor should visit <http://www.stat.sfu.ca/teaching/need-a-tutor-.html>. We accept no responsibility for the consequences of any actions taken related to tutors.

REGISTRAR NOTES:

SFU's Academic Integrity web site <http://www.sfu.ca/students/academicintegrity.html> is filled with information on what is meant by academic dishonesty, where you can find resources to help with your studies and the consequences of cheating. Check out the site for more information and videos that help explain the issues in plain English.

Each student is responsible for his or her conduct as it affects the University community. Academic dishonesty, in whatever form, is ultimately destructive of the values of the University. Furthermore, it is unfair and discouraging to the majority of students who pursue their studies honestly. Scholarly integrity is required of all members of the University. <http://www.sfu.ca/policies/gazette/student/s10-01.html>

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