**Geo 236–Stratigraphy and Sedimentology**

**Lecture: Sunday Tuesday08:00-08:50**

**Dr. Ali Kahal**

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**Course Goals and Objectives:** The objective of this course is to introduce the students to the concepts of sedimentology and stratigraphy, the types of sedimentary rocks and sedimentary structures, the depositional environment of sedimentary rocks, techniques used for stratigraphy correlation and introduction to more modern techniques such as sequence stratigraphy. This course will provide the foundation for students who want to study more advanced courses in sedimentology and stratigraphy by introducing them to the terminologies and basic concepts this discipline.

**Textbook**: ***Sedimentology and Stratigraphy, 2ndEdition* by Gary Nichols**

**Course Grading:** Your grade in the course will be based on the following distribution of work

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| Exam 1 | 20 % |  |
| In-class Quizzes | 5 % |  |
| Field trip and Home works | 5 % |  |
| Replacement Exam |  |  |
| Lab assignments | 30 % |  |
| Replacement Exam |  |  |
| Final Exam | 40 % |  |

**Course topics:**

1. Introduction to Sedimentology and Stratigraphy
2. Detrital Sedimentray Rocks
3. Biogenic and Chemical Sedimentary Rocks
4. Sedimentary Structures
5. Field Sedimentology, Facies and Environments
6. Stratigraphic Concepts and Lithostratigraphy
7. Dating and Correlation techniques