Instructor Information

Instructor: Aaron French Phone: 505-277-3018

Office: ASM 2140 Email: afrench@unm.edu

Course Description

The primary focus of this course is on Data Warehousing and it's applications to business intelligence. We will concentrate on topics like: requirements gathering for data warehousing, data warehouse architecture, dimensional model design for data warehousing, physical database design for data warehousing, extracting, transforming, and loading strategies, introduction to business intelligence, design and development of business intelligence applications, expansion and support of a data warehouse.

Topics Covered

What is Data Warehousing, Inmon vs. Kimball, dimensional modeling, ETL technologies, fact tables, OLAP, business intelligence, and big data.

Required Textbook

The Datawarehouse Toolkit Third Edition, by Ralph Kimball and Margy Ross, 2013.

ISBN: 978-1-118-53080-1.

Useful References

Kimball Group's Site: http://www.kimballgroup.com/category/design-tips/

SQL Server 2012: http://technet.microsoft.com/en-us/library/bb418433(v=sql.10).aspx
BI for SQL Server 2012: http://msdn.microsoft.com/en-us/library/ee229548(v=sql.10).aspx

Grading

Grades will be based on the accumulation of points throughout the semester. Each assignment, test, or group task will be awarded points determined at the time it is assigned. The number of points earned divided by the total points assigned will result in your final grade.

Percent	Grade	Percent	Grade	Percent	Grade
96% - 100%	A+	86% - 89%	B+	76% - 79%	C+
93% - 95%	Α	83% - 85%	В	73% - 75%	С
90% - 92%	A-	80% - 82%	B-	70% - 72%	C-

Participation

This is a graduate level course with professional students. Effective communication and class discussions will make the course more interesting, productive and useful. Participation in this course will be worth 100 points on your total score at the end of the semester.

Attendance and Tardiness

- 1. You are expected to complete work on schedule. Late assignments will not be accepted.
- 2. You are expected to be in class and on time. If you cannot meet this requirement let me know in advance. You will be responsible for getting missed material from a classmate.
- 3. You cannot participate if you don't attend class.

Weekly Schedule – Spring 2015

Week	Date	Topic	
1	January 13	Introduction	
		Review the relational model	
		Limitations of the relational model	
2	January 20	Introduction to data warehouseoverview	
		Requirements analysis & planning	
		Project Management	
		Read: Chapter 1	
3	January 27	Master Data Management	
		Meta data	
		Data Governance	
		Inmon vs. Kimball	
4	February 3	Introduction to Dimensional Models	
		Read: Chapter 2	
5	February 10	Designing Dimensional Models	
6	February 17	Developing the Relational Data Warehouse	
7	February 24	ETL & SSIS	
8	March 3	Midterm Exam	
X	March 10	Spring Break	
9	March 17	Data Marts	
10	March 24	OLAP & Business Intelligence	
11	March 31	Data Cubes	
12	April 7	Deployment, expansion and support of the DW	
13	April 14	Data Mining	
14	April 21	Big Data	
15	April 28	Final Exam	
16	May 5	Presentations	

Note: Dates are subject to change.