# Business Law Assessment Report Fall 2016

Author: Joseph F. van Gaalen, Ph.D., Director, Academic Assessment

# 1 Introduction

Florida SouthWestern State College's Business Department gathers a multitude of data from various courses as assessment tools in support of the Florida Department of Education Curriculum Framework. The course included in assessment is BUL 2241 *Business Law*. The assessment outcomes are intended to provide a baseline and measurement of achievement moving forward as well as investigate the strength and performance of items in the exam. The assessment plan also provides comparisons between dual Enrollment and non-dual enrollment students, online versus traditional students, and by site, where possible. Where data is sufficient, additional analyses are provided including distribution studies and longitudinal studies.

For additional detail or further analysis not provided in this report, please contact Dr. Joseph F. van Gaalen, Director of Academic Assessment, Academic Affairs (<a href="mailto:jfvangaalen@fsw.edu">jfvangaalen@fsw.edu</a>; x16965).

## 2 BUL 2241

#### 2.1 LEARNING OBJECTIVES AND DESCRIPTIVE STATISTICS

The FSW Business faculty defined two areas of interest for evaluation in support of the state framework. The outcomes and the measure of success related to BUL 2241 are:

- ➤ Outcome 1 80% of candidates will achieve a score of 80 or higher on the final exam from Business Law associated with the program outcome "Demonstrate knowledge of the fundamental principles of the law of business organizations." during AY 2016-2017.
- ➤ Outcome 2 80% of candidates will achieve a score of 80 or higher on the Document Drafting Assignment(s) {Module Four Assignment-Promissory Note} with the program outcome "Demonstrate knowledge of fundamental principles of contract law including the uniform commercial code." during AY 2016-2017.

During the fall 2016 semester, 56 scores were tallied from 3 of 4 sections of BUL 2241. The fourth class did not report data in the LMS. Descriptive statistics for achievement of outcomes are shown in Table 1. The distribution of scores is presented in Table 2 and Figure 1.

| Measurement     | % Scoring     |
|-----------------|---------------|
| Method          | 80% or Higher |
| Final Exam      | 89%           |
| Module 4        |               |
| Promissory Note | 56%           |

Table 1. Student achievement level by Essay for BUL 2241.

|                    | Final Exam | Module 4 Promissory Note |
|--------------------|------------|--------------------------|
| Maximum score      | 100        | 200                      |
| n                  | 56         | 47                       |
| Max                | 100        | 200                      |
| Min                | 60         | 128                      |
| Median             | 89.5       | 180                      |
| Mode               | 98         | 180                      |
| Mean               | 88.8       | 180                      |
| Standard deviation | 8.39       | 13.38                    |
| Skewness           | -1.08      | -1.30                    |
| Kurtosis           | 1.52       | 4.15                     |

Table 2. Descriptive statistics for BUL 2241 final exam.

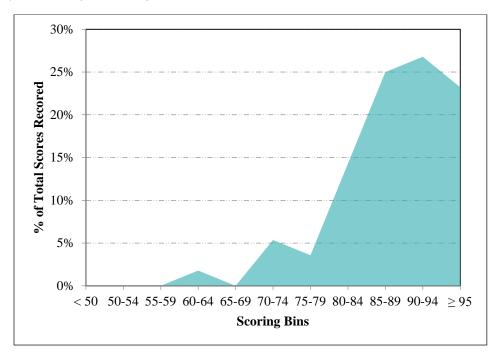


Figure 1. Distribution of scores from BUL 2241 Final Exam.

#### 2.2 EXPLORATORY ANALYSIS AND SIGNIFICANCE TESTING

Multiple comparisons of artifact scores across varying formats, campuses, and student types were made, where possible, in order to add depth to the causes of the distribution of the artifacts. Each course was divided into the appropriate subgroups to perform the analysis. In cases where a subgroup is not represented in the course comparisons were not conducted and are noted for comprehensiveness.

### 2.2.1 Dual Enrollment to Non-Dual Enrollment Comparison

No dual enrollment sections of the course were run during fall 2016 so no comparison study between dual enrollment and non-dual enrollment could be completed.

#### 2.2.2 Online to Traditional Comparison

During the fall 2016 semester, 44 total online scores were tallied from BUL 2241 and 12 traditional artifacts were tallied from BUL 2241 for the final exam. Only online courses reported data on the Module 4 Promissory Note assignment. A comparison of basic statistics is provided in Table 3. Online artifacts mean scores are 0.9 lower than traditional exams. Difference in the means was tested for significance using a Welch's t-test according to standard methods (Davis, 1973; McDonald, 2009;

Wilkinson, 1999) and found to not be statistically significantly different. Therefore, we cannot reject the null hypothesis that the difference in the means of the online and traditional scores of the final exams is equal to 0, and we cannot conclude this with a 95% confidence that the differences in scores are not solely due to chance.

| Maximum<br>score | 100  |
|------------------|------|
| Traditional      |      |
| n                | 12   |
| Mean             | 89.5 |
| % above<br>80    | 75%  |
| Online           |      |
| n                | 44   |
| Mean             | 88.6 |
| % above<br>80    | 93%  |

Table 3. Comparison of basic statistics for final exam of traditional sections and online sections. Statistically significant results denoted in bold/italics.

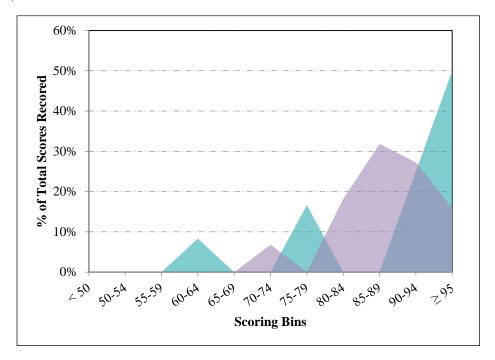


Figure 2. Comparison of score distribution for final exams of traditional (aqua) and online (purple).

Effect size was calculated using a method devised by Rosenthal and Rosnow (1991) for meta-analytical purposes in potential comparisons with other institutions (Lipsey and Wilson, 1993). The statistically significant results exhibit what Cohen (1988) would consider a small effect sizes. In other words, non-overlap score distribution from online artifacts to traditional artifacts is approximately 5%.

#### 2.2.3 Comparison by Campus/Site

Since the only two sites in which course data was collected was Thomas Edison (Lee) and FSW Online, results of this comparison are exhibited in 2.2.2 (see above).

#### 2.3 LONGITUDINAL STUDY

As further data is collected in coming terms, this section will track achievement through time and highlight strengths, weaknesses and any long term trends.

# 3 Conclusions

FSW's Business Department gathers a multitude of data from various courses as assessment tools in support of the Florida Department of Education Curriculum Framework. The course included in assessment is BUL 2241 *Business Law*. The assessment outcomes are intended to provide a baseline and measurement of achievement moving forward as well as investigate the strength and performance of items in the exam.

#### 3.1 BUL 2241

A drill-down of BUL 2241 results are as follows:

- In a study of outcome achievement, "80% of candidates will achieve a score of 80 or higher on the final exam from Business Law associated with the program outcome "Demonstrate knowledge of the fundamental principles of the law of business organizations." during AY 2016-2017", 89% of scores are 80% or greater on the final exam.
- 2. In a study of outcome achievement, "80% of candidates will achieve a score of 80 or higher on the Document Drafting Assignment(s) {Module Four Assignment-Promissory Note} with the program outcome "Demonstrate knowledge of fundamental principles of contract law including the uniform commercial code." during AY 2016-2017, 96% of scores are 80% or greater on the Module 4 assignment.
- In a study comparing Online with Traditional course sections, online artifacts mean scores are 0.9 lower than traditional exams. Difference in the means was tested for significance using a Welch's t-test according to standard methods and found to not be statistically significantly different.
- 1. No cross-campus comparison could be completed because course data was only collected from online and one site, a study completed in #2 above.

## 4 REFERENCES

- Cohen, J. 1988. Statistical power analysis for the behavioral sciences (2<sup>nd</sup> ed.). Lawrence Earlbaum Associates, Hillsdale, NJ.
- Davis, J.C. 1973. Statistics and Data Analysis in Geology. John Wiley & Sons, New York, New York, 564 pp.
- Lipsey, M.W. and Wilson, D.B. 1993. The efficacy of psychological, educational, and behavioral treatment: Confirmation from meta-analysis. American Psychologist, 48, 1181-1209.
- McDonald, J.H. 2009. Handbook of Biological Statistics (2nd ed.). Sparky House Publishing, Baltimore, Maryland.
- Rosenthal, R. and Rosnow, R.L. 1991. Essentials of behavioral research: Methods and data analysis (2<sup>nd</sup> ed.). McGraw Hill, New York, NY.

Wilkinson, L. 1999. APA Task Force on Statistical Inference. Statistical Methods in Psychology Journals: Guidelines and Explanations. American Psychologist 54 (8), 594–604.