FLCC Course Syllabus

**General Information**

**Date**
03/23/2017

**Department**
Mathematics

**Course Prefix:**
MAT

**Course Number:**
122

**Course Title:**
Introductory Statistics II

**Course Information**

**Credit Hours**
3

**Lecture Contact Hours**
3

**Catalog Description**
A continuation of Introductory Statistics I (MAT 121) with an introduction to statistical research. Topics of statistical inference included are hypothesis testing and estimation for means, proportions, and variances; determination of sample size; uses of the Chi-square distribution; analysis of variance; and statistical research. The course will emphasize computer or calculator use (graphing calculator, Minitab, Excel, StatCrunch, etc.) to obtain results.

**Prerequisites**
MAT 121

**Grading Scheme**
Letter Grade

**This course is designated as satisfying a requirement in the following SUNY Gen Ed category**
Mathematics

**FLCC Values**

**College Learning Outcomes Addressed by the Course**
- Inquiry
- Interconnectedness
- Perseverance

**Course Learning Outcomes**
Course Learning Outcomes

1: Use the language of statistics; reading and interpreting statistical presentations; critically analyzing the use of statistics in decision making; understanding and recognizing the misuses and limitations of statistics.
2: Describe the relationship between sample statistics and population statistics.
3: Explain how the Central Limit Theorem applies to statistical analysis.
4: Determine the validity about the population statistic using the technique of hypothesis testing.
5: Apply hypothesis testing to small samples, large samples, two samples, and many samples.
6: Find confidence intervals for many different sample situations.
7: Interpret the meaning of confidence intervals.
8: Evaluate results for reasonableness.

Program Affiliation

This course is required as a core program course in the following program(s)

AS Sports Studies
AAS E-Commerce
Other - Write In: AS Tourism Studies

Outline of Topics Covered

Outline of Topics Covered in Course

MAT_122_Topic_Outline.pdf