# Curriculum Change Form (Present only one proposed curriculum change per form) (Complete only the section(s) applicable.)

(Check one)	Department Name	Mathematics and Statistics
New Course (Parts II, IV)	College	Arts and Sciences
X Course Revision (Parts II,	IV) *Course Prefix & Num	iber STA 270
Hybrid Course ("S," "W")	*Course Title	Applied Statistics I
New Minor (Part III)	*Program Title	
Program Suspension (Par	t III)	
Program Revision (Part III)	*Provide only the informatic relevant to the proposal.	on If Certificate, indicate Long-Term (University) or Short-Term (Departmental)
Proposal Approved by:	Date	Date
Departmental Committee	1/14/2016	Council on Academic Affairs 3/24/16
College Curriculum Committee	01/25/16	Faculty Senate** NA
General Education Committee*	02/09/16	Board of Regents** NA
Teacher Education Committee*	NA	EFFECTIVE ACADEMIC TERM*** FALL 2016
Graduate Council*	NA	
*If Applicable (Type NA if not **Approval needed for progran ***To be added by the Registrar	applicable.) r revisions or suspensions 's Office after all approval	s. is received.

## Completion of A, B, and C is required: (Please be specific, but concise.)

A. 1. Specific action requested: (Example: Increase the number of credit hours for ABC 100 from 1 to 2.)

Increase the number of credit hours from 3 to 4; update MAT prerequisite; revise the title to "Applied Statistics"; revise course description to more accurately reflect course content.

### A. 2. Proposed Effective Academic Term: Fall 2016

A. 3. Effective date of suspended programs for currently enrolled students: (if applicable)

### B. The justification for this action:

Dort I

In a recent survey of departments who require STA 270 for their programs, several departments have indicated that it would be beneficial to their students if they also learned two-sample inference procedures for means and proportions as well as some other statistical techniques. We believe that students who take this revised four-hour course will have a much stronger background in statistical inference.

Another reason for this change is to allow us to cover enough material in STA 270 in one semester for students to be properly prepared to take higher level statistics courses. This will be advantageous to students who decide to major or minor in statistics. We have considered adding STA 320 as a prerequisite to other higher level statistics courses, but this potential change might delay graduation for some students since many of our students do not declare majors or minors in statistics until their sophomore or junior year.

The name change is necessary because Applied Statistics II (STA 320) is being dropped.

The courses potentially affected by this course revision is attached.

C. The projected cost (or savings) of this proposal is as follows:

Personnel Impact: None.

Operating Expenses Impact: None.

Equipment/Physical Facility Needs: None.

Library Resources: None.

### Part II. Recording Data for New, Revised, or Dropped Course

(For a **new required course**, complete a separate request for the appropriate program revisions.)

- 1. For a new course, provide the catalog text.
- 2. For a revised course, provide the current catalog text with the proposed text using strikethrough for deletions and <u>underlines</u> for additions.
- 3. For a dropped course, provide the current catalog text.

New or Revised\* Catalog Text

(\*Use strikethrough for deletions and underlines for additions. Also include Crs. Prefix, No., and description, limited to 35 words.)

**STA 270 Applied Statistics I.** (<u>34</u>) I, II. Prerequisite: MAT <u>107 112</u> or higher, a minimum score of 23 on the mathematics portion of the ACT, or a minimum score of 500 on the mathematics portion of the SAT. Measures of central tendency and dispersion, discrete and continuous distributions, binomial distributions, normal distributions, frequency distributions, correlation and linear regression, probability, sampling distributions, point and interval estimates, hypothesis testing, and use of statistical software. <u>Descriptive statistics</u>, probability, counting techniques, discrete and continuous distributions, binomial distributions, normal distributions, sampling distributions, one- and two-sample estimation and hypothesis testing, chi-square tests, correlation, linear regression, analysis of variance, and use of statistical software. Gen. Ed. E-2 [QR].

## Part III. Recording Data for Revised or Suspended Program

- 1. For a revised program, provide the current program requirements using strikethrough for deletions and *underlines* for additions.
- 2. For a suspended program, provide the current program requirements as shown in catalog. List any options and/or minors affected by the program's suspension.

Revised\* Program Text (\*Use strikethrough for deletions and <u>underlines</u> for additions.)

Part IV. Recording Data for New or Revised Course (Record only new or changed course information.)

Part IV. Recordin	ng Data for New or I	Revised Course (Record only ne	ew or changed course infor	mation.)	
Course prefix (3 letters)	Course Number (3 Digits)	Effective Academic Term (Example: Fall 2012)	College/Division:	Dept. (4 letters)*	
				MTOT	
STA	270	Fall 2016		MISI	
			BTJS		
			ED UP		
Credit Hrs.	Wee	ekly Contact Hrs.	Repeatable Maximum No. of Hrs. 0		
34 Lecture X Lab		aboratory Other			
		Cip Code (first two digits only)		ts only) 27	
Schedule Type*	Work Load	Grading Mode*	Class Restriction, if any:	(undergraduate only)	
(List all applicable)	(for each schedule type)				
1 Lecture	4	Normal, Audit	FR	JR	
B Web Course	4	(for all schedule types)	SO	SR	
τ ιτν	4	Grading Information: Course is			
V Mixed ITV	4	eligible for IP (in-progress			
W Mixed Web	4	grading) for: <u>Check all applicable</u>			
	<u>т</u>	Thesis			
		Practicum			
	CoRequisites an	nd Prerequisites **See definit	tions on following page**		
Co-Requisite(s)	: (List only co-re	quisites. See below for prerequisite	s and combinations.)		
Course Prefix an	d No.				
Course Prefix an	d No.				
Prerequisite(s):	(List prerequisites on requirements should	ly. List combinations below. Use "a be placed in ( ) following courses. D	and" and "or" literally.) (Spece Default grade is D <sup>-</sup> .)	cific minimum grade	
Course Prefix an	d No.	MAT 107 112 or higher, a mir	nimum score of 23 on the ma	athematics portion	
		of the ACT, or a minimum score of 500 on the mathematics portion of the			
		SAT			
Course Prefix and No.					
Test Scores					
Minimum GPA (w student cumulative G	/hen a course grouping or iPA is required)				
Co-requisite(s) a requirements sl	and/or Prerequisite hould be placed in ( ) fo	(s) Combination (Use "and" and blowing courses. Default grade is D	"or" literally.) (Specific minim)	um grade	
Course Prefix an	d No.		-		
Test Scores					
Minimum GPA (v student cumulativ	when a course grouping o /e GPA is required)	r			
Equivalent Cou	rse(s): (credit will no	t be awarded for both; or formerly.	)		
Course Prefix an	d No.				
Course Prefix and No.					
Course Prefix and No.					

Proposed General Education Element: Please mark (X) in the appropriate Element or Elements (e.g. – 4B(3) X).

Element 1 (9)	Element 2 (3)	Element 3 (6)	Element 4 (6)	Element 5 (6)	Element 6 (6)
1A (3)	2 (3)	3A (3)	4A (3)	5A (3)	6 (6)
1B (3)		3B (3)	4B (3)	5B (3)	
1C (3)		or 3A/B	or 4A/B		
		Integrated A&H(6)	Integrated Sciences(6)		