To: Faculty Senate

From: Faculty Senate Curriculum Committee: Sakiko Oyama (Co-chair), Martha Fasci (Cochair), Brian Davies, Turgay Korkmaz, Diane Abdo, Liang Tang, and Pepe Chang

Re: Review of core course proposals

Date: December 4th 2017

Faculty senate curriculum committee met and reviewed the proposals for the 8 new core curriculum courses on 11/28/2017. Based on our evaluation, we recommend all proposals to be approved by the faculty senate. Please see below for the summary of our evaluation.

- The committee had no comments/reservations on the following proposals:
 - MUS 2653 History of Recorded Music
 - ARC 2413 History of Architecture: Pre-history to the Middle Ages
 - ENG 2xxx Literature and Film
 - PHI 2013 Basic Philosophical Problems
- The committee identified *a potential* for substantial overlap with the currently existing corecourses for the following courses, and subsequently inquired the proposal creators:
 - MAT1133 Calculus of Business
 - MAT 1053 Mathematics for Business
 - MUS 2653 Music in Culture
 - ENG 2xx3 Science, Technology, and Society

MAT1133 Calculus for Business / MAT1053 Mathematics for Business

The two new courses appeared to overlap with MAT 1033 Algebra with Calculus for Business. Upon requesting clarification from Dr. Sandy Norman, he explained that the two proposed courses will replace MAT 1033, and that MAT 1033 will be eliminated from the catalogue.

MUS2653 Music in Culture

This course examines music and culture of a specific region, on a rotating basis. Two of the alternating regions are Latin America and the Caribbean. The committee was concerned that the course will overlap with MUS 2693 The Music of Latin America and the Caribbean on the semesters that these two regions are covered. Upon requesting clarification from Dr. Mark Brill, he explained that the MUS 2693 will be eliminated and absorbed into MUS2653.

On a separate note, we noticed that the two core courses proposed from the Music Department have the same course number. The course number for one of the courses must be changed.

ENG 2xx3 Science, Technology, and Society

The committee raised two concerns with this course proposal. One concern was that the content of the course seems to represent a significant departure from the English courses. The other concern was that this course might overlap with EGR 1343 The Impact of Modern Technologies on Society. The committee chair met with Dr. Sue Hum, the creator of the proposal to discuss these points on 12/1.

On the first point, Dr. Hum explained that English department does not only include faculty members who study literature and creative writing, but also include faculty members whose work is in the areas of rhetoric of science and technology, scientific and technical writing, and science literacy, and that the proposed course falls under these disciplines. Dr. Hum explained that the main focus of the course is not in science and technology, but is in "knowledge construction, production and analysis of scientific texts, controversies, expertise, public understanding of science, and the political economy of STEM knowledge".

In terms of the potential overlap with the EGR 1343, Dr. Hum clarified that the EGR 1343 "focuses on improving students understanding of modern technologies and their social impact on human life". Topics covered in this class include air, land, and water transportation; fresh water; renewable energy production; and cyber security. In contrast, ENG 2xx3 is centered on analysis of science and technology documents to discuss social issues related to science and technology. The two courses look at a similar topic from a different perspective. Furthermore, EGR1343 has not been offered since it was last taught in Fall 2015.

The memo from Dr. Hum is attached to this report.

To: Sakiko Oyama, Co-chair, Faculty Senate University Curriculum Committee

From: Sue Hum, Kenny Walker, and Crystal Colombini

Re: ENG 2XX3 (Science, Technology, and Society), proposed as a component area elective option for Social and Behavioral Science Component, can be taught by English faculty with interdisciplinary rhetoric expertise

Date: 30 November 2017

Per the inquiry on why the proposed Science, Technology, and Society course is taught in English, we provide the following information.

I. UTSA Context

The proposal for this course responds to student demand and faculty interest in two concrete, UTSA contexts:

- Technical Writing (ENG 2413), a core curriculum, Communications component area elective option, is taken by students from various majors. In 30 sections per year, students share with faculty their interest in more courses that emphasize textual and rhetorical approaches to other disciplinary discourse. Such demand is echoed by non-English majors enrolled in professional writing courses that required by the Undergraduate Certificate for Professional Writing and Rhetoric (PWR); and
- NSF grant proposal, submitted in collaboration with the Department of Environmental Science and Ecology and the College of Human Development and Education, responds to the question: how do underrepresented graduate students persist and succeed in science? The proposal outlines three, interrelated interventions of holistic mentoring, science writing, and public science communication. Discussions with science faculty provided important insight into course content.

II. English Faculty with Interdisciplinary Expertise

English departments are composed not only of literary scholars and creative writers, but also *rhetoric, writing, and literacy scholars.* Rhetoric and writing studies is a vibrant sub-discipline of English. The disciplinary training in analysis, close reading, and evaluation can be applied to a range of artifacts, including documents produced by scientists, engineers, etc. Areas of research in English include *rhetoric of science and technology, scientific and technical writing, and science literacy.* In English, three faculty—Walker, Colombini, and Hum—bring expertise in STS, including scholarly publications in rhetoric of science, political economy, and quantitative literacy respectively.

III. Course Focus on Analysis

The course was designed to build on rhetoric faculty's research expertise in *science and technology studies* (STS). The proposed course—which prioritizes critical thinking, analysis, and evaluation—helps students explore the ways in which social, political, and cultural practices shape scientific and technological innovation. By so doing, students develop an empirical and data-based understanding of scientific knowledges and their implications for society. The course emphasizes knowledge construction, production and analysis of scientific texts, controversies, expertise, public understanding of science, and the political economy of STEM knowledge. The course builds on the interdisciplinary field of STS.

IV. English Faculty Contribute to the Interdisciplinary Focus of STS

STS developed in the mid-1970s into an interdisciplinary field. Rhetoricians played a role in founding the field, particularly through an emphasis on *how scientists persuade, write, and engage deliberative democracy*. From the 1970s to this day, rhetoric and writing studies scholars continue to publish with and alongside scholars from other departments in STS. <u>Anne Penrose</u> and <u>Steven Katz</u>,

authors of one of the course texts, teach in English departments at NC State and Clemson respectively.

Faculty trained in English, who work in English/Rhetoric/Writing Departments, contribute directly to STS scholarship. See, for example, <u>Carolyn Miller</u>, <u>Greg Myers</u>, <u>Jeanne Fahnestock</u>, <u>Judy Segal</u>, <u>Lisa Meloncon</u>, and <u>Lynda Walsh</u>.

Departments in the US and Canada that have robust, internationally recognized STS programs, include <u>NC State</u>, <u>University of Waterloo</u>, and <u>University of British Colombia</u>. MIT offers a series of courses in STS, including a <u>Rhetoric of Science course</u>.

The disciplinary organizations include the Association for the Rhetoric of Science, Technology, and Medicine (<u>www.arstmonline.org</u>), Council for Programs in Technical and Scientific Communication (<u>www.cptsc.org</u>), and the Association for Teachers of Technical Writing (<u>www.attw.org</u>).

V. Different Content, Approach, and Assignments from EGR 1343

Information about EGR 1343 (The Impact of Modern Technologies on Society), a course in the Social and Behavioral Sciences), was gathered from its core curriculum proposal summary, syllabus, and assessment plan, submitted in 2011. EGR 1343 focuses on improving students understanding of modern technologies and their social impact on human life. The sample syllabus indicates topics including air, land, and water transportation; fresh water; renewable energy production; and cyber security. Three exams comprise of 70% of the course grade. This course was last offered in Fall 2015.

By contrast, ENG 2XX3 prioritizes analysis of science and technology documents to focus on the following topics: paradigm shifts in science and technology; race, gender, and women's studies of technoscience; social studies of scientific imaging and visualization; new media and participatory cultures in technoscience; and the public understanding of science. Two separate writing assignments—analysis and case study—comprise 45% of the course grade. Three tests comprise the other 55% of the course grade.

A comparative case may provide some context. When SOC 2223 was first proposed, it carried the title "Drugs in Society," which was perceived to be too close in name to BIO 1033, "Drugs and Society." The SOC course was renamed "Social Context of Drug Use." Both courses currently reside in the Social and Behavioral Science component of the core curriculum.