8th Annual Texas A&M University Assessment Conference

Pre-Conference Workshop

The Texas General Education Core Curriculum and Field of Study Curricula Assessment Initiatives

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Recent Changes To The Coordinating Board Rules Regarding General Education Core Curriculum Evaluation Reports

Let's start with a little background…

- First legislation requiring evaluations and reports of effectiveness of core curricula: 70th Texas Legislature, 1987

- THECB implemented requirements, 1989

- First "snapshot" descriptive reports received, 1991 (some institutions did not have general education requirements until this time)

- First set of evaluation reports received from institutions 1996
(reports were collected, but no response was made to individual institutions; a survey went out to all colleges and universities asking for feedback about several statewide core curriculum matters), 1996

- Based on the results of the survey, Coordinating Board staff recommended some changes (e.g make the core curriculum transferable, establish a uniform number of credit hours in the statewide core, etc.), October 1996

- Senator Teel Bivens carried legislation that changed the original core curriculum to the one familiar to public colleges and universities today (SB 148, 75th Texas Legislature), 1997

- Fully transferable general education core curriculum implemented, 1999

- Development of first field of study curricula, 1999

- Core curriculum evaluation reports from institutions reviewed, 2004

- Responses to institutional reports from Coordinating Board 2007

Leading us to:

- **A CHANGE IN REPORTING REQUIREMENTS APPROVED BY COORDINATING BOARD was made official in January, 2008**

CHANGE? What change is that?

NO CORE CURRICULUM REPORTS ARE DUE IN OCTOBER 2009

WHY NOT???

The reporting schedule has changed.

From the Coordinating Board agenda materials, January 2008:

The Texas Higher Education Coordinating Board proposes amendments to Section 4.28 and 4.30, concerning the Texas core curriculum. Two changes are proposed. First, the staff has received a number of questions during the past year regarding appropriate courses to fulfill the Mathematics Component Area requirement. The change specifies that the first college-level mathematics course, including but not limited to introductory statistics, logic, college algebra, or any more advanced math course for which the student is qualified upon enrollment, should be allowed to fulfill the component area requirement. Second, the Coordinating Board is charged to specify a reporting period for the submission of institutional reports regarding the effectiveness of the core curriculum at the institution. The Southern Association of Colleges and Schools (SACS) has recently increased its interest in and attention to this portion of the undergraduate curriculum as part of its revisions to the accreditation reaffirmation process, and requires essentially the same information that has been required in these institutional reports to the Board. The Coordinating Board's reporting period should be changed so that is can be aligned with that of SACS in order to eliminate unnecessary duplication of reporting requirements.

And the proposed changes to the rules themselves:

Chapter 4. Rules Applying to All Public Institutions of Higher Education in Texas
Subchapter B. Transfer of Credit, Core Curriculum and Field of Study Curricula

4.21. Purpose.
4.22. Authority.
4.23. Definitions.
4.24. General Provisions.
4.25. Requirements and Limitations.
4.26. Penalty for Noncompliance with Transfer Rules.
4.27. Resolution of Transfer Disputes for Lower-Division Courses.
4.28. Core Curriculum.
4.29. Core Curricula Larger than 42 Semester Credit Hours.
4.30. Criteria for Evaluation of Core Curricula.
4.31. Revision of Existing Approved Core Curricula.
4.32. Field of Study Curricula.
4.33. Criteria for Evaluation of Field of Study Curricula.
4.34. Revision of Existing Approved Field of Study Curricula.
4.35. Texas Common Course Numbering System.

4.21. – 4.27. No change

4.28 Core Curriculum.

(a) General. In accordance with Texas Education Code, §§61.821 - 61.831, each general academic institution, community college, and health-related institution shall design and implement a core curriculum, including specific courses composing the curriculum, of no less than 42 lower-division semester credit hours. Health-related institutions should encourage their students to complete their core curriculum requirement at a general academic institution or community college.

(b) Component Areas. Each institution's core curriculum must be designed to satisfy the exemplary educational objectives specified for the component areas of the "Core Curriculum: Assumptions and Defining Characteristics" adopted by the Board; all lower-division courses included in the core curriculum must be consistent with the "Texas Common Course Numbering System," and must be consistent with the framework identified in Charts I and II of this subsection. Chart I specifies the minimum number of semester credit hours required in each of five major component areas that a core curriculum must include (with sub-areas noted in parentheses). Chart II specifies options available to institutions for the remaining 6 - 12 semester credit hours.

(See Chart I on the following page)

Chart I - Institutions must select 36 semester credit hours of the core curriculum according to the parameters described below

Component Area	Required Semester Credit Hours
010****** Communication (English rhetoric/composition)	6
020****** Mathematics (the first college-level math course a student completes, including but not limited to introductory statistics, logic, college ~~level~~ algebra, or any more advanced math course which the student is qualified to take upon enrollment ~~equivalent, or above~~)	3
030** Natural Sciences	6
Humanities & Visual and Performing Arts Must include: 050** Visual/Performing Arts 040** Other (literature, philosophy, modern or classical language/literature and cultural studies*)	6 (3) (3)
Social/Behavioral Sciences Must include: 060****** U.S. History (legislatively mandated) 070****** Political Science (legislatively mandated) 080****** Social/Behavioral Science	15 (6) (6) (3)
Total Minimum Requirements	36

*** Humanities** application of language skills includes a study of literature in the original language, and/or the cultural studies related to a modern or classical language.

** Identifying numbers recommended by the Texas Association of Collegiate Registrars and Admissions Officers (TACRAO) for use on students transcripts, in order to indicate courses utilized to satisfy core curriculum component area requirements. Student transcripts should also indicate whether a student has completed the core curriculum satisfactorily.

Chart II - To complete the required 42-semester-credit-hour core curriculum, institutions shall select an additional 6 semester credit hours from one or more of the following:

Component Area	Possible Additional Semester Credit Hours (6 Minimum)
011*** Communication (composition, speech, modern language communication skills*)	Up to 6
021*** Mathematics (the second college-level math course a student completes, including but not limited to finite math, statistics, calculus, or above)	Up to 3
031*** Natural Sciences	Up to 3
041*** Humanities (literature, philosophy, modern or classical language/literature and cultural studies**) & 051*** Visual and Performing Arts	Up to 3
081*** Social and Behavioral Sciences	Up to 3
090*** Institutionally Designated Option (may include additional semester credit hours in the categories listed above, computer literacy, health/wellness, kinesiology, capstone or interdisciplinary courses, etc.	Up to 6
Total Additional Hours	6

* **Communication** application of a modern language means the basic proficiency skills acquired during introductory courses and including a working competency in grammar, writing, speaking, and listening/comprehension in a foreign language.

** **Humanities** application of language skills includes a study of literature in the original language, and/or the cultural studies related to a modern or classical language.

*** Identifying numbers recommended by the Texas Association of Collegiate Registrars and Admissions Officers (TACRAO) for use on students transcripts, in order to indicate courses utilized to satisfy core curriculum component area requirements. Student transcripts should also indicate whether a student has completed the core curriculum satisfactorily.

4.28(c) through 4.28(k) No change

4.29. No change

4.30. Criteria for Evaluation of Core Curricula.

(a) Each public institution of higher education shall review and evaluate its core curriculum every ten ~~five~~ years on the schedule that accords with the institution's accreditation reaffirmation self-study report to the Southern Association of Colleges and Schools or its successor, and report the results of that evaluation to the Board. The evaluation should include:

(1) the extent to which the core curriculum is consistent with the elements of the core curriculum recommended by the Board;

(2) the extent to which the core curriculum is consistent with the Texas Common Course Numbering System (TCCNS);

(3) the extent to which the core curriculum is consistent with the elements of the core curriculum component areas, intellectual competencies, and perspectives as expressed in Core Curriculum: Assumptions and Defining Characteristics adopted by the Board; and

(4) the extent to which the institution's educational goals and the exemplary educational objectives of the core curriculum recommended by the Board are being achieved;

(b) Each institution's evaluation report must contain at least the following:

(1) a table that compares the institution's core curriculum with the core component areas and exemplary educational objectives of the core curriculum recommended by the Board;

(2) a brief description of the purpose and substance of the institution's core curriculum;

(3) a description of the processes and procedures used to evaluate the institution's core curriculum; and

(4) a description of the ways in which the evaluation results are being or will be utilized to improve the core curriculum at the institution.

4.31. - 4.35. No change

SO WHAT DOES THIS MEAN?

• This change to the Coordinating Board rules effectively cancels the anticipated report that would have been expected in October of 2009.

• Instead, institutional reports will be due to the Coordinating Board two years prior to the date the institution submits its Certification of Compliance documentation.

- Institutions with Certification of Compliance documents due in the fall should expect to provide their report to the Coordinating Board on or before **October 1** of the year two years before the Certification of Compliance documents are due.
- Institutions with of Compliance documents due in the spring should expect provide their report to the Coordinating Board on or before **April 1** of the year two years before the Certification of Compliance documents are due.

• This timeline will allow sufficient time for an institution to receive a response from Coordinating Board staff, and to make any modifications or corrections that might be needed. The Coordinating Board will issue a letter certifying that the institution is in compliance with state law and policies regarding the organization and structure of the institution's core curriculum. That document could then be submitted as part of the documentation for Certification of Compliance.

• Institutions are being asked to provide information about their reaffirmation schedule; this information will be compared to what is posted at the SACS website. Based on the information, Coordinating Board staff will develop a table with due dates for institutional reporting, and will post that table on the CB website for handy reference. The table will be updated annually.

• Texas has established component-area learning outcomes for the Texas Core. These are the Exemplary Educational Outcome statements defined for each Core Curriculum Component Area in the document *Core Curriculum: Assumptions and Defining Characteristics*.

• Institutions developing assessment plans for their institutions core curricula should consider how the component-area learning outcomes for the Texas Core Curriculum can support course-specific learning outcomes. An especially helpful recent example can be found within the recent reaffirmation documentation developed by the University of Texas at Dallas: http://sacs.utdallas.edu/ccrnav/index.zog?pid=U337&tabset=tabset1&tab=narrative&rtype=narrative. You can doubtless discover others.

• Expect to see steps taken soon to begin evaluating the effectiveness of the various field of study curriculum approved by the Coordinating Board. The Undergraduate Education Advisory Committee will very likely be involved in developing a process for this assessment initiative.

COORDINATING BOARD UPDATE: WHAT ELSE IS NEW?

- **College Readiness Standards** adopted by THECB and TEA

  http://www.thecb.state.tx.us/CollegeReadiness/

  The College Readiness Standards and the recent high school curriculum 4X4 Initiative should increase the rigor of the high school senior year, and provide clear outcomes for college readiness.

  As the College Readiness Project matures, senior-year high school courses and CRS standards are being aligned with lower-division "gateway" college-level courses. As the Texas Core Curriculum comes under renewed scrutiny, the alignment and progression of outcomes from high school through entry-level collegiate courses, and the core curriculum, will doubtless contribute to the reconsideration of the purpose and objectives of the core curriculum.

- **Undergraduate Education Advisory Committee Report**

  Designing Undergraduate Education in Texas for the 21st Century: A Report with Recommendations from the Undergraduate Education Advisory Committee

Executive Summary

Four critical areas should be addressed in higher education policy and practice throughout Texas to enhance undergraduate education in the globally competitive and information-driven environment of the 21st century. These recommendations, based on both scholarship and current national best practices, especially address the goals of the Texas higher education plan *Closing the Gaps by 2015*. In this report, the recommendations for each area are based on evidence and research; they suggest strategies and best practices formulated to implement the recommendations.

A cohesive, action-oriented agenda must be developed – through legislation, through Coordinating Board initiatives, through governing board directives, and at the institutional level – if the recommendations and strategies are to contribute to increasing the quality of undergraduate education throughout the state.

The report is supplemented by several appendices. Appendix A outlines which entity would have lead responsibility for specific initiatives. For a description of the approach taken by the Undergraduate Education Advisory Committee in the development of the recommendations, see Appendix B. The committee membership is listed in Appendix C.

Recommendations

Closing the Gaps

- Create institutional incentives to improve student success, especially for at-risk students.
- Support initiatives to improve developmental education, including determining the effectiveness of any funded projects.
- Strengthen academic and other advising programs to address the personal, social, financial, career, and academic issues that affect student success.
- Provide leadership to establish student success programs for new students.
- Define state accountability data to reflect the multiple intentions of students.
- Audit state laws and policies and eliminate those that create unreasonable barriers to college completion.

Improving the Quality of Undergraduate Education

- **Reconsider the Texas Core Curriculum to ensure that it reflects current and future demands on student knowledge and skills.**
- Continue to support and fund research and faculty development in the development and measurement of learning outcomes.
- Encourage Texas colleges and universities to internationalize their curricula and campuses to remain competitive**.**
- Support faculty development to improve teaching.
- Develop a virtual teaching excellence laboratory for faculty to enhance the use of active learning, the cultivation of better student and faculty engagement, and the expansion of instructional technology skills.
- Integrate the *Course Redesign* principles into instruction throughout Texas.

Assuring Excellence of Undergraduate Education

- Provide a website for the posting of best practices in assessment and evaluation, and program review.
- Support research that examines the validity of causal links between standardized assessment models and outcomes and students' institutional/curricular experience.

- Establish a system of program review for existing undergraduate programs by the Texas Higher Education Coordinating Board with common criteria for baccalaureate and common criteria for associate degrees.

Strengthening Funding for Undergraduate Education

- Develop policies and procedures that improve the speed, accuracy, and predictability of financial aid awards to students.
- Significantly increase state-appropriated formula funding to ensure that institutions of higher education are able to meet their instructional and operating costs. To that end, support the recommendations of the Coordinating Board as approved in Agenda Item VI E of the April 24, 2008, agenda.
- Base the semester credit hour counts and associated costs used to calculate formula funding upon a rolling average rather than a single year in order to provide a predictable funding stream that allows for better institutional planning.
- Establish a formula for appropriating need-plus-merit-based financial aid, particularly grants, which is indexed to the statewide average of direct tuition and fees.

Each of the recommendations is supplemented within the report by strategies for achieving the recommendation.

The UEAC is currently working on three projects that will have a direct bearing on program assessment throughout Texas colleges and universities:

- Developing recommendations regarding best practices for institutional review procedures for existing undergraduate degree programs
- Developing recommendations regarding the content and procedures for a state-level review of existing undergraduate degree programs
- Developing recommended standards for associate degree programs similar to those already in effect for bachelor's, master's and doctoral programs

The UEAC will soon begin a reconsideration of the Texas Core Curriculum. Although this project will get underway during the spring 2009 semester, much of the work will be completed during the summer and fall 2010 semesters. The current legislative session may include the consideration of bills that would directly affect the project.

Find the report here: http://www.thecb.state.tx.us/reports/pdf/1699.pdf

Finally, your assistance is requested!

You will be switching tables and reconfiguring your groups for this part of the workshop. When you move around the room, try to join a table that includes representatives of colleges and universities, and look for people whose jobs entail different responsibilities than your own. Differing perspectives will add to the richness of the discussion!

You will be asked to consider and discuss one of three questions. You will have 25 minutes to agree on some suggestions in response to each question.

One person should be designated as the recorder, to write down the ideas and suggestions that emerge from the discussion.

At the end of 25 minutes, you will be asked to join a different group, and consider a different question. Each person will have the opportunity to consider two of the three questions.

We will conclude the session by compiling the results of the discussions, which will be made available to anyone who is interested via email.

Question 1: How could the Associate of Arts or Associate of Science degrees be made more effective in encouraging students to transfer from a community college to a university, and to complete a bachelor's degree?

Question 2: How could the Coordinating Board best provide support to institutions in the alignment of reporting requirements in order to satisfy the legislatively-mandated objectives and the newly increased emphasis of accreditors on student learning outcomes in general education? (Should the component-area Exemplary Educational Objectives be changed? If so, how?)

(The statute reads: "The board, with the assistance of advisory committees composed of representatives of institutions of higher education, shall develop a recommended core curriculum of at least 42 semester credit hours, including a statement of the content, component areas, and objectives of the core curriculum.")

The Basic Intellectual Competencies, Perspectives, and Component Ares Exemplary Educational Objectives are provided as a supplement (see the final pages of this packet).

Question 3: How could the existing field of study curricula or other statewide transfer curricula be better employed or developed to facilitate student success? How could such initiatives be appropriately assessed? (FOSCs are optional, and a student must know of them and opt to complete one in order to have the FOSC transfer and apply to the bachelor's degree. Should FOSCs be mandatory for the fields of study for which they have been adopted?)

SUPPLEMENT:

DEFINING CHARACTERISTICS OF BASIC INTELLECTUAL COMPETENCIES IN THE CORE CURRICULUM

The core curriculum guidelines described here are predicated on the judgment that a series of basic intellectual competencies -- reading, writing, speaking, listening, critical thinking, and computer literacy -- are essential to the learning process in any discipline and thus should inform any core curriculum. Although students can be expected to come to college with some experience in exercising these competencies, they often need further instruction and practice to meet college standards and, later, to succeed in both their major field of academic study and their chosen career or profession.

READING: Reading at the college level means the ability to analyze and interpret a variety of printed materials -- books, articles, and documents. A core curriculum should offer students the opportunity to master both general methods of analyzing printed materials and specific methods for analyzing the subject matter of individual disciplines.

WRITING: Competency in writing is the ability to produce clear, correct, and coherent prose adapted to purpose, occasion, and audience. Although correct grammar, spelling, and punctuation are each a sine qua non in any composition, they do not automatically ensure that the composition itself makes sense or that the writer has much of anything to say. Students need to be familiar with the writing process including how to discover a topic and how to develop and organize it, how to phrase it effectively for their audience. These abilities can be acquired only through practice and reflection.

SPEAKING: Competence in speaking is the ability to communicate orally in clear, coherent, and persuasive language appropriate to purpose, occasion, and audience. Developing this competency includes acquiring poise and developing control of the language through experience in making presentations to small groups, to large groups, and through the media.

LISTENING: Listening at the college level means the ability to analyze and interpret various forms of spoken communication.

CRITICAL THINKING: Critical thinking embraces methods for applying both qualitative and quantitative skills analytically and creatively to subject matter in order to evaluate arguments and to construct alternative strategies. Problem solving is one of the applications of critical thinking, used to address an identified task.

COMPUTER LITERACY: Computer literacy at the college level means the ability to use computer-based technology in communicating, solving problems, and acquiring information. Core-educated students should have an understanding of the limits, problems, and possibilities associated with the use of technology, and should have the tools necessary to evaluate and learn new technologies as they become available.

Some of these intellectual competencies have traditionally been tied to specific courses required of all students during their first two years of college. For example, courses in

college composition, together with mathematics, have long been the cornerstone experience of the freshman year. But a single course or two-course sequence in college composition can do little more than introduce students to the principles and practices of good writing. Within the boundary of three to six semester credit hours of course work, neither of these sequences can guarantee proficiency. Moreover, in most curricula there are no required courses specifically dedicated to reading or to critical thinking. Thus, if a core curriculum is to prepare students effectively, it is imperative that, insofar as possible, these intellectual competencies be included among the objectives of many individual core courses and reflected in their course content.

PERSPECTIVES IN THE CORE CURRICULUM

Another imperative of a core curriculum is that it contain courses that help students attain the following:

1. Establish broad and multiple perspectives on the individual in relationship to the larger society and world in which he or she lives, and to understand the responsibilities of living in a culturally and ethnically diversified world;
2. Stimulate a capacity to discuss and reflect upon individual, political, economic, and social aspects of life in order to understand ways in which to be a responsible member of society;
3. Recognize the importance of maintaining health and wellness;
4. Develop a capacity to use knowledge of how technology and science affect their lives;
5. Develop personal values for ethical behavior;
6. Develop the ability to make aesthetic judgments;
7. Use logical reasoning in problem solving; and
8. Integrate knowledge and understand the interrelationships of the scholarly disciplines.

INSTRUCTION AND CONTENT IN THE CORE CURRICULUM

Education, as distinct from training, demands a knowledge of various contrasting views of human experience in the world. Both the humanities and the visual and performing arts deal with the individual's reaction to the human situation in analytical and creative ways. The social and behavioral sciences deal with the principles and norms that govern human interaction in society and in the production of goods and services. The natural sciences investigate the phenomena of the physical world. Mathematics examines relations among abstract quantities and is the language of the sciences. Composition and communication deal with oral and written language. Each of these disciplines, using its own methodology, offers a different perspective on human experience. Taken together, study in these disciplines provides a breadth of vision against which students can establish and reflect on their own goals and values.

The outcomes which are specified for the disciplinary areas are thus intended primarily to provide students with a perspective on their experience through an acquaintance with the subject matter and methodology of each discipline. They provide students with the opportunity to understand how these disciplines present varying views of the individual, society, and the world, and of appreciating the methods by which scholars in a given discipline organize and evaluate data. The perspectives acquired in these studies describe the potential, as well as the limitations, of each discipline in understanding the human experience.

The objective of disciplinary studies within a core curriculum is to foster multiple perspectives as well as to inform and deliver content. Disciplinary courses within a core curriculum should promote outcomes focused on the intellectual core competencies, as well as outcomes related to establishing perspectives, and the basic concepts in the discipline -- methods of analysis and interpretation specific to the discipline.

Institutions are urged to consider development and utilization of appropriate interdisciplinary courses as a means of helping students develop multiple perspectives on the individual in relationship to other people and societies. Comparison and contrast of disciplinary perspectives on an issue within the context of a single course can be a particularly effective instructional device.

CORE COMPONENTS AND RELATED EXEMPLARY EDUCATIONAL OBJECTIVES

In designing and implementing a core curriculum of at least 42 semester credit hours, each Texas college and university should select and/or develop courses which satisfy exemplary educational objectives specified for each component area. The following exemplary educational objectives should be used as basic guidelines for selected component areas. Exemplary educational objectives become the basis for faculty and institutional assessment of core components.

Since it is difficult to define exemplary educational objectives for a core curriculum outside of some framework of the general areas of content, the objectives and outcomes described below are suggested as those that meet the intent of Senate Bill 148. The outcomes for student learning provide both guidelines for instruction and a profile of students as they complete each component of a core curriculum. Although these component areas could easily be "translated" directly into disciplinary or departmental terms, it is not necessary to restrict the areas to one or a few departments. These objectives could be met in a number of differing course configurations, including multi-disciplinary courses.

Colleges and universities across the state have specific missions and different roles and scope. The way in which colleges and universities achieve these outcomes will thus vary. These outlines are not intended in any way to impose restrictions on the creativity of the classroom instructor or to dictate pedagogical methods. The emergent profile of the students, however, will presumably have common characteristics insofar as they achieve the specified outcomes. A core curriculum experience will prepare them to learn effectively through the rest of their college years so that they carry these aptitudes for learning into their life careers.

I. COMMUNICATION (composition, speech, modern language)

The objective of a communication component of a core curriculum is to enable the student to communicate effectively in clear and correct prose in a style appropriate to the subject, occasion, and audience.

Exemplary Educational Objectives

1. To understand and demonstrate writing and speaking processes through invention, organization, drafting, revision, editing, and presentation.
2. To understand the importance of specifying audience and purpose and to select appropriate communication choices.

3. To understand and appropriately apply modes of expression, i.e., descriptive, expositive, narrative, scientific, and self-expressive, in written, visual, and oral communication.
4. To participate effectively in groups with emphasis on listening, critical and reflective thinking, and responding.
5. To understand and apply basic principles of critical thinking, problem solving, and technical proficiency in the development of exposition and argument.
6. To develop the ability to research and write a documented paper and/or to give an oral presentation.

II. MATHEMATICS

The objective of the mathematics component of the core curriculum is to develop a quantitatively literate college graduate. Every college graduate should be able to apply basic mathematical tools in the solution of real-world problems.

Exemplary Educational Objectives

1. To apply arithmetic, algebraic, geometric, higher-order thinking, and statistical methods to modeling and solving real-world situations.
2. To represent and evaluate basic mathematical information verbally, numerically, graphically, and symbolically.
3. To expand mathematical reasoning skills and formal logic to develop convincing mathematical arguments.
4. To use appropriate technology to enhance mathematical thinking and understanding and to solve mathematical problems and judge the reasonableness of the results.
5. To interpret mathematical models such as formulas, graphs, tables and schematics, and draw inferences from them.
6. To recognize the limitations of mathematical and statistical models.
7. To develop the view that mathematics is an evolving discipline, interrelated with human culture, and understand its connections to other disciplines.

III. NATURAL SCIENCES

The objective of the study of a natural sciences component of a core curriculum is to enable the student to understand, construct, and evaluate relationships in the natural sciences, and to enable the student to understand the bases for building and testing theories.

Exemplary Educational Objectives

1. To understand and apply method and appropriate technology to the study of natural sciences.
2. To recognize scientific and quantitative methods and the differences between these approaches and other methods of inquiry and to communicate findings, analyses, and interpretation both orally and in writing.
3. To identify and recognize the differences among competing scientific theories.
4. To demonstrate knowledge of the major issues and problems facing modern science, including issues that touch upon ethics, values, and public policies.
5. To demonstrate knowledge of the interdependence of science and technology and their influence on, and contribution to, modern culture.

IV. HUMANITIES AND VISUAL AND PERFORMING ARTS

The objective of the humanities and visual and performing arts in a core curriculum is to expand students' knowledge of the human condition and human cultures, especially in relation to behaviors, ideas, and values expressed in works of human imagination and thought. Through study in disciplines such as literature, philosophy, and the visual and performing arts, students will engage in critical analysis, form aesthetic judgments, and develop an appreciation of the arts and humanities as fundamental to the health and survival of any society. Students should have experiences in both the arts and humanities.

Exemplary Educational Objectives

1. To demonstrate awareness of the scope and variety of works in the arts and humanities.
2. To understand those works as expressions of individual and human values within an historical and social context.
3. To respond critically to works in the arts and humanities.
4. To engage in the creative process or interpretive performance and comprehend the physical and intellectual demands required of the author or visual or performing artist.
5. To articulate an informed personal reaction to works in the arts and humanities.
6. To develop an appreciation for the aesthetic principles that guide or govern the humanities and arts.
7. To demonstrate knowledge of the influence of literature, philosophy, and/or the arts on intercultural experiences.

V. SOCIAL AND BEHAVIORAL SCIENCES

The objective of a social and behavioral science component of a core curriculum is to increase students' knowledge of how social and behavioral scientists discover, describe, and explain the behaviors and interactions among individuals, groups, institutions, events, and ideas. Such knowledge will better equip students to understand themselves and the roles they play in addressing the issues facing humanity.

Exemplary Educational Objectives

1. To employ the appropriate methods, technologies, and data that social and behavioral scientists use to investigate the human condition.
2. To examine social institutions and processes across a range of historical periods, social structures, and cultures.
3. To use and critique alternative explanatory systems or theories.
4. To develop and communicate alternative explanations or solutions for contemporary social issues.
5. To analyze the effects of historical, social, political, economic, cultural, and global forces on the area under study.
6. To comprehend the origins and evolution of U.S. and Texas political systems, with a focus on the growth of political institutions, the constitutions of the U.S. and Texas,federalism, civil liberties, and civil and human rights.
7. To understand the evolution and current role of the U.S. in the world.
8. To differentiate and analyze historical evidence (documentary and statistical) and differing points of view.

9. To recognize and apply reasonable criteria for the acceptability of historical evidence and social research.
10. To analyze, critically assess, and develop creative solutions to public policy problems.
11. To recognize and assume one's responsibility as a citizen in a democratic society by learning to think for oneself, by engaging in public discourse, and by obtaining information through the news media and other appropriate information sources about politics and public policy.
12. To identify and understand differences and commonalities within diverse cultures.

VI. INSTITUTIONALLY DESIGNATED OPTION

An institution may wish to include in its core curriculum courses that address exemplary educational objectives not covered in the preceding broad discipline categories. Such courses may include computer literacy, kinesiology, health/wellness, interdisciplinary or linked courses, or other courses that address a specific institutional role and mission.